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Editorial

In this issue, we continue to focus on the early first millennium BCE, since questions concerning the extent of the Kingdom of David and Solomon are even more pertinent as new archaeological discoveries are unearthed. The first paper by Gershon Galil sheds light on the oldest inscription found recently in Jerusalem near the Temple Mount. Its interpretation is still cloaked in fog. Within less than a year of its discovery quite a few theories have been proposed as to its meaning, date, and even whether the letters should be read left to right or *vice versa*. Galil breaks new ground by suggesting that this inscription should be read from right to left and describes a jar of poor quality wine. He proposes that this was possibly given to those workers who helped build Solomon's Temple. The following study by Nava Panitz-Cohen and Robert Mullins discusses their first season of excavation of the Biblical Abel Beth Maacah, near the border with Lebanon. Here are numerous remains from the period of the monarchy. This site is particularly interesting as it is much smaller than either the mighty Tel Hazor or nearby Tel Dan but probably has some similar features. The excavators have already found sections of a possible fortification. Volunteers wishing to participate next season are keenly needed, so please get in touch with either of the authors.

Two papers deal with the Hasmonean kingdom and the Jewish revolt against Rome. David Jacobson's study reveals that the depictions on the coins of John Hyrcanus I are evidently Greek military symbols indicating victory for Hellenistic kings and that they relate much less to Jewish custom. Yehuda Rapuano, who has been studying early first and second century CE pottery for many years, has identified typical forms that he believes are indicative of the years up to the founding of Aelia Capitolina in 135CE. He suggests that these pottery forms indicate Judean culture was not weakened after the destruction of the Temple in 70CE, but strengthened until the start of the Second Jewish Revolt in 132CE.

Next, there are two papers dealing with the late Byzantine period. One, by Michael Decker on the end of Holy Land wine trade overseas throughout the Mediterranean, where he emphasizes that the seventh-century invasions had a significant impact on revenues and economic vitality for the whole region. The second paper, by a team led by Oren Tal, re-examines an earlier excavation of a refuse pit, and discusses an extremely rare 8th-century glass mold made of limestone along with other glass-making debris. A glass-making workshop must have existed nearby.

The last two papers deal with more recent history. The first is by Stephen Rosenberg who studied the work of Charles Warren when he went to visit Airaq al-Amir in Transjordan in the heat of mid-July 1867. The second is a report by Ayala Zilberstein and Ariel Shatil of some British Mandate-era finds including sewer pipes from the excavation near the Dung gate in Jerusalem. Similar to the Romans, the first thing the British did in a new town was to build a good sewer.

Astute readers will notice that not only do we have more articles but that the number of reviews, too, has nearly doubled, an indication of the wealth of new books appearing. Sandra Jacobs has done an outstanding job of collecting them. I should like to thank all those who helped produce this volume and especially Barbara Barnett, Rupert Chapman and Rachel Sparks. We are very grateful to Joey Silver, whose kind support towards meeting the costs of publishing the journal has significantly helped the Society. Finally, I would like to encourage anyone who would like to know more to visit our website: www.aias.org.uk.

David Milson
Editor

Contents

Reviews

'yyn ḫlq'
The Oldest Hebrew Inscription from Jerusalem

Gershon Galil
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This article offers a new reading of the inscription unearthed in 2012 at the Ophel in Jerusalem. It reexamines its script, language, and vocabulary, as well as its historical and cultural context. In my opinion this text was written in the late Canaanite script, in Hebrew, and it indicates that there were scribes in Jerusalem who were able to write texts as early as the second half of the 10th century BCE. Here is my new transliteration and translation of this inscription: […]ʳmʾ ʳyyʾn ḫlq m[…]*: '*[in the … year], wine of inferior quality, (sent) from GN*'. The inscription is divided into three categories: (a) a date formula; (b) classification of wine; and (c) provenance. The form* yyn *indicates that the language of this inscription is Hebrew, written in the southern dialect. In Ugaritic, Old Canaanite, Phoenician, Ammonite, and even in Israelite Hebrew as attested in the Samaria Ostraca, wine was typically written with only one yod (*yn; ye-nu; *indicating the reduction of the diphthong). Yet, in (southern) epigraphic Hebrew at Lachish, Arad and other sites the form is always* yyn. *Similarly, this form appears in Biblical Hebrew without exception, Ben Sira, Qumran, and even in the Rabbinic sources.*

Introduction

A new inscription was unearthed during the 2012 excavations in Jerusalem, ca. 80 m south of the southern wall of the Temple Mount by Eilat Mazar and her team, during the archaeological excavation under the auspices of the Institute of Archaeology of the Hebrew University in Jerusalem. The inscription was incised below the rim of a *pithos* while the clay was still moist. Two potsherds of this *pithos* were discovered and were joined by Mazar's team. These two fragments were found under a wall of a large building constructed on bedrock. Where the bedrock featured a slight depression, a group of large pottery fragments from seven *pithoi* including these two inscribed potsherds was placed to stabilize the earth under this section of the building. The inscribed *pithos* dates to the 10th century BCE.

A week after the July 10, 2013 Hebrew University press release on the subject (with two excellent photographs of the inscription, Smith 2013) a scientific article appeared (Mazar, Ben-Shlomo and Ahituv 2013). Several days later, Galil, Rollston

and Demsky presented alternative readings of the inscription (Galil 2013a; 2013b; Demsky 2013; Rollston 2013), and three weeks later Lehman and Zernecke's paper was published (Lehman and Zernecke 2013). On August 15, 2013, I examined the original inscription at the Institute of Archaeology of the Hebrew University in Mount Scopus, Jerusalem.[1] The number and speed of these studies is one indication of the importance of this new find.

Critical Review of Previous Readings

Ahituv's reading

The *editio princeps* of this inscription was published by Ahituv (*cf.* Mazar, Ben-Shlomo and Ahituv 2013: 45–47). Since the letters tend to the left, he reads the following letters from left to right: *mem, qop* (less likely *reš*), *pe, ḥet, nun*, *lamed* (or two broken letters), and *nun*. Ahituv points out that the inscription was incised before firing, and written in a Proto-Canaanite/Early-Canaanite script. He proposed that it may refer to the name of the owner of the *pithos,* its addressee, or contents, but was unable to present any meaningful reading and claimed that it is enigmatic. He dates the letters to the 11th–10th centuries BCE, without determining its precise language. However, the press release points out that the language is not Hebrew, and may be Jebusite.

Ahituv's proposal raises a number of difficulties, primarily that the reading direction is not clear. In this period it was indeed possible to write from left to right (dextrograde) or from right to left (sinistrograde), yet the slant of the letters can not indicate reading direction. While some letters in this inscription tend to the left, the letter *ḥet* tends to the right. In other inscriptions the slant of the letters is not consistent and does not match the reading direction: for example, several letters in the Qeiyafa inscription tend to the right, although it was certainly written from left to right. For example, the *šin* at the beginning of line two; the letter *bet* in the first three lines; and others; some letters are straight and others tend to the right. Similarly, in the Gezer inscription, written from right to left, some letters tend rather to the left. For example, the writing direction of the letter *reš* in lines six (twice) and seven. These inscriptions show that the slant of the letters can not be used as an indicator for reading direction.

Ahituv suggested that the sixth letter is a possible *lamed* (or two broken letters), but he is not sure about the meaning of the long vertical line which appears below the break. He mentioned that it might be a tail of a letter, but in any case it is not a continuation of the left line above it, the left side of his reconstructed *lamed* (Mazar, Ben-Shlomo and Ahituv 2013: 45). He claims, furthermore, that it is not a casual incision.

Rollston’s reading

Rollston, following Ahituv, also reads the inscription from left to right, but sees the following letters: *mem, qop*, *lamed, ḥet, nun*, *reš,* [*dalet?*]*, šin*, and translates the inscription as: ‘Pot belonging to Ner’ (*mqlḥ nr*). He identifies *mqlḥ* with Biblical *qlḥt* (‘pot’ or ‘cauldron’), an Egyptian loan word, attested in 1 Sam 2:14 and Micah 3:3. His alternative reading is: *mqlḥ nr*[*d*], but he prefers *nr,* an attested personal name (*cf.* 1 Sam 14:50, Abner son of Ner), pointing out that ‘I would certainly not propose an identification of these biblical and epigraphic figures on the basis of the evidence at hand, especially since the reading ‘Ner’ is not certain’. He dates the inscription to the 11th century BCE, and defines the script as an ‘Early Alphabetic script, (that is Proto-Canaanite)’. In his opinion the language is probably Canaanite.

Rollston’s proposal is problematic for several reasons. The term *qlḥ* or *mqlḥ* is not attested in any Ancient Near Eastern text. BH *qlḥt* is an Egyptian loan word (the original word in Egyptian is *qrḥt*). Athas pointed out that ‘It would be unusual for a loanword of this kind to come prefixed with a noun-making *mem*’ (Athas 2013). Moreover, *qlḥt* in BH is a cooking pot, as in Micah 3:3: ‘you shared them like flesh into a pot (*sir*) / like meat into a cauldron (*qlḥt*)’ or 1 Sam 2:13–15: ‘…the priest’s servant would come while the flesh was stewing and would thrust a three-pronged fork into the *kior* or the *dud* or the cauldron (*qlḥt*).’[2] However, this inscription was inscribed on a large storage vessel, not a cooking pot. Why should anyone write on a cooking pot that it is a cooking pot—especially if it is not a cooking pot but a large storage vessel?

Moreover, Petrovitch has already remarked critically that the reading of a *reš* after the *nun* (‘Ner’) is untenable: ‘the name, ‘Ner’, is quite dubious here, because it was demonstrated that the sixth letter almost certainly cannot be a *resh*. The reading of this letter seems far too forced and perhaps even driven by this possible connection with a known Hebrew name’ (Petrovitch 2013).

Dating the inscription to the 11th century is impossible: the archaeological data completely rule this out since the inscription has been incised under the rim of a Type B *pithos*. This type is dated by archaeologists not earlier than the late 10th–9th century BCE.

Rollston’s alternative reading *mqlḥ nr*[*d*] (‘pot of nard’) is also impossible since the capacity of this *pithos* would be rather large for this precious commodity (for the term NRD see Brown 1969: 160–161). Furthermore, Rollston does not suggest any explanation for the right-most letter which he believes is a *šin*.

Demsky’s reading

Demsky (2013) reads the following letters (from left to right): [*ḥet*], *mem, reš, lamed, ḥet, nun*, [*nun*], [*?*]*, nun*, namely: ‘[*ḥ*]*mr lḥn*[*n*]’ = ‘[wi]ne belonging to

Han[an]' (Deut. 32:14; Isa. 27:2); or '[Ho]mer belonging to Han[an]' = Homer is a dry measure (=10 *eiphah*, of wheat or barley, see Num. 11:32; Lev. 27:16). Hanan reminds Demsky of 'the early clan of Bene Hanan located in the vicinity of Beth Shemesh and Timnah'; in his opinion, 'This family seemingly was part of Solomon's local administration' (1 Kgs. 4: 9).

Demsky's proposal is untenable for several reasons: first, the reconstructed *nun* (sixth letter) is unreasonable, and it is clear that the right-most *nun* has nothing to do with the personal name Hanan. Demsky does not suggest any explanation for the vertical line between the unreasonable *nun* and the right-most *nun*. This is not a space but the tail of a letter, clearly not related to the unreasonable *nun*. The second letter on the left is a *qop* not a *re*š. For these reasons the reading '[*ḥ*] *mr lḥn*[*n*]' is unsound. Moreover, Beth Hanan in 1 Kings 4; 9 is a toponym not a family name.[3] In addition to all these Demsky does not suggest any explanation for the right-most letter, which he believes is *nun*.

Lehman and Zernecke's reading

These scholars (2013), reiterated Ahituv's readings, with only two slight differences (see Table 1). They reconstructed two letters (6–7: *mem* and *ṣade*) without suggesting any meaningful reading. There is little point in reconstructing letters if they do not yield a meaningful interpretation. One may present endless speculations, especially since the stances and forms of the letters are not yet fixed.

Transliteration and Translation

In my opinion this inscription reads from right to left, as follows: […]ר*m*ר ר*yy*ר*n ḫlq m*[…], namely: '[in the … year], wine of inferior quality, (sent) from GN' (see Figure 1). The inscription is divided into three categories: a) a date formula; b) classification of wine; and c) provenance. This structure is similar to the information attested in the Egyptian wine jars labels (*ca*. 448 texts), dated to the 15th–12th centuries BCE (see Wahlberg 2012; and Guach Jané 2008; 2011; Poo 1995). These jar labels are divided into categories, presented usually in the following order: date; classification of the wine; provenance (place of production); and ownership, see e.g., 'Year 5, Sweet wine – from the estate of Aton,' etc. (Černý 1965: 22, no. 12). In the Samaria Ostraca a similar order is attested: most inscriptions open with a date formula: *bšt.htš't* / *h'srt* / 15, etc. (see Ahituv 2008: 258–310, with earlier bibliography). In Judah the formula is similar but the spelling of the word 'year' is different: *šnh* or *šnt* instead of *št*, see e.g. '*bšnh hššt*', 'In the sixth year,' (see Ahituv 2008:180). Similar jar labels were found at other sites including Shiqmona, Gaza, and others (*cf*. below and the information attested in over 2,000 Aramaic ostraca found in Nisa, the Partian capital, dating to the 1st century BCE, which

Ahituv		מ	ק	פ	ח	נ	[ל?]	?	נ
Rollston		מ	ק	ל	ח	נ	[ר]	[ד?]	ש
Demsky	[ח]	מ	ר	ל	ח	נ	[?]	[?]	נ
Galil	x	מ	ק	ל	ח	נ	ויז	ויז	ומז
Lehman & Zernecke		מ	ק	פ	ח	נ	מ	צ	נ

Table 1: Comparison of the suggested readings of the inscription’s letters

Figure 1: Reconstructed Reading of the Inscription.

also includes date formulae, and the wine’s quantity, quality and provenance, Diakonoff and Livshits 1976).

Script

This issue was discussed in detail in earlier studies (mainly Ahituv’s), so there is no need here to repeat arguments already presented in research. I refer the

reader to the comprehensive discussion on this issue in my study of the Qeiyafa inscription (Galil 2009 [2010]: 199–207, and Tables 2–3, 239–242). The similarity between this prominent inscription and the new Ophel inscription is already well attested. Therefore, the following discussion will focus on the letter *yod*.

The sixth and the seventh letters are in my opinion two *yod*s, similar in form to the *yod* attested in the Qeiyafa inscription (second line, second letter from the right). The reading of this letter in the Qeiyafa inscription as a *yod* was first proposed by Ada Yardeni (2009; 259).

Two lines of the sixth letter survived on the potsherd, an upper and a lower one, whereas from the seventh letter only the upper tail is attested on the pot. Both letters are similar in form and stance, though the sixth letter inclines southwest. The angles of upper tails of the letters are different: the tail of the seventh letter is vertical and faces south, while the tail of the sixth letter turns southwest, and this is also the general direction of the bottom line of this letter which was preserved. So it is likely that these letters are not identical, since the seventh tends to the south, and the sixth to southwest (see Figure 1). These *yod*s are mirror images of the regular letter attested in other inscriptions from this period in form/stance, and turned 90 degrees. In the Qubur el-Walaida bowl and in the ‘Izbeth Ṣarṭa ostracon (line 3) the *yod* is in the form of the Latin ‘F’.

These two letters are similar in form to the archaic forms attested in Late Bronze inscriptions, e.g., the Lachish ewer and the Gezer jar inscriptions, and cf. also the Wadi el-Hol inscriptions, dated to the 18th century BCE (Hamilton 2006: 108–111, 324–326, with earlier bibliography, see also Galil 2009 [2010]: Table 3, 240–242).

The forms and stances of the letters in this inscription, as well as in the Qeiyafa inscription are not yet fixed: the left-most and right-most letters are *mem*s but their stance is different. If the right-most letter is a *nun*, it is wholly different from the fifth letter, which is clearly a *nun*. The forms of the two *yod*s are also different, as suggested above.

Vocabulary and Language

Date Formula

The right-most letter is a *mem* or a *nun*; both readings are possible, but I prefer the first. This is probably the final letter of a date formula, whose reconstruction is unclear. Therefore I will present four possible options below, the first two with the right-most letter *mem*, the last two with the right-most letter *nun*.

First option: [*bšnt* …]*m*, or [*bšn(h) h*…]*m* or [*b*…]*m*, namely, ‘In the … year’. Only a few years end with a *mem*, e.g., 20, 30, etc.: [*bšnt ʿsr*]*m* or [*bšnt šlš*]*m*, or [*bšn(h) hʿsr*]*m* or [*bšn(h) hšlš*]*m* or [*bʿsr*]*m* or [*bšlš*]*m*. Since the inscription was unearthed in the Ophel (between the City of David and the Temple Mount), an

area which was not inhabited before the reign of Solomon, and since Rehoboam and Abijah/m ruled less than 20 years, the only two possibilities are Solomon’s 20th or 30th year, namely ca. 950 or 940 BCE. The reading ‘in (Solomon’s) 40th year’ is less likely since it is not clear if King Solomon actually reigned 40 years or whether this number is rounded (Galil 1996; 2004; 2012a). The short formula [*bšlš*] *m,* not [*bšn(h) hšlš*]*m* is attested in the Arad inscriptions (no. 20): *bšlšt* (Ahituv 2008: 122), and on a jar from Lachish II: *brb‘t* (Lemaire 2004: 2123–2124).

Second option: [*bšnt* …, *byrḥ ’tn*]*m*, or [*b*…, *byrḥ ’tn*]*m*, namely ‘[In the … year, in month Ethan]im’. See e.g., Arad inscriptions, no. 20: *bšlšt [b]yrḥ ṣaḥ*, ‘In the third year, in month Ṣaḥ’ (according to Aharoni 1975: 42–43); or: *bšnh hššt*, *bšb‘y,* ‘In the sixth year, in seventh month’ (Ahituv 2008: 180). Month Ethanim (*yrḥ h’tnym*) is mentioned in 1 Kgs 8:2 (see Galil 2012b), as well as in three Phoenician inscriptions from Cyprus, dated to the 4th–3rd centuries BCE (*yrḥ ’tnm* – see KAI, nos. 37, 41, 289).

Third option: [*bšn(h) hr’š*]*n*, or [*br’š*]*n*, namely ‘In the first year’ (without vowels or suffixes), *cf*. the form *’lmn* (instead of *’lmnh*), in the Qeiyafa inscription (Galil 2009 [2010]: 211). If this option is preferred, the date of the inscription will supposedly be the first year of the following kings of Judah: Rehoboam (931/30 BCE), or Abijah/m (914 BCE), or Asa (911 BCE), (see Galil 1996: 147).

Fourth option: [*bšn(h)… br’š*]*n*, namely, ‘In the … year, in the first month,’ *cf*. *bšnh hššt*, *bšb’y,* ‘In the sixth year, in seventh month’ (Ahituv 2008: 180); or *bšnh hššt*, *bššy*, ‘In the sixth year, in the sixth month’ (Ezekiel 8:1), and others. This reading is less probable since in the 10th century the months were probably enumerated by their names (Ethanim, Bul, Ziv, etc.) and not by their number (the first, the second, etc.).

The exact date of this inscription can not be fixed precisely. The ‘Late Canaanite’ script may indicate that it should be dated to the first half of the 10th century BCE, but the archaeological context points to a later date (late 10th – 9th century BCE?). The Biblical sources fit well with the second half of the 10th century BCE; this could be a satisfactory compromise, well-suited to both the paleography and the archaeology.[4]

Wine Classification

yyn

The form *yyn* indicates that the language of this inscription is Hebrew, written in the southern dialect: in Ugaritic, Old Canaanite, Phoenician, Ammonite, or even in Israelite Hebrew (attested in the Samaria Ostraca) wine was always written with

only one *yod (yn; ye-nu;* indicating the reduction of the diphthong). However, in (southern) Hebrew the form is always *yyn,* in Epigraphic Hebrew (Lachish, Arad and more), Biblical Hebrew (without any exception), Ben Sira, Qumran, and even in the Rabbinic sources.

The form *yn* appears in Ugaritic texts dozens of times (see KTU, passim; HALOT 409–410; Del Olmo Lete and Sanmartín 2003: 968–971; Halayqa 2008: 376). In Old Cannanite the form *ye-nu* is attested in a Tri-Lingual cuneiform fragment from Tel Aphek: [GEŠTIN].MEŠ : *ka-ra-nu*: *ye-nu (see* Rainey 1983: 137; Izre'el 1998: 425). In Israelite Hebrew the form *yn* is attested dozens of times in the Samaria Ostraca, dated to the 8th century BCE (see Ahituv 2008: 258–310). In Ammonite the form *yn* appears in an administrative ostracon from Heshbon, dated to the late 7th or early 6th century BCE (see Aufrecht 1989: 807–8; Ahituv 2008: 370–374). In Phoenician the term *yn* appears on two jar inscriptions from the 4th century BCE. One of them was found in Shiqmona, near Haifa in the north, and the other was bought in Gaza (see Cross 1968: 226–233; 2003: 286–289; Naveh 1987: 27; 2009: 324).

The form *yyn* is attested in Lachish Ostraca, nos. 25 and possibly also 9; and in the Arad Ostraca, nos. 1–4, 8, 10–11 (see Aharoni 1975: 12–20, 26–27; Ahituv 2008: 84, 88–89, 92–103, 109–112). It also appears on a jar from the Hebron area (Idna, Tell 'Aiṭun or Khirbet el-Qom?): 'Belonging to Yahzeyahu, blue (dark?) wine, E' (see Avigad 1972: 1–5; Demsky 1972: 233–234; Paul 1975: 42; 2005: 71); and compare also the jar inscription: *lmtnyhw. yyn.nsk. rb't*, 'Belonging to Mattanyahu, libation wine – (one) quarter,' published by Deutsch and Heltzer (1994: 23–26).

yyn ḫlq

The term *yn ḫlq* is attested only once in an Ugaritic text (RS 16.127 = UT 1084 = KTU 4.213). This administrative text enumerates quantities and qualities of wine and records its storage places (in ll. 1–23). Its second part (ll. 24–30) lists the quantities of wine consumed by various officials and priests for different purposes, including wine used during the offering of sacrifices, wine for messengers who left for Egypt and for other military personnel, and more. In Heltzer's opinion this text enumerates ca. 24,000 litres of wine of various qualities (Heltzer 1993: 49). The term *yn ḫlq* appear only in the first paragraph of this text (ll. 1–3): '15 (jars of) good wine (*yn.ṭb*), and 90 heavy jars of second quality wine (*kdm.kbd.yn.d.l.ṭb*), and 40 (jars of) inferior quality of wine (*yn ḫlq*) – (all jars are stored at) Gath-*SKNM*'.

It is clear that wine quality is presented in this paragraph in descending order: good wine, second quality wine, and inferior quality wine. Second quality wine,

GEŠTIN.UŠ is attested in the Mari tablets [ARM 9 17:12, 186:1], and may be a synonym for *yn.d.l.ṭb* (Powell 1996: 113–114; CAD, K, p. 205; and recently Chambon 2011: *passim*).

On the one hand, most scholars translate *yn ḫlq* as bad wine, wine of poor/inferior quality, emphasizing that the term *ḫlq* in Ugaritic means lost, missing, destroyed or spoiled (see Del Olmo Lete and Sanmartín 1996: 192). This is also the meaning of the Akkadian adjective *ḫalqu* (CAD, H: 192). Virolleaud in his *editio princeps* of RS 16.127, published in 1957, translated *yn ḫlq* as ‘mauvais vin’ (Virolleaud, 1957: 107, 208). This interpretation was accepted by Gordon in 1965 (UT: 402, 410), and Delavault and Lemaire reached a similar conclusion in 1975. They suggested the following translations: ‘vin abîmé, vin perdu, mauvais vin’ (Delavault and Lemaire 1975: 36). In 1984, Aartum devoted a special discussion to this issue and presented similar results: he translates *yn ḫlq* as *verdorbener Wein* (Aartum 1984: 26). This is also the suggested translation of Del Olmo Lete and Sanmartín in their excellent dictionary (2003: 394, 969): ‘*ḫlq* = Ruined, spoilt, said of wine turned sour with time: *yn ḫlq* = spoilt wine (sour with time)’.

On the other hand, Xella (1979: 837, note 12), suggested that *yn.ḫlq* refers to lost jars of wine, and not to the quality of the wine. His proposal is unreasonable for two reasons. First, it is clear that all jars are stored at Gath-*SKNM*. If the author wished to point out that these 40 jars of wine were lost, he would surely have enumerated first the jars stored at Gath-*SKNM* and then the lost wine, e.g.: ‘15 (jars of) good wine, and 90 heavy jars of second quality wine (are stored at) Gath-*SKNM*; 40 (jars of) of wine – are lost’. But this is not the wording of this text. One cannot indicate in one sentence that the wine was lost and immediately assert that it was stored (*…w’rb‘m yn – ḫlq, bgt sknm* = ‘...and 40 jars of wine are lost, stored at Gath-*SKNM*’). The author might say either that they are lost or that they are stored but not both. Each of the first 12 paragraphs of this text (ll. 1–23) ends with a GN which defines the storage place of the wine. Furthermore, if 40 jars of wine were indeed lost, one would expect the scribe to specify the quality of that lost wine, which he does in other cases as wine is classified in this text 25 times.

The Akkadian word *ḫalqat* is attested in a Canaanism found in one the El-Amarna letters sent by the scribe of Abdi-Hepa, king of Jerusalem, to his lord the king of Egypt (EA 288: 52): ‘*ḫal-qa-at // a-ba-da-at*’ = she has been lost (the king’s land). Akkadian *ḫal-qa-at* and Canaanite *a-ba-da-at* are presented as synonyms, indicating that the Akkadian words *ḫalqat*, *ḫalqu* were known to the Canaanite scribes of Jerusalem in the LB (*cf*. Knudtzon 1915: 872; Hoftijzer and Jongeling 1995: 4; Izre’el 1998: 424; and Moran 1992: 331–332).

yyn ḫlq: Synonyms and Related Terms

yyn ḫlq is similar to other related terms attested in the HB, the Arad inscriptions, and in Greek, Roman, and Rabbinic sources. Two of these possible synonyms are *ḥmṣ yyn* and *ḥmṣ*. The term *ḥmṣ yyn* appears in the regulations for a Nazirite in Num 6:3:

מִיַּיִן וְשֵׁכָר יַזִּיר, חֹמֶץ יַיִן וְחֹמֶץ שֵׁכָר לֹא יִשְׁתֶּה; וְכָל מִשְׁרַת עֲנָבִים לֹא יִשְׁתֶּה,
וַעֲנָבִים לַחִים וִיבֵשִׁים לֹא יֹאכֵל

He (the Nazirite) shall abstain from wine and any other intoxicant; he shall not drink vinegar of wine (*ḥmṣ yyn*) or of any other intoxicant, neither shall he drink anything in which grapes have been steeped, nor eat grapes fresh or dried.

It is clear that these regulations refer not to raw vinegar, but to a sort of drink based on vinegar heavily diluted with water (see below) or a mixture of water with wine which turned sour with time. A synonym for *ḥmṣ yyn* is probably the term *ḥmṣ* which appears in the Arad inscriptions, no. 2, ll. 7–8: 'And if there is more vinegar (*ḥmṣ*, left in stock) – then give it to them' (to the Kittiyim, the Cypriot mercenaries). Aharoni identified *ḥmṣ* in the Arad inscriptions, with Biblical *ḥmṣ yyn* (1975: 17, 143, no. 2; 'Bad wine sent in bulk during an emergency'). Lemaire expressed a similar opinion two years later: '*ḥmṣ* = a cheap wine made by mixing water and grape residue and allowing it to ferment… this is a usual drink of rural workers and soldiers' (1977: 163). Recently Ahituv also identified both *ḥmṣ* with *ḥmṣ yyn* with the well-known Roman drink *posca*: this 'mixture of vinegar and water, sometimes sweetened with honey, was a popular beverage of the Roman legionaries. It is very likely that the Kittiyim too were fond of such a beverage. Perhaps the prohibition on drinking vinegar in the Nazarite regulations refers not to raw vinegar but to a similar beverage' (Ahituv 2008: 98; for the term *posca* see also Roth 1999: 37–38, 40; and Dalby 2003: 270, with earlier bibliography).

Another synonym attested in ancient Near Eastern texts is the Sumerian term GEŠTIN-BÍÁ-LÁ = Akkadian, *ṭābātu* = *vinegar,* but it also refers to wine which turned sour with time (see CAD, 'Ṭ': 5*: ina* GEŠTIN.MEŠ *em-ṣi u* A.GEŠTIN.NA *talâš* = you knead [the ingredients] in sour wine or vinegar'). The term GEŠTIN *emṣu* = sour wine (CAD, E: 152–153), is also attested in Rabbinic literature (*yyn hḥmyṣ*, or *yyn kwss*).[5]

Dalby summarized recently the information about other inferior quality wines from Greek and Roman texts: 'Cheap wines, typically for farm workers, were made in several ways… Latin *lora, lorea,* Greek *thamna* (θάμνα) was a secondary wine made from the maceration of newly pressed marc… Greek *deuterios* (δευτέριος) was made by diluting the must and then cooking it….,' (Dalby 2003: 353; *cf*. Ramsay 1875: 1203; Kruit 1992). All these sorts of inferior wine were usually served to workers, soldiers, and other common people.

Provenance of the Wine

The left-most letter is clearly a *mem,* and therefore the meaning of this reading is: *m*[…] = 'from …'. The *mem* was probably followed by a toponym, which was unfortunately lost, since the potsherd is broken at this point. A similar category is attested in Egyptian jar labels dated from the 15th–12th centuries BCE, in the Samaria Ostraca, and elsewhere.

Historical and Cultural Context

The new inscription unearthed in 2012 at the Ophel in Jerusalem is extremely important and fascinating, even though only a few letters survived on these two potsherds. It is written in late Canaanite script, in (southern) Hebrew, and should be dated to the second half of the 10th century BCE. It is therefore the oldest Hebrew inscription ever found in Jerusalem, perhaps even 250 years earlier than other Hebrew inscriptions from there. Although it is impossible to fix the inscription's exact date, any attempt to understand its historical context must be restricted to the chronological framework presented above, namely the second half of the 10th century BCE which opens with the third decade of Solomon's reign. The controversy over the historicity of the biblical descriptions of the kingdom of David and Solomon is well known and this short article is not the place to re-examine this complicated issue. The following scenario is based on my judgement that the Kingdom of David and Solomon was a real historical phenomenon, and that the biblical description of its formation and consolidation is reasonable (see Galil 2007; 2009 [2010]; 2012a; 2012d, and forthcoming).

In his third decade, Solomon completed his monumental building projects in Jerusalem including the Temple and his palace. In a recent study I have pointed out that it is within reason to suggest that the Temple was built in the days of Solomon, and the building story was composed by Solomon's scribes, since no king in the Ancient Near East caused his scribes to compose a building story or inscription in honor of another king. It is even less plausible that a king would build a temple or a palace and say that it was the work of one of his predecessors (see Galil 2012b). These projects, the Temple and the palace, were started in Solomon's fourth year, and were completed *ca*. 20 years later, in the third decade of his reign (1 Kgs 6, 38; 7:1; 10:24; 11, 26–27, 40). Only a few years later, in 944/3 BCE, Shishaq became king of Egypt, and this fact probably accelerated the process of a popular uprising against Solomon, headed by Jeroboam who was in charge of the forced labour of the house of Joseph. Jeroboam's revolt and escape to Shishaq, king of Egypt, is related to the project of the building of the Millo. Whether one accepts the identification of the Millo with the Ophel or not, it is reasonable that Solomon was the king who inhabited the Ophel and it was he

who built the wall of Jerusalem which united its three main quarters: the Temple Mount, the Ophel and the city of David (1 Kgs 3:1; 10:15).

The new inscription suggests, in my opinion, that large quantities of inferior wine were used in Jerusalem. This cheap wine was certainly not served at Solomon's table or used in the Temple. So one could suppose that it was served to the manual laborers who were engaged in the large-scale building projects in Jerusalem and perhaps also to the soldiers who served there. The food needed for these forced laborers (barley, water, cheap wine, and more) was probably held in the Ophel. Inferior wine was also served to the Cypriot mercenaries in Arad and in later times to workers and soldiers in the Hellenistic and Roman periods.

The inscription also indicates that there were scribes able to write texts in Jerusalem as early as the second half of the 10th century BCE. These scribes may have been Canaanites or other non-Israelites since David and Solomon employed non-Israelites in their government, even in very senior positions, including the office of the Chief Scribe. David's scribe was Shisha, and his sons were appointed as Solomon's chief scribes (Mazar 1986: 111–138). So it would not be surprising that this inscription was written in the 'Late Canaanite script' (as was the Qeiyafa inscription), and that it indeed reflects the southern Hebrew dialect; but it also uses archaic technical terms like *ḫlq* to define this inferior wine.

The forms and stances of the letters in this inscription (as well as in the Qeiyafa inscription) are not yet fixed – a phenomenon typical of pictographic scripts. But this inscription is written from right to left, while the Qeiyafa inscription runs from left to right. This fact may indicate that it is the beginning of the regulation of the reading direction.

Scribes who were capable of writing administrative texts are also able to compose literary and historiographic texts (as clearly demonstrated recently by the Qeiyafa inscription). This fact is of major importance for reconstructing the process of the crystallization of the Bible, and even more for the understanding of the history of Israel and Jerusalem in Biblical times.

Notes

1 I thank Eilat Mazar for her permission to examine the inscription, and for the detailed and interesting conversation about its historical and archaeological context.
2 For the term *qlḥt* see Kelso 1948: 31, no. 76; Lambdin 1953: 154.
3 cf. Petrovitch’s critical remark: ‘As for Demsky’s proposal that the owner was named Hanan, this reading completely fails to account for the presence of the sixth letter… as well as the potentially non-incidental space that follows the sixth letter. It would be better to risk identifying this letter than to pretend a space is to be read for it and merely ignored. For this reason, in no scenario whatsoever does ‘Hanan’ appear to be an acceptable interpretation of the last word (Petrovitch 2013).
4 For a similar problem related to the inscriptions from Eshtemo’a, see Renz 1995: 65–66; Lemaire 2012: 302.
5 See: m. B. Qam. 9, 2; m. B. Bat. 6, 3; b. B. Bat. 97b; y. Pesaḥ 2, 7, 29c; for this classification of wine see Paul 2005: 73; and *cf*. Powell 1996; Chambon 2011; for the term GEŠTIN *emṣu* in Hittite texts see Gorny 1996: 150.

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Northern Exposure: Launching Excavations at Tell Abil el-Qameḥ (Abel Beth Maacah)

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Tell Abil el-Qameḥ, identified with the Biblical site of Abel Beth Maakah, is an imposing site strategically located on the farthest northern border of Israel, a border in antiquity as well as today. In the Iron Age, this boundary separated – and joined – Israelites, Phoenicians and Arameans. In the Bronze Age, it served as a springboard for relations with the great kingdoms in Syria and Mesopotamia. Despite its prominence and strategic importance, the site had never been excavated. Following a survey in 2012 led by the authors, excavation began in the summer of 2013. Iron Age remains exist just under the topsoil in the two areas explored this first season. In the center of the eastern slope (Area A) a series of Iron Age occupation levels were found and in the southern end of the lower mound (Area F) there was a large stone structure that might be a fortification overlooking the Huleh Valley.

Introduction

Tell Abil el-Qameḥ is a city of major Biblical and historical importance on the northern border of present-day Israel. It is located just south of the village of Metulla and about 6.5 km west of Tel Dan. The site is approximately 100 dunams (10 hectares) in size and sits astride the narrow defile of Nahal Iyyon, one of the four headwaters of the Jordan River. From its strategic vantage point overlooking the narrow northern end of the fertile Huleh Valley, Tell Abil el-Qameḥ commands roads leading north to the Lebanese Beq'a, inland Syria and Mesopotamia, west to the Lebanese/Phoenician coast, and east to Damascus (Figs. 1–2).[1]

Identification

The tell was described by a number of prominent 19th century explorers, including Victor Guérin (1880**:** Chapter 102), Edward Robinson (1852: 372) and F.M. Abel (1938). Robinson first identified the mound with Biblical Abel Beth Maacah (Avel Bet Ma'akha),[2] a proposal that has been accepted by most scholars (Dever 1986:

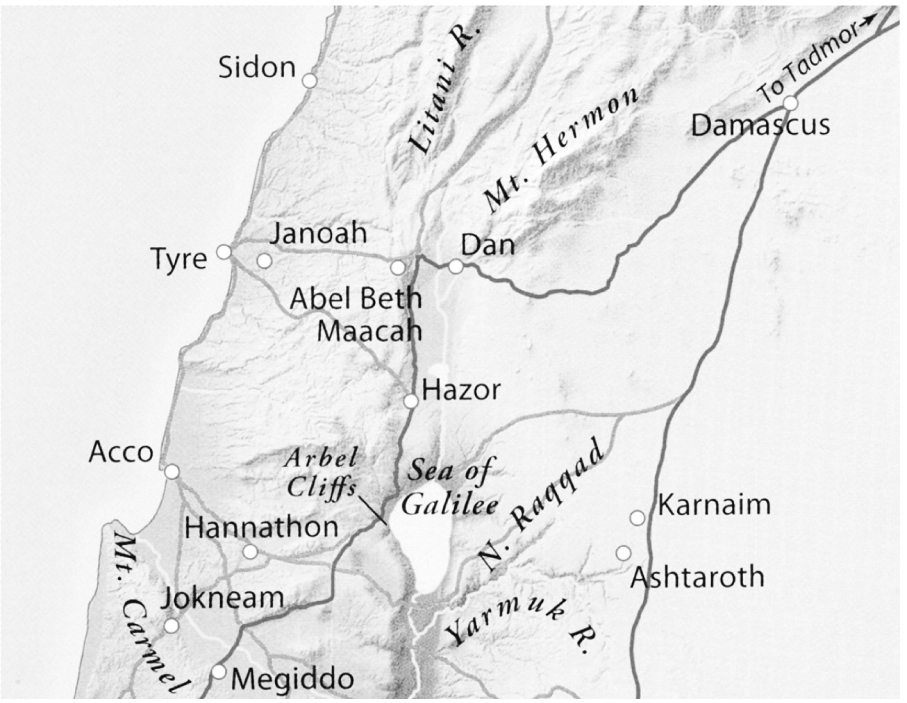

Fig. 1. Location of Tel Abel Beth Maacah.

Fig. 2. View of the tell from the northwest to the east, with the Huleh Valley and Golan Heights in the background (photo by Robert Mullins).

207–210), based largely on historical-geographical considerations.[3] The town is repeatedly mentioned in geographical order from north to south after Ijon (Tell ed-Dibbin in southern Lebanon, about 11 km to the north of the site) and before Hazor (around 30 km to the south). We read in 1 Kings 15:20, "Ben-hadad listened to King Asa, and sent the commanders of his armies against the cities of Israel. He conquered Ijon, Dan, Abel-beth-Ma'acah, and all Chinneroth, with all the land of Naphtali," and 2 Kings 15:29: "In the days of King Pekah of Israel, King Tiglath-pileser of Assyria came and captured Ijon, Abel-beth-Maacah, Janoah, Kedesh, Hazor, Gilead, and Galilee, all the land of Naphtali; and carried the people captive to Assyria". The city is also called Abel Maim in 2 Chron 16:4.

Ancient References

Bronze Age references to the site include the early group of Execration Texts and possibly Thutmose III's list of destroyed towns, the Amarna letters (Dever 1984: 211–213) and No. 40 in the list of cities conquered by the pharaoh Sheshonk (Biblical Shishak) (Meisler 1950: 37). The first Biblical reference to the town is in 2 Samuel 20:14–22 in the context of a call for revolt against David by a Benjaminite named Sheba ben Bichri. The tale of Joab pursuing the rebel far north to Abel Beth Maacah and how the local Wise Woman saved the city from his destroying it, alludes to it as an Israelite city in the 10th century BCE and it having been the northernmost point of the Israelite entity at that time, or somewhat later, considering that this narrative could reflect a time later in the Iron Age II than the reign of David.

Two additional Biblical references to the site are related to its strategic role as a city guarding Israel's northern approaches; Abel Beth Maacah was conquered by Ben-hadad I of Damascus in the early 9th century BCE (1 Kings 15:20) and later by the Neo-Assyrian king Tiglath-pileser III (2 Kings 15:29) in 733 BCE.[4] After the Assyrian conquest, the site is not mentioned in any later sources.[5]

While uncertain due to its incomplete state, the conquest of Abel Beth Maacah by Ben-hadad I may be alluded to in the last line of the Dan Stele (House of David inscription), where the letters *aleph* and *bet* have survived (Schneidewind 1996:77; Na'aman 2012:95, note 10).

History of Exploration

Despite its obvious importance, Abel Beth Maacah has never been excavated. Yigael Yadin had originally planned to start a project there in the 1950s, but shifted his focus to Hazor instead. History shows that Yadin made a wise choice, but his original intent certainly emphasizes the importance of Tell Abil el-Qameḥ in the mind of this famous father of Israeli archaeology.

Documents in the Israel Antiquities Authority archives refer to periodic visits to the site by Department of Antiquities inspectors from the 1940s to the 1970s,[6] and visits to the tell by Yehudah Nevo Dayan were recorded and appear briefly in a Hebrew pamphlet on a survey of the Huleh Valley in 1962. The results of a limited survey carried out in 1973 by Prof. W. G. Dever of the University of Arizona were summarily published in a festschrift dedicated to Siegfried H. Horn (Dever 1986).

A small salvage excavation conducted by the Israel Antiquities Authority at the base of the southeastern slope during the laying of a pipeline revealed several Byzantine tombs, as well as a group of Middle Bronze vessels that seemed typical of a tomb assemblage (Stefansky 2005).

Major Research Goals

The significance of conducting excavations at Abel Beth Maacah lies primarily in its potential to fill a major gap in our knowledge about the northern sphere of Israel during the Bronze and Iron Ages. Only two major sites in this region with remains from these periods – Dan and Hazor – have been extensively excavated to date. Other nearby major cities like Damascus, Tyre, and Ijon, either have not or cannot be investigated because modern settlements overlay them or for other reasons. Indeed, the lack of excavated sites in southern Syria is a well-known and lamentable archaeological lacuna. Kamid el-Loz, 35 km north of Abel Beth Maacah in the Lebanese Beq'a, is one of the few sites that have been excavated in the region with any thoroughness and can provide comparative material (Heinz 2010; Marfoe 1998; Metzger 1991, 1993). Relevant remains to the west are also being uncovered in Sidon (Doumet-Serhal 2010) and at Tell el-Burak south of Sidon (Sader and Kamlah 2010). As a result, our understanding of this region is based largely on an important, but limited data set from the much larger sites of Dan and Hazor.

Excavation of Abel Beth Maacah will unquestionably fill gaps in our knowledge on a number of key research questions relating to the Bronze and Iron Ages in northern Israel.

The Early, Middle, and Late Bronze Ages

During the 2012 survey and the first excavation season in 2013, sherds of Early Bronze Age II metallic ware were collected. Exposure of strata related to the Early Bronze Age will be one of the future research goals of our project, adding important data to the topic of the rise of urbanism as it played out on a regional basis, particularly in relation to Dan and Hazor in the Early Bronze II and III.

Fig. 3. British Mandate-era aerial photo of the tell, with the village of Abil el-Qameḥ (Aerial Photographic Archive, Geography Department, Hebrew University of Jerusalem, taken by the Royal Air Force, Section 23, 1945).

Finds from the excavations at the large and important sites of Hazor and Dan in Upper Galilee have demonstrated that the cultural affinity of this region was directed to the north and northeast, towards Syria and Mesopotamia, particularly during the Middle Bronze Age and also during the Late Bronze Age. The relationship of the material culture of Hazor to important northern kingdoms, such as Yamḥad, Qatna, and Aram-Damascus is pronounced, as is the difference between the Upper Galilee sites and those not far to the south, such as Beth-Shean and Megiddo.

The relatively small size of Abel Beth Maacah when compared to Hazor makes it a prime candidate for the study of the settlement hierarchy in the region during the Middle and Late Bronze Ages. Did sites like Abel Beth Maacah represent a middle tier in this well-known hierarchy and what are the socio-geographic implications of such an arrangement? Was second-millenium BCE Abel Beth Maacah part of the kingdom of Hazor during these periods and what was its relationship to the large nearby site of Dan? Determining this relationship will allow us to investigate the nature of the settlement and material culture of large cities and smaller satellite towns and to explore whether this relationship was consistent during the Middle and Late Bronze Ages. Data recovered from excavating Abel Beth Maacah can also address the question of whether the sequence of occupation in the second millennium BCE was similar to that at nearby Hazor and Dan. These sites have continuity from the Middle to Late Bronze Age destruction at the end of the Late Bronze Age, followed by a gap and poor settlement in Iron Age I.

The Aramean Question

The location of Abel Beth Maacah on the northern border of Israel and the various references to Aramean entities in the region indicate that the site has great potential to study Aramean cultural and political influences.

Among the independent Aramean states that arose in Syria, adjoining the borders of Israel, according to the Bible are Aram-Zobaḥ, Aram Beth-Reḥob and Aram-Maacah (2 Samuel 10:6, 8 and 1 Chronicles 19:6; see also Joshua 13:11, 13). While identified as an Israelite city in the Bible, a viewpoint supported by the conquest of the city by Ben-hadad I of Damascus as mentioned above, the latter reference to Aram-Maacah is intriguing. As Na'aman (2012) has argued, Abel Beth Maacah may have been the capital of the Aramean kingdom of Maacah. The late Haim Tadmor also persuasively argued that Abel Beth Maacah represented the traditional southern border of Aram (Tadmor 1962).

Thus, the excavation has the potential to clarify and broaden our understanding of the Aramean entity in northern Israel, adding to the relatively patchy present knowledge, even at sites with clear Aramean affinity, such as et-Tell (Bethsaida) and Tel Hadar. Although texts confirm the active involvement of Arameans in the region, in fact, we know very little about them 'on the ground'. Excavation might reveal pottery or other aspects of material culture that may be associated with the Aramean entity. This provides an opportunity to further explore the question of the material culture of the Arameans, who are well documented in texts, but remain elusive in the archaeological record. Deepening our knowledge of the Arameans also has implications for our reconstruction of the involvement of the Assyrians in the kingdom of Israel, as they were the adversaries of both Israel and Aram.

The Phoenician Question

The city's location on the branch road of the International Trunk Road (Via Maris) leading north to Ijon (Tell ed-Dibbin) in the Marj 'Ayyun Valley, as well as roads leading northwest to Sidon and west to Tyre, will provide an opportunity to study the nature of cross-cultural ties with coastal Lebanon of the Bronze Age and Phoenicia of the Iron Age. The late Anson Rainey long argued that the Tyre-Damascus road which passed by way of Tel Dan and Tell Abil el-Qameḥ was the "Way to the Sea" mentioned in Isaiah 8:23. This only emphasizes the vital role played by Abel Beth Maacah at the juncture of these important roads. Excavations at the site will provide a prime opportunity to clarify the nature of the Phoenician connection, particularly in light of Biblical texts that describe close economic, political and cultural interaction, as well as affinities in pottery and other items of material culture noted between sites in Phoenicia and the Upper Galilee.

The Assyrian Conquest

Possible evidence documenting Tiglath-pileser III's attack on Abel Beth Maacah as part of the Neo-Assyrian monarch's western campaigns mentioned in 2 Kings 15:29 (and possibly in an Assyrian source) will be explored. British Mandate-era aerial and present-day photos (Figs. 2 and 3) show a large buried structure (possibly a citadel) at the northern end of the tell, corroborated by Dever's 1973 survey. Leading up to the feature on the northwestern slope are faint traces of what might be a siege ramp. Thus, Abel Beth Maacah might present an opportunity to excavate the Neo-Assyrian conquest of a prominent northern Israelite city, described in 2 Samuel 20:19 as "a mother in Israel" (presumably an idiom for an important city). To date, Iron Age II siege ramps or systems have been excavated only in the south, at Lachish and Tell es-Safi (Gath), and the potential of Abel Beth Maacah to yield further evidence of this aspect of ancient warfare is intriguing.

Cultural Crossroads and Borderlands

As is evident from the discussion above, the geographic location of Tell Abil el-Qameḥ at the crossroads of important east–west and north–south roads, and its strategic position at the intersection of political and ethnic Iron Age kingdoms and entities (Aram, Phoenicia, Israel), make the site a prime candidate for the study of ethnicity and borders, in which the emphasis is placed on dynamic relations between groups and how material culture crosses the border (or doesn't) based on complex mechanisms of identity, interests, interaction, and resources. Identification of an ethnic or national group, such as the Arameans, is not done by merely ticking off items on a check list of traits, but is rather the consequence of ongoing manipulation by the members of the group, within particular contexts, in order to differentiate between "them" and "us".

The archaeology of borderlands provides evidence for aspects of social interaction that elite, pious scribes may have overlooked; it can show how people defined ethnic borders by developing adaptive material culture and created a 'middle-ground' in border zones. An analysis of utilitarian and symbolic objects, buildings, monuments, and adoption (or rejection) of foreign goods and customs will illuminate how processes of identity construction were negotiated between Canaanites, Hurrians and Egyptians in the Bronze Age, and Israelites, Arameans and Phoenicians in the Iron Age. This information can help refine our understanding of what was essential to each.

Late Antiquity and the Village of Abil el-Qameḥ

As already noted, Persian, possibly Hellenistic, Roman-Byzantine, Early Islamic, Crusader, and Ottoman pottery was recovered, mainly in the center of the tell in

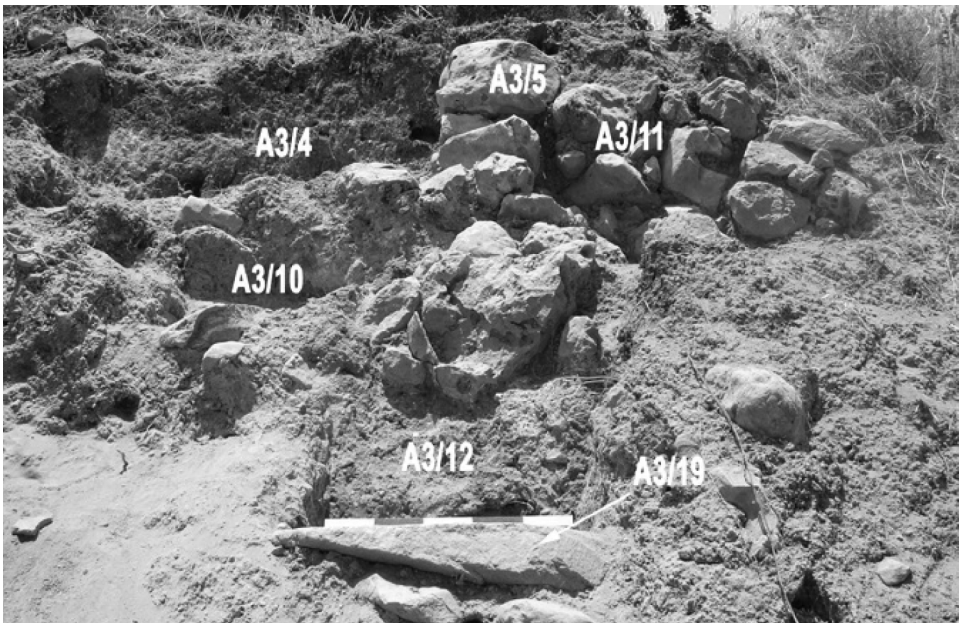

Fig. 4. Series of walls in section above eastern access road to the tell, Area A (photo by Anabel Zarzecki-Peleg).

an area occupied by the remains of the Arab village of Abil el-Qameḥ. Several Byzantine-period tombs were identified by the Israel Antiquities Authority during the laying of water pipes southeast of the tell. Additional rock-hewn tombs that apparently date to this period were identified on the southeastern slope during the 2012 survey (Stefansky 1990; Panitz-Cohen, Bonfil, and Mullins 2012: 32, 36).

Scattered ruins of the small village of Abil el-Qameḥ, possibly established as early as the 13th century CE, and occupied by Christians and Muslims until its abandonment in 1948, are visible in the topsoil, on the lower southern slope of the upper mound, and on the saddle between the upper and lower parts of the site (Fig. 4). The northern end of the mound served as the village's cemetery and the lower tell in the south served as agricultural land, as did some of the slopes which had been terraced. While not the focus of our immediate research agenda, the remains of the village and the Late Antiquity strata are slated to be explored in the future as an integral part of the occupational sequence of the site, emphasizing the *long durée* of occupation on this tell, certainly the result of geographic determinism in light of the strategic position of the site and the fertile well-watered region around it.

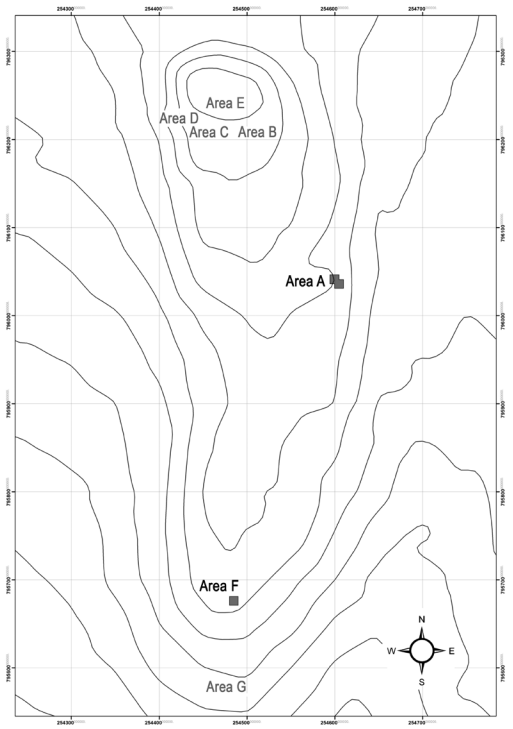

Fig. 5. Topographic map of the tell showing survey areas from 2012, with Areas A and F chosen for excavation in 2013 (map by Ruhama Bonfil).

The 2012 Survey

In May 2012, the authors conducted a four-day survey with the participation of staff and students of the Hebrew University of Jerusalem, Azusa Pacific University, Jerusalem University College, University of the Holy Land, and local residents from the area. The survey combined an extensive walking survey with some shallow excavation in seven areas (Fig. 5).

One of the drawbacks of a walking survey is that later pottery can get washed down from higher up and give a false reading of when a particular area was occupied. By digging down up to 20 centimeters in select areas we were able to determine the various occupational phases with greater chronological precision.[7] This methodological approach enabled us to more wisely choose potential excavation areas for the first full season in June 2013 (Panitz-Cohen, Bonfil and Mullins 2012).

In three of the areas probed during this scratch survey (Areas A1, A3 and F), several architectural phases and associated pottery apparently dated to the late Iron Age I (11th century BCE) and Iron Age (10th – 9th centuries BCE) were recovered not far below the topsoil. The probe in survey Area A/3 included a series of superimposed walls visible in the section created by the access road

Fig. 6. Iron Age I ring flask found in the bottom of the section seen in Fig. 4, during the 2012 survey (photo by Moshe Cohen).

to the tell in Area A (Fig. 5). Several restorable vessels including a painted carinated krater and an intact ring flask were found by scraping and clarifying this section (Fig. 6). Three very large stones visible in topsoil in Area F proved to have Iron Age cooking pot rim sherds around them, as well as a jar handle marked with an "X" and other sherds. Probes in Areas B, C, E and D of the 2012 survey yielded mainly pottery dating to the Medieval to Ottoman periods, with sporadic earlier sherds. Walls of buildings were identified in Areas D and C, while a large north–south terrace wall in Area B might have been built of ancient stones. Traces of the cemetery of Abil el-Qameḥ were identified under topsoil in Area E (Panitz-Cohen, Bonfil and Mullins 2012; 24–27).

Based on a combination of the survey results and the literary historical sources (Biblical, Egyptian and Assyrian), the early periods represented on the tell are Early Bronze II–III, Middle Bronze II, Late Bronze I–II, and Iron I–II. Sherds from the Persian, Hellenistic(?), Roman-Byzantine, early Islamic, and Crusader periods were also recovered, mainly in the center of the mound where the small Arab village of Abil el-Qameḥ covered about one quarter of the site until 1948; the extent of the village is clearly visible in British Mandate-era aerial photos and maps.

The 2013 Excavation

Following the discovery of the rich potential of the site as understood from the results of the 2012 survey, the first season of excavation took place from June to July 2013, lasting for four weeks, with the participation of almost 40 team

Fig. 7. Iron Age walls in Area A, to the south; Ottoman period terrace wall in lower right.

members from various institutions.[8] In the wake of the results of the 2012 survey, two areas were chosen for excavation based on two considerations: first, whether they contained early-period finds just under the topsoil and second, whether they were beyond the confines of the village remains. Area A is on the eastern edge of the saddle between the lower and upper mound and Area F is on the southern end of the lower mound.

Area A

Four squares were opened, positioned above the system of walls that had been visible in the section above the access road to the tell, as mentioned above. The uppermost layer was composed of sterile agricultural topsoil, reaching a depth of c. 0.70 m in the south of the area, and contained an Ottoman-period agricultural terrace wall or plot fence on the border of a cultivated field, built haphazardly of small field stones. This wall was built directly on top of the uppermost of three phases containing well-built stone wall foundations and related occupation layers (Fig. 7). The nature of this occupation appears to be domestic as an oven and installations were found (Fig. 8). The pottery recovered from the

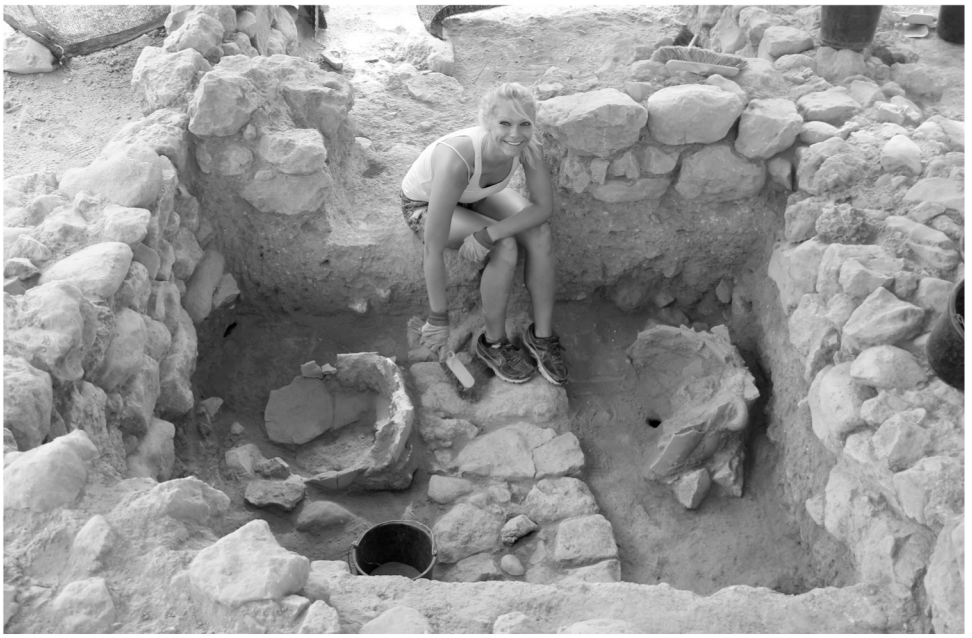

Fig. 8. Oven and domestic installations in Area A (Azusa Pacific University student Rachael Johnson in photo).

related debris is mostly comprised of cooking pot sherds and large fragments of collared-rim jars, including rims and shoulders of the typical Central-hill country type (i.e., Amiran 1969: Plate 77:4–11). A number of body fragments bear a parallel double low-relief ridge reminiscent of the so-called Wavy-Band or Tyrian pithos (i.e., from Dan: Biran 1994: 137, Fig. 96). Thus, our tentative conclusion is that at least the two lower phases excavated this season in Area A may be attributed to the Iron Age I. This was a surprising result, as the Iron Age I intact ring flask found in the 2012 survey was associated with the lowest layer in the aforementioned section; our excavations showed that the accumulation above this element, at least one meter thick, is apparently all to be dated to Iron Age I as well. If this proves to be correct (further analysis of the pottery and stratigraphy is necessary), this would be a substantial occupation dating to a period that was hardly represented at Hazor and not very developed at nearby Dan. The nature of the ceramic assemblage is also intriguing, comprised mainly of cooking pot and pithos fragments, although not an assemblage found *in situ* on a floor and might represent a fill. It is possible that remains of the 'missing' Iron Age IIA and IIB will be exposed when Area A is extended in future seasons to the west, since the squares excavated this season were close to the erosion line of the eastern slope.

Fig. 9. Large stone structure in Area F, looking south, with later walls to the north and west.

Area F

Area F was chosen for excavation owing to the three large stones found in topsoil during the 2012 survey; four squares were opened around these stones (Fig. 9). Just under topsoil, it became clear that they comprised the northeastern corner of a massive structure composed partially of similar large stones and partially of a concentration of rounded field stones, set in a very hard white chalky matrix. This structure was found to continue to the south and west, where it apparently was cut by later activity in the form of pits and some architecture. Later activity, including stone-lined pits and various installations of complex sub-phasing, were found to the north of this structure. Some pits were cut into the stones of the structure as well. While a large amount of pottery was recovered from these contexts, it was not well stratified on a floor, so we are left with a mix of various periods, ranging from the Middle Bronze Age to Iron Age II; several Early Bronze Age II and Persian period sherds were found as well. The exception to this is a beaten-earth and lime floor exposed in the northwestern square, which abutted the northern face of the large stone structure; on this floor were a number of finds, including several basalt ring weights, parts of a collared-rim jar and a complete jug, as well as a small jug that contained a silver hoard composed of earrings and ingots (Fig. 10). The date assigned to the context in which this jug was found is Late Bronze

Fig. 10. Small jug with silver hoard from Area F (photo by Gabi Laron).

Age-early Iron Age I, a period in which other silver hoards have been recovered, such as at Beth-Shean (Thompson 2009) and Dor (Stern 2001). The relationship of the surface with the jug and other finds to the northern wall of the large stone structure remains unclear at this point; it seems that this surface is not the original floor. Further excavation is needed to clarify this relationship.

At this point, we can summarize that in Area F there had been a major stone structure, possibly a tower that was part of a fortification, occupying this southern perimeter of the mound and overlooking the Huleh Valley. Various later activities were conducted using the walls of this 'tower'; at least one of these occupation layers appears to date to the transition from the Late Bronze Age to the Iron Age I. However, these conclusions are tentative at such an early stage of our work and much further study and excavation are needed.

Conclusions

In light of the uncontested identification of this tell with the site of Abel Beth Maacah, and given its relation to the Biblical and extra-Biblical sources, along with the promising results of the first excavation season, it is quite certain that answers to some of the questions posed at the beginning of this article may be addressed with the data obtained from excavating this important and imposing site. This is the northernmost site ever excavated in the Land of Israel and the first season of excavation has shown the potential contribution it will make in filling the gaps in our knowledge of the society and history of this pivotal region.

Notes

1. Map reference: New Israel Grid 058524/805452.
2. According to the rules of the Israeli Academy of the Hebrew Language, the correct transliteration of the name of the Biblical site from the Hebrew אָבֵל בֵּית־מַעֲכָה would be Avel Bet Ma‘kha. When the name is applied to a tell, it becomes Tel Avel Bet Ma‘akha. In the King James version of the Bible, the name is spelled Abel-beth-maachah. We have adopted the simpler spelling of Abel Beth Maacah (which appears in modern maps) for publication. The authors thank Aviva Schwartzfeld of the Israel Antiquities Authority Publications Department for this information.
3. But see Lipinski 2006: 238–244 for a different opinion, identifying Tell Abil al-Qameḥ with Dan.
4. A possible reference to the site in the annals of Tiglath-pileser III was initially proposed by Tadmor (1962: 114, note 4) and supported by Dever (1986: 215–216; 2007: 79); however, this reading was subsequently rejected by Tadmor (Dever 1986: 215); see a summary and rejection of this reading by Riddle (2013).
5. Note a suggestion by Kaplan (1966) that a 4th century CE Greek inscription on a border stone discovered in 1951 near Kibbutz Ma‘ayan Baruch (2 km southeast of Tell Abil al-Qimh), reads BEΘAXWN, and can be reconstructed as pertaining to BEΘ[M]AXWN, which he suggests is an abbreviated form of the name Beth Maacah (lacking the Biblical word ‘Abel’).
6. The authors thank Sylvia Krapiwko and Arieh Rochman-Halperin of the Israel Antiquities Authority for their kind help in accessing these documents.
7. The authors wish to thank Joe Uziel of the Israel Antiquities Authority for his advice concerning this type of probe survey.
8. The excavations, co-directed by the authors, were made possible by the very generous support of friends and alumni of Azusa Pacific University, and funding from Cornell University (the Institute for the Social Sciences, the President’s Council of Cornell Women, and the Mario Einaudi Center for International Studies), initiated by Professors Lauren and Chris Monroe. The participation of Ph.D. students led by Prof. John Monson of Trinity Evangelical Divinity School made a major contribution to the excavation. Ruhama Bonfil of the Hebrew University of Jerusalem served as the field surveyor. For details online, see www.abel.beth.maacah.org and www.facebook.com/AbelBethMaacah.
9. Area A was supervised by Ido Wachtel, assisted by Carroll and Jeff Kobs, Aviv Toren and Fredrika Loew (registrar). Area F was supervised by Ortal Haroch, assisted by Dianne Benton, Leann Canady, Itamar Weissbein and Adva Danon (registrar).

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Military Symbols on the Coins of John Hyrcanus I

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Military achievement was one of the defining characteristics of the Hasmonaean dynasty during its ascendancy in the generations of the Maccabees and their immediate successors. As we know from the literary sources, their celebration of arms was emblazoned on the most celebrated Hasmonaean monument, the family mausoleum, and the form that this sculptural composition probably took may be deduced from contemporaneous architectural decoration that has survived in Asia Minor. Military motifs also feature on the earliest issues of Hasmonaean coinage struck by John Hyrcanus I (135–104 BCE). An emblem which appears on the smallest of these coins, which has attracted very little attention to date, is a palm branch with a ribbon, or fillet band, tied to the tip of the branch. This device is a well-recognised Greek victory symbol with both divine and royal connotations.

Introduction

In a landmark study, Rajak (1996) examined the characteristics of Hasmonaean high priesthood and kingship, as presented in the documentary sources. As she noted, conspicuous among these is its militaristic aspect (Rajak 1996: 112–114). The military campaigns and fortunes of the Maccabees largely fill the pages of 1 Maccabees, which was composed late during the reign of John Hyrcanus I (135–104 BCE) or shortly afterwards (Schürer 1986, 181). Among the several stirring declarations recorded in that work is one by the followers of Simon Thassis, John's father, when he assumed the mantle of the Maccabaean cause from his slain brother, Jonathan Apphus[1]: "Fight our battles, and we will do whatever you tell us" (1 Macc 13:9). Actiom immediately followed this exhortation: "So Simon mustered all the fighting men and hurried on the completion of the walls of Jerusalem until it was fortified on all sides. He sent Jonathan son of Absalom with a considerable force to Joppa; he expelled its inhabitants and remained in possession of the town" (1 Macc 10). John Hyrcanus I continued the vigorous programme of his father, as recounted in Josephus (*War* 1.55–69; *Ant.* 13.230–300). His accomplishments, mostly of a martial nature, are summarised at the end of 1 Maccabees: "The rest of the story of John, his wars and the deeds of valour he performed, the walls he built, and his exploits, are written in the annals of his high-priesthood from the time when he succeeded his father". Unfortunately, the annals as such do not survive,

although the accounts of John Hyrcanus I's rule preserved in Josephus, at least in part, may derive from those annals.

In this article, I shall show the extent to which military themes featured on Hasmonaean coins, but will begin by highlighting the fact that this type of subject matter also featured prominently on their most celebrated monument, namely the family mausoleum at Modein (Modi'in).[2]

The Maccabaean Mausoleum as a *Tropaeum (Tropaion)*

The triumphs of the Hasmonaean were stamped on their most prestigious edifice, the mausoleum which Simon erected as a family monument. The Maccabaean mausoleum was very much in the tradition of Hellenistic dynastic funerary monuments (Hengel 1989: 31; Watzinger 1935: 22–23). Although it has not survived, we have a description of it in I Maccabees which is largely repeated by Josephus, who wrote two centuries later:

> Simon built a high monument over the tomb of his father and his brothers, visible at a great distance, faced back and front with polished stone. He erected seven pyramids, those for his father and mother and his four brothers arranged in pairs. For the pyramids he contrived an elaborate setting; he surrounded them with great columns surmounted with trophies of armour for a perpetual memorial, and between the trophies carved ships, plainly visible to all at sea. This mausoleum which he made at Modein stands to this day (1 Macc 13:27–30).

> And Simon also built for his father and brothers a very great monument of polished white marble, and raising it to a great and conspicuous height, made porticoes round it, and erected monolithic pillars, a wonderful thing to see. In addition to these he built for his parents and his brothers seven pyramids, one for each, so made as to excite wonder by their size and beauty; and these have been preserved to this day (Jos., *Ant.*13.211–12).

In this monument, there were six pyramids arranged in pairs, as cenotaphs for the founder of the dynasty, Mattathias, together with his wife and four illustrious sons, Judah, Eleazar, Jonathan and John (Yehoḥanan). The seventh pyramid, which may have been erected in the middle of the ensemble, would have been intended to commemorate Simon, the builder of the sepulchral monument. The arrangement of six cenotaphs in three ordered pairs was also used for the tombs of the Patriarchs (and Matriarchs) in Hebron. This latter monument, as constructed by Herod the Great in the late 1st century BCE largely survives intact, although there have been evident changes to the form and, in two cases – those commemorating Isaac and Rebecca, the exact position of the cenotaphs (Jacobson 1981). Unfortunately, neither the remains nor even the precise location of the Tombs of the Maccabees have been positively identified (Schwartz 1991: 61–65).

The Maccabaean mausoleum appears to have belonged to a series of grand funerary monuments that drew architectural inspiration from the famous fourth century BCE tomb of Mausolus at Halicarnassus (Waywell and Berlin 2007; Jeppesen *et al*. 1981–2004; Fedak 1990: 71–74, ills. 76–78; Waywell 1988). This was a tall stone-built rectangular structure, crowned by a single pyramid over a peripteral colonnade. Its decoration included freestanding and relief sculpture. The high podium was constructed of finely dressed ashlars.[3] A surviving pyramid-topped monument in Jerusalem from the Hasmonaean period is the Tomb of Jason, which has been dated from its contents to c. 100 BCE (Fedak 1990: 140–41; Rahmani 1967). Partly cut into the rock and partly built, it has a distinctive porch with a single Doric column *in antis*.

From the description in 1 Maccabees, the family mausoleum possessed a peripteral colonnade carrying a frieze decorated with armour, alternating with (war) ships, representing a martial theme. Panoply was much favoured in Asia Minor in friezes above colonnades at about the same period, with famous examples on the stoas fringing the *temenos* of the temple of Athena Polias Nikephoros at Pergamon, built by Eumenes II (188–159 BCE; Droysen 1885: 93–138 and pls. XXI, XLIII-L; see Figs. 1 and 2) and on the propylon of the Bouleterion at Miletos, dedicated by protégés of the Seleucid monarch, Antiochus IV Epiphanes, the infamous protagonist of the Maccabees (c. 170 BCE) (Knackfuss 1908: 80–87, 95–99; pls. XI, XV). The panoply friezes from Pergamon include portions of warships intermixed with helmets and other items of armour and weaponry. It is possible that it is such an ensemble of armour, arms and naval symbols which is implied in 1 Macc 13:29, the original Greek being somewhat unclear. At any rate, it is evident that the decoration was deliberately chosen to celebrate the military achievements of the Maccabees and therefore the funerary monument was also a *tropaeum* or victory memorial.

It is hardly surprising that Hellenistic forms were copied in the architecture and ornament of the Tombs of the Maccabees, as it has been well established that the Hasmonaeans adopted the lifestyle and assimilated many of the practices of contemporaneous Hellenistic monarchs, from the first generation onwards (Levine 1998: 39–46; Rappaport 1991; 1992; Rajak 1990; Hengel 1989: *passim*; Bickerman 1962: 148–65). Indeed, Judaea had been exposed to Greek influences for more than two centuries prior to the Maccabaean uprising. Athenian coins and pottery dating back to the 5th century have been found frequently throughout the southern Levant, while the satrapy of Yehud still formed part of the Persian Empire. In about 400 BCE, or a few decades into the 4th century BCE, Yehud, as Judah was known in Aramaic, began to issue small silver coins based on the Attic weight system and modelled on Athenian silver currency, featuring the profiled head of Athena on the obverse and well-known owl motif on the reverse (*TJC*: 6–8, 10; nos. 2–12).

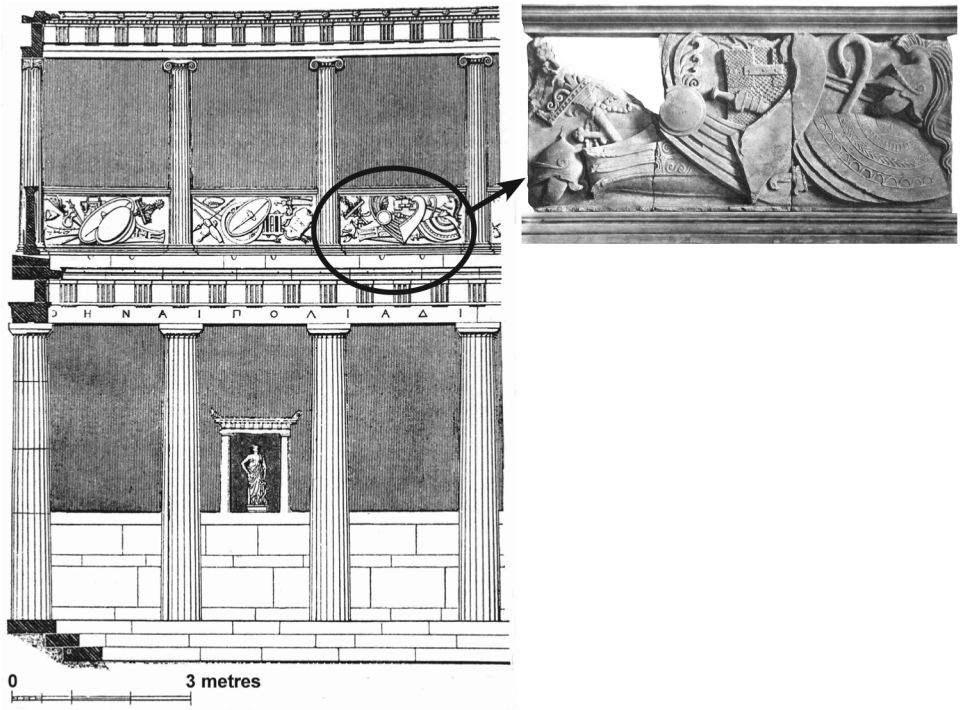

Fig. 1. Pergamon: reconstruction of a portion of the stoa on the east side of the sanctuary of Athena Polias Nikephoros at the north-east corner of the temenos, 188–159 BCE, showing the panoply frieze (Droysen 1885, Pl. XX1) and magnified image of the right-hand relief panel (Droysen 1885: pl. XLIV.1). The V-shaped central portion of the composition comprises the stern (left) and prow (right) of a Greek warship, which are integrated into a melange of panoply.

Fig. 2. Fragment of a relief panel featuring a suit of armour (cuirass), shield, sword, helmet and gauntlets (Droysen 1885: pl. XLVII.2).

Fig. 3. John Hyrcanus I. Æ double-prutah (135–104 BCE), 25 mm, 3.4 gm. Obverse: Parallel conjoined cornucopias adorned with fillets; surrounding Palaeo-Hebrew inscription: YHWḤNN HKHN HGDWL R'Š HḤḆR HYHWDYM (Yehoḥanan, the High Priest and Head of the Council of the Jews). Reverse: Crested Boeotian helmet with cheek-pieces. *TJC* no. H1. Heritage Auction of 9 March 2012, lot 20082. Courtesy of Heritage Auctions Inc.

Greek influences deepened after the conquest of the southern Levant by Alexander the Great in 333/332 BCE, particularly through the strengthening of trade ties with the Aegean and other parts of the Greek world, following the incorporation of Judaea into kingdoms headed by Alexander's generals and their successors. By the generation of the Maccabees, Hellenic culture had become deeply entrenched in Judaea and thoroughly permeated the ruling circle. By the second half of the 2nd century BCE, when the mausoleum of the Maccabees was constructed, Hellenism as such "was probably no longer an issue with political capital" (Rajak 1990: 107). From the available evidence, the adoption of Greek artistic and architectural models was not contentious, so long as human and animal subjects were avoided.

Military Emblems on Hasmonaean Coins

Items of armour and emblems of victory feature prominently on the coins of John Hyrcanus I, the first Hasmonaean ruler to strike coins.[4] Thus, a crested Boeotian helmet is depicted on a bronze double-prutah (double-chalkous) of this ruler (see Fig. 3).[5] It is closely similar to and was probably modelled on the Boeotian helmet represented on the obverse of a small bronze coin struck for Antiochus VII somewhere in the Southern Levant.[6]

Noy (2012) has, I believe, correctly interpreted the wreath surrounding the palaeo-Hebrew inscription on the prutot of John Hyrcanus I as a victory symbol; see Fig. 4. The inscription mentions the minting authority as 'John (Yehoḥanan) the High Priest and the Council (*ḥever*) of the Jews'.[7] Some scholars, among them Kindler (2000: 317–18) and Hendin (2007–2008: 76), suggested that Hyrcanus (and his Hasmonaean successors) had resorted to this device in order to conform with the biblical commandment forbidding graven images, replacing the usual head of the ruler on Hellenistic coins by his name and title. It was supposed that the wreath represented the diadem of royal authority (Noy 2012: 31–32; *TJC*: 35–36).

Fig. 4. John Hyrcanus I. Æ prutah, 13 mm, 1.6 gm. Jerusalem mint. Obverse: Palaeo-Hebrew inscription on four lines: YHWḤNN /HKHN HGD/L WḤḆR HY/HWDYM (Yehoḥanan, the High Priest and Council of the Jews), with the letter 'A' above, within a wreath. Reverse: Pomegranate on a stalk between facing cornucopias, to which fillets are tied. The 'A' may refer to Alexander II Zabinas. *TJC* no. A3. Private collection, with permission.

Through studying its symbolic significance on Seleucid coins, Noy reached the conclusion that the wreath on the prutot of John Hyrcanus I was intended as a victory symbol rather than representing headgear appropriate to the elevated status of this ruler. He recognised with Kindler that several motifs employed on Hasmonaean coins, such as the Boeotian helmet already mentioned, derive from the Seleucid repertoire of coin types.[8] Noy supported his interpretation by comparison with an inscription-in-a-wreath coin type that occurs regularly on Bar Kokhba silver denarii or zuzim (Noy 2012: 39). In these later examples, it is the name of the rebel leader, Simon (Shim'on), which is inscribed in palaeo-Hebrew in the wreath. As I have demonstrated, the wreath in this particular case is modelled on the *corona civica*, one of the highest Roman military decorations which was awarded for supreme valour and, in its essential respects, equivalent to the British Victoria Cross (Jacobson 2008).

Noy is also close to the mark in his view that the motif of facing cornucopias and pomegranate on the reverse of Hyrcanus' prutot symbolises the fruits of victory.[9] Indeed, this metaphor is actually found in 1 Macc 14:8–13, couched in biblical language, when mentioning the peace and prosperity won by the sword during the rule of his father, Simon (cf. Rajak 1996: 113), but it could equally well describe his own term of office:

> They farmed their land in peace, and the land produced its crops, and the trees in the plains their fruit. Old men sat in the streets, talking together of their blessings; and the young men dressed themselves in splendid military style. Simon supplied the towns with food in plenty and equipped them with weapons for defence. His renown reached the ends of the earth. He restored peace to the land, and there were great rejoicings throughout Israel. Each man sat under his own vine and under his own fig tree. The enemies left the land and the enemy kings were crushed in those days.

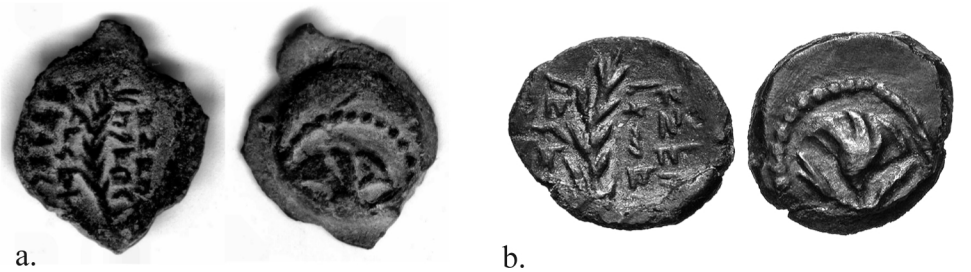

Fig. 5a. John (Yehoḥanan) Hyrcanus I. Æ half-prutah. Jerusalem mint: (a) 12 mm, 1.1 gm. Obverse: Palm branch with a strip of cloth (fillet band) tied to its tip and a palaeo-Hebrew inscription on four lines to the left and right: YHWḤN[N] /HKHN HG/DL HḤḄR /HYHDY[M] (Yehoḥanan the High Priest and the Council of the Jews). Reverse: Rose between two grain ears (?). The 'A' normally present in the left field of this reverse type appears to be absent on all coins struck from this particular die. *TJC* no. C7 (Dies O13, R2; see http://www.menorahcoinproject.org/hyr-01.htm). (5b) 12 mm, 1.0 gm. Obverse: Palm branch, with a palaeo-Hebrew inscription on four lines to the left and right: [YHWḤNN H] /KHN H[GDL] /R'Š HḤ[ḄR] /HYHD[YM] (Yehoḥanan the High Priest, Head of the Council of the Jews). Reverse: Rose between two grain ears (?). *TJC* no. J4. On the identification of the flower on these coins as a rose, see Jacobson 2013. Private collection, with permission.

The Filleted Palm Branch

Hitherto overlooked as a victory symbol is the palm branch on the half-prutah (half-chalkous) of John Hyrcanus I; (see Figs. 5a–b). The palm branch does not even appear on the list of symbols that feature on Hasmonaean coins given in Meshorer's *Ancient Jewish Coinage* (1982, 1: 60–68). In *TJC*, he makes good the omission, but defines the palm branch as a *lulav*, one of the four plant species which are used in the rituals of the Festival of Sukkot (Tabernacles) (*TJC*: 35, 209; cf. Meshorer 1982, 1: 63). However, Meshorer admits that it is uncertain whether this association was actually intended by the Hasmonaeans, conceding that the palm branch also signified a Greek victory symbol. He goes on to point out that on coins of John Hyrcanus I, "[this] lulav is tied with a ribbon at its upper end".[10]

In fact the filleted palm branch (i.e. a palm branch to which a band of cloth is tied) is a well-attested Greek victory symbol,[11] often borne by the goddess Athena in images representing her in the guise of the Nikephoros (bearer of victory).[12] It appears as a supplementary symbol on Seleucid silver tetradrachms of Antiochus Hierax (242–227 BCE), Antiochus III (223–187 BCE) and Seleucus IV (187–175 BCE); (Fig. 6).[13] This device was also employed in saltire with a winged caduceus (the wand of Mercury) representing good fortune (felicitas), together with a wreath,

Fig. 6. Seleucus IV Philopator (187–175 BCE). AR tetradrachm, 17.0 gm, 30 mm. Antioch mint. Obverse: Diademed head of Seleucus IV. The royal diadem is clearly shown as a fillet band of cloth tied around Seleucus' head, with the free ends waving about. Reverse: Apollo seated on omphalos, holding arrow in right hand, his left hand resting on a bow, filleted palm to the outer left, 'Φ' monogram in exergue; Greek inscription: ΒΑΣΙΛΕΩΣ – ΣΕΛΕΥΚΟΥ (of King Seleucus). *SC* II no. 1313.6b. Private collection, with permission.

Fig. 7. Herod the Great (40–4 BCE). *Æ* 1½ prutot (?), 15 mm, 2.9 gm. Sebaste/Samaria (?) mint. Obverse: Aphlaston (aplustre); date = 'year 3' to left, monogram to right; Greek inscription: ΒΑΣΙΛΕΩΣ ΗΡΩΔΟΥ (of King Herod). Reverse: Filleted palm branch. RPC I no. 4904; *TJC* no. 47. Courtesy of Isadore Goldstein, Zuzim (Brooklyn, NY).

on a Roman denarius struck by Q. Sicinius, a supporter of Pompey the Great, in 49 BCE.[14] A filleted palm was shortly afterwards chosen for a Judaean prutah of Herod the Great (40–4 BCE) (Fig. 7). As this coin was one of Herod the Great's "year 3" issues, it may refer to his victory over Antigonus, the last Hasmonaean king, in 37 BCE: he had been appointed client king in Rome in 40 BCE.

The fillet, or band of cloth, was indicative of a royal diadem[15]; its association with the palm branch and also the cornucopias on other coin issues of Hyrcanus attests to these symbols having been appropriated from the coinage the Hellenistic monarchies, especially that of the Seleucids and their Ptolemaic rivals.[16] Thus, the two double cornucopia motifs on the coins of Hyrcanus would appear to derive from coin types of Alexander II Zabinas[17] (128–123/2 BCE); (Fig. 8a–b). Zabinas was a puppet placed on the Seleucid throne, in opposition to Demetrius II, by Ptolemy VI Philometor of Egypt. Ptolemaic influence on the regime of Zabinas (128–123/2 BCE) would logically account for the appearance of Ptolemaic-style filleted cornucopias on some of his coins (*cf.* Figs. 8–9);[18] Zabinas maintained a

Fig. 8a. Alexander II Zabinas (128–123/2 BCE). Antioch mint. Obverse: Radiate and diademed bust of Alexander II. Reverse: (a) *Æ* 21mm, 9.3 gm. Filleted double cornucopias, 'A' above wreath to inner l., 'Π' to the inner right; Greek inscription: ΒΑΣΙΛΕΩΣ – ΑΛΕΞΑΝΔΡΟΥ (of King Alexander). *SC* II no. 2237h; (8b) *Æ* 19 mm, 6.1 gm. Two intertwined cornucopias, Σ above grain ear to the left, A to the right; same inscription. *SC* II no. 2235.1. Private collection, with permission.

Fig. 9. Ptolemy II (282–246 BCE). AV oktadrachm, 26 mm, 27.8 gm. Alexandria mint. Obverse: Veiled and diademed bust of Arsinoë II wearing stephane, 'K' to the left. Reverse: Twin cornucopias to which a fillet band is tied; Greek inscription: ΑΡΣΙΝΟΗΣ – ΦΙΛΑΔΕΛΦΟΥ (of Arsinoë Philadelphos). Svoronos 1904 no. 1498. Spink Auction 5014 (28.09.2005), Lot 152. Courtesy of Spink & Son Ltd.

harmonious relationship with the Hasmonaeans (Jos., *Ant*. 13.269): it was during his reign that Hyrcanus was able to assert his independence from the Seleucids and struck coins in his own name, with the 'A' (= the Greek alpha) at the head of the Hebrew inscription on several coins issued in the name of 'Yehoḥanan' (i.e., on the Group A and most of the Group C coins listed in *TJC*) probably standing for Alexander Zabinas.

Let us now return to the filleted palm branch. With its symbolic meaning established, it is possible to cast fresh light on a passage in 1 Maccabees. In 1 Maccabees 13:51 we are informed about the waving of palm branches in the ceremonial procession of Simon and his entourage, celebrating their conquest of the Akra fortress overlooking the Temple and the capitulation of its Seleucid garrison in 141 BCE (on the 23rd day in the 2nd month of SE 171). This practice

would seem to represent a Greek rather than a Jewish custom: it is nowhere mentioned in the Hebrew Bible or the early rabbinic literature. It is quite likely that, on this occasion, in celebrating an important Hasmonaean victory, the palm branches were festooned with ribbons, as represented on the Group C half-prutot of John Hyrcanus I. Simon Thassis decreed that the day of his triumphal entry with his enthusiastic followers into the Akra was to be observed as an annual festival (1 Macc 13:52): accordingly 23 Iyyar, when "the garrison departed from Jerusalem", is inscribed in the Megillat Ta'anit as one of the special days in the Jewish calendar when fasting was not permitted.[20]

Notes

1 Judah the Maccabee and his four brothers all had Semitic nicknames (1 Macc 2:2–5).

2 On the name of the place, see Schürer 1973, 136 n. 43.

3 Comparable monuments topped with pyramids have been documented across the Levant and North Africa (Fedak 1990). They include the Tomb of Hamrath at Suweida in Syria (1st century BCE) and the monumental tombs at Hermel (late Hellenistic) and Kalat Fakra (mid-1st century CE) in Lebanon (Fedak 1990: 148–50 and ills. 428–31). The Tombs of the Maccabees has also been compared with the Obelisk Tomb (no. 35) at Petra from the time of the visit by William John Bankes in 1818 (Bankes 1818, section 1; Irby and Mangles 1823: 407; *cf*. Watzinger 1935: 22). That rock-cut tomb is surmounted by four narrow pyramids or obelisks in a row and has been dated to 40–70 CE (McKenzie 1990: 49, 156–57).

4 In 1 Macc 15:6, it is claimed that, among the privileges granted to Simon by Antiochus VII was the right to issue *autonomous* coinage, but it is now generally recognised that the first Hasmonaean ruler to actually do so was his son John Hyrcanus I. See, e.g., Schürer 1973: 190; Rappaport 1976: 172–78.

5 On the denominations of Hasmonaean coinage, see Jacobson 2014 (forthcoming).

6 *SC* II no. 2122. The mint responsible for this issue was probably a coastal town because an *aphlaston* features on its reverse; see *SC* II 1: 391. That coin probably provided the model for the obverse motif on the double- *prutah* of John Hyrcanus I (*TJC*: 36). A small bronze coin bearing an *aphlaston* had earlier been struck for Alexander I Balas (152–145 BCE) at the coastal town of Ascalon (*SC* II no. 1849).

7 One form of the wording is given in the caption of Fig. 4 (*TJC* Groups A-G). Other coins of Hyrcanus bear the variant legend: "Yehoḥanan the High Priest, head of the council (*ḥever*) of the Jews" (*TJC* Groups H-J; see Fig. 5(b)). This wording is close to the formula employed on contracts and agreements from 143/2 BCE (SE 170), when Judaea was officially awarded a large measure of autonomy by the reigning Seleucid monarch, Demetrius II Nicator (1 Macc 13:41–42; *cf*. Jos., *Ant.* 13.213). We are told that these documents were issued with the authority of "Simon, the great High Priest, general and leader of the Jews".

8 Noy 2012: 33 and n. 4. Hasmonaean coins not only derive much of their iconography from Seleucid coins, but also their system of denominations; see Jacobson 2014 (forthcoming).

9 There has been a longstanding debate about the nature of the item between the facing cornucopias on this series of Hasmonaean pieces which drew in the pioneering scholars of ancient Jewish coins. C. Cavedoni (1850: 22), supported by F. W. Madden (1864: 54 and n. 3) and G. F. Hill (1914: 188), identified it as a poppy-head. This attribution was contested by F. de Saulcy (1854: 97 and n. 1), who considered it to be a pomegranate. In more recent times, the examination of better preserved representations has resulted in the balance of scholarly opinion tilting towards the view of de Saulcy (*TJC*: 33–34, 64; cf. Romanoff 1944: 44).

10 Meshorer states that the palm branch has a ribbon tied to it in both his Groups C and J of John Hyrcanus' half-prutot (*TJC*: 203, 209). However, I have only seen the ribbon, or fillet band, on coins of Meshorer's Group C; compare Figs. 5a–b. Tucked away in the catalogue of *Ancient Jewish Coinage*, Meshorer briefly defines the obverse type of Group O in that compilation as a "palm branch (*lulav*), with fillet on top, flanked by a 4-line paleo-Hebrew inscription …" (Meshorer 1982: 147).

11 Newell 1941, 69.

12 Representations of Athena *Nikephoros* holding a winged Nike in one hand and a filleted palm branch in the other appear as types on Seleucid gold staters minted by Myrina, Cyme and Phocaea (?) for Antiochus II (261–246 BCE); see *SC* I nos. 498, 502 and 515, respectively.

13 *SC* I nos. 896.1 (Antiochus Hierax; Teos (?)), *SC* I no. 1128.1 (Antiochus III; Nisibis); *SC* II nos. 1313.2–3 and 1313.6 (Seleucus IV; Antioch).

14 *RRC* no. 440/1. This composition, symbolising victory and good fortune, alludes to early optimism of Pompey's supporters at the commencement of the long Roman Civil War. This finally ended with the triumph of Julius Caesar's great nephew, Caesar Octavian in 31 BCE; see *RRC* I: 460.

15 Schreiber 2012: 233–34, 236; Salzmann 2012.

16 The conjoined, parallel and filleted cornucopias on the obverse of the double-prutah of John Hyrcanus I is a symbol that first appears on high denomination Ptolemaic coins struck by Ptolemy II Philadelphus (282–246 BCE) to commemorate his sister and consort, Arsinoë II, after her death in about 268 BCE; see Fig. 9. This motif is believed to be a metaphor for the beneficent rule of this sibling pair (Rice 1983: 202–208).

17 The different spelling of Alexander II's nickname found in the modern literature is due to the varied orthography used in the ancient sources. Zabinas is one of the Greek versions that is encountered, e.g., in Diodorus Siculus (34/5.22.1) and in Porphyry (*apud* Euseb. *Chron*. Ed. Schoene I, p. 258). Josephus (*Ant.* 13.268) renders it Zebinas, while Justinus, in the Prologus to Book 39 of his Epitome of Pompeius Trogus' Philippic Histories refers to this Seleucid monarch in Latin as Alexander Zabinaeus. This name stems from the Aramaic, Zebina (which also appears thus in Ezr 10:43), and means 'the bought one', as correctly interpreted by Porphyry (*loc. cit.*). It crops up in Mesopotamia during the 6th – 5th centuries BCE, often in Jewish contexts; see, e.g., Mitchell 1988: 77.

18 Barag and Qedar 1980, 16. Following Ptolemaic custom, the twin cornucopias motifs on Zabinas' coins may refer to a marriage with a Ptolemaic princess, following the practice of his Seleucid predecessors and in view of his close dependence on Ptolemy VI Philometor, although such a union is not mentioned in the ancient sources.

19 *Pace* Meshorer (*TJC*: 42). This possibility was first suggested by F. de Saulcy (1854: 99–102), but he considered that it could stand for Antiochus VII. In their turn, D. Barag and S. Qedar (1980: 17–18) supposed that these coins were struck under either Alexander II *Zabinas* or Antiochus VIII *Gryphus* (126/5–96 BCE).

20 The *Megillat Ta'anit* is usually dated to the 1st century CE; see, e.g. Schürer 1973: 114–115.

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Abbreviations

RRC *Roman Republican Coinage*, by M. H. Crawford (Cambridge, 1974).

SC I *Seleucid Coins: A Comprehensive Catalogue*, *Part I* (in 2 vols.): *Seleucus I through Antiochus III*, by A. Houghton and C. Lorber (New York and London, 2002).

SC II *Seleucid Coins: A Comprehensive Catalogue, Part II (in 2 vols.): Seleucus IV through Antiochus XIII*, by A. Houghton, C. Lorber, and O. Hoover, (New York and London, 2008).

SE Seleucid Era, in which year 1 = 312/1 BCE.

TJC *A Treasury of Jewish Coins from the Persian Period to Bar Kokhba*, by Y. Meshorer (Nyack, NY, 2001).

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The Pottery of Judea Between the First and Second Jewish Revolts

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The destruction of the Second Temple of Jerusalem in the aftermath of the First Jewish Revolt against the Romans is seen as a major watershed in the history of the Jewish People in the Land of Israel. The traditional view is that the loss of the Temple and destruction of Jerusalem with the surrounding towns and villages brought an end to Jewish life and culture in Judea. From that moment on the center of Jewish life shifted to the Galilee, later passed to Babylon and was eventually diffused throughout the numerous communities of the Diaspora. Despite this conventional outlook, more and more archaeological evidence is coming to light indicating that Judean culture not only survived the destruction of the year 70 CE but even experienced a brief renaissance that gathered strength until the eruption of the Second Jewish Revolt against the Romans, the so-called 'Bar-Kochbah Revolt', named after its notorious leader, between the years 132 – 136 CE.[1]

Introduction

The pottery belonging to the period between the revolts retrieved from the excavation of towns and villages of Judea is a major tool for understanding this turbulent era in the history of the region. Until recently, only a small quantity of inter-revolt pottery had been discovered in well-dated stratigraphic contexts. Up till now, most of the material had been recovered from caves and hiding complexes.[2]

The Sites

The towns and villages of Judea had been, for the most part, in Jewish hands since at least the Hasmonean period. These sites remained Jewish throughout the reigns of the Herodian rulers and the Roman occupation.

The research for this paper is based on the inter-revolt pottery from a number of Judean sites (Fig. 1).

Primary Sites

The primary sites include:

Shoham, Subdivision 44 (map ref. 145050/155150; 145400/155750, Onn and

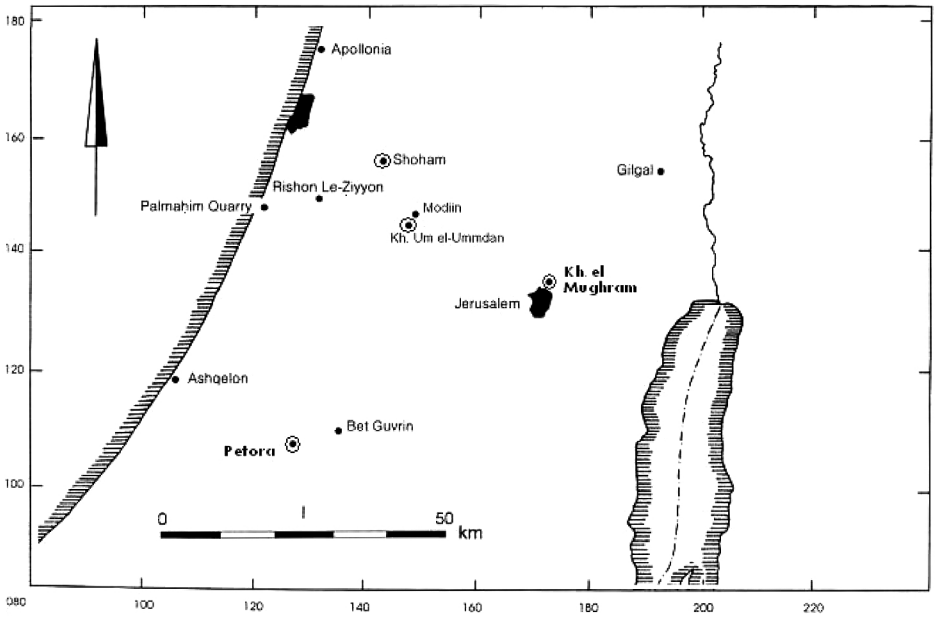

Fig. 1. Location of the sites in this study (adapted from Sussmann, Strauss and Kudish-Vashdi 1997, 144).

Torge, forthcoming) The archaeological site was discovered while preparing the area for paving Highway 444 which bypasses the city of Shoham in the Shephela from the east. A Jewish settlement dating from the Late Hellenistic Period to the Bar-Kochbah Revolt was discovered including an oil press, a *miqveh*, a burial cave and various installations.

El-Khirbeh at the northwestern end of Shoham, Hill 10 Oil Press Site: (Rapuano forthcoming) (195583–657025/195531–656979) included: several water cisterns, a small pool, an exceptionally well-preserved oil industry complex and a large *miqveh* (Polina Spivak, forthcoming).

At Khirbat Umm el-'Umdan (ancient Modein, Onn, *et al.* 2002), located on a hill north of Highway 432 in the vicinity of the modern city of Modein (map ref. NIG 2000/6434; OIG 1500/1434), a rural Jewish village was found dating from the Early Hellenistic period (second century BCE to the end of the Bar Kochba Revolt. It featured a synagogue and well-preserved *miqveh*.

At Horbat Petora (Onn, forthcoming; map reference: NIG 18215–45/61117–20; OIG 13215–45/11117–20), southwest of the Kiryat Gat Interchange, Area C, a Jewish settlement was found that included a tower and a *miqveh*. Coins recovered from loci with Inter-revolt pottery dated within the first or early second centuries, the latest dating between 120 and 121 CE (Gabriela Bikovsky, forthcoming).

Secondary Sites

The secondary sites:

The Ben Shemen Exchange is located on the western slope of Shlucha on the periphery of the eastern foothills of Lod, about 100 m north of Road 443 nearby the intersection of Modein (map ref. 194175–651531, 194229–651570) : (Lupu forthcoming). Two *miqvaot*, cisterns and quarries were discovered that dated from the late first century BCE to the Bar Kochbah Revolt.

Kh. el-Mughram is located on the periphery of a large Jewish village on the Ramala Road (171400/135100) near the Shuafat Refugee Camp (Skelar-Parnes; Rapuano; and Bar-Nathan 2004) that was dated by pottery, glass and coins to the Inter-revolt period (’Adawi 2013). The excavation included a burial cave belonging to inhabitants of the village. The significance of this site is that it is a Jewish village in close proximity to ancient Jerusalem of the Inter-revolt period.

These sites are spread out in various locations throughout Judea: Modein and Shoham in the north, Kh. el-Mughram in the Jerusalem area and Kh. Petora in the south. For the most part these Judean sites were rural and their inhabitants were engaged mainly in agriculture pursuits. The settlements at Petora, Area C, at El-Khirbeh and Kh. el- Mughram are particularly interesting in that they date, with minor exception, to the period between the two revolts alone.

Indications that the sites had Jewish Inhabitants

There were several indications that during the Inter-revolt period these sites were Jewish. The sites are located within the geographical area that had been Jewish from the Late Hellenistic period through the Roman occupation. Indeed the evidence indicates that the inhabitants of Shoham, Um el Ummdan, Petora and Ben Shemen were Jewish in the preceding strata. Discovered among the remains of the inter-revolt strata were buildings and installations that were distinctively for Jewish use, for instance, the synagogue at Kh. Um el-Ummdan and the *miqvot* of Shoham Subdivision 44, El-Khirbeh, Kh. Um el-Ummdan and Ben Shemen. Tunnels discovered at Shoham Subdivision 44 were evidently hiding complexes in which Jews concealed themselves as they fled from the Romans.[3] Chalk vessels typical of Jewish sites of the Second Temple period that may have been connected with Jewish ritual purity (Magen 2002:138) continued to be found in the inter-revolt strata at these sites.

Concerning the pottery, the general conservatism that prevailed in the Second Temple period was still evident in the inter-revolt stratum. Moreover, there is a remarkable continuity of form and fabric of Judean pottery between the two periods. In this regard, it is interesting to compare the pottery of these sites with that of non-Jewish, Roman legionary sites such as that found on the grounds of the

Jerusalem Conference Center (Magness 2005), the eastern cardo (Wexler-Bedolah; Onn; and Rosenthal-Heginbottom 2009); Ein Zeitun (Glick 2006) and the Roman garrison camps at Masada (Magness 2009). There is a notable lack of figurative representation in this pottery, possibly in deference to the Second Commandment, in contrast to that of the Roman legionary sites. For example, the mould-made ceramic figurines and masks found at the Jerusalem International Conference Center (Magness 2005:78–83) and the eastern cardo of Jerusalem (Weksler-Bdolah et al. 2012: 43 and 46) were entirely missing at these sites. The wheel-made knife-pared 'Herodian lamp', the most typical lamp of Second Temple Judea, continued to be used during the inter-revolt strata at these sites.

Between the Revolts: Defining the period

The period under discussion is defined in a variety of ways, depending on the particular point of view of the researcher. It has been variously referred to as the Early Roman period (Sauer 1973: 3; Taxal and Hershkovtz 2011: 343, Stern, Lewinson-Gilboa and Aviram 1993: 1529), the Middle Roman period (Chancey and Porter 2001: 185–188) and the Late Roman period (Monson et. al. 1979: Section 2: Introduction).

Historically speaking, the Early Roman period began with the conquest of the region by Pompey in 63 BCE.[4] Practically, however, a clear transition in the material culture (particularly the pottery) from the Late Hellenistic period to the Early Roman period is first perceived during the reign of Herod the Great (37–4 BCE).[5] The Early Roman period continued though the rest of the Second Temple era, the crucial date being 70 CE, when Jerusalem and the Temple were destroyed. While the pottery of the Second Temple period is well known (Geva 2003; Geva and Rosenthal-Heginbottom 2003; Geva and Hershkovitz 2006; Bar-Nathan 2002 and 2006; Killebrew 1999; Loffreda 1996; and Clamer 1997), the pottery of the succeeding period is far less familiar (Aharoni 1961, Bennett 1965, Eshel and Amit 1998, Kloner and Tepper 1987, Lapp and Nicklesberg 1974, Zigleman U. 1990). Since the differences between the pottery before the First Revolt and that after it are often subtle, this later material is routinely lumped together with Second Temple pottery. Accordingly, many researchers regard the decades succeeding 70 CE as a continuation of the Early Roman period.

For other researchers the year 70 CE is a hard break, based largely on historical considerations, (especially the Roman conquest after which the region is proclaimed on coins of Vespasian, Titus and Domitian as 'Judaea Capta' cf. Meshorer 1967: 107–109), but also perceived in genuine changes in the material culture. They label the period which immediately followed 70 CE as the Late Roman Period, which they consider lasting until the beginning of the Early Byzantine period.

A compromise seeks to impose an intermediate division within the larger Roman period beginning immediately after 70 CE. Usually the lower end of this Middle Roman period is considered the Bar Kochbah Revolt. However it may be argued that this period should be continued until the third century CE, at least (*cf.* Seligman 2010:104). This however leaves little time for the late Roman period to elapse before the historical beginning of the Byzantine period in 325 CE. For some researchers the remedy for this is a protracted Late Roman/Early Byzantine period.

It is well known that while natural and human calamities in the ancient past meant suffering and hardship for the populace living at the time, they are today considered a serendipitous boon for the archaeologist. Such occurrences leave detectable evidence that may serve to define periods and link them with historical events. In this case, each of the two revolts produced its own respective evidence in the archaeological record. Thus the two termini, at one end the suppression of the First Revolt in 70 CE and the other at the crushing of the Second Revolt in 136 CE provide a convenient means of defining the period. This era although brief, (a mere sixty-six years), has produced a ceramic corpus that is distinguishable from that of the preceding (Early Roman) period on the one hand and that of the succeeding (Late Roman) period on the other.

The Historical and Cultural Background of the Period

The conquering Romans did not wipe out Judean culture altogether following the suppression of the First Revolt. While they indeed resolved to quench Jewish nationalism and seize control of the administrative institutions, they nevertheless left the social and cultural fabric of Judean civilization largely intact. The picture that is emerging from sites such as Shoham, Kh. Um el-Ummdan and Kh Mughram is that after a brief disruption caused by the First Revolt, life returned to normal albeit on a more modest scale. The real break with Jewish life in Judea occurred only after the Romans had brutally crushed the Bar Kochbah Revolt early in the second century CE. It was then that Judean culture came to an abrupt halt. The stratum that succeeded that of the Second Revolt at Shoham, Kh. Um el-Ummdan and Petora was characterized by new construction associated with pottery and coins of the fourth century CE.

During the interim period between the revolts, the Tenth Legion was garrisoned on Mount Zion. The kilns of the legion, located at what are today the grounds of the Jerusalem International Conference Center, were producing large quantities of pottery. The recent publication of the Roman workshops of the International Jerusalem Conference Center (Magness 2005) has vastly increased our knowledge of legionary pottery produced in the region between the latter first century when the Tenth Legion Fratensis took up residence in Jerusalem and the beginning of the third century, when the Legion relocated

at Aila in the vicinity of modern Aqaba (Magness 2005: 104). Considering the evidence from Kh el-Mugrham, the industrial kilns discovered at the Jerusalem International Conference Center were likely the source of a good deal of the pottery in use at Jewish sites between the revolts in Jerusalem and its environs. This observation is based on the visible similarity of forms and fabric of many of the vessels found at the two sites.

The period between the revolts was an era of wide-ranging historical change. The decades following 70 CE were the formative years of Rabbinic Judaism. At the same time, early Christianity was also taking shape.

With the Temple no longer in commission, the strict adherence to the Jewish purity and dietary laws evidently waned to some extent. Whether or not the Temple would soon be rebuilt was hotly contested. Some expected an imminent rebuilding of the Temple. This hope was abetted by the messianic aspirations of Simon Bar-Kochbah and by spurious rumours that the emperor Hadrian himself planned to rebuild the Temple.[6] There were others who pragmatically resigned themselves to the fact that the Temple would not be rebuilt in their lifetimes. Those who anticipated the soon rebuilding of the Temple of course had much greater incentive for preserving the ritual purity and the dietary laws than those who despaired of seeing the Temple rebuilt in their day. All of these circumstances are reflected to some degree in the material culture that includes the ceramic finds.

General Characteristics of the Pottery

The Inter-revolt period pottery was mainly of local manufacture with a few imported fine wares and amphorae. One of the most striking differences between the pottery of the Late Second Temple period and that from between the revolts noticed during the earliest stages of research at Shoham Subdivision 44 and Um el Ummdan was the difference in the general color of the sherds. The pottery of inter-revolt loci was immediately recognizable in the washing tray by its reddish hue against that of Second Temple period loci which tended toward a tan or buff color. This change in color may have resulted from a switch of clay sources or possibly from a modification of firing techniques.

Notably, there is sharp ribbing on some of the vessels, (for instance cooking pots and storage jars, small to medium-sized bowls; beakers and bottles) as opposed to the usual gentle, rounded rippling often found on latter Second Temple period vessels. Moreover, the ribbing tended to cover a greater portion of the vessels' surfaces than it did in the previous Early Roman period.

Vessel Forms[7]

As might be expected, the wares of the vessels differ somewhat from area to area within the region, however, the same general forms were repeated at the various sites.

Fine Ware Bowls

A number of examples of fine ware bowls were recovered from the inter-revolt stratum of these sites. These have parallels in the late first and early second centuries and the repertoire is rather limited and incomplete. These included examples of Eastern Terra Sigillata A: Nos. 1–8; Imitation Eastern Terra Sigillata Nos. 9, 10; and Cypriot Sigillata Nos. 11–13.

No.14 and No. 15 are locally made medium-sized deep bowls with short, inclining shelf-rims. They are made of a gray (5YR 6/1) fabric with a pale brown (10YR 6/3) core. They were covered with a red (2.5YR 5/6) slip on their external surfaces and over their rims.

Rouletted Bowls (Late Roman Jerusalem Ware)

No. 16 and No. 17 are early examples of Magness' Rouletted Bowls Form 1 (Magness 1993:185–187; Rapuano 1999:174, Fig. 3: 41–44). Magness originally dated the appearance of these bowls from the late third to the early fourth century, however it is now clear that they were already present in small numbers in the Inter-revolt period.

Thin-walled cup

Another locally made fine-ware vessel, (Nos. 18, 19) is a thin-walled cup with a narrow, square, folded rim, a disc base and a depression in its floor. It was made of a fine, thin ware.

Plain Ware Bowls

Basins

There are several types of basins in the Inter-revolt repertoire: These include Shelf-rim Basins such as No. 20 and No. 21 described by Magness (1993: 202).

Rilled-rim Basins

Rilled-rim Basins, a variant of Shelf-rim basins with channels or rills on top of their rims, were originally described by Magness (1993: 203 – 204).Two variants were found at these sites.

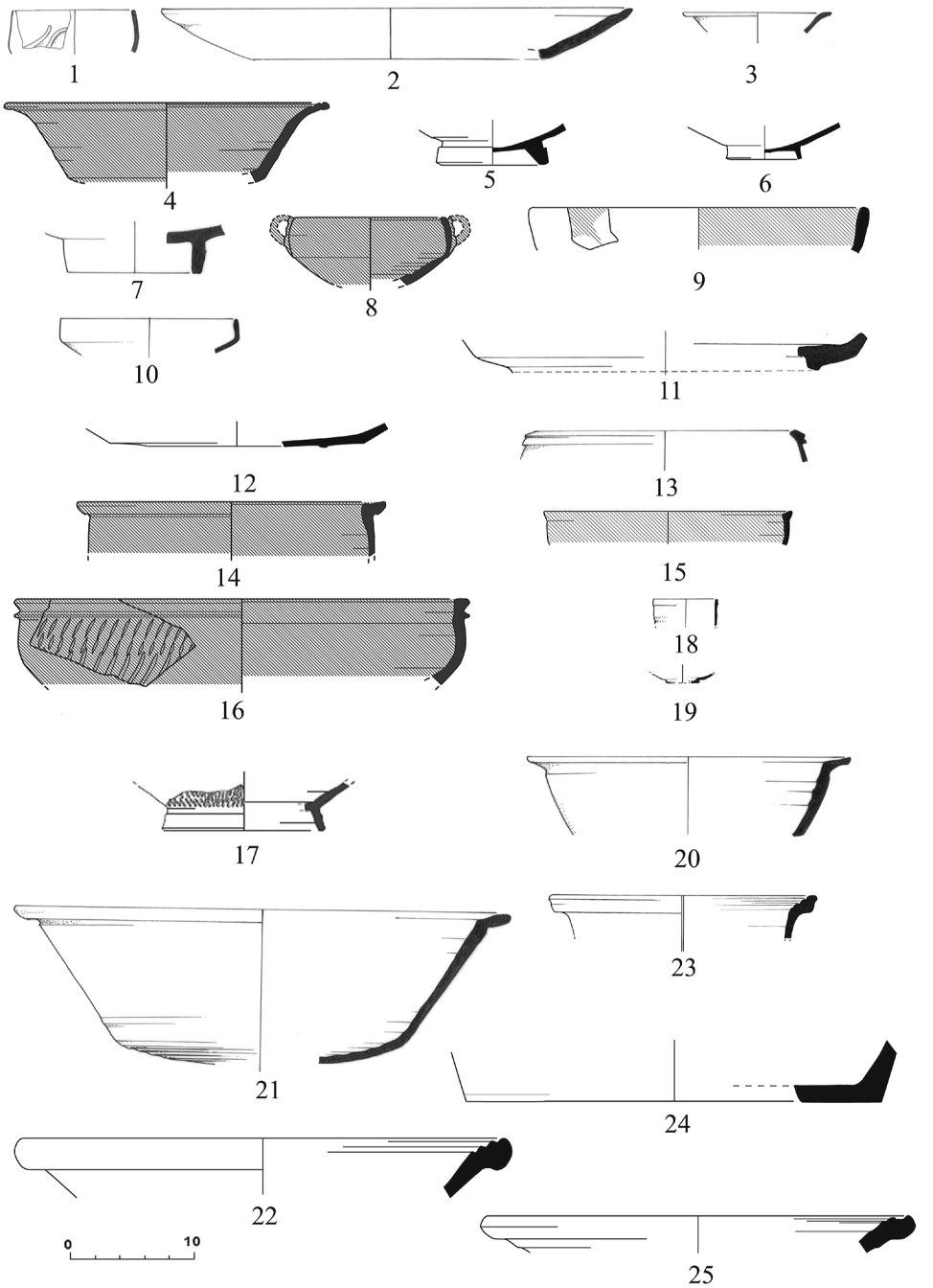

Fig. 2. Bowls

Form 1. Nos. 22–24 are deep basins each with three or more rills over the top of its ledge-rim. Nos. 25 and 26 are evidently related shallower bowls with incurving walls and two or three deep rills on their ledge rims.

Form 2. No. 27 is a deep basin that has deep rills on top of its rim, arranged one toward the outer edge and another toward the inner edge of the rim. This form was less commonly found at these sites. The lower part of vessel No. 28 with tapering walls and a flat base may belong to a Form 2 Rilled-rim Basin.

Phasing and dating of rilled-rim basins

In *Jerusalem Ceramic Chronology (JCC)*, Magness (1993: 203 – 204) originally suggested a date range for Rilled-rim Basins from the late third century/early fourth century to the sixth century. The examples she presented belong entirely to Form 2. However, after encountering examples of basins of Form 1 along with a few Form 2 at the Jerusalem International Convention Center site (Magness 2005:104–105), she revised her dating of rilled-rim basins, raising the date of their appearance to Hadrianic and Antonine periods (117–161 CE) or earlier. Most of the examples found at these Inter-revolt sites belong to Form 1. Only a very few examples of Form 2 were recovered. Moreover, Form 1 is entirely absent in Magness's *JCC* corpus. Evidently the production of Form 1 had already ceased by the late third century. The greater number of Form 1 examples at these sites may suggest that Form 1 possibly served as the inspiration for Form 2. No. 29 may in fact be a transitional Form 1 and Form 2. However, it is also possible that Rilled-Rim Form 2 is a local imitation of Eastern Terra Sigillata Atlante Form 63 (Hayes 1985:41, Pl.8:1) to which it is remarkably similar in shape. Rilled-rim Basins of Form 2 continued to be produced through Late Roman and Early Byzantine times. To summarize the suggested dates for Form 1 are the late first century to third century CE; for Form 2, it is the late first/second century to sixth century CE.

Arch-rim Basins

Magness (1993: 204–206) suggested that arched-rim basins (nos. 30, 31) are large, deep basins with an arched rim, the typical form of basin of Judea in the late Roman through the Byzantine periods, first appearing in the late third/early fourth centuries. It is clear from these sites that these basins were already present in the period between the revolts; they were, nevertheless, scarce during this period.

Small to Medium-Sized Bowls

Small bowls found at these sites were either hemispherical or incurving. The small hemispherical bowl No. 32 may have served as a drinking cup. The incurving-rim bowls range from shallow, (almost plates) (Nos. 33, 34), to fairly deep (Nos.

35, 36). They are usually simple, sometimes with a cup-shaped rim (No. 35). There is at times a carination beneath the rim. This carination may be quite sharp (e.g. Nos. 33, 35) or gentle and rounded (No. 36). The base is a low disc which may be slightly concave. There is sharp ribbing on the exterior body of some examples as Nos. 37 and 38. Small incurving rim bowls were popular already in the Hasmonean period and continued to be so in the Herodian period as well. (Bar-Nathan 2002: 86).

No. 39 is a medium-sized bowl from Um el-Ummdan with a concave internal ledge rim and sharply ribbed incurving walls. Its fabric and the sharp ribbing of its external wall is similar to that of mug No. 47 (see below).

The flat-bottom pan, No. 40, was recovered from Ben-Shemen. This is a local imitation of a Pompeian Red Ware vessel (Magness 2005:87). The baking pan was an important form in legionary pottery. (Magness 2005:87), it was however rare at these sites.

Beakers

Two different forms of beakers were distinguished by their shape as well as their fabric.

The first group is of small open, cup-like beakers, No. 41 with a thickened, everted rim No. 42 thickened rolled-back rim and No. 43 with a shelf rim. They are of a metallic-hard, smooth, reddish, (2.5YR 5/6–5YR 6/4) fabric. No. 42 typically has a band of dark reddish brown (5YR 2.5/2) paint on and below its exterior rim.

Of the second group (Nos. 44, 45) only the lower part of the of beakers were preserved with thick string cut bases. They may have been similar to No. 46 found at the Jerusalem International Convention Center (after Magness 2005:16–2). They are of a coarse, heavy fabric ranging in color from reddish yellow (5YR 7/6) to light brown (7.5YR 6/4). There is sharp ribbing on the body sometimes covering the entire lower part of the vessel. They are similar in form and fabric to a group of juglets (see below).

Mug

No. 47 is a globular mug with a concave neck and footed disc base found at Umm el-Umdan. It is made of a thin, reddish fabric. There is a small depression in the floor and sharp ribbing covers its body. A similar complete vessel but with a convex neck No. 48 was recovered from the Judean Desert Selah cave (after Eshel and Amit 1998: Pl.1:19) dated to the Bar-Kochbah Revolt.

Cooking Pots

Cooking pots comprised a large percentage of the vessels recovered from these sites. They varied widely in form, some of the shapes being quite unusual.

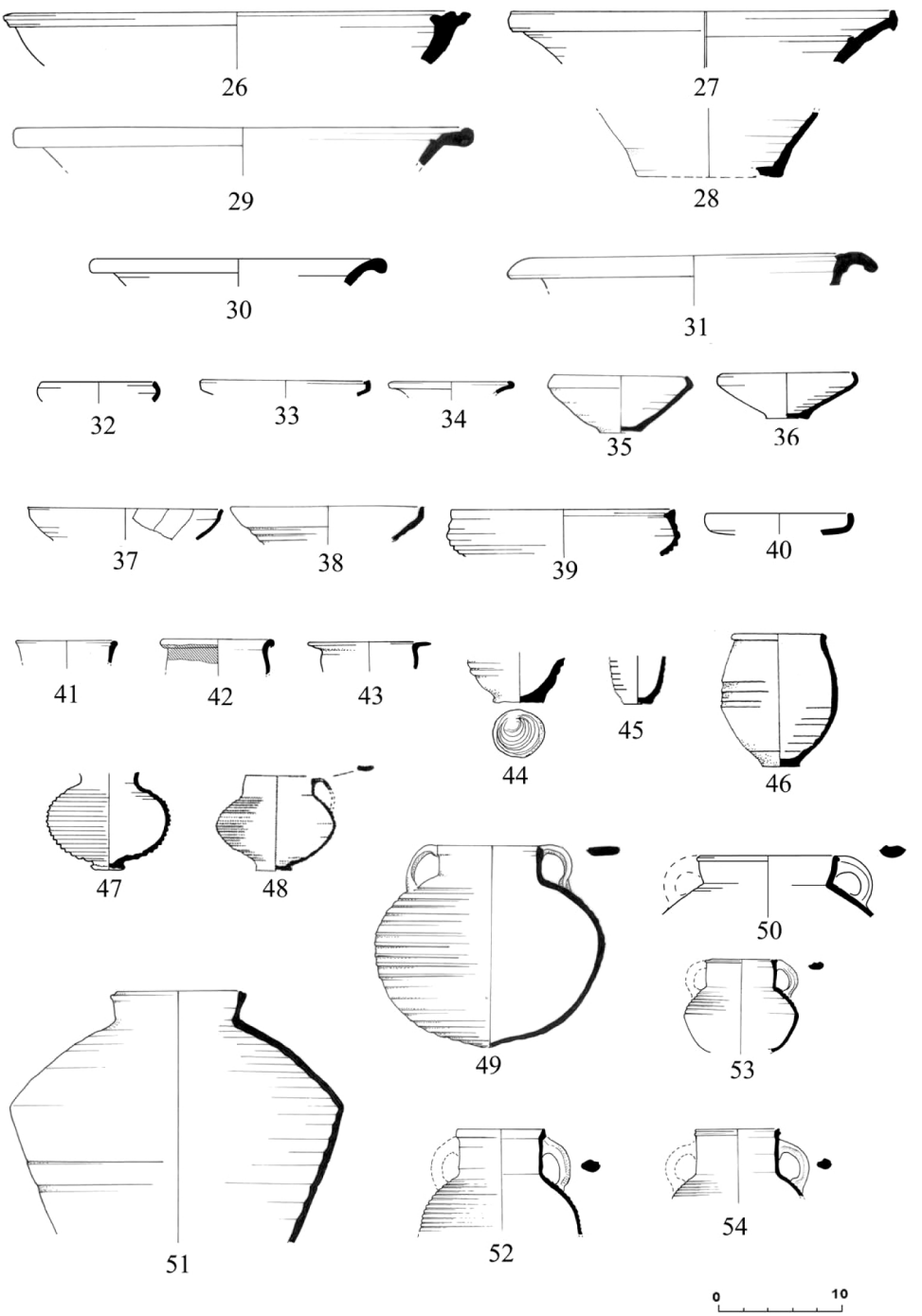

Fig. 3. Cooking pots

Nos. 49 and 50 are variants of triangular-rimmed globular cooking pots with folded with a triangular, grooved rim and a smooth rounded transition from the neck to the shoulder. This form continued from the Second Temple period. No. 51 is a related form, an unusual, especially large bi-conical cooking pot with a channel rim and a funnel-shaped neck.

Tall-necked cooking pots discovered mainly in the Shoham area were characterized by a global to ovoid body with an especially tall neck, a smooth transition from neck to shoulder. It had various rim profiles: everted (No. 52); shelf-rim (No. 53); and grooved (Nos. 54, 55).

Nos. 56–60 are squat, wide-mouth cooking pots with a medium high neck and a smooth transition from neck to shoulder. The sub-forms are distinguished by their various rim and neck profiles: No. 56 with a simple rim and funnel-shaped neck; No. 57 with an everted rim and funnel-shaped neck; No. 58 with a grooved, triangular rim and cylindrical neck; No. 59 with a grooved, triangular rim and conical neck; and No. 60 with a grooved, triangular rim and convex neck.

Narrow-grooved cooking pots Nos. 61 and 62 are squat cooking pots with a grooved rim, a medium- tall neck and a carinated shoulder. They are especially typical of this period and continue until the third century.

Petora Cooking pots (Nos. 63–67) are so nicknamed because nearly all the examples of this form were recovered from the excavations at Petora. They are globular to squat in form usually with a carinated shoulder. The most distinctive feature of this vessel is its neck. Some of the variants have a distinct ‘hourglass’ neck (Nos. 66, 67). On others the internal angle between the upper and lower parts of the neck is not as sharp and the neck may be described as concave (No. 63). Occasionally, all that remains of the internal angle is a gentle turn inward near the base of the neck (see Nos. 64 and 65) The rims vary somewhat, the shelf rim being the most common.

The miniature globular cooking pot, Nos. 68–70 is one of the most characteristic forms of the inter-revolt period. Fragments of it were found at every one of these sites. This vessel has a short, out-folded triangular rim, usually with a very small (in some cases almost imperceptible) groove on the exterior, and a tall cylindrical neck. It is made of thin, friable ware. It was notably not reported at the Jerusalem Convention center excavations., At Aroer it was assigned to the declining years of the second Temple period, (Hershkovitz 1992:310). At Shoham Subdivision 44, a complete example No. 68 was recovered from inside a storage jar of the type with a wide, distinct flanged to channel-rim (see below). The small unguent pot No. 240 (see below), in which was buried a horde of coins of the late first to early second centuries CE (see below), bares a remarkable resemblance to these cooking pots, both in form and ware.

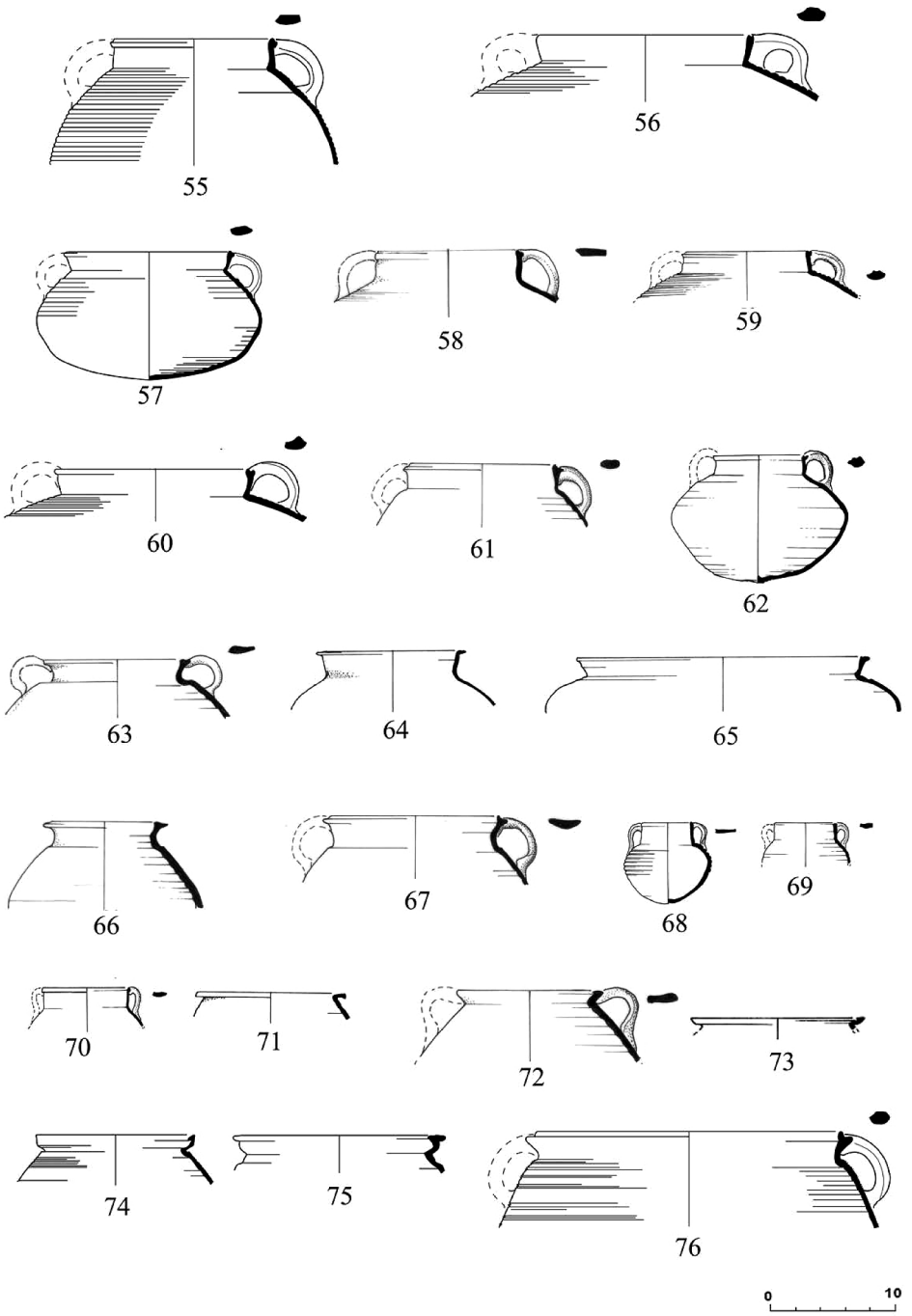

Fig. 4. Cooking pots and casseroles

Casseroles

There were four forms of casseroles from these sites:

Conical, shelf-rim cooking pot/casseroles have a carination from the transition of the wall to the base and variations of shelf-rim profiles: a broad ledge-rim l (No. 71); an everted, concave shelf rim (No. 72); a cupped shelf rim (Nos. 73, 74); a shelf-rim with a shallow groove on top (No. 75); and a broad channel-rim (No. 76). This vessel has either a wide, short neck (Nos. 73–76) or no neck at all (Nos. 71, 72). The basic form of this vessel first appeared in the Late Hellenistic period and continued into the Late Roman period as late as the third century CE.

Nos. 77–79 are open carinated casseroles with a concave ledge-rim, a rounded base and vertical loop handles.

Nos. 80–82 are deep, open ledge-handle casseroles with gently flaring walls, an internally-beveled rim, a flattened base and ledge handles some of which are crimped. Casseroles of this form as well as deep open casseroles with horizontal loop-handles (see below) were probably formed together as one piece with their lids that were subsequently sliced off before firing, while the fabric was still leather-hard, with the intention that each lid would fit together with its pot snugly.

Deep, open horizontal loop-handle casseroles are casseroles with a rim that was usually internally beveled, horizontal loop handles and a flattened base. Nos. 83–85 have smaller, lighter handles, while Nos. 86 and 87 have larger, heavier handles. Both appeared together for the first time in the Inter-revolt period however after the fourth century it seems the casseroles with smaller handles were no longer produced. The form with the horizontal handles became the typical casserole of the Late Roman, Byzantine and Umayyad periods

Kraters

There were basically two forms of locally made kraters at these sites: Carinated krater bowls (Nos. 88–91) are medium-sized, open, deep, carinated krater bowls with an inset band beneath the rim that formed a slight shoulder and having everted to shelf-rim profiles.

Krater-jars are ovoid kraters with restricted necks having various rim profiles, usually square (Nos. 92–94). This form already appeared in the late Hellenistic period (e. g. Gitin 1990: Pl.40:14 dated late 2nd cent. BCE). No. 94 was recovered from Locus 17047 in many fragments. The upper vessel and the base were restorable. It has a square-folded rim, a concave base and a strap handle springing from the rim. The many body fragments, a number of which had small, round, perforations each measuring about the diameter of a reed could not be restored in relation to the upper body or base.

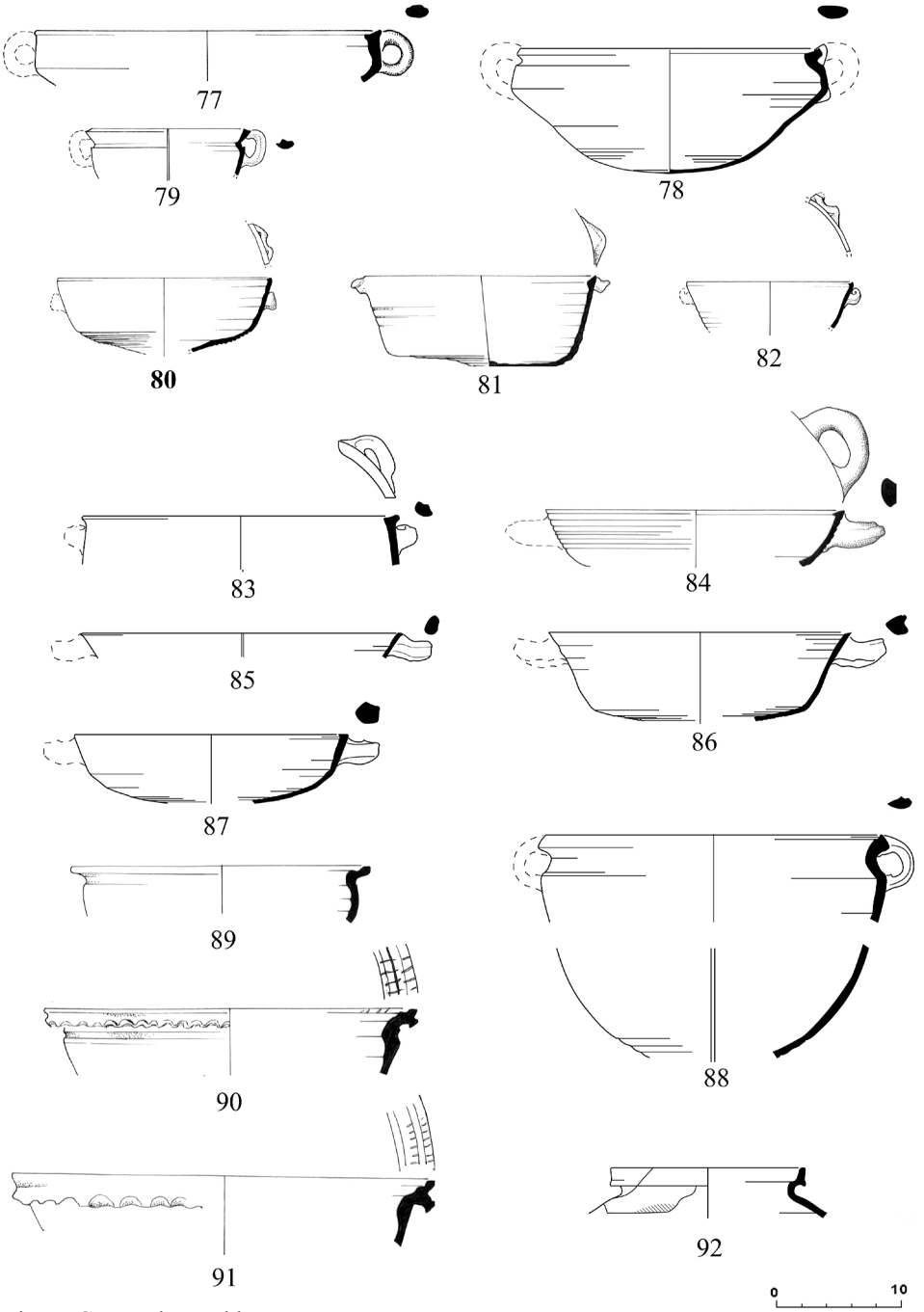

Fig. 5. Casseroles and kraters

No. 95 is a unique large, jar-like krater with a shelf rim and three or four grooved loop handles, two of which extend from the rim to the shoulder and one (or two) drawn from the top to the middle of the shoulder. The outer edge of the rim of this vessel was decorated with pie crust molding and the body was adorned with horizontal bands of straight and wavy combed lines in at least two or three registers.

Imported Amphorae

Along with the examples of the imported fine-ware bowls in the repertoire there were also a number of amphorae imported from different parts of the Roman world.

No. 96 is an amphora with a thickened, rounded, carinated rim; it is possibly like one described by Peacock and Williams (1986:56–157) Amphora Class 34 (African Grande II see Johnson 2008: 166 No. 467; late second to at least the late fourth century CE.). No. 97 has a thick square rim and a cylindrical neck. It is possibly like Johnson 2008: 145–146, No. 442 Ben Ghazi Early Roman Amphora 11A (Its date range is within the first century CE). Nos. 98 and 99 are examples of an elongated ovoid amphora, also possibly Benghazi Early Amphora 11A, with a heavy folded, square rim, cylindrical neck and loop handles attached from mid neck. No. 100 is a comparative example from Ashkelon (after Johnson 2008: 145–146). No. 101 is the handle of a Benghhazi Middle Roman Amphora. This vessel has a wide cylindrical body with a pronounced turn from upper body to shoulder, a flattened knob rim, a cylindrical neck and ends in a thickened rim a short solid cylindrical or pointed toe. The handles are vertically attached on the upper neck and shoulder. The coils of clay, with a deep groove along the outer surface, are squeezed together and bent sharply at the transition from the horizontal to the vertical section. Pronounced ribbing usually covers the exterior of the jar from shoulder to toe. The date range of these vessels is from the first to the fourth centuries CE, especially the second and third centuries CE. No. 102 is a complete comparative example from Ashkelon (after Johnson 2008: 153, No. 438). No. 103 is possibly a Phoenician amphora with a cup-shaped, externally folded rim, and a cylindrical neck with handles attached at the top of the neck to the shoulder. No. 104 is a complete comparative example from Ein Zeitun (Glick 2006: Fig. 11: 10). No. 105 has a flattened knob-rim, a cylindrical neck and thick handles that spring from the underside of the rim and upper neck

No. 106 is an amphorae with a wide mouth, an everted knob rim, an hourglass neck and handles that spring from the neck to the shoulder. A parallel from Paphos is an amphora noted by Hayes to be similar to his Eastern Type IV, which is presumably imported from Western Asia Minor (Hayes 1991:205; also Rapuano 2012:5–6 No. 23 and parallels).

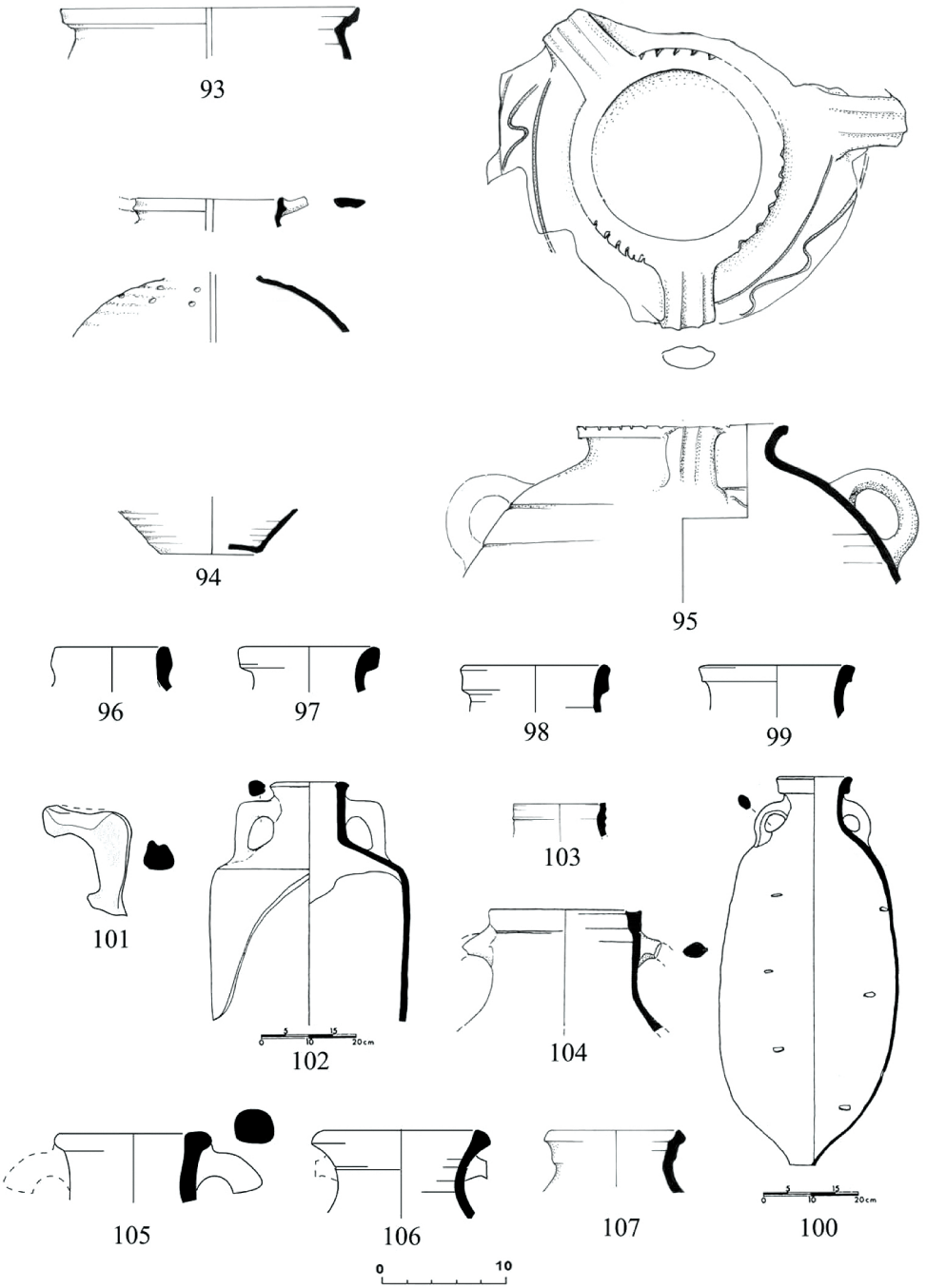

Fig. 6. Amphorae

Unidentified amphorae

No. 107 Is an amphora with a cupped rim and a gently carinated, hourglass-shaped neck. Nos. 108 and 109 are amphorae with long, folded square rims and a cylindrical neck. No. 110 is an amphora with a thickened triangular rim, and a tall slightly conical neck.

Table Amphorae

There is a single basic form of table amphora. It is piriform with a narrow shelf-rim, a tall, ridged cylindrical neck and strap handles extending from the neck down to the shoulders. However, there is considerable variation in the proportions of the vessels. No. 111 has a shelf-rim with a square face, a tall, cylindrical neck with a pronounced ridge beneath the rim. The strap handles spring from the neck beneath the ridge, arching and rising to the height of the rim and then descending to the shoulder. No. 112 has an everted square rim, a tall, conical neck with collar ridge at the transition from the neck to the shoulder and a flat base. The ridge beneath the rim is less pronounced than that of No. 111. The handles of No. 112 spring from the neck beneath the rim, extending outward and then descending to the shoulder. The rim of these vessels are somewhat similar to that of Hayes' (1985) ETSA Form 116 Fig. 10:6 which he dated to 'circa 70–120?' CE.

Storage Jars

The greatest number of vessels recovered from these sites was of storage jars. Some forms of the Inter-revolt period continued those of the Second Temple period, retaining identical characteristics so that the jars of this period are indistinguishable from those of the earlier period. Other storage jars developed features that would continue into the Late Roman period and herald those of the Early Byzantine era.

No. 113 is a cylindrical storage jar with an everted rim and a tall cylindrical neck with a collar ridge at the base of its neck. No. 114, from the Murabbat caves, is included to show a complete example of this type of vessel (Benoit, Milik and de Vaux 1961: Pl. 3:14).

Collared-neck bag-shaped storage jars (Nos. 115–120) have variations of an everted rim and a distinctive collar ridge, narrow shelf, sleeve or 'turtle neck' collar at the base of the neck. There are several variations in the profile of the rim. This type of storage jar first appeared at the end of the first century BCE; and continued throughout the first century CE to the beginning of the second century CE.

Nos. 121–123 are tall-necked, bag-shaped storage jars with an everted rim, an especially tall neck, the upper part of which is slightly cup-shaped, the lower part cylindrical. They lack a collar ridge at the base of the neck and are made of a thin, metallic ware. All the examples illustrated were recovered from El-Khirbeh. No.

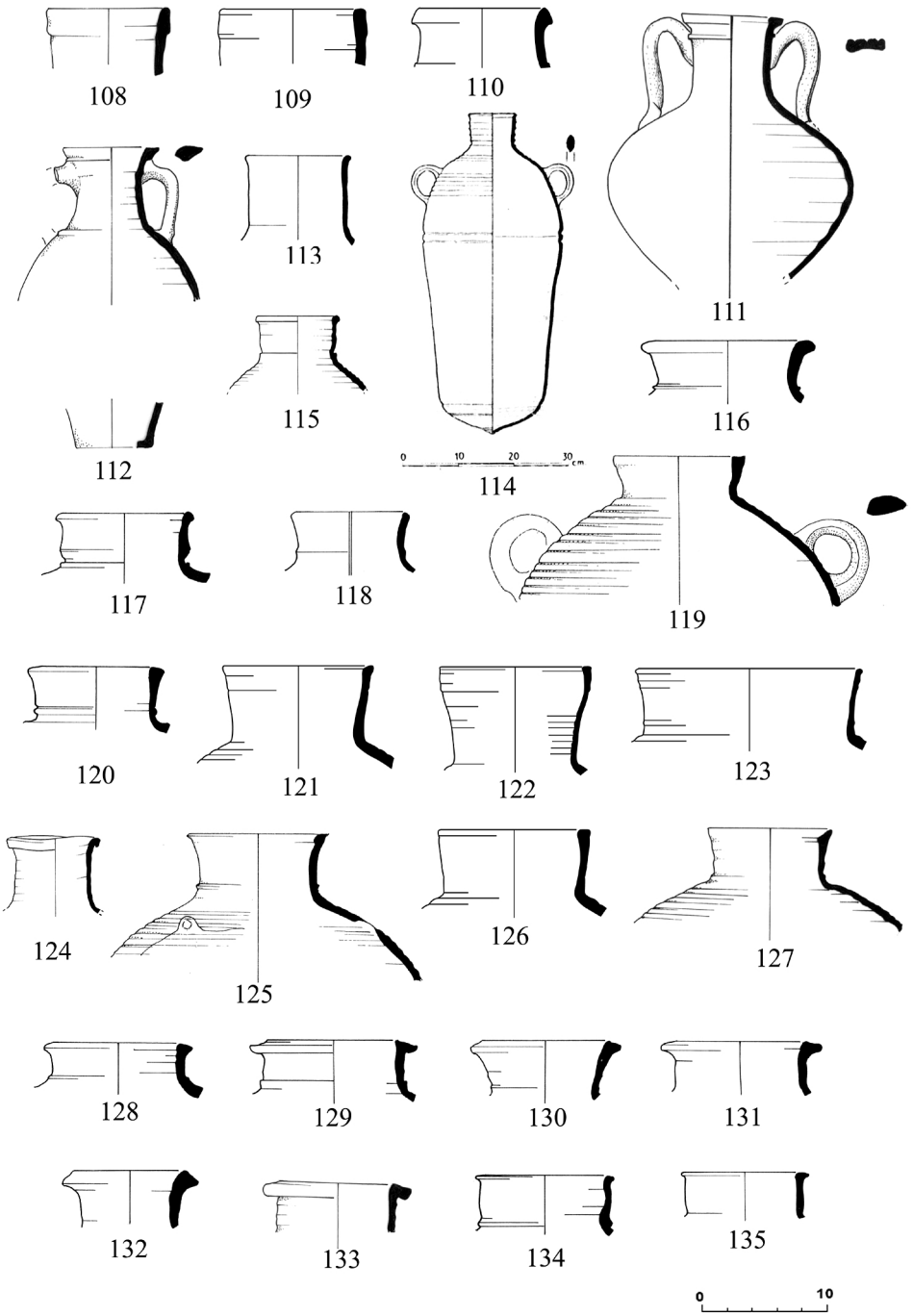

Fig. 7. Amphorae and storage jars

124 may be related to these having a tall, cylindrical neck lacking a collar-ridge. The difference is that it has a ring-rim that has a square section.

Infolded-rim bag-shaped storage jars (Nos. 125 – 127) have a rim with a fold or a thickening on its inner side, a cylindrical to funnel-shaped neck and a collar-ridge at the base of the neck. This type of jar is probably the predecessor of Magness' Form 4 storage jar (1993:223–226) also characterized by a thickening or fold on the inside of the rim (cf. Rapuano 1999:173). Magness noted the tendency for the body of her Form 4 jar to become wider and the neck shorter over time. These jars bear the characteristics of her earliest form, Form 4A, having a rather tall neck and a very high thickening, fold or ridge on the inside of the rim. The body of the examples tends to be relatively tall and narrow. Magness dated the appearance of Form 4A to the third century to fourth century CE. Notwithstanding, this form evidently commenced at a considerably earlier time (Rapuano 1999:173). This storage jar was particularly common at Petora; it thus would seem fitting to designate it the 'Petora inter-revolt storage jar'.

Ledge-rim storage jars have bell-shaped to bag-shaped bodies a ledge-rim and a cylindrical to funnel – shaped neck They probably first appeared in mid-first century CE (Bar-Nathan 1981:55–56) and continued to be produced to the Second Revolt. Nos. 128–130 have collar ridge at the base of the neck. Nos. 131–133 lack a collar ridge at the base of the neck

Grooved-rim Storage Jars (Nos. 134 and 135) represent bag-shaped storage jars with an everted rim that has a groove on top of it and a tall neck with a collar-ridge at its base. Narrow, grooved rims already appeared at Um el Ummdan on long folded rims of late Hellenistic tradition in the late first century BCE. These shallow, narrow rims evidently carried over when the folded-rim jars evolved into collared-necked jars at the end of the first century BCE. They continued until after 70 CE.

Channel-rim Storage Jars Nos. 136 and 137 are evidently an earlier form of channel-rim storage jars within this corpus that have a triangular narrow channel-rim a cylindrical to convex neck and a collar ridge at the base of the neck. It was occasionally executed in a somewhat careless, 'sloppy' manner (see for example No. 136) as opposed to the later variants Nos. 138–144 that have wider and thicker rims with neater, crisper edges. These storage jars with the wider channel-rims are more common in the later loci.

Nos. 138–140 are storage jars that have developed channel-rims a cylindrical to funnel-shaped neck and a collar ridge at the base of the neck Storage jars Nos. 141 and 142 have a wide, distinct flanged rim or channel-rim a cylindrical, funnel-shaped or convex neck that lacks a collar ridge at its base. These vessels are often produced in a distinctive coarse sandy dark reddish brown (2.5YR 5/6 to 7.5YR 5/6) ware (see for example No. 141), evidently manufactured in a region somewhere on or near the coast. Nos. 143 and 144 are of a variant

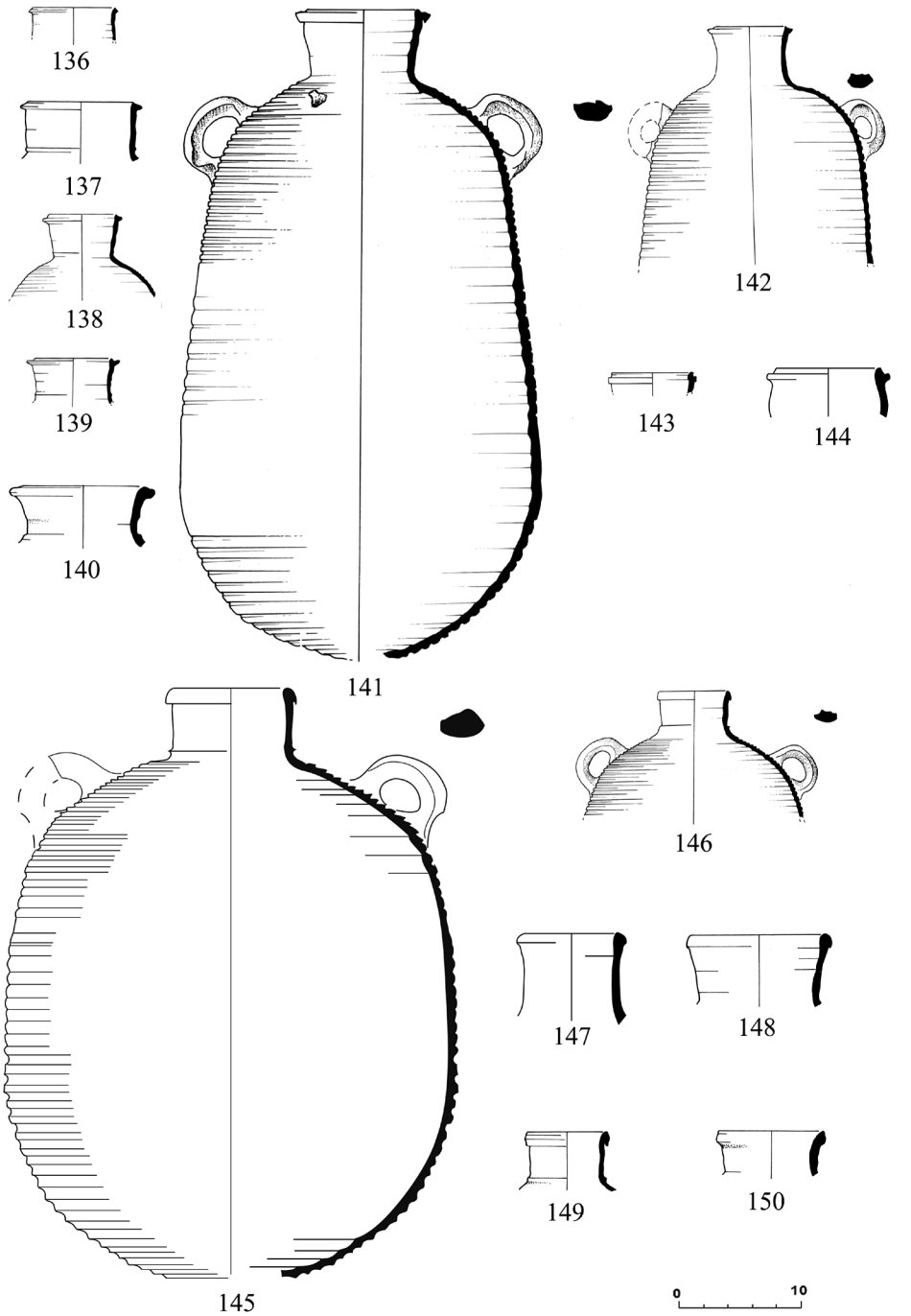

Fig. 8. Storage jars

with a wide, channel-rim that has a distinctive square profile, a cylindrical to funnel-shaped neck lacking collar ridge at the base of the neck The channel-rim storage jar lacking a collar ridge was first introduced in the Inter-revolt period and was one of the most distinctive vessels of this era. It seems that the variant of channel-rim storage jars with a collar ridge at the base of the neck continued to be produced alongside those without a collar ridge.

Folded-Rim Storage Jars include various bag-shaped storage jars with externally folded rims: Nos. 145 and 146 have a round folded rim, a tall cylindrical neck with a collar ridge at the base of the neck. This form corresponds with Riley's Amphora 1A at the Caesarea Hippodrome (1975: 26–27), which he dated to between the first and the fourth centuries. Nos. 147 and 148 have an incurved, folded, round rim, an especially tall cylindrical neck that lacks a collar ridge at its base. No. 149 has a round, lapped, elongated rim, tall, a cylindrical, slightly convex neck and a collar ridge at the base of the neck. No. 150 has a grooved, round, everted, folded rim, and a cylindrical to funnel-shaped neck that lacks a collar ridge. No. 151 has a round, everted folded-rim, a cylindrical neck that lacks a collar ridge.

The early form of southern coastal bag-shaped jar (Nos. 152–154) has a triangular to round folded rim, a bulging neck and usually a distinct collar ridge or 'turtleneck' collar at the base of the neck (No. 154 is exceptional), and rather heavy grooved loop handles on either side of its shoulder, It is manufactured in a sandy orange (2.5YR 5/6–5YR 6/6) ware, typical of the coast. Occasionally there are ceramic accretions found on the neck and shoulder (see for example No. 152). A red stripe on the body of this vessel is common (see Kloner and Tepper 1987:Pl.6:13) It is evidently an early example of the coastal bag-shaped storage jar that probably first appeared in late first to early second century CE. It developed into the typical late Roman coastal bag jar of the late Roman, Byzantine and Early Islamic periods, the wasted neck becoming lower and squatter over time. This vessel, for instance, has the same form as Caesarea Hippodrome (Riley 1975:26–27) Amphora IB, which Riley suggested appeared possibly during the fifth century. He sites other Byzantine parallels as late as sixth century. These later, Byzantine examples of southern coastal bag-shaped jars were closely associated with Gaza jars and were probably produced in the same workshops (see for instance Sion and Rapuano 2010: 1).

Nos. 155 and 156 are bag-shaped storage jars with a triangular folded rim and a tall, cylindrical to funnel shaped neck with a collar ridge at the base of the neck. Bag-shaped storage jars with variants of a square folded-rim, Nos. 157 and 158 have an upright square folded-rim, a cylindrical to slightly convex neck and collar ridge at the base of the neck Nos. 159 and 160 have a long, everted, square folded rim and a turtle-neck collar ridge forming a wasted neck. No. 161 has a thick, folded, everted, squarish knob-rim, and a funnel-shaped neck.Nos. 162 and No. 163 have a folded rim that has an axe-shaped profile.

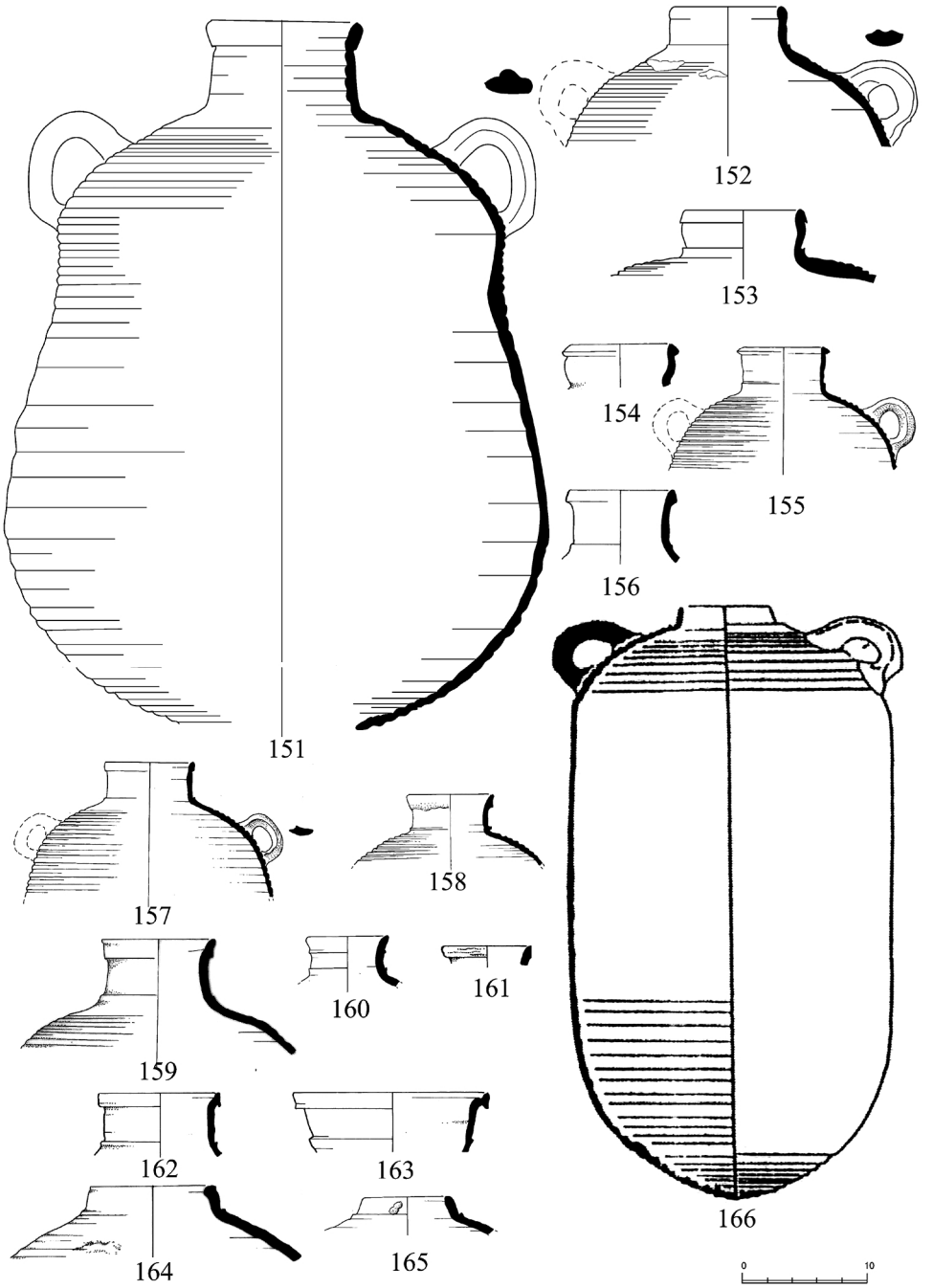

Fig. 9. Storage jars

An early form of Gaza Jar (Nos. 164, 165) is Majcherek's (1995) Gaza Storage Jar' Form 1 No. 166 (Majcherek 1985: Fig. 3:1) that illustrates a complete vessel of this form. According to Majcherek, this vessel is a bulging amphora with a maximum height of 60 cm, maximum width of 33 cm, a rim diameter reaching 10 cm and a volume of nearly 30 liters. It has broad, flat and slightly rounded shoulders, a vertical, plain or profiled rim of medium height and thickness, handles oval in section were attached to the shoulders at the maximum diameter point. The shoulders and base are covered with a regular, wide-spaced and shallow ribbing. Often there are ceramic accretions found on the neck and shoulder (see examples Nos. 164 and 165).

The Pseudo-Early Gaza storage jar is evidently an ovoid storage jar with an everted rim and sharp ribbing on the shoulder made of reddish yellow (5YR 6/6) ware. No. 167 has a wide everted rim a short cylindrical neck. No. 168 has a tall carinated neck This form appears somewhat similar to these early examples of the 'Gaza Storage Jars', (see above).The fabric is somewhat yellower than true early-form Gaza Storage Jars. This form is rare and in this corpus was only found in the Shoham area.

The eponomous S-profiled-rim storage jar (No. 169 and No. 170) is a bag-shaped (?) jar with an 's'-shaped, inverted rim and a cylindrical neck. An example was found at Nevi Bulus, in the Ramat Beit Shemesh area in a third to fourth century context (*cf.* Rapuano and Yas 1998).

Nos. 171, 172 are ovoid, wide mouth jars with an internally beveled rim, cylindrical neck and a collar ridge at its base. They are decorated with a wavy band of combing on the shoulder. No. 172 is a comparative, complete example from Masada (Bar-Nathan 2006: Pl.2:7).

A number of storage jars were produced in similar versions with and without a collar ridge at the base of the neck Those with collar ridges evidently continue from the Second Temple period, while those lacking a collar ridge were introduced during the Inter-revolt period. It may have been that storage jars with and those without a collar ridge were produced at different workshops. This question requires further research.

Fine Ware jugs

There were a few examples of Terra Sigillata ware jugs. Nearly all of the examples found were only the bases of the vessels, making them difficult to classify.

Eastern Terra Sigillata A Nos. 173 and 174 are ovoid Eastern Terra Sigillata A ware jugs with a ring bases

Imitation Terra Sigillata No. 175 is a narrow-necked jug with a internally-grooved triangular rim and a funnel-shaped neck. Nos. 176, 177 and 178 are lower parts of jugs with ring bases.

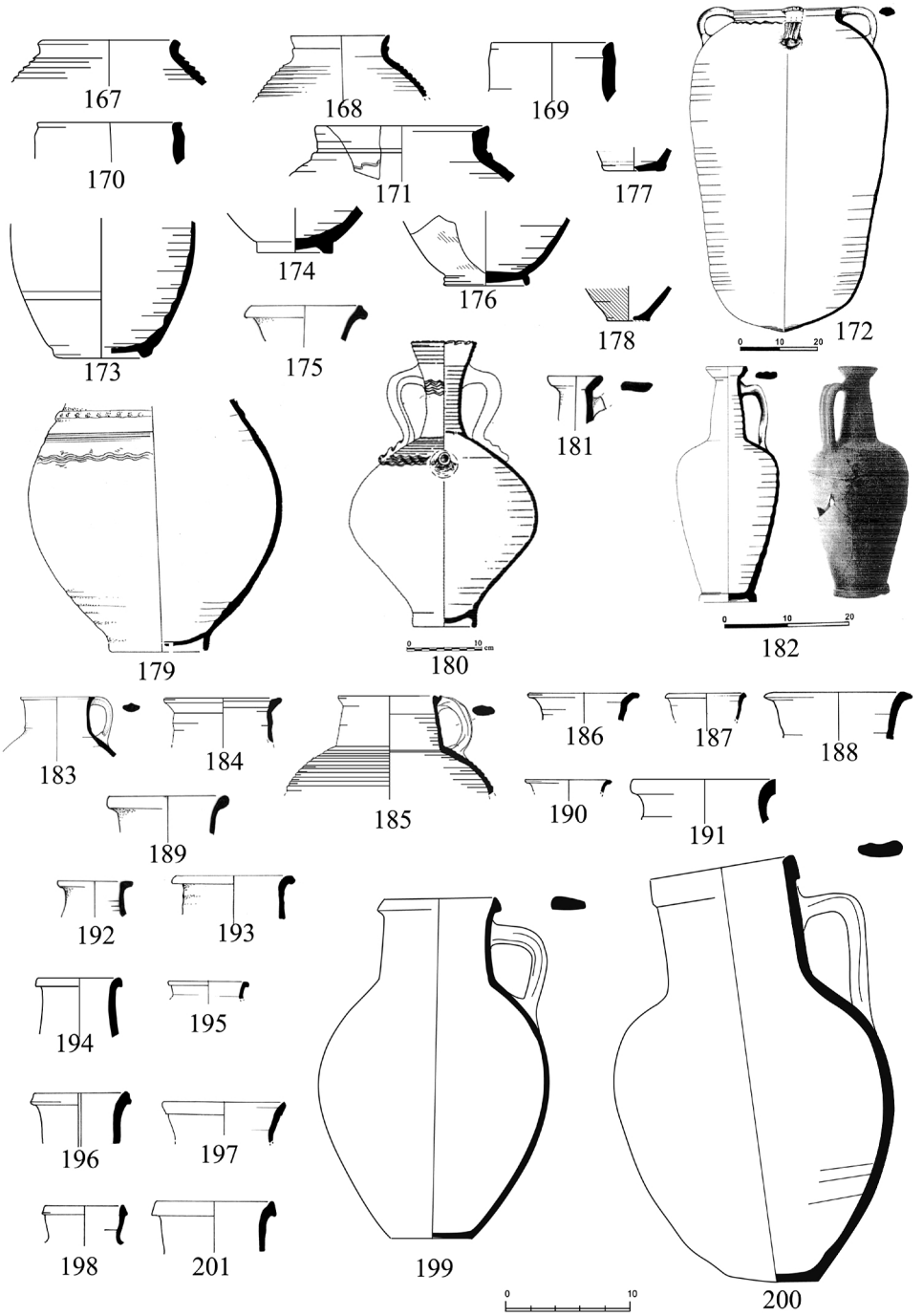

Fig. 10. Storage jars and fine wares

The body and base of a Nabatean Cream Ware jug No. 179 were recovered from Petora and restored. It has an ovoid body and the tall ring-base. This vessel is made of cream ware; the color obtained by the addition of salt to the fabric before firing (Bar-Nathan 2006: 281; Amr 1992:223–224). The upper body of the vessel is decorated with a band of 'pie-crust' application, below which is a band of straight combing and below that, a band of wave combing. No. 180 is a composite drawing of similar jugs from Callirrhoe in Jordan (Clammer 1997: Fig.9). These jugs were produced at Nabatean sites in the south of Israel and Jordan (Negev 1986:71). Usually only fragments of Nabatean Cream Ware jugs are found on Inter-revolt period sites. They are easily mistaken for Early Islamic vessels, because of their similar form and fabric (Negev 1986:71).

'Tall Belly-jug' No. 181 is a narrow-necked jug with a flaring rim, a tall cylindrical neck and a single strap handle springing from the neck. No. 182 is a complete comparative example from Masada; the vessel's widest proportion is in the upper part of its body prompting Bar-Nathan (2006:115; and Pl. 22:66) to nickname it a 'Tall Belly-jug'. She noted that the form and fabric are not local and presented a possible second century parallel from the Villa Dionysus in Crete (Hayes 1983:156, Fig. 26:A92) Her dating of 100–115 for the Masada example is significant for the dating of this jug in particular and this pottery corpus in general.

Plain Ware Jugs

The plain ware Jugs are divided between wide neck and narrow-necked vessels.

Wide-Necked Jugs

Nos. 183–185 are ovoid jugs with an everted beaked rim and a tall cylindrical to conical neck. The top of the rim may be a flat (No. 183), concave (No. 184) or grooved (No. 185).

Nos. 186–195 are all variants of jugs with out-turned rims. Nos. 186–188 have everted rims and cupped necks. Nos. 189–191 are ovoid jugs with a thickened, round, out-turned rim and a cylindrical to funnel-shaped neck. No. 192 is an ovoid jug with a rim that has been turned out so widely that it forms a shelf-rim and a slightly conical neck. Nos. 193 and 194 have a rolled-back rim and a slightly conical neck. Similarly, No. 195 is a wide-necked jug with a thickened, rounded, rolled-back rim and a medium-high a funnel-shaped neck.

Nos. 196–201 represent ovoid, wide-necked, folded-rim jugs with various rim profiles. No. 196 has an everted, triangular rim and a cylindrical neck. No. 197 has

a flaring folded rim and a funnel-shaped neck. No. 198 has a triangular, folded rim and a swollen neck.

No. 199 and No. 200 were both restored from El-Khirbeh. They are similar, large, ovoid wide-necked jugs with folded rims, tall, cylindrical necks and flattened bases. No. 199 has an internally-grooved, triangular rim. No. 200 has a square rim. Both jugs have a strap handle that extends from the middle of the neck to the shoulder. The lower part of No. 200 was found in the oil vat of the El-Khirbeh oil press and may have served to collect the freshly pressed oil. No. 201, similar to No. 199 has an axe-shaped rim profile.

No. 202 and No. 203 are thin-ware wide-necked jugs with a grooved axe-shaped rim profile and a funnel-shaped neck. No. 202 is decorated with reddish-brown paint over its rim, trailing down the inside of its neck. No. 204 is an unusual wide-necked jug with a grooved shelf rim and a bowl-shaped neck.

Narrow-Necked Jugs

No. 205 is a conical necked piriform jug with an everted rim, conical neck and a grooved strap handle springing from the neck to the shoulder.

No. 206 and No. 207 are piriform, narrow-necked jugs with a thickened rim, cylindrical neck. Nos. 208 and 209 have a folded, square rim. Parallels from the caves of the Judean Desert (Eshel and Amit 1998: P.44 Pl.2:9, P.92: Pl.2:14–15) confirm that this form belongs to about the time of the Second Revolt.

Piriform jugs (Nos. 210, 211) have a cupped rim, a cylindrical neck and a footed ring base. On the nearly complete example No. 210 the strap handle springs from the neck below the rim to the shoulder; on a somewhat similar jug at Aroer (Hershkovitz 1992: Fig. 13:5) the strap handle springs from the rim.

Cupped-necked jugs Nos. 212 and 213 are small narrow-necked jugs with an everted rim, cupped-shaped neck, and a strap handle springing from the rim to the shoulder.

Axe-rim jugs are piriform; narrow-necked jugs with a square cupped rim a cylindrical neck and a footed ring base. This type of jug first appeared at the beginning of the Early Roman period and continued into the Inter-Revolt period. No. 214 has an upright, square cupped rim that widens slightly at the top; No. 215 has an externally-grooved square cupped rim and No. 216 is the low ring base typically found on this same type of jug. No. 217 is a narrow-necked jug with an axe-shaped rim, profile, an exceptionally tall cylindrical neck and a strap handle springing from the middle of the neck to the shoulder. It was manufactured in a dark reddish-brown ware.

Carinated-necked jugs (Nos. 218–221) are narrow necked jugs distinguished by a carinated neck; they have various rim profiles: everted (No. 218); shelf (No.

219) overhanging with an incurving lip (No. 220); and square cupped (No. 221). The handle on these vessels extends from the point of carination on the neck to the shoulder (No. 219) or from the rim to the shoulder (Nos. 218, 220). No. 229 (see below) is a carinated-necked jug made of cooking pot ware.

Cooking Jugs

There were several varieties of cooking jugs or kettles from these sites. These jugs are made of cooking pot ware in order to withstand heat stress. Some forms were carried over from the previous period while others first appeared in the Inter-revolt period. All these vessels have narrow necks in order to raise and retain high temperatures of the liquids they heated.

No. 222 is a triangular-rimmed cooking jug with a cylindrical neck and a strap handle springing from the rim to the shoulder. There is a tendency for the neck of this form to become narrower and taller over time. No. 222 has a tall cylindrical neck with a smooth transition from the rim to the neck. This cooking jug developed from the typical cooking jug of the Second Temple period with a triangular rim and bulging upper neck (e.g. Bar-Nathan 2002: Pl.27:504, type J-CJG1A (dated 6–48 CE).

The square-rim cooking jug (Nos. 223–225) was the typical cooking jug of the inter-revolt period. No. 223 has a square, cupped rim with a carination at its lower edge, a tall cylindrical neck and a strap handle springing from the rim to the shoulder. This vessel evidently developed from the earlier form with a triangular shaped, carinated rim (No. 222). Nos. 224 and 225 both have a square folded rim with a medium-height neck, No. 224 has concave neck and No. 225 has a swollen neck.

No. 226 is unique funnel-mouthed ovoid cooking jug with a cupped, funnel-shaped rim having a narrow, shallow groove running around the top of it, a tall concave neck, a round base and two twisted strap handles drawn from the rim to the shoulder No. 226 could be entirely restored with the exception of its base. This vessel has two strap handles more like a cooking pot than a cooking jug that usually has a single handle. It is classified as a cooking jug rather than a cooking pot based on the height and narrowness of its neck.

No. 227 is a small cupped-rim cooking jug, with a tall, narrow neck, and a handle springing from the rim, and a round base.

Strainer-necked cooking jug No. 228 is a medium-sized piriform cooking jug with a cylindrical neck, a low ring base that has an inset button at its center, a loop handle springing from its neck to its shoulder and a strainer inside the join between the neck and the shoulder. Unfortunately the rim of No. 228 is missing. It likely had a flaring or a folded, square rim and a carinated neck. While strainer-

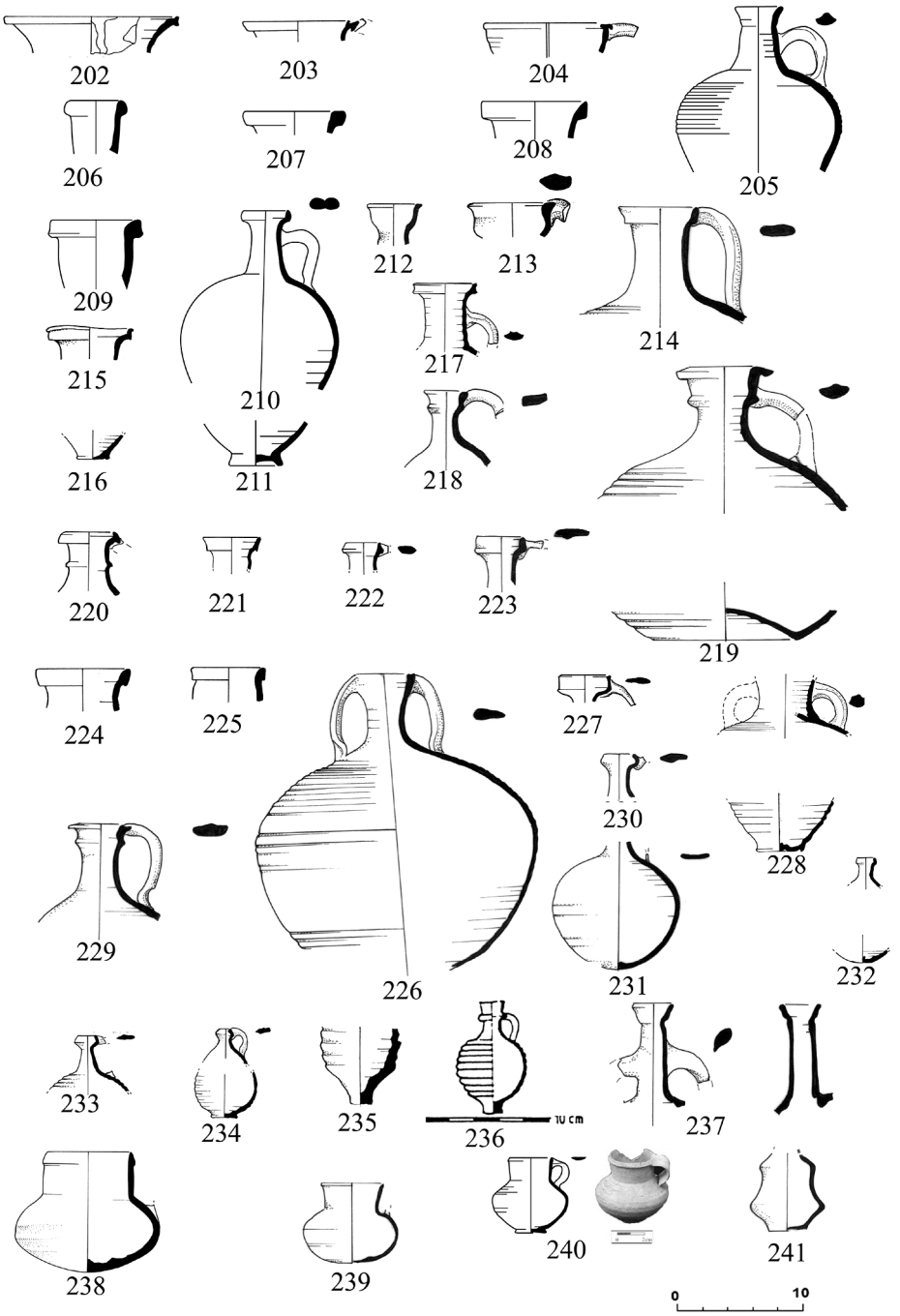

Fig. 11. Jugs, juglets, flasks and unguent pots

necked jugs are more common in the late Roman and Byzantine periods, cooking jugs with strainers in their necks are attested in the first century CE (Bar-Nathan 2006:Pl.21:53). Nabatean cream-ware vessels of the Inter-revolt period also had strainers in their necks (Negev 1986:71).

No. 229 is a carinated cooking jug from Petora with a channel-rim, carinated neck and strap handle drawn from the rim to the shoulder. Cooking jugs with carinated necks were also discovered at the Jerusalem Convention Center (Magness 2005: 90, Fig 16:10).

Juglets

Only a few juglets were recovered from the Inter-revolt period at these sites. For the most part, the juglets continued the forms of those of the Second Temple period or developed only slightly from them.

Globular to piriform juglets (Nos. 230 and 231) that have been nicknamed 'balsam jugs' (Bar-Nathan 2006:192) have an inverted cupped-rim, a tall cylindrical to conical neck, a rounded base and a single strap handle drawn from the rim to the shoulder. This form of juglet changed little from the late Hellenistic period to the Inter-revolt period. No. 232 is a globular to piriform juglet with a square, folded, cupped rim, a tall conical neck and a round base. Nos. 233 and 234 have a carinated rim, a conical neck and a strap handle drawn from the rim to the shoulder No. 233 has a tall conical neck, while No. 234 has a rather stout neck and a low disc base.

The second form is a carinated-necked, stump-based juglet. No. 235 is a globular to piriform juglet that has a sharply ribbed body, and a stump-base. The stump-base is rather tall and the vessel was clearly not intended to stand upon it. While the lower part of this juglet resembles Antlia jugs in form, it is considerably smaller. Although the top is missing, comparison with other examples suggest that this type of jug had a tall rim and a carinated neck with a strap handle drawn from the carination on the neck to the shoulder. No. 236 is a compete, comparative example from Beth She'arim (Diez-Fernandez P.149: No. 196). Elgavish (1977: 19–20, Pl.XII:93–98) published a series of jugs with tall stump bases which he dated to the first and second century CE and Diez-Fernandez' (1983) stump-based juglet type T 8.3 in the Galilee dates from the latter part of the first to the third centuries. At Oboda (Negev 1986:71, 113) similar juglets were considered to be part of a family of vessels with a cream or 'green' ware Nabatean vessels which included ovoid jugs with strainer necks (see *supra* p.21). These juglets are similar in form and fabric to the second group of beakers with thick, string-cut disc bases (see Nos. 44–46 above).

Flask

A single example of a flask is included in this corpus. Although a few others were recovered from Inter-revolt strata, it was not entirely clear that they were not residual from the Second Temple period. No. 237 is an asymmetrical flask recovered from Petora with a cupped rim, and twisted handles springing from the middle of the tall, cylindrical neck**.** It is unusual and remarkably similar to that of the amphoriskos published by Glick (2006: 56, Fig. 11:9) at 'Ein Ez-Zeitun, (cf. Kletter and Rapuano 1998: 51, Fig. 4:6), mainly because of its cupped rim, but due to a scarcity of parallels from well established contexts in this period it is not clear whether this feature is typical. Flasks along with juglets and unguentaria became rare during the Inter-revolt periods.

Unguent pots

Miniature ointment vases were used to contain precious unguents some of which had reputed medical properties. Hershkovitz (1986) discussed Second Temple period variants of these vessels. It is noteworthy that at least one example of each of these forms of unguent pot presented here was found at Petora.

The Tel Shush Unguent Pot (Nos. 238, 239) represents an unguent pot with a squat globular body, externally-folded square rim, tall, cylindrical to funnel-shaped neck, a thick, rounded base and a strap handle drawn from rim to shoulder, Its external surface is covered with a dark red slip. It is easily mistaken for a small cooking pot. This vessel form was first published at Tel Shush (Zigleman 1990) dated to the second century.

The Petora Horde Unguent Pot, No. 240, is similar in general form to the Tel Shush Unguent Pot. It has a squat globular body, an externally folded square rim, rather wide, tall, cylindrical neck, a low, string-cut disc-base and a single strap handle drawn from rim to shoulder. It bares a close resemblance to miniature cooking pots (see Nos. 68–70 above), both in form and fabric. It was found buried with a horde of coins dating from the late first century to the early second century CE within the pot wrapped in a cloth (Bijovsky forthcoming). The form of this vessel is somewhat similar to Hershkovitz (1986: 49) Type D, especially example Fig. 3:4 with a disc base.

No. 241 is a carinated, bell-shaped bottle or unguent pot with a disc base. Unfortunately the upper part of the vessel is missing.

Oil Lamps

Five forms of lamps are presented in the repertoire.

There are a number of variants of wheel-made, knife-pared so-called 'Herodian'

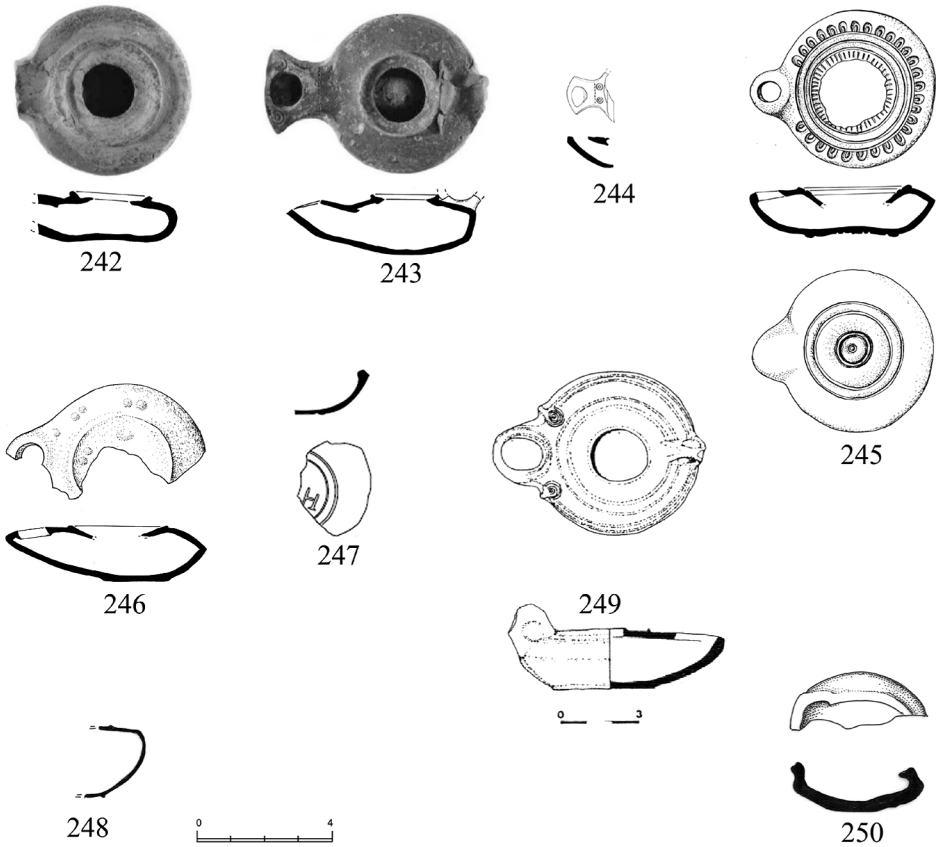

Fig. 12. Lamps

oil lamps. It is a continuation of the most popular lamp at Jewish sites during the late Second Temple period. A number of complete and nearly complete lamps were recovered from the central space within Burial Cave L.1101 at Shoham Subdivision 44. The latest pottery from the tomb is apparently of the early second century CE. No. 242 has a broad, undecorated nozzle and a wide rim, corresponding to Form C1 at Masada (Barag and Hershkovitz 1994:47). No. 243 has a rather broad nozzle decorated on its pointed ends with concentric circles and a medium-wide rim and the remnant of a handle at the rear. No. 244 has a broad nozzle decorated with a single incised line and stamped double circlets on the spout. It is of the type with a narrow rim corresponding to Masada Form CIII (Barag and Hershkovitz 1994:47)

Nos. 245–247 are mould-made disc lamps. They often have a filling hole that was broken away in antiquity. While these lamps already were in use in the mid-first century, they were notably absent from Second Temple period rural, Jewish sites of

Judea. They were however very characteristic of Inter-revolt sites. Herodian type lamps and disc lamps were often found together at these sites, sometimes within the same locus.

No. 248 is a mould-made lamp with a large filling hole and a loop handle at its rear. It is decorated with concentric circles on either side of the nozzle which may be stylized volutes. This lamp was related to the 'southern type' Lamp (Rosenthal-Heginbottom and Sivan 1978: 82–84). No. 249 is a complete example from the excavations of Kloner and Tepper (1987: Pl. 5:19) in the Judean Foothills.

No. 250 is a small wheel thrown bowl from Petora with a flattened base. It was adapted for use as an oil lamp by the addition of a pinched rim.

Conclusions

The Inter-revolt period was sandwiched securely between two significant historical events: the destruction of the year 70 on the one hand and the devastation suffered from the suppression of the Bar-Kochba revolt in the year 135 CE, resulting in the abrupt end of Judean culture on the other. The clear definition of this era as well as its exceptional brevity enables us to glimpse a 'snapshot' of the pottery in its evolutionary transition between the Early Roman and Late Roman periods. Many of the forms are similar to those of Jewish communities at the end of the Second Temple period. These types appear alongside new forms that bear characteristics of pottery from legionary sites and herald those of the late Roman and early Byzantine periods. Sharp ribbing appears on storage jars and cooking pots as well as on small vessels including incurving-rim bowls, Form 2 beakers and bottles.

Some small, closed-form vessels including unguentaria, flasks and juglets that had been common in the Second Temple period became scarce in the Inter-revolt period. A workshop may have specialized in the production of a limited repertoire of specific forms (see for example Berlin 2005:30). It may be that the main suppliers of these smaller vessels were destroyed or forced out of business in the aftermath of the First Revolt. The few vessels of these forms that are occasionally found in inter-revolt strata may be Second Temple period leftovers that managed to survive breakage.

Regionalism was most clearly seen in the cooking pots and the storage jars .For instance, most of the examples of tall-necked cooking pots were found at Shoham. Often regionalism may be perceived in the relative proportions of quantities of the various forms at each site. This possibly reflects the distance from the workshop producing a particular form. A single form may be particularly prevalent on one site for instance the Petora Storage Jar (Form 4); Petora Cooking Pot and tall-necked cooking pots at Shoham. The Mishnah (Kelim 2:2) also notes a distinction between the Lod Jar and the Bethlehem Jar presumably denoting the location of the workshops where the respective vessels were produced.

The distribution and the fairly strong regionalism of the types suggests that most of the pottery was not widely traded over great distances but was for the most part produced in the local areas where it was found. That a particular type is well-represented at one site and is hardly found at another suggests that movement between towns and villages may have been controlled by the Romans or at least carried out under their watchful eye. Not a single example of Kefar Hananya ware was found in the corpus. This is interesting considering its ubiquitous presence at contemporary sites in the north.

In contrast, fine Roman wares and amphorae were widely distributed over wide distances across regional borders.

Two workshops that are significant for Inter-revolt pottery may be noted. In the case of the Jerusalem International Conference Center it seems that the Romans appropriated the workshop that had previously been a production site used by Jews (Berlin 2005:51–55). The Romans later built their own kilns and continued production there. Perhaps Jewish potters may have been employed or were pressed into service in the workshops of the legion.

A workshop at which inter-revolt pottery was produced has recently been discovered at the modern town of Ness Ziona in the Lod region (U. Odd, personal com.).The Mishnah's mention of the distinction of the Lod Jar from the Bethlehem Jar (Mishnah Kelim 2:2) may suggest that there were workshops at these sites as well.

Vessels typically found in non-Jewish sites, notably foreign amphorae, sigllata wares and disc lamps were absent at rural Jewish sites in the latter Second Temple period. This evidently reflects the exceptional conservatism of the inhabitants of these villages in that era. It seems that fine and imported wares were restricted to royal and administrative centers at that time. For instance, no fine wares were recovered from the Second Temple period excavations of the Shuafat Ridge, Area 2 (Rapuano forthcoming); at Shoham Subdivision 44 and Modein. The imported wares and disc lamps suddenly began to appear in the inter-revolt pottery repertoire. They, however, made up only a very small percentage of the total number of vessels represented. The preservation or relaxation of the purity and dietary laws were possibly connected with the differing opinions of the Jewish populace regarding the status of the Temple and how soon it would be rebuilt. This may explain the sudden appearance of non-Jewish vessels such as foreign amphorae, sigllata wares and disc lamps in the inter-revolt strata, albeit in small quantities.

Evidence from the pottery suggests that there was considerable interaction between the Jews and the Romans during the Inter-revolt period, more so than there had been in the Second Temple period. This is reflected in the increased number of Roman forms in the Jewish pottery repertoire. In fact, there seems to have been a growing interdependence of the Jewish and Roman communities upon one another. The conscripts of the Tenth Legion would have found themselves, in

the backwaters of Judea, 'strangers in a strange land'. The Jews, suffering from the ravages of war brought on by the failed First Revolt attempted to rebuild their society. Romans and Jews were cast together into late first century Judea as conqueror and conquered, administrator and the administered. Of necessity they sought some respite in their shared plight.[8] This rather tense, symbiotic relationship that evidently developed between the two communities was in the end shattered by the outbreak of the Bar Kochbah revolt.

As more Judean sites are excavated, and additional forms are added to the repertoire, our understanding of the pottery of this period will become increasingly refined. It is anticipated that the discovery of more Judean inter-revolt workshops will provide greater insight into the regionalism of the pottery and shed further light on the relationship between Judean and legionary pottery. In the mean time, it is hoped that this paper will serve as a useful guide to those engaged in research of the archaeology and history of this intriguing era.

Catalogue of forms

No.	Form	Site	Locus	Ware Description
1	Bowl	Petora	L.17220	pink 7.5YR 7/4ware; no core; red 10R 5/6 int. and ext. glossy slip; very few, tiny gray inclusions
2	Bowl	Petora	L.17024	pink 5YR 7/4 ware; no core; red 2.5YR 5/8 glossy int. and ext. slip; very few, tiny gray inclusions
3	Bowl	Petora	L.17215	pink 7.5YR 8/3 ware; no core; traces of weak red 10R 4/4 glossy int. and ext. slip very few, tiny dark gray inclusions
4	Bowl	El-Khibeh (Miqveh) Fig.9:2	L 15	pink (5YR 7/4) ware; no core; few, tiny pink and dark gray inc.; red (10R 5/6) int. and ext. lustrous gloss. 2 grooves on rim
5	Bowl	El-Khirbeh	L.531	reddish yellow (7.5YR 7/6) ware; no core; red (2.5YR 4/8) int. and ext. gloss; very few, dark gray, white and glistening (mica?)
6	Bowl	El-Khirbeh	L.533	pink (7.5YR 7/4) ware; no core; red (10R 5/6) int. and ext. gloss; some, small to tiny, white, gray and red inc.
7	Bowl	Petora	L.17220	pink 5YR 7/4 ware; no core; red 10R 4/6 glossy int. and ext. slip; few, tiny, black, inclusions
8	Bowl	El-Khibeh (Miqveh) Fig.9:1	L.30	pink (7.5YR 7/4) ware; no core; red (10R 5/8) int. and ext. lustrous gloss. Very few small to tiny light gray inc
9	Bowl	El-Khirbeh	L.530	strong brown (7.5YR 5/6) ware; no core; reddish brown (2.5YR 4/4) int. and ext. slip; some, dark gray and white inc
10	Bowl	Petora	L.17207	light brown 7.5YR 6/4; no core; red 10R 4/8 int. and ext. glossy slip; no visible inclusions
11	Bowl	Kh. Umm el-'Umdan	L.127	
12	Bowl	El-Khirbeh	L.507	gray (2.5YR N5/ ware; no core; reddish brown (2.5YR 5/3) int. and ext. matte gloss; many, tiny, white inc.
13	Krater Bowl	Petora	L.1299	reddish yellow 5YR 6/6 ware; no core; traces of burnished red 2.5YR 5/6 slip on and over rim; few, gold mica inclusions
14	Bowl	El-Khibeh (Miqveh) Fig.9:5	L.12	red (2.5YR 5/6) ware; no core; many, tiny sand (including glistening) inc.
15	Bowl	Ben Shemen	L.108	gray (5YR 6/1) ware; pale brown (10YR 6/3) core toward int. surf.; red (2.5YR 5/6) slip on ext. surf and over rim

*Figure numbers are from the original publication

No.	Form	Site	Locus	Ware Description
16	Bowl	El-Khibeh (Miqveh) Fig.9:3	L.20	light yellowish brown (10YR 6/2) ware; no core; few, small to tiny, white reddish brown and black inc.; red (2.5YR 4/6) slip on ext. and small traces over rim
17	Bowl	El-Khibeh (Miqveh) Fig.9:4	L.20	light yellowish brown (10YR 6/2) ware; no core; few, large to tiny white and light brown inc.; traces of yellowish red (5YR 5/6) slip on int.
18	Cup	Shoham 44	L.15505	red 10R 4/6 ware; no core; very pale brown 10YR 8/3 int. and ext. slip; few, medium to tiny white inclusions
19	Cup	Shoham 44	L.12508	dark gray 2.5YR N4/ ware; no core; weak red 10R 5/4 ext. slip; very few, large to tiny, white inclusions
20	Basin	Petora	L.17172	reddish brown 5YR 5/4 ware; faint, dark gray 5YR 4/1 core; few, tiny, sand inclusions
21	Basin	Petora	L.17086	
22	Basin	El-Khirbeh	L.550	reddish yellow (5YR 6/6) ware; gray (5YR 5/1) core; few, small to tiny, white and dark gray inc
23	Basin	Shoham 44	L.12508	yellowish red 5YR 5/6 ware; thick, reddish brown 5YR 5/4 core; few, small to tiny, white and sand (glistening) inclusions
24	Basin	El-Khirbeh	L.523	reddish yellow (5YR 6/6) ware; no core; thin, very pale brown (10YR 7/4) strip in section near int. surface; few, small to tiny dark gray off-white and red inc.
25	Basin	El-Khirbeh	L.526	reddish yellow (5YR 6/6) ware; no core; some, sand including glistening, white and black inc
26	Basin	Kh. Umm el-'Umdan	L.127	
27	Basin	Kh. Umm el-'Umdan	L.127	
28	Basin	Shoham 44	L.12508	Fig.59:03 red 2.5YR 4/6 ware; no core; few, large to tiny, sand white and red inclusions
29	Basin	Kh. el – Mughram Fig.1:2	L.151	red 2.5YR 5/8 ware; thick reddish gray 5YR 5/2 core; some, small to tiny white inclusions
30	Basin	El-Khirbeh	L.531	reddish yellow (5YR 7/6) toward int. surface and pink (7.5YR 8/4) toward ext. surface; many; dark brown, black, red and glistening inc.
31	Basin	Kh. el – Mughram Fig.2:4	L.102	reddish yellow 5YR 6/8 ware; light brown 7.5YR 6/4 core; few small to tiny white inclusionsc128 int. and ext. slip
32	Bowl	El-Khirbeh	L.512	red (2.5YR 4/8) ware; no core; few, tiny white and dark gray inc.
33	Bowl	Kh. Umm el-'Umdan	L.49	
34	Bowl	Shoham 44	L.12508	red 2.5YR 5/6 ware; no core; few, medium to tiny white and sand inclusions
35	Bowl	Petora	L.17171	reddish brown 2.5YR 5/4 ware; some tiny sand and white inclusions
36	Bowl	Kh. Umm el-'Umdan	L.23	
37	Bowl	Kh. Umm el-'Umdan	L.117	
38	Bowl	Petora	L.1203	reddish yellow 5YR 6/6 ware; no core; few, tiny, sand inclusions
39	Bowl	Kh. Umm el-'Umdan	L.121	
40	Bowl	Ben Shemen	L.113	yellowish red (5YR 5/6 ware; faint light brown (7.5YR 6/4) core; very pale brown (10YR 7/3) int. and ext. surfaces; very pale brown (10YR 8/3) int. and ext. surfaces; some, tiny sand (including glistening) and white inc.
41	Beaker	Shoham 44	L.15505	red 2.5YR 5/6 ware; no core; light brown 7.5YR 6/4 slip; on ext and over rim; band of brown 7.5YR 5/3 paint on ext. neck; few medium to tiny white, sand and reddish brown inclusions
42	Beaker	Shoham 44	L.15505	light reddish brown 5YR 6/4 ware, light red 2.5YR 6/8 near the int. and ext. surfaces; no core; pink 7.5YR 7/3 slip on ext. and over rim; dark reddish brown 5YR 2.5/2 paint on ext. on underside of rim and below it; some, medium to tiny, white, black (sand?) and red inclusions.
43	Beaker	Kh. Umm el-'Umdan	L.236	
44	Beaker	Petora	L.17225	light brown 7.5YR 6/4 ware; no core; some, tiny sand inclusions; string-cut base
45	Beaker	El-Khirbeh	L.523	light reddish brown (5YR 6/4) ware; no core; some, tiny, brown, dark gray, white and reddish brown inc
46	Beaker	Jerusalem International Convention Center		(Magness 2005: Fig16-2
47	Mug	Kh. Umm el-'Umdan	L.102	
48	Mug	Selah cave		Eshel and Amit 1998: Pl.1:19

No.	Form	Site	Locus	Ware Description
49	Cooking pot	Petora	L.17108	
50	Cooking pot	El-Khirbeh	L.526	red (2.5YR 5/8) ware; no core; few, small to tiny, sand ncluding glistening, light brown and dark gray inc
51	Cooking pot	Petora	L.1765 (?)	
52	Cooking pot	Shoham 44	L.12512	Two layers: red 2.5YR 4/8 toward ext. and strong brown 7.5YR 5/6 toward int. ware; no core; some, tiny, sand (with glistening) and white inclusions
53	Cooking pot	Shoham 44	L.12512	red 2.5YR 4/8 ware; very dark gray 2.5YR N3/ core; few, tiny, sand (with glistening) inclusions; charring on ext.
54	Cooking pot	Shoham 44	L.12512	reddish yellow 5YR 6/6 ware; no core; many, tiny, sand inclusions
55	Cooking pot	El-Khirbeh	L.531	red (2.5YR 4/8) ware; no core; many large to tiny, dark gray, white, light gray, and glistening (sand) inc.; charring on lower ext. surface
56	Cooking pot	El-Khirbeh	L.530	red (2.5YR 4/8) ware; no core; some tiny, dark gray (sand) and glistening (sand) inc
57	Cooking pot	Ben Shemen	L.130	reddish brown (2.5YR 5/4) ware; red (2.5YR 5/6) core; few, tiny white and sand (including glistening) inc.
58	Cooking pot	Petora	L.17162	red 2.5YR 4/8 ware; no core; many, small to tiny sand inclusions
59	Cooking pot	Shoham 44	L.M1305	red 2.5YR 5/6 ware; no core; few, tiny, sand (with glistening) inclusions
60	Cooking pot	El-Khirbeh	L.507	red (2.5YR 5/6) ware toward int. surface; dark gray (7.5YR N4/) toward ext surface; weak red (2.5YR 5/2) int. and ext. surfs.; few, small to tiny, white, glistening (sand) and dark gray inc.
61	Cooking pot	Petora	L.17165	red 10R 4/8 ware; no core; some, large to tiny, sand and white inclusions
62	Cooking pot	Shoham 44	L.1101	red 2.5YR 4/8 ware; no core(?); reddish gray 10R 5/1 slip(?) on ext. (in patches) and over rim and inside of neck; many, tiny, sand (with glistening) inclusions
63	Cooking pot	Petora	L.17108	dark reddish gray 10R 3/1 ware; reddish brown 2.5YR 4/3 core; many tiny sand and white inclusions
64	Cooking pot	Kh. Umm el-'Umdan	L.121	
65	Cooking pot	Kh. Umm el-'Umdan	L.23	
66	Cooking pot	Petora	L.17144	reddish brown 2.5YR 4/4 ware; no core; many, tiny sand and red inclusions
67	Cooking pot	Petora	L.17165	red 2.5YR 4/8 ware; some, small to tiny sand and white inclusions
68	Cooking pot	Shoham 44	L1815	red 2.5YR 4/8 ware; (section unavailable); few tiny, sand and white inclusions
69	Cooking pot	Shoham 44	L.12512	yellowish red 5YR 5/6 ware; no core; few, tiny, sand inclusions
70	Cooking pot	Shoham 44	L.12512	yellowish red 5YR 4/6 ware; no core; few, sand (with glistening) and white inclusions; charring on int. and ext.
71	Casserole	Kh. Umm el-'Umdan	L.337	
72	Casserole	Kh. el – Mughram Fig.1:6	L.150	red 10R 4/6 ware; no core; few, tiny white inclusions
73	Casserole	Kh. el – Mughram Fig.1:5	L.152	red 2.5YR 5/8 ware; c32 core; some, large to tiny, white and sand inclusions
74	Casserole	El-Khirbeh	L.506	yellowish red (5YR 5/6) ware; no core; dark gray (5YR 4/1) or charring on ext. surface; many medium to tiny dark gray (sand), glistening (sand) and white inc.
75	Casserole	Ben Shemen	L.113	red (2.5YR 4/6) ware; no core; some, tiny sand inc
76	Casserole	El-Khirbeh	L.539	red (2.5YR 4/6) ware; no core; many, tiny, dark gray and sand including glistening inc
77	Casserole	Kh. Umm el-'Umdan	L.121	
78	Casserole	Ben-Shemen	L.135	reddish brown (2.5YR 4/4) ware; very dusky red (2.5YR 2.5/2) core toward interior surface; some, tiny sand (including glistening) and white inc. charring on ext.
79	Casserole	Shoham 44	L.L1507	reddish brown 2.5YR 4/3 ware; no core; very dark gray 2.5YR N3/ int. and ext. slip; many, tiny, sand (with glistening) inclusions
80	Casserole	Shoham 44	L.15505	yellowish red 5YR 5/6 ware; no core; many, small to tiny, sand (with glistening) inclusions; charring on int. and ext. surfaces
81	Casserole	Petora	L.17086	
82	Casserole	Shoham 44	L.12508	black 7.5YR N2/ ware; no core; dark red 2.5YR 3/6 int. and ext. slip; many, small to tiny, sand (with glistening) and white inclusions; charring on int. and ext. surfaces
83	Casserole	El-Khirbeh	L.545	

No.	Form	Site	Locus	Ware Description
84	Casserole	El-Khirbeh	L.532	dark red (2.5YR 3/6) ware; no core; many, tiny sand including glistening inc.
85	Casserole	Ben-Shemen	L.123	reddish brown (5YR 4/3) core; dark gray (7.5YR N4/) ware; some, tiny, sand (including dark gray and glistening) and white inc
86	Casserole	Petora	L.3126	red 2.5YR 4/6 ware; no core; many small to tiny sand and white inclusions
87	Casserole	El-Khirbeh	L.521	
88	Krater bowl	El-Khirbeh	L.549, L.530	reddish brown (5YR 4/4) ware; dark gray (7.5YR N4/) core; some, tiny, dark gray (sand) and white inc.
89	Krater bowl	Petora	L.1320	reddish yellow 5YR 6/6 ware, grayish brown 10YR 5/2, core
90	Krater bowl	Petora	L.17215	reddish yellow 5YR 6/6 ware; no core; few, small to tiny gray (sand?) inclusions
91	Krater bowl	Petora	L.17097	strong brown 7.5YR 5/6 ware; no core; few, large to tiny sand, white and glistening inclusions
92	Krater bowl	Ben Shemen	L.130	light reddish brown (5YR 6/4) ware; gray (5YR 5/1) core; pinkish gray (7.5YR 7/2) ext. surface with pink (7.5YR 8/3) streaks; c76 painted stripe on ext. surf.; pink (7.5YR 7/3) int. surf.; some, tiny, white, dark gray and glistening inc.
93	Krater bowl	Petora	L.17147	red 2.5YR 4/6 ware; no core; some small to tiny, sand inclusions
94	Krater bowl	Petora	L.17047	reddish brown 5YR 5/4 ware; no core; few, small to tiny sand and white inclusions
95	Krater bowl	Petora	L.17162	
96	Amphora	Ben-Shemen	L.113	light brown (7.5YR 6/4) ware; no core; many, tiny, sand and red inc.
97	Amphora	Ben-Shemen	L.115	light gray/ gray (10YR 6/1) ware; no core; pink (7.5YR 7/3) surfs; many, large to tiny white and dark gray inc
98	Amphora	Ben-Shemen	L101	
99	Amphora	Ben-Shemen	L.134	yellowish red (5YR 5/8) ware; brown (10YR 5/3) core; very pale brown (10YR 7/3) ext. surf. and over rim; few, tiny, white and dark gray inc
100	Amphora	Ashkelon		Johnson 2008: 145-146, no. 442
101	Amphora	Ben-Shemen	L.140	reddish yellow (5YR 6/6) ware; no core; pinkish gray (7.5YR 7/2) ext. slip; few, small to tiny, white, red and glistening inc
102	Amphora	Ashkelon		Johnson 2008: 153, no. 438
103	Amphora	Shoham 44	L.1714	reddish brown 5YR 5/4 ware; faint, brown 7.5YR 5/3 core; some, tiny white and sand (with glistening) inclusions
104	Amphora	‘Ein Ez-Zeitun		Glick 2006: Fig.11: 10
105	Amphora	El-Khirbeh	L.531	reddish yellow (5YR 6/6) ware; no core; few, tiny black, light gray (sand) and glistening inc.
106	Amphora	El-Khirbeh	L.538	pink (5YR 7/4) ware; no core; very pale brown (10YR 7/3) ext. surface; some, small to tiny gray, violet, white and red inc
107	Amphora	Petora	L.1266	pink 7.5YR 7/3 ware; no core; white 2.5Y 8/2 slip on ext. and over rim; light reddish brown 5YR 6/4 int. surface; few, large, to medium, white, sand inclusions.
108	Amphora	Petora	L.17225	light brown 7.5YR 6/4 ware; no core; many, tiny, sand inclusions
109	Amphora	Ben-Shemen	L.106	reddish yellow (5YR 6/6) ware; no core; many, tiny, sand and white inc.
110	Amphora	Ben Shemen	109	light reddish brown (2.5YR 6/4) ware; gray (2.5YR N5/ core; weak red (10R 5/3) 3 int. and ext. inc.; few, small to tiny, white and dark gray inc.
111	Table Amphora	Kh. el – Mughram Fig.1:13	L.150	reddish yellow 5YR 7/6 ware; dark gray N4/ thick core; many, large to tiny white, gray and red inclusions
112	Table Amphora	Petora	L.1322	
113	Storage jar	Kh. Umm el-‘Umdan	L.23	
114	Storage jar	Murabaat Caves		Benoit, Milik and de Vaux 1961: Pl.3:14)
115	Storage jar	Shoham 44	L.1108	reddish yellow 5YR 6/6 ware; thick, light brown 7.5YR 6/4 core; few, medium to tiny white and sand inclusions,
116	Storage jar	Kh. Umm el-‘Umdan	L.127	
117	Storage jar	Kh. Umm el-‘Umdan	L.23	
118	Storage jar	Kh. Umm el-‘Umdan	L.23	
119	Storage jar	Petora	L.172004	
120	Storage jar	Kh. Umm el-‘Umdan	L.49	

No.	Form	Site	Locus	Ware Description
121	Storage jar	El-Khirbeh	L.539	reddish yellow (7.5YR 6/6) ware; many large to tiny, reddish brown (sand?) and white inc
122	Storage jar	El-Khirbeh	L.516	light brown (7.5YR 6/4) ware; no core; pink (5YR 7/4) int. and ext. surfs.; some, medium to tiny dark gray, white, brown, light gray and reddish brown inc.
123	Storage jar	El-Khirbeh	L.539	light gray (10YR 7/2) ware; no core; weak red (10R 5/3) 3 int. and ext. surfs. Many, medium to tiny, sand, gray, white and dark brown inc.
124	Storage jar	Shoham 44	L.12512	light brown 7.5YR 6/4 ware; faint, grayish brown 2.5Y 5/2 core; few, large to tiny sand (with glistening) and white inclusions
125	Storage jar	Petora	L.17235	
126	Storage jar	El-Khirbeh	L.539	reddish yellow (7.5YR 6/6) ware; no core; some, medium, white and sand including glistening inc.
127	Storage jar	Petora	L.17046	weak red 10R 5/4 ware; thick gray 2.5YR N5/ core; pinkish gray 7.5YR 7/2 ext. slip; few, small to tiny white and sand inclusions
128	Storage jar	Kh. Umm el-'Umdan	L.337	
129	Storage jar	Kh. Umm el-'Umdan	L.224	
130	Storage jar	Kh. Umm el-'Umdan	L.74	
131	Storage jar	Kh. Umm el-'Umdan	L.134	
132	Storage jar	Kh. Umm el-'Umdan	L.23	
133	Storage jar	Petora	L.17004	reddish yellow 5YR 7/6 ware; pinkish gray 5YR 6/2
134	Storage jar	Kh. Umm el-'Umdan	L.220	
135	Storage jar	Kh. Umm el-'Umdan	L.286	
136	Storage jar	Shoham 44	L.1109	brown 10YR 5/ 3 ware; no core; very pale brown 10YR 7/3 ext. slip; tiny, sand (with glistening) and white in, dark, gray dots covering ext. surface
137	Storage jar	Kh. Umm el-'Umdan	L.21	
138	Storage jar	Shoham 44	L.1109	light yellowish brown 10YR 6/2 ware(?) yellowish red 5YR 5/6 int. and ext. slip; few, tiny, sand and white inclusions
139	Storage jar	Shoham 44	Feature 22	light reddish brown 5YR 6/4 ware; no core; some, tiny sand (with glistening), reddish brown and white inclusions
140	Storage jar	Kh. Umm el-'Umdan	L.405	
141	Storage jar	Shoham 44	L.1726	red 2.5YR 5/6 ware; core? (); many, large to tiny, sand (with glistening) and white inclusions
142	Storage jar	Shoham 44	L.1724	strong brown 7.5YR 5/6 ware; brown 10YR 5/3 core; some, medium to tiny sand and white inclusions
143	Storage jar	Shoham 44	L.1714	reddish yellow 5YR 6/6 ware; no core; many, tiny, white and sand inclusions
144	Storage jar	El-Khirbeh	L.507	yellowish red (5YR 5/6) ware; thick light brown (7.5YR 6/4) core; some, small to tiny, dark gray and white inc.
145	Storage jar	El-Khirbeh	L.523	pink (5YR 7/4) ware; no core; very pale brown (10YR 7/3) ; many large to tiny, sand including glistening, white, black and red inc.
146	Storage jar	Shoham 44	L.1716	dark gray 10YR 4/1 ware; strong brown 7.5YR 5/6 ext. slip; some, tiny, sand and white inclusions
147	Storage jar	El-Khirbeh	L.549	
148	Storage jar	Kh. Umm el-'Umdan	L199	
149	Storage jar	Kh. Umm el-'Umdan	L.121	
150	Storage jar	Kh. Umm el-'Umdan	L.74	
151	Storage jar	El-Khirbeh	L.535	light reddish brown (5YR 6/4) ware; pink (5YR 7/4) core; some, tiny, white, gray and black inc.
152	Storage jar	El-Khirbeh	L.506	light reddish brown (5YR 6/4) ware; pink (5YR 7/4) core; some, tiny, white, gray and black inc
153	Storage jar	El-Khirbeh	L.549	yellowish red (5YR 5/6 ware; no core; some, medium to tiny sand including glistening and white inc
154	Storage jar	Kh. Umm el-'Umdan	L.252	
155	Storage jar	Shoham 44	L.15505	strong brown 7.5YR 5/6 ware; no core; some, tiny sand inclusions
156	Storage jar	Kh. Umm el-'Umdan	L.253	
157	Storage jar	Shoham 44	L.18	yellowish red 5YR 5/6 ware; very pale brown 10YR 7/4 core; some, medium to tiny, sand and white inclusions
158	Storage jar	Shoham 44	L.12512	yellowish red 5YR 5/6 ware; many, sand and white inclusions
159	Storage jar	Petora	L. 17210	

No.	Form	Site	Locus	Ware Description
160	Storage jar	Shoham 44	L.1716	dark grayish brown 10YR 4/2 ware; narrow reddish brown 5YR 5/4 slip(?); some, medium sand (with glistening and basalt?) and white inclusions
161	Storage jar	Kh. Umm el-'Umdan	L.253	
162	Storage jar	Kh. Umm el-'Umdan	L.127	
163	Storage jar	Kh. Umm el-'Umdan	L.127	
164	Storage jar	Petora	L.17147	reddish brown 5YR 5/4 ware; no core; some, medium to tiny sand inclusions
165	Storage jar	Shoham 44	Feature 22	reddish brown 5YR 4/4 ware; no core; some, large to timy sand inclusions
166	Storage jar			Majcherek 1985: Fig.3:1
167	Storage jar	El-Khirbeh	L.533	reddish yellow (5YR 6/6) ware; no core; many small to tiny; sand inc.
168	Storage jar	Shoham 44	L.M1305	reddish yellow 5YR 6/6 ware; no core many large to tiny sand (with glistening), lt gray, red and white inclusions
169	Storage jar	Ben Shemen	L.134	reddish yellow (5YR 6/6) ware; thick light brown (7.5YR 6/4) core; very pale brown (10YR 7/3) int. and ext. surfaces; few, medium to tiny, dark gray, white and red inc.
170	Storage jar	El-Khirbeh	L.506/508	pink (7.5YR 7/4) ware; no core; some, small to tiny, dark gray, white and red inc.
171	Storage jar	El-Khirbeh	L.516	reddish yellow (7.5YR 6/6) ware; faint pale brown (10YR 6/3) core; very pale brown (10YR 8/3) ext. surface; few, small to tiny, white and light gray inc.
172	Storage jar	Masada		Bar-Nathan 2006:Pl2:7
173	Jug	El-Khirbeh	L.545	pink (7.5YR 7/4) ware; no core; red (10R 4/8) ext. lustrous gloss; no visible inc.
174	Jug	El-Khirbeh	L.530	reddish yellow (7.5YR 6/6) ware; no core; red (2.5YR 4/6) ext. matte gloss; few, tiny white and dark gray inc
175	Jug	Petora	L.17084	light reddish brown 5YR 6/4 ware; no core; red 10R 5/8 glossy slip on ext. and over the rim; few, tiny black inclusions
176	Jug	El-Khirbeh	L.544	light reddish brown (5YR 6/4) ware; gray (7.5YR N5/) core; very pale brown (10YR 8/4) ext. surf; strong brown (7.5YR 4/6) bands of color on ext. surface.; few, tiny, dark gray and white inc. Imitation ware (?)
177	Jug	El-Khirbeh	L.534	light reddish brown (5YR 6/4) ware; gray (7.5YR N5/) core; very pale brown (10YR 8/4) ext. surf; strong brown (7.5YR 4/6) bands of color on ext. surface.; few, tiny, dark gray and white inc.
178	Jug	Ben Shemen	123	strong brown (7.5YR 5/6) ware; no core; some, tiny, reddish brown (2.5YR 5/4) ext. matte slip; sand (including reddish-brown and glistening) and off-white inc.
179	Jug	Petora	L.17086	
180	Jug	Callirrhoe		Callirrhoe Clammer 1997 Fig.9 composit
181	Jug	Petora	L.17084	
182	Jug	Masada		Bar-Nathan 2006: Pl.22:66
183	Jug	Petora	L.17129	reddish yellow 7.5YR 6/6 ware; dark gray 5YR 4/1 core; few, large to tiny, white and sand inclusions
184	Jug	El-Khibeh (Miqveh) Fig.9:26	L002Ecx9	light reddish brown (5YR 6/4) ware; brown (7.5YR 5/2) core; few, small to tiny black and white inc.
185	Jug	El-Khibeh (Miqveh) Fig.9:25	L.9	white (10YR 8/2) ware; no core; some, small to gray and red inc.
186	Jug	Kh. Umm el-'Umdan	L.253	
187	Jug	Shoham 44	L.1724	light reddish brown 5YR 6/4 ware (in center- core?) gray 5YR 5/1 toward int. and ext. surfaces; white 10YR 8/2 int and ext slip; many, tiny, sand (with glistening) and white inclusions
188	Jug	Kh. Umm el-'Umdan	L.23	
189	Jug	Petora	L.1284	
190	Jug	Shoham 44	L.15505	light red 2.5YR 6/6 ware; thick gray 5YR 5/1 core; some, large to tiny, sand (with glistening) pink, white and red inclusions
191	Jug	El-Khirbeh	L.545	
192	Jug	Petora	L.17040	pink 5YR 7/4 ware; no core; red 10R 5/6, glossy, int. and ext. slip; very few, tiny, black inclusions

No.	Form	Site	Locus	Ware Description
193	Jug	Petora	L.1287	pink 7.5YR 7/4 ware; brown 10YR 5/3 core; yellowish red 5YR 5/8 ext. surface
194	Jug	El-Khirbeh	L.532	light yellowish brown (10YR 6/2) ware light reddish brown (5YR 6/4) core; some, medium to tiny, brown, white and dark gray inc.
195	Jug	Shoham 44	L.L1601	red 2.5YR 5/8 ware; light reddish brown 5YR 6/4 layere toward ext. surf; some medium, to tiny, pink, dark purplish (sand?) and white inclusions
196	Jug	Kh. Umm el-'Umdan	L.119	
197	Jug	Shoham 44	L.1714	red 2.5YR 5/6 ware; reddish brown 2.5YR 5/3 core; many, small to tiny sand (with glistening) , white and red inclusions
198	Jug	Kh. Umm el-'Umdan	L.117	
199	Jug	El-Khirbeh	L.523	light reddish brown (5YR 6/4) ware; core?; very pale brown (10YR 7/4) ext. surface; few, tiny, white and glistening (sand) inc.
200	Jug	El-Khirbeh	L.531	reddish brown (5YR 5/4) ware; very pale brown (10YR 8/3) core; medium to tiny, reddish brown and white inc.
201	Jug	Kh. Umm el-'Umdan	L.73	
202	Jug	Kh. Umm el-'Umdan	L.405	
203	Jug	Kh. Umm el-'Umdan	L.405	
204	Jug	Kh. Umm el-'Umdan	L.199	
205	Jug	El-Khirbeh	L.539	light reddish brown (5YR 6/4) ware; no core; light gray (10YR 7/2) ext. surf.; some, medium to tiny, white and dark gray inc.
206	Jug	El-Khirbeh	L.537	red (10R 5/6) ware; no core; c94 int. and ext. surfaces; few, small to tiny white, reddish brown and dark gray inc.
207	Jug	El-Khirbeh	L.550	light brown (7.5YR 6/4) ware; faint very pale brown (10YR 7/3) core; many, reddish brown and black inc.
208	Jug	El-Khirbeh	L.508	light red (2.5YR 6/6) ware; c133 core; few, small to tiny, white and dark gray inc.
209	Jug	Ben Shemen	L.113	light brown (7.5YR 6/3) ware; yellowish red (5YR 5/6 core; white (10YR 8/2) int. and ext. surfs.; few, tiny, white and black inc.
210	Jug	El-Khirbeh	L.533	light reddish brown (5YR 6/4) ware; no core; reddish brown (2.5YR 4/4) slip on exterior body; some, tiny reddish brown, gray and white inc.
211	Jug	El-Khirbeh	L.533	light reddish brown (5YR 6/4) ware; no core; reddish brown (2.5YR 4/4) slip on exterior body; some, tiny reddish brown, gray and white inc.
212	Jug	Kh. Umm el-'Umdan	L.181	
213	Jug	Kh. Umm el-'Umdan	L.328	
214	Jug	Petora	L.17205	
215	Jug	Kh. Umm el-'Umdan	L.236	
216	Jug	Shoham 44	L.12508	light brown 7.5YR 6/4 ware; no core; some, medium to tiny sand (with glistening) and reddish brown inclusions
217	Jug	Shoham 44	L.1108	
218	Jug	Petora	L.17212	light brown 7.5YR 6/4 ware; gray 10YR 5/1 core; some, tiny white, sand and red inclusions
219	Jug	Petora	L.17165	
220	Jug	Kh. Umm el-'Umdan	L.121	
221	Jug	Shoham 44	Feature 13	reddish yellow 7.5YR 6/6 ware; no core; pink 7.5YR 7/4 int. and ext. slip; many, tiny, reddish brown, sand and white inclusions
222	Cooking jug	Shoham 44	L.14504	Layered ware: center (core?) thick weak red 10R 5/2 thin band on either side: actual ware? dusky red 10R 3/2 layer toward ext. side; weak red 10R 4/4, ext.; weak red 10R 5/4 to red 2.5YR 5/6 (ext. slip?)few, small to tiny, white and black (basaltic sand? Inclusions; traces of charring on ext. and possibly int.
223	Cooking jug	Petora	L.17034	weak red 10R 5/4 ware; no core; few, tiny, sand, and white inclusions
224	Cooking jug	Kh. Umm el-'Umdan	L.127	
225	Cooking jug	Kh. Umm el-'Umdan	L.121	
226	Cooking jug	Petora	L.1308	
227	Cooking jug	Kh. Umm el-'Umdan	L.224	
228	Cooking jug	Shoham 44	L.12512	yellowish red 5YR 5/6 ware; no core; traces dark gray 5YR 4/1 slip or charring on ext. (and int.?); many, mall to tiny sand and off white inclusions

No.	Form	Site	Locus	Ware Description
229	Cooking jug	Petora	L.17162	red 10R 5/8 ware; no core; reddish gray 10R 5/1 ext. surface (possibly slip); few, medium to tiny, white and black (sand?) inclusions
230	Juglet	Petora	L.17162	reddish brown 5YR 5/4 ware; no core; few, small to tiny, black and gray (sand) inclusions
231	Juglet	Petora	L.17160	
232	Juglet	Shoham 44	L.12512	Ware in two layers: red 2.5YR 4/8 toward ext. surf, weak red 2.5YR 4/2 toward many, tiny, sand and white inclusions
233	Juglet	Shoham 44	L.12512	
234	Juglet	Shoham 44	L.1103	
235	Juglet	Petora	L.17028	pink 7.5YR 7/4 ware; no core; many, small to tiny sand, red and white inclusions
236	Juglet	Beth She'arim		Diez-Fernandez P.149: No. 196
237	Flask	Petora	L.1262	Layers of reddish brown 2.5YR 4/4, brown 7.5YR 5/3 and gray 7.5YR N5/ ware; pink 7.5YR 7/3 ext. slip; few, medium to tiny white inclusions
238	Unguent pot	Shoham 44	L.12512	yellowish red 5YR 5/6 ware; no core; few, tiny, sand inclusions
239	Unguent pot	Petora	L.17089	
240	Unguent pot	Petora	L.17202	reddish brown 5YR 5/3 ware; no core; few, tiny, white, light gray, dark gray and brown inclusions
241	Unguent pot	Petora	L.17162	red 10R 5/6 ware; few, tiny sand and white inclusions
242	Lamp	Shoham 44	L.1101	
243	Lamp	Shoham 44	L.1101	
244	Lamp	Petora	L.1287	reddish yellow 5YR 6/6 ware; no core; few, tiny, black (sand) inclusions; charring on spout
245	Lamp	Shoham 44	L.1105	
246	Lamp	Shoham 44	L.12508	
247	Lamp	Ben Shemen	L.113	white (10YR 8/2) ware; no core; few, tiny red inc.; c110 paint on ext.
248	Lamp	Petora	L.1312	yellowish red 5YR 5/6 ware; no core; very pale brown 10YR 8/3 on ext. surface (firing discoloration?); very few, tiny, sand and glistening (gold mica?) inclusions
249	Lamp	Shephela of Judea		Kloner and Tepper 1987: Pl. 5:19
250	Lamp	Petora	L.17221	light reddish brown 5YR 6/4 ware; no core; many, large to tiny, sand and red inclusions

Notes

1 Eck has argued for the redating of the final year of the revolt (Eck, W. 1999.)

2 Interest has been drawn to these subterranean features largely because of the comment of the fourth century Christian writer Hieronymus. He noted that at the time of the Second Revolt the 'citizens of Judea came to such distress that they, together with their wives, children, gold and silver, remained in underground tunnels and in the deepest caves.' (Commentary on Isaiah 2.15). Consequently, wherever Roman period remains have been found within these subterranean features in Judea, it has been assumed that they must date to the Second Revolt. It is becoming increasingly clear, however, that in many cases these caves and hiding complexes were previously occupied during the First Revolt as well (see for example Freund and Arav 2001:38).

3 See *supra* footnote 1.

4 Josephus Flavius, *Antiquities of the Jews*, book X!V, chapter 4.

5 See for instance Bar-Nathan 2002:1–7.

6 Midrash Genesis Rabbah 64:8
7 My gratitude is due to Irena Lidski-Reznikov, Carmen Hersh and Marina Shuiskaya -Arnov for drawing the pottery and to Clara Amit for the photographs.
8 Further examples of cooperation out of necessity can be perceived in other aspects of society as well, for example, in the property deed found among the so called 'Babata Letters' from the Cave of the Letters in the Judean Desert (Yadin 1971:232–243).

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The End of the Holy Land Wine Trade

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In the 4th to early 7th centuries Palestinian and Egyptian wines were shipped and consumed widely throughout the Mediterranean and beyond. In part the flourishing commerce was a product of the booming pilgrim trade that the region witnessed, but other factors, such as the rise of Constantinople as an imperial capital, also played a role. This trade, however, suffered dramatically in the mid-seventh century – the period coinciding with the aftermath of the Persian and the Arab conquest of Palestine and Egypt – when the material markers of the commerce vanish. The present evidence indicates that the seventh-century invasions led to the end of the overseas wine trade and with it the loss of a considerable source of revenue and economic vitality. The Egyptian and Levantine wine trade, which persisted into the Umayyad and early 'Abbasid era, was neither comparable in scale nor scope to its late antique predecessor.

Introduction

Since Henri Pirenne's *Mahomet et Charlemagne*, the question of commerce and its correlation with urban life, and consequently with aspects of civilized life, has been a matter of great debate (Pirenne 1937). Since Pirenne died in 1935, a vast volume of material data has become available. It is mainly from these data that attempts to examine and to some extent refute the 'Pirenne thesis' have been argued, notably by Richard Hodges and David Whitehouse, Michael McCormick, Chris Wickham, as well as by Peregrine Horden and Nicholas Purcell in *The Corrupting Sea*; (Hodges and Whitehouse 1983; McCormick 2002; Wickham 2007). Scholars of the Islamic world generally take a different view of the economy and trade of the Mediterranean in Late Antiquity than those interested primarily in the post-Roman West. Islamic historians tend to look backwards from the peak of Islamic civilization when a great, cosmopolitan civilization centered upon Baghdad, one of the largest cities of Eurasia and the biggest urban site west of China, a city which benefitted from thriving maritime and overland commerce. Scholars such as Hugh Kennedy, whose well-known works on the transformation of urban centres in both the Levant and Persia have contributed much about the nature

of the first centuries of Islam, argue that social and economic transformation (or decline, depending on one's perspective) predated the Arab conquest. For scholars like Kennedy, the sixth century marked a turning point in Syria-Palestine and the rest of the Roman East – when plague, earthquakes, and invasion wrecked the Roman dominions. The Arab conquerors therefore entered a world quite different from that which the emperor Justinian had inhabited just a century prior – the cities had lost a great deal of their Graeco-Roman urban character, including many of their monumental civic structures and clean, delineated street plans and many had declined in size and economic importance. Alongside these stand more recent works, notably by Jodi Magness and Alan Walmsley, who see greater continuity of settlement vitality through the decades of the mid-seventh century and later, at least through to the end of the Umayyad era in 750, and possibly beyond, while Gideon Avni stresses a complexity of factors in the transformation of settlements and a need for a nuanced, site-based approach (Kennedy 1985; Magness 2003; Walmsely 2007; Avni 2011).

The Holy Land Wines of Greater Syria

An examination of the late antique wine trade helps to elucidate issues of production and exchange and by extension the fate of an important part of the economy and the structures on which it depended. From the fourth through the seventh centuries, Levantine wine played a prominent role in trade throughout the Mediterranean world and beyond. Key to the rise of Palestinian wines in regional and long-distance exchange was the foundation of Constantinople, with the attendant shift of the settlement of court and administration in the east. Unlike Rome, Constantinople was a port city and so was ideally located to benefit from overland and sea traffic from both the Mediterranean and the Black Sea. As the fecund Spanish and African provinces had supplied Old Rome with staple products, especially wheat, olive oil, and wine, as well as specialist goods such as fineware pottery, Syria-Palestine, Egypt, and Anatolia lay in the orbit of supply for New Rome. With the shift of the heart of the empire to Constantinople, the point of balance of the economy moved decisively to the East and even more decisively so in the fifth century, when much of the Roman West suffered from barbarian attack and political instability. The vital cities of the Levantine coast and Egypt especially benefited, as they were in a good position to supply the new capital and wider Mediterranean with goods cheaply by sea, and their traffic in many commodities was subsidized in part by the massive shipment of *annona* corn to Constantinople.

Another social alteration that contributed to the rise of Palestinian wine production was the spread of Christianity. In the fourth century, Christianity

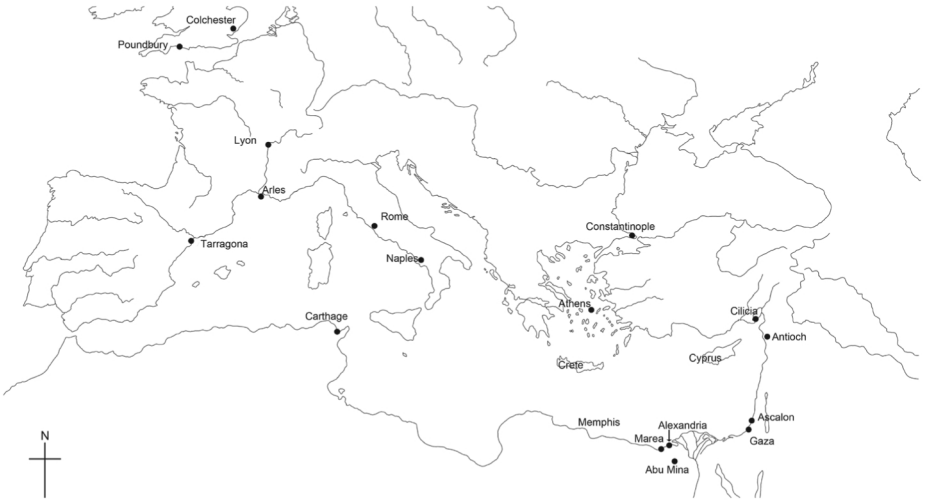

Fig. 1. Map of Roman world with major sites mentioned in text

made great headway not only within the rural population over much of the Roman Empire but also among the neighbouring barbarian tribes that lived along its borders. During the third and fourth centuries, a portion of the Goths and Vandals accepted Christianity. The growing number of Christians in the empire and along its borders also meant that the physical space where Jesus of Nazareth conducted his ministry, which took place in Roman Palestine, became an increasingly important locus of spiritual and economic activity. Following the unification of the empire once more under Constantine after his defeat of the eastern emperor Licinius, Constantine continued to exploit the potential offered by Christian monotheism and its growing ecclesiastical network for the extension of imperial authority. The empress Helena, the emperor's mother, was a long-devoted Christian. In 325 CE, with her son's full support, Helena visited Christian holy places in Palestine, funding monasteries and paying for the building of churches, including the Church of the Holy Sepulchre, with the resources of the state. Helena did not establish pilgrimage to the Holy Land which after all had been the holy centre for Judaism for centuries, but she helped to provide the Christian version with a permanence and prestige worthy of further emulation.

Thousands of other travelers, only a handful of whom left a record of their visit, followed in the footsteps of the empress to the Holy Land. Many of these travellers took the overland route from the western portion of the empire to the east, among these the anonymous so-called Piacenza Pilgrim, who around 570 CE made what appears to have been a standard tour of the Holy Land as conceived

by contemporaries. After leaving Constantinople he stopped on Cyprus and then landed on the Syrian coast, whence he traveled to Jerusalem and its surrounding holy sites. He then traveled to Egypt where he saw the Pyramids (interpreted as Joseph's granaries from the story of Genesis 41), visited the Sinai, followed by Alexandria and the nearby shrine of the Egyptian St Menas at Abu Mina, about 45 km (28 miles) to the southwest (Fig. 1) (Geyer 1898: 188 ff.; Wilkinson 2002: 129 ff.). The itinerary of the Piacenza Pilgrim is similar to that followed in the fourth century by Egeria, who visited the holy sites of Syria, Palestine, and Egypt ca. 381–4 CE. In the mid-fifth century, Eucherius, probably to be identified with Eucherius who was bishop of Lyon, based his understanding of the borders of the Holy Land on the Book of Numbers, where Antioch and neighbouring regions are included as belonging to the Jewish people (and consequently to the Christians) as well as the writings of Josephus, who included the regions of Galilee, Syria, and Phoenicia and those regions bordering them (Geyer 1898: 129–30; Wilkinson 2002: 96). While Syria was a natural extension of the Terra Sanctis, Egypt apparently took some time to become part of the normal itinerary – it seems that the Bordeaux Pilgrim did not make this part of the tour, which thus probably developed in the decades after 325 and prior to the 380's when Eucherius wrote. Thus, by the end of the fourth century, the Holy Land came to be understood as not only Palestine, but a much broader range of activity associated with Apostolic activity in the Levant.

The role of Egypt in the holy tourism of Late Antiquity steadily grew in the fourth century when the patriarch Athanasius lamented the invention of holy spaces and the frenetic search for the human remains of martyrs and other holy relics. The St Menas shrine at Abu Mina in the hinterland of Alexandria was already established as a locus of popular veneration in the late fourth century to which the earliest identifiable remains are dated (Grossmann 1998: 282). The city of Alexandria, with its deep Hellenistic roots, influential polytheist community, and large Jewish population, was somewhat inoculated against the rush to Christianize its urban centre through possession and display of relics. The second most important Christian pilgrimage site to Abu Mina was the shrine of SS Cyrus and John at Menouthis was established about 19 km (12 miles) east of Alexandria. The shrine of SS Cyrus and John is first attested during the reign of Theodosius II (408–50) and developed over a former Isis temple. The fame and fortunes of both Abu Mina and SS Cyrus and John peaked in the sixth and early seventh centuries and both fell into terminal decline by the ninth century (Montserrat 1998: 259).

The churches and monasteries that flourished prior to Helena's visit blossomed to their fullest extent in later centuries. By the sixth century there were major communities of monks throughout the cities but also in the countryside, especially

in the Judaean Desert. Among the many economic activities pursued by both the secular church and the monasteries of Palestine was wine-making. Wine was an essential element of the Eucharist, the central ritual of regular Christian worship. Although universally consumed over much of the Roman world, the spread of Christianity also meant an extension of wine drinking, culture and production. Pious pilgrims arriving in the Holy Land partook of Eucharistic wine produced locally and no doubt were afforded special sanctity on account of it. When they returned from pilgrimage, many of these same travellers spread a habit of the consumption of Holy Land wine in their homelands. This partly explains how Palestinian wines, which hitherto had only enjoyed a modest place in the Mediterranean wine economy, ascended meteorically as an export item and became a vital component of the regional economy. In addition to the religious element, it helped that the wines of the southern Levant were well-made by ancient standards. Ample hours of sunlight and hot climate rendered wine that was concentrated in sweetness and high alcoholic content. By late antique standards in which wine was generally mixed with water and acidity was therefore rendered secondary, a sweet, heavily alcoholic beverage was ideal. Finally, the decline in Rome also affected the Italian wine market – essentially the West lost major emporia whose hinterlands were mass producers of wine as Rome fell first to the Goths in 410 and then to the Vandals in 455. As urban centres in the West similarly suffered sack and political disruption, long-standing regional producers suffered and trade networks failed while others rose to replace them. Constantinople and the great cities of Antioch and Alexandria, together with a constellation of lesser settlements like Berytus, Sidon, and Gaza-Ascalon, engaged in vibrant commerce from the fourth century onwards.

Scales of Production & Distribution

The demand for wine was immense. It is currently believed that per capita consumption was as much as 186 litres of wine annually (Tchernia 1986: 26). A city the size of Rome, which by the end of the sixth century maintained a population of only 80,000, would nonetheless have required 14.9 million litres of wine each year (Lançon 2000: 14). The flow of eastern wines abroad intensified at the end of the fourth century when the so-called Gaza jar (Late Roman Amphora 4 or LR4 – see Fig. 2) first appeared in North Africa at Carthage, while major imports of Gaza wine in LR4 jars began at Arles (ancient Arelate) in southern Gaul in the fifth century (Reynolds 1995: 71). Arles was an important city and appears in the pilgrim itinerary of the so-called Bordeaux Pilgrim who left a log of a journey to the Holy Land made in 333–334, just prior to Helena's much-heralded visit (Geyer 1898: iv).

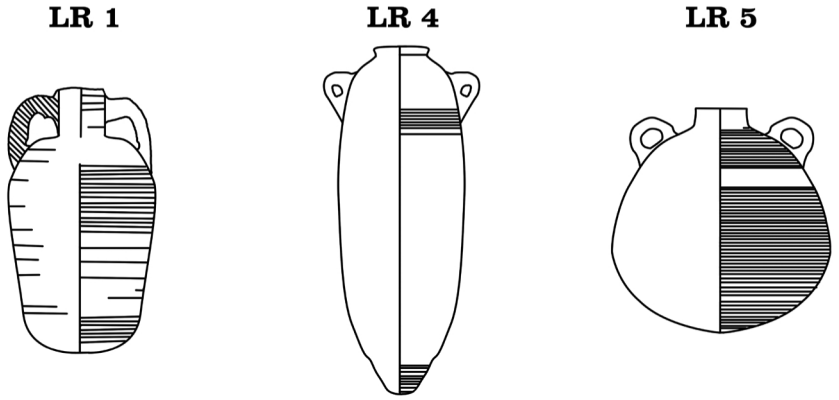

Fig. 2. Major Levantine amphorae types (after Majcherek, 2004).

The special place of Palestinian wine in this trade is also amply illustrated by the finds of hundreds of wineries in modern Israel and likely built or used during the Byzantine era. Kingsley has discussed the evidence in detail and a summary will suffice here. About nine hundred wineries from Israel are known, about nine per cent of which have the addition of a screw press in the winery (Kingsley 2004: 85–92).

Screw technology, which used press boards and stout, threaded wood screws to press the grapes, allowed for faster and more thorough extraction of must than simply by treading. Presses varied considerably in size, with an average example capable of processing ca 2,400 litres of wine in a single pressing. Nearly half of presses studied by Kingsley (42 per cent) are large, commercial wineries with capacities between 4,000 – 59,000 litres. In Palestine, most wine was produced near the coast from what today is Nahariyya to Jerusalem and further south in the Negev. But there was large-scale production elsewhere in the Levant not more than a few days' transport removed from the coast, from the Decapolis region of Jordan to the coast of Lebanon northwards to Laodicaea (modern Lattakia, Syria) and Cilicia, where wine was shipped in distinctive regional amphorae, Late Roman Amphora 1 (LR1 – see Fig. 2) (Decker 2009: 238–41). This jar, together with wine vessels of distinctive form from Palestine, namely the cylindrical LR4 and bag-shaped Late Roman Amphora 5/6 (LR 5/6), amounted for a sizeable portion of many cargoes shipped abroad. These wares became increasingly important in overseas trade during the fifth and through the sixth centuries.

Evidence for LR4 amphora production has been found at the Third Mile Estate south of Ashqelon (ancient Ascalon), lying near the former Roman coastal trunk

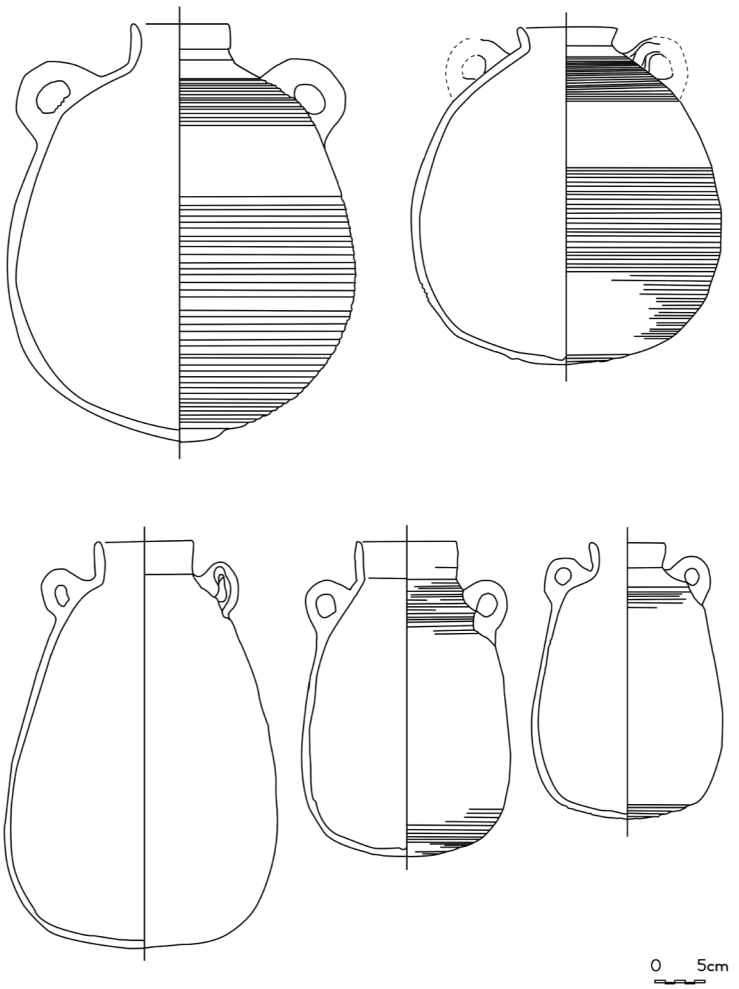

Fig. 3. LR5/6 types manufactured at Abu Mina, Egypt (after Dixeneuf, 2011).

road, the Via Maris. In addition to the amphora kiln, a large winery with multiple winepresses that covered about 380 square metres was excavated (Israel 1993: 105). The size and character of these installations make it clear that the estate produced a surplus of wine and the location of the site, with ready access to the seaport at Ascalon, indicates that winemaking at the estate was intended for the export market. LR4 is especially linked with Palestinian wine export, as further kiln sites found in the hinterland of Gaza and the numerous presses discovered in southern Palestine comport well with the ample testimony of the quality of the Gaza and Ascalon wine found in the written sources (Mayerson 1993). Kiln sites

producing LR4 and dated to the Byzantine period have recently been excavated at Ashqelon, Be'er Shema, Ono, Tel Yavne, and Khirbat Hannuna along the Gaza strip, the latter in association with Byzantine winepresses, and underscore the links between this important vessel and the Holy Land wine trade of Late Antiquity.[1] The bag-shaped jar LR 5/6, carried wine among a number of local agricultural commodities (see Figs. 2 and 3). Clear evidence for the use of these jars as wine containers comes from Khirbat Ibreika, where a kiln producing them was excavated in association with a large industrial-scale winepress of the Byzantine era (Masarwa 2009).

Finds of these amphorae abroad confirm the important place of Levantine wines in the trade of Late Antiquity. In the early-mid fifth century at Rome, Palestinian imports amounted to just under 7 per cent of all amphorae found in the Schola Praeconum I excavations, a figure that rose to 11 per cent by ca. 600 (Whitehouse, et. al 1982: 60; Whitehouse, et. al., 1985: 186). At Naples ca. 500 CE, Palestinian LR4 and LR 5/6 accounted for 8 per cent of amphorae, and imports increased to 16.4 per cent by ca. 600 (Arthur 1985). Other western sites are also telling: Kingsley estimates that Palestinian wines at Carthage comprised about 10.7 per cent of wine consumption, equivalent to the import of 781,000 litres annually, or about 31 ship loads of wine each year (Kingsley 2004: 101).

At other important western coastal sites of Late Antiquity, the story is similar. At fifth century Arles, imports of Palestinian LR4 represented 27 per cent of the total amphorae, while at late 4th early-5th century Tarragona (ancient Tarraco), Spain, LR4 comprised 9 per cent of all amphorae, rising to 18.8 per cent in the mid-fifth to early sixth century deposits.[2] These are but a sample of the dozens of sites in the Mediterranean and beyond, from Britain to the Black Sea, where Palestinian wine formed part of regular commerce.

Regional success brought imitation. The great majority of LR 5/6 types are of Palestinian origin, but the vessel was copied in Egypt at Abu Mena in the north. Abu Mina was the site of a flourishing pilgrim trade, thanks to the cult of St Menas who was venerated there. The popularity of St Menas is well attested by the distribution of the clay pilgrim flasks produced and sold as holy souvenirs for those who visited the shrine; these are found on sites not only in the Mediterranean but throughout a large part of Europe (Anderson 2004). As noted above, Egypt formed the westernmost extension of the Holy Land and it lay on most pilgrim itineraries. This position allowed Egyptian producers to capitalize on the flow of religious travelers in marketing their own wines alongside those of Palestine. Most travelers to the Holy Land made their way to Alexandria, having first come overland from Sinai or by sea. The majority of these pilgrims would make the journey to Abu Mina via Lake Mareotis where they landed at the seaport on the lake, Marea. In the sixth century, Marea was a flourishing centre,

with impressive public spaces, pilgrim hostels, and infrastructure to handle the important trade that flowed through it. It also was a clearinghouse for the vintage of the region, a high quality white wine that had been famous for centuries.[3] The similarity of the wine of Marea and those of Gaza and Ascalon, which were also potent white wines, probably helped the Egyptian wines from west of Alexandria to enter the booming wine market.

Telling evidence of the links between pilgrimage and the marketing of Holy Land wine by Egyptians comes from Abu Mina, where kiln sites producing LR 5/6 amphorae are known and dated to the fifth-eighth centuries CE and more than a dozen winepresses of late antique date have been found (Grossmann 1998: 298). Another Egyptian workshop, at Kom Abu Billou, 70 km (43 miles) north-west of Cairo, is broadly dated to the Roman-medieval eras (Dixneuf 2011: 144–45). Since vessel morphology in the Palestinian and Egyptian forms of the bag-shaped amphorae are similar, archaeologists must rely on fabric analysis to differentiate the origins of these jars. At Marseille, Egyptian LR5/6 amphorae have been recognized in mid-seventh century deposits, indicating trade links between this important western port and Egypt at the end of Late Antiquity.[4] These finds represent some of the last vestiges of the eastern wine trade: by the mid-630's much of the Levantine seaboard was in Arab hands. Alexandria, the most important port in the east, fell in 641 and exports declined dramatically.

Decline in Holy Land Wines

The end of the eastern wine export trade is an example of the transformation of the cosmopolitan, connected, and more specialized Mediterranean economy of Late Antiquity to the regionalized, more autonomous economy of the medieval era in which the seventh-ninth centuries are viewed as a time of recession and the retreat of trade (Horden and Purcell 2000: 153 ff.). The absence of Gazan amphorae from late seventh century contexts, where it had hitherto been an important part of the matrix of imported goods, is telling (the perils of argument from silence aside). From 650–700, LR4 amphorae continued to reach sites in the West, such as Carthage, but even in the East, where distances from producer to consumer were much smaller and the trade networks much more resilient, LR4 declined rapidly in places like Constantinople, Chios, and Cyprus and Kingsley has noted that no certain examples of Palestinian wine jars are known post-670 (Kingsley 2004: 99). Perhaps most revealing is the retreat of LR4 from Alexandria where its numbers fell precipitously from the mid-seventh century (Majcherek 2004: 235).

The decline in Gazan imports to Alexandria in the second half of the seventh century was not solely due to the Arab conquests of Egypt and the Levant.

Muslims did not ban alcohol consumption among Christian communities, and as is well known many of the Umayyad elite themselves were fond of the beverage. Pre-Islamic and early Islamic texts note several regions of Palestine which continued to be famous for their wine, notably Darum, a fort near Gaza, Beit Ras (Capitolias) and Umm Qeis (Gadara) in the Decapolis of Transjordan, and the southern Syrian sites of Der'a and Salkhad (Schick 1995: 261, 280, 286). These were inland sites and their trade was an internal one, with vintages consumed locally by Christian and early Muslim communities. The continued production of LR 5/6 throughout the Umayyad era is evidence of this overland and regionalized trade, but the wine and other products contained in these vessels played no significant role in overseas exchange.

Likewise, in Egypt, variants of LR 5/6 and other locally produced wine amphorae were thrown in large quantities in the Umayyad and even the 'Abbasid eras. Like their Palestinian models and their successors, the Egyptian wine vessels were destined mainly for local consumption, although some Egyptian vintages were carried overland to Transjordan. One of the telling indicators of the restricted circulation of these later vessels is their morphology. The successors of LR 5/6 possess a heightened neck and lack body ribbing: late antique examples had a shortened neck to reduce breakage during seaborne transport and ribbing that helped to secure them with rope while at sea (Kingsley 2004: 99).

There is little to suggest, therefore, that the Umayyad and 'Abbasid trade was anywhere near as brisk as its late antique predecessor. This trade had fallen under the double-blows of Persian and Arab invasions which disrupted maritime traffic, merchant networks, and at least on some occasions drove elite landowners to flight. Seaports vital to trade on the south coast of the Mediterranean were regularly attacked by the Muslims as they advanced into North Africa where most of wealthy Byzantine Byzacena fell in 647 and Carthage and the rest of Byzantine Africa, save Ceuta, succumbed over the next fifty years (Christides 2000: *passim*). The decline of the major emporium of Carthage, which had maintained strong links with ports in the western Mediterranean throughout Late Antiquity, was another shock to pan-Mediterranean commerce. Carthage was first replaced by the inland Arab capital at Qayrawan and then with Tunis. The Arab authorities hastened the unraveling of the trading networks via which eastern wine and other goods circulated by removing populations from the cities of the seacoast, a quarter from which they feared Byzantine raids, and replacing the open ports and harbour cities with defensive *ribats* (Masarwa 2011). The shriveling of the pilgrimage trade, which slowed but did not entirely fade, is best illustrated by the Egyptian sites which had in some senses been liminal to the great traffic in the holy pilgrimages whose epicentre was Jersualem; the great shrines of

Egypt, that of SS Cyrus and John and that of St Menas at Abu Mena, declined and did not survive long the advent of the ‘Abbasids. By this time the wineries of the monasteries and estates of Palestine and Egypt had long faded from the minds of western elites and from the holds of the ships that plied their trade.

Conclusion

While the Pirenne thesis has been seriously challenged and its claims modified, the archaeological evidence supports the view that the mid-seventh century witnessed a sharp recession in the overseas trade in wine. The implications for other commodities and the volume of commerce as a whole are important: the Persian attacks on the Levantine coastlands and then the Arab takeover of the east altered the commercial landscape and led to a decline in a large and important sector of the local economy and the overseas traffic on which much of this surplus production depended. In the case of Gazan-Ascalon wine, there was not a simple shift to other inland markets to mitigate the economic effects of the loss of overseas markets, but rather an abrupt cessation of specialized manufacture in response to waning demand and disruption in regional and long-distance maritime contacts that had fostered the trade in the first place. In Egypt, the volume of local demand and some overland trade abroad allowed wine production to continue at a significant level after the Arab conquests, but trade was in no way sustained at a pitch achieved in the first decades of the seventh century. The view that the Arab conquests were incidental to the fate of Levantine trade and economy is untenable in the specific case of the wine trade. With this, we must reconsider the view of broader economic continuity in the south of Greater Syria. As I have argued above, the wine trade was a not insignificant portion of the local economy of the region and, barring its replacement by an equally lucrative (and as yet unidentified) exchange, the loss was a considerable one with wide social consequences.

At present the data remain incomplete and analyses of the period are presently fractured, limited in their scope to regional examinations, not unlike this one. Archaeologists have a great deal to contribute to the debate and real progress in ceramic classification and identification on-site has been made over the past twenty years. Given that most of the major settlements inhabited during the seventh, eighth and ninth centuries remain densely populated today, ceramic studies become even more vital, as there is unlikely to be anything like the scale of the excavations of downtown Beirut to enlarge our terrestrial knowledge base. In the case of the Levantine wine trade, differentiation of amphorae fabrics (such as the Abu Mina LR5/6 imitations) on excavations is important; this can only done through wider dissemination and easy access of morphological

and petrologic information via online databases. Maritime archaeology, which retains a strong classical bias, offers significant potential in helping to answer questions of the nature and volume of trade. A.J. Parker's *Ancient Shipwrecks of the Mediterranean* is now more than two decades old and needs serious updating (Parker 1992). A synthesis of this kind could help to further establish a deeper chronological comparative framework and allow for more finely tuned regional comparisons. Finally, historians need to turn their attention to the Arabic sources, which present a unique set of historiographical challenges, yet nonetheless hold significant promise for economic historians. Only when these sources are utilized fully can the pictures of the western and northern medieval Mediterranean drawn by Wickham and McCormick be developed further.

Notes

1 For Ashqelon: Feder and Eriskson-Gini 2012; for Be'er Shema Erickson-Gini 2011; for Ono: Kogan-Zehavi 2011; for Tel Yavne: Segal 2011; and for Khirbat Hannuna: Peretz 2008.
2 For Lyon: Bonifay, Congés and Légilloux 1989, pp. 660–63; for Tarragona: Reynolds 1995: 280–83 and Reynolds 2010: 223.
3 On wine of Marea: Athenaeus I.26a; 33D; Nonnus 1.6; 11.518; 14.99; for the archaeology of Marea, cf. Szymańska and Babraj 2008.
4 Bien 2005 Bien 2007; for the late antique wine trade to Gaul in general see Pieri 2005.

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Khirbet al-Ḥadra: More on Refuse Disposal Practices in Early Islamic Palestine and Their Socio-Economic Implications

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This paper discusses the late J. Kaplan's 1970 excavations at Khirbet al-Ḥadra. It focuses on how disposed material in archaeological sites supplements our historical knowledge and provides information on the political, social and religious history of late antique Palestine. It deals with a transitional period of occupation (Byzantine-Early Islamic) and tries to show how the reuse and recycling of finds not only provide data on shifting in the political sovereignty of the region but also on the religious or social affinity of the ethnic groups involved.

Introduction

In a previous paper (Tal and Taxel 2012) we highlighted the rarity of studies which thoroughly deal with the archaeological evidence for refuse disposal practices in the late antique and early medieval Eastern Mediterranean, and especially the southern Levant, along with their broader behavioral and social implications. This work aims to investigate further this fascinating aspect of human behavior, by discussing in some detail the coastal Palestinian site Khirbet al-Ḥadra. This site provides interesting evidence for refuse disposal at the beginning of the Early Islamic period which can be identified with a contemporaneous shift in its economy and probably also in its religious identity.

Khirbet al-Ḥadra is located some 5 km east of the Mediterranean coastline and 0.3 km north of the Yarqon river in the northeastern section of Tel Aviv, presently within the boundaries of the Dan and Ramat HaḤayyal neighborhoods (Fig. 1). Surveys and excavations carried out at the site since the early 1950s revealed burial caves from the Intermediate Bronze Age and various remains from the Hellenistic to the Early Islamic periods (roughly 2nd century BCE to the 9th century CE). The latter included domestic (?) structures, wine presses and burial caves.[1]

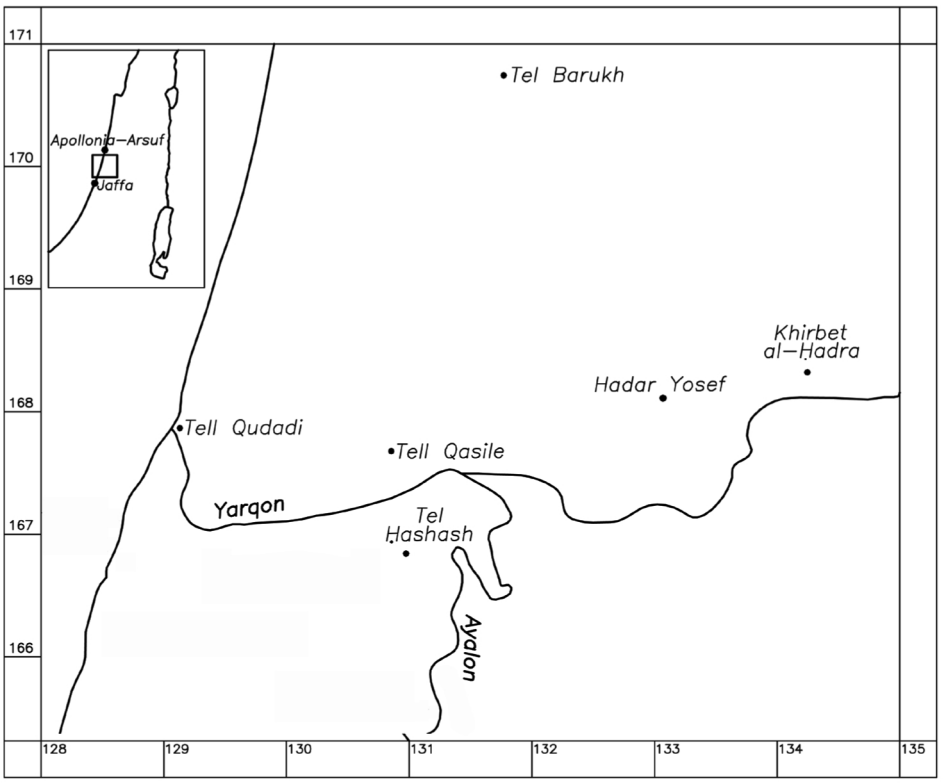

Fig. 1: Location map.

In February 1970, ancient remains were discovered during development at 27 HaGolan Street (within the Ramat HaḤayyal neighborhood), and were subsequently excavated by the late J. Kaplan (1971: 21–22). A small ashlar-built structure, whose southern part was partially destroyed by a mechanical tool prior to the excavation, was the main excavated feature. Kaplan attributed two phases of use to this structure: first, as a mausoleum in the original phase dated to the Late Roman period (3rd or 4th century CE); and in the second phase, as a refuse deposit dated to the beginning of the Early Islamic period (7th – 8th centuries CE). In addition to the pottery and stone finds recovered in this deposit, glass and especially secondary glass production refuse, were recorded. We offer a new interpretation and a more comprehensive picture of the stratigraphy, material culture, chronological and functional framework of the remains excavated by Kaplan. Our interpretation is largely based on Kaplan's archival file and the available finds we managed to recover.[2]

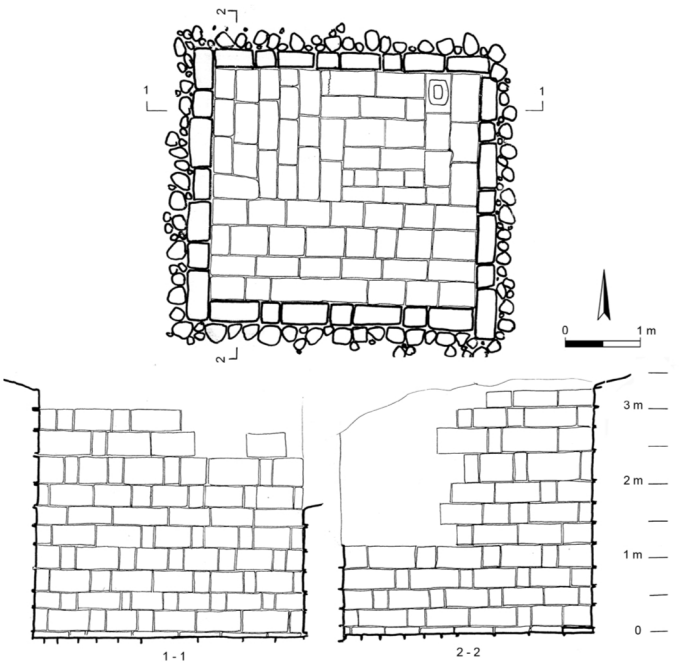

Fig. 2: Plan and sections of the ashlar-built structure.

Fig. 3: The ashlar-built structure, looking northeast.

Stratigraphy and Architecture

The preserved section of the structure (Structure A) excavated in 1970 was a single square-shaped space (*ca*. 3.1 × 3.6 m, preserved to c. 3.25 m high), carved into the *kurkar* bedrock (fossilized dune sandstone) on the southern slope of the hill that formed part of the second *kurkar* ridge of the central coastal plain of Israel. The structure's walls and floor were made of well-dressed rectangular *kurkar* ashlars (*ca*. 0.3 × 0.6 m in average), apparently in dry construction (Figs. 2 and 3). The gap created between the building's walls and the bedrock was filled with fieldstones and earth.

In order to level the bedrock, the floor's ashlars were laid over a foundation layer (0.1 m thick) of lime mixed with ash. The construction of the pavement may have been made in two subsequent stages given the design of the floor paving into subdivisions. The southern section (*ca*. 1.4 m wide) was composed of four rows with six to eight ashlars each laid in an east-west axis. The northern part (*ca*. 1.7 m wide) was set almost perpendicularly with rows of three to four ashlars each laid in a north-south axis, with the exception of the middle sector which seems to be the continuance of the southern section. One of the ashlars near the northeast corner was carved in the form of a square-shaped, shallow basin probably to be used as a settling pit.

The structure's walls were made of ashlars imitating the header-and-stretcher technique, but some stretchers were divided between quasi-headers and stretcher courses. The best-preserved northern wall had eleven courses (nine preserved in full), while the western wall had 12 courses (five in full); on the east there were seven courses; and on the south, four. No evidence was found for a doorway or stairs that may have led into the structure. In the preliminary report, the excavator mentioned sections of *kurkar* pillars and voussoirs found nearby. These he attributed to the structure's façade, in accordance with its identification as a mausoleum (Kaplan 1971: 22), though no photographic documentation of these elements is available.

The interior contained a series of earth layers (Fig. 4), which differed one from the other by their thickness, colour and texture. Most of these layers however, were characterized by a high concentration of ash and some have charcoal remains,[3] and by similar artifacts. It should be emphasized that nearly all of the few complete or nearly complete objects retrieved from the excavation including five pottery lamps, one glass bottle, a limestone mold for glass vessel blowing and an iron tool, were found in the earliest and lowest layer (Fig. 4, no. 8).

In the lower part of the uppermost level, (i.e. 'latest' layer, Fig. 4, no. 1) there were some dressed stones, likely originally belonging to the structure's walls. This indicates that by that time the upper courses of the structure were dismantled or intentionally destroyed. Despite the clear stratigraphic division of the structure's

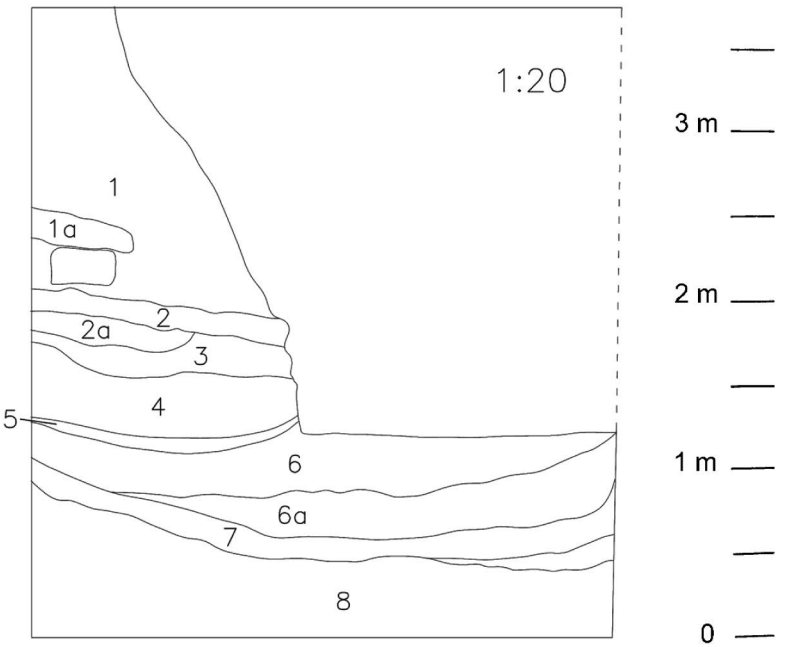

Fig. 4: Section through the layers of accumulation inside the ashlar-built structure, looking east: 1) grey earth (*ca*. 1.45–1.5 m); 1a) pocket of paler grey earth (*ca*. 0.2 m); 2) pale grey earth (*ca*. 0.15 m); 2a) pocket of *kurkar* chips (*ca*. 0.1–0.15 m); 3) reddish-black earth (*ca*. 0.05–0.2 m); 4) pale grey, ashy earth (*ca*. 0.4 m); 5) dark ash (*ca*. 0.05–0.1 m); 6) pale grey earth (*ca*. 0.2–0.25 m); 6a) pocket of black, ashy earth with much charcoal remains; (*ca*. 0.1–0.25 m); 7) 'burnt' red earth (*ca*. 0.1–0.15 m); 8) blackish, ashy earth (*ca*. 0.4–0.7 m).

interior deposits, the roughly homogenous mix of pottery and glass indicates that these deposits occurred within a relatively short period of time.

A 2 × 2 m trench was excavated perpendicular to the structure's northern wall down to bedrock at a depth of 0.7 m. According to Kaplan's excavation diary, the trench included pottery sherds and some 'traces of walls'. However, it is unclear whether the latter belonged to the foundations of the ashlar-built structure or to other adjacent remains.

Nearby, the remains of another ashlar-built structure (Structure B), whose floor was made of coarse white mosaic (2 × 2 cm tesserae) laid over a foundation of lime mixed with ash, similar to that used in the construction of the ashlar-built structure's floor were also reported (but its contour and thickness were not given). The excavator interpreted this structure as a water tank, although he did not mention the presence of hydraulic wall plaster (Kaplan 1971: 21).

Finds

Numerous artifacts were found in the earth layers excavated in the ashlar-built structure (Structure A). These included pottery sherds and a few small complete vessels, glass fragments and a nearly complete glass vessel and animal bones, in addition to fired mudbricks, secondary glass production refuse, fragments of marble slabs and a few stone and metal objects. Since these finds originated in a context which post-date the abandonment of the ashlar-built structure, none could have been securely attributed to its time of construction or original use.

Pottery

Numerous pottery sherds were found in the earth layers that filled the ashlar-built structure but not a single complete vessel could be restored, excluding a few intact small objects. Many of the sherds bear ash traces or yellowish-brown stains and thin accretions of an unidentified material (Fig. 5). This is a well-known characterictic of artifacts, especially pottery, which originated in refuse deposits, including architectural installations used or reused to collect sewage sludge. In such conditions, the organic refuse and inorganic residues attach to the pottery and often change its original color (*cf.* Tal and Taxel 2008: 111). In many cases intentional firing of refuse for hygienic and environmental reasons is assumed. In addition, several pottery sherds (storage jar body fragments) have very worn edges and/or surfaces (Fig. 6), typical of ceramics transported by water or lying stable in a watery environment (*cf.* Schiffer 1996: 275–276, Fig. 10.4a), but also of pottery sherds reused as building material.

Of particular interest is a large storage jar body sherd with two of its opposite edges highly worn and smoothed (Fig. 6, top left). This sherd was probably reused as a scrubbing or polishing instrument (*cf.* Peña 2007: 152, 204–205, Fig. 7.6). Another small group of sherds, including storage jar body fragments and one basin rim were overfired and cracked, resembling pottery production wasters. Some sherds have traces of mud-bricks attached to either their external or internal face (Fig. 7). Since the overall assemblage contains numerous finds related to secondary glass production (see below), it is likely that these mud-bricks originated from a dismantled glass furnace. Lastly, there were several small body and handle fragments of ribbed storage jars bonded in whitish mortar, indicating reuse as building material. As no rim fragments were found, it is difficult to accurately date these sherds. Since no evidence exists for the use of mortar in the construction of this structure, these mortared sherds cannot be related to the structure's foundation phase. They certainly came from another structure nearby, whose date would be between the Late Roman/Byzantine to the Early Islamic period.

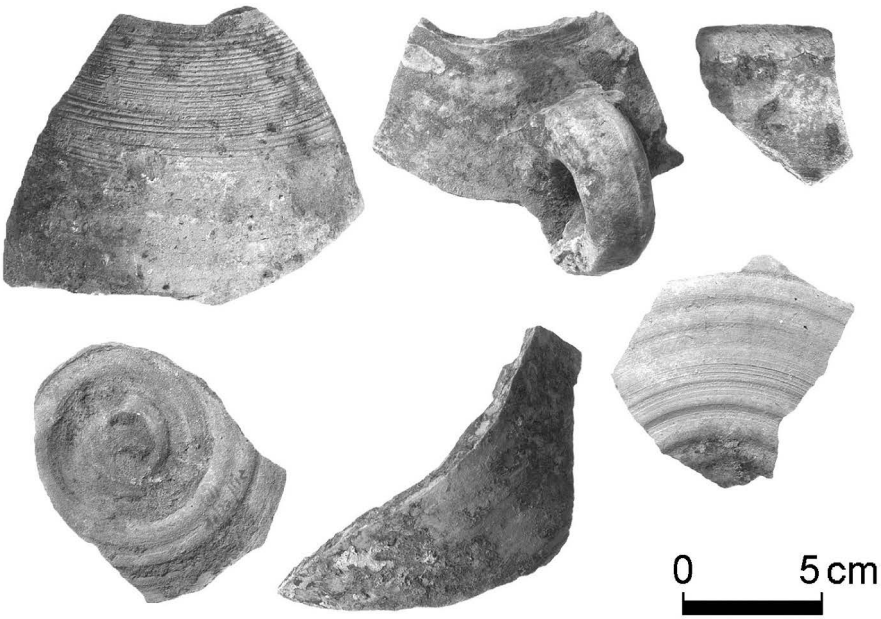

Fig. 5: Selection of pottery fragments with ash stains and accretions of unidentified materials.

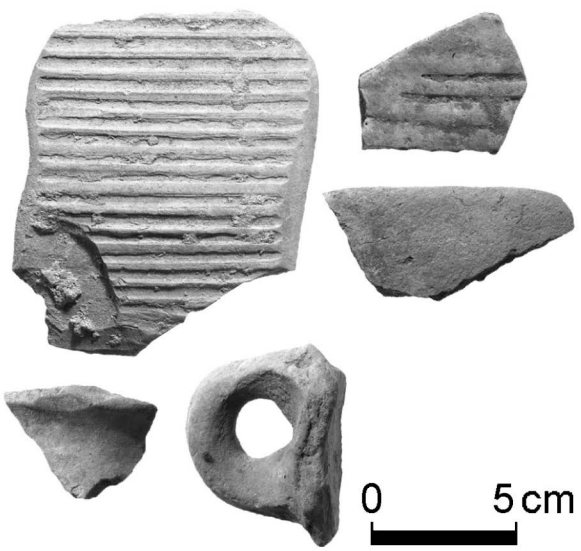

Fig. 6: Selection of pottery fragments with worn edges and/or surfaces.

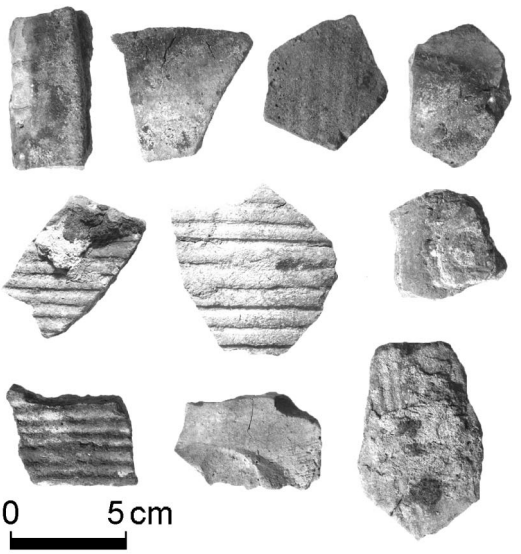

Fig. 7: Selection of overfired pottery fragments.

The remaining ceramic assemblage consists of a relatively limited variety of local or regional types. There are various storage jars (Figs. 8:9–13, 9:1–7), cooking vessels (Fig. 8:4–8), bowls and basins (Fig. 8:1–3), buff ware and metalic ware jugs and juglets (Fig. 9:8–16), flasks (Fig. 10:1, 2) and water-wheel (*sāqiya*) jars (Fig. 10:3–5), a storage jar lid (Fig. 10:6) and lamps (Fig. 11).[4] On the one hand, these have parallels dated from the 7th/8th to 9th/10th centuries CE, though others seem to have made their first appearance during the 8th century CE (*cf.* Tal and Taxel 2008: 125–165; Cytrin-Silverman 2010). Noteworthy among these are the various closed buff ware vessels (Fig. 9:8–14), flasks (Fig. 10:1, 2) and lamps (particularly the type with a tongue handle; Fig. 11:4), which allow advancing the assemblage's *terminus post quem* towards the middle or the second half of the 8th century CE. On the other hand, the disappearance of certain storage jar types (southern Palestinian bag-shaped jars and Gaza amphorae; Figs. 8: 9–11, 9: 5, 6) from the regional ceramic repertoire at the very beginning of the 9th century CE at the latest, and the disappearance of the lamps with a conical handle (Fig. 11:1–3) later in that century, indicate that this assemblage was deposited during a relatively short period of time around 800 CE, in the early 'Abbasid period. This dating is supported indirectly by the relative absence of glazed table and cooking wares, whose introduction in this region is commonly attributed to the late 8th or early 9th century CE (see Walmsley 2007: 52). A single glazed cooking-pot fragment found in the excavation and dated to the late 9th century CE (Fig. 8:8), originated in the fill accumulated outside the subterranean installation, which seems to be later than the deposit found inside it. Thus, this assemblage, though small and fragmentary,

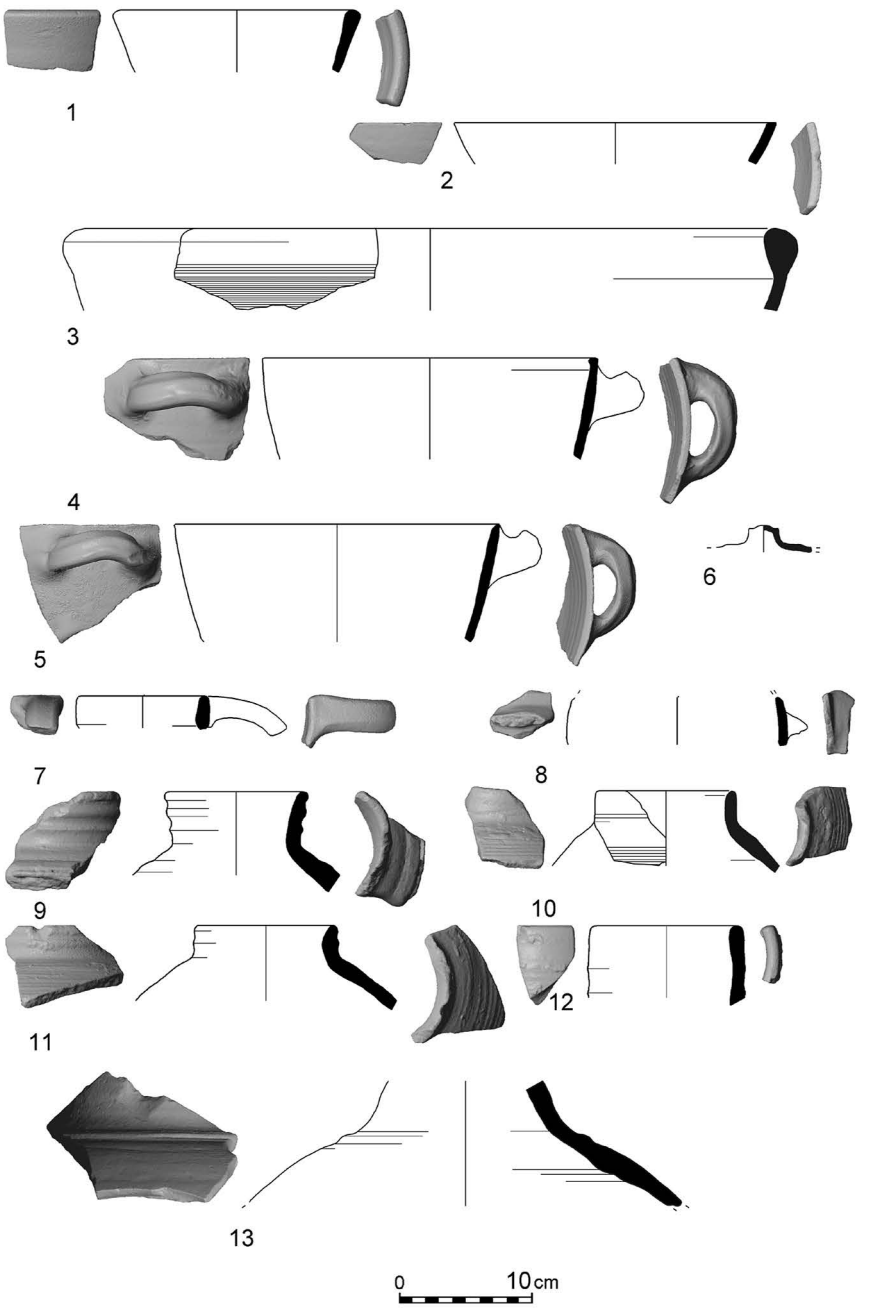

Fig. 8: Selection of pottery vessels: 1–3) bowls and basin; 4–5) casseroles; 6) casserole lid; 7) cooking pot; 8) glazed cooking pot (handle); 9–13) storage jars.

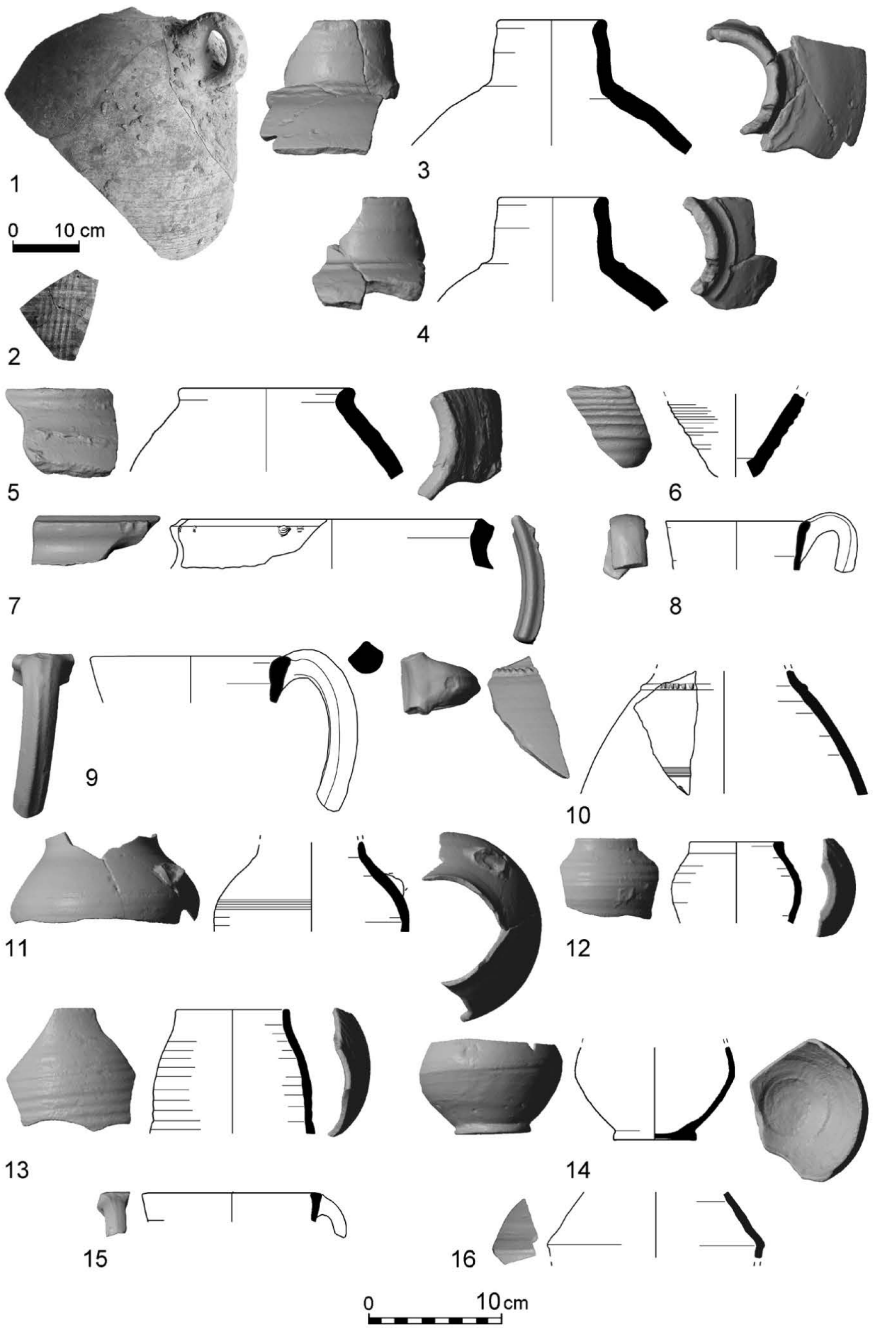

Fig. 9: Selection of pottery vessels: 1–7) storage jars; 8–16) jugs and juglets.

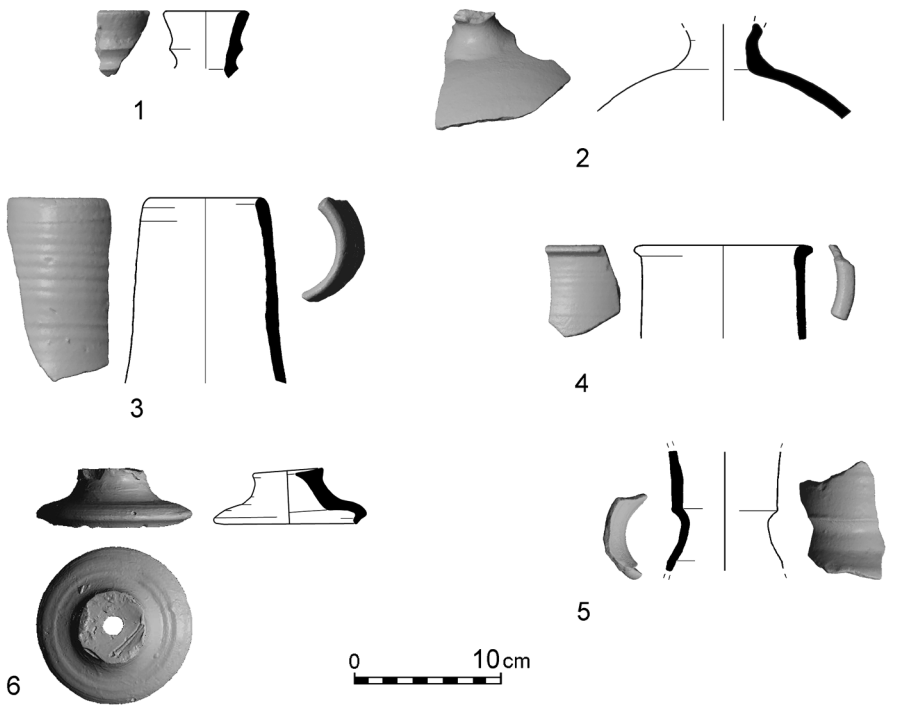

Fig. 10: Selection of pottery vessels: 1–2) flasks; 3–5) water-wheel jars; 6) jar lid.

fits into the currently relatively limited knowledge about the ceramic repertoire of central Palestine during the transitional Umayyad-'Abbasid period in the 8th century CE (*cf.* Walmsley 2000: 320–331).

Glass Working Debris

The glass-working debris found in the fills of the ashlar-built structure consists of furnace remains, primary product remains, vessels production remains and fragments of glass vessels that may have been produced in the furnace. Since the furnace was dismantled and dumped into this structure, no architectural remains were found which might indicate the furnace type. The evidence nevertheless indicates the existence of a secondary glass production furnace nearby.

Furnace Remains

Several fragmentary glazed (vitrified) and unglazed fired mud-bricks that certainly formed part of the furnace were found (Fig. 12, 13). These bricks were c. 11 × 15 × 3 cms. Some of the bricks had negative straw impressions that were used as

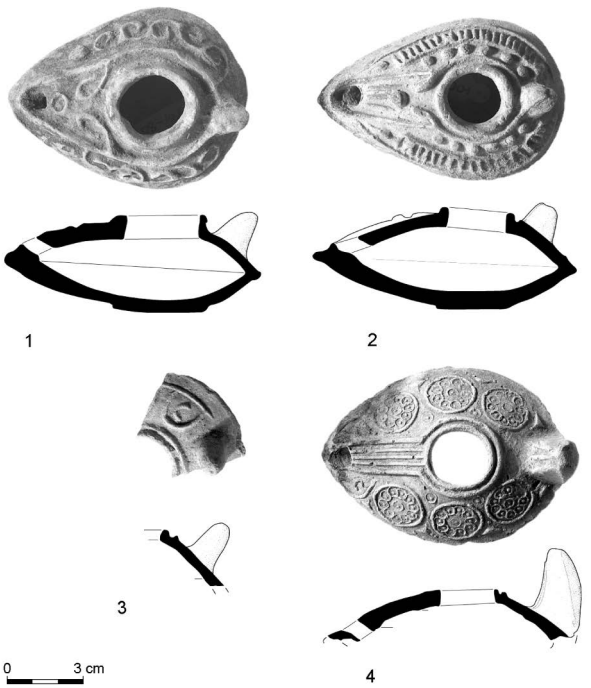

Fig. 11: Selection of lamps.

a tempering agent during their production. Among the fragmented bricks, some must have been from the furnace's ceiling as indicated by vitrified drops. Fired mud-bricks were often used to build pottery kilns and glass furnaces. Similar bricks, occasionally mixed with fieldstones, have been found in furnaces at Late Roman Jalame (Weinberg 1988), Late Byzantine Ramla (South) (Tal *et al*. 2008) and medieval Giv'at Yasaf (Tell er-Ras/Somelaria) (Weinberg 1987), as well as in many glass furnaces in western Europe.[5]

Primary Product Remains

Nine raw chunks (largest are about 4 × 6 cm) of bluish-green and yellowish-brown glass, covered with a layer of silver weathering, probably broken from larger chunks and used to produce vessels (Fig. 14). Alternatively, these chunks may be the remains of primary glass chunks, small lumps, and recycled vessel fragments (i.e. cullet) melted in the furnace.

About 50 uneven lumps (largest 4 × 5 cm), of bluish and greenish glass covered with a thick layer of limy/ashy extremely porous material were found. These lumps may be waste from the mixing of raw glass in the furnace. They may have been

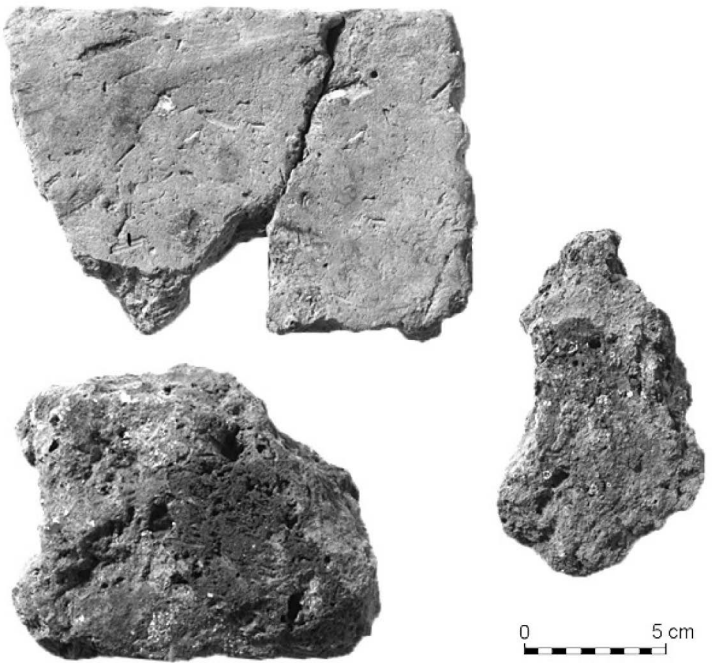

Fig. 12: Fragmentary unglazed fired mud-bricks from workshop furnace.

left on the floor and sides of the furnace, thus becoming contaminated with lime, or they may have been re-melted with cullet (Fig. 15). The material covering these lumps may be ash or a fuel-ash slag.

Vessel Production Remains

A complete, cylindrical, cup-shaped dip mold, unevenly carved on the outside, with a wide rim and 14 inner vertical concavities on the inside, was found among the vessel production remains (Fig. 16). It measures c. 13 cm high and 9 cm in its external diameter. It is made of relatively hard limestone and its thick walls (2 cm on average) and base (some 5 cm) were obviously intended to withstand the heat and pressure of molten glass without the glass adhering to it (*cf.* Stern 1995: 45–46). To impress the pattern, the primary glass gob was blown into it, producing a ribbed vessel. The vessel was then removed and probably would have been inflated again by free blowing and tooled until the desired shape was achieved. The secondary inflation of the vessel would produce a larger, shallower and sparser rib design, parallel or twisted on the vessel walls (Gudenrath 2001: 55, Figs. 44, 45). Although dip molds are known as early as the Early Roman

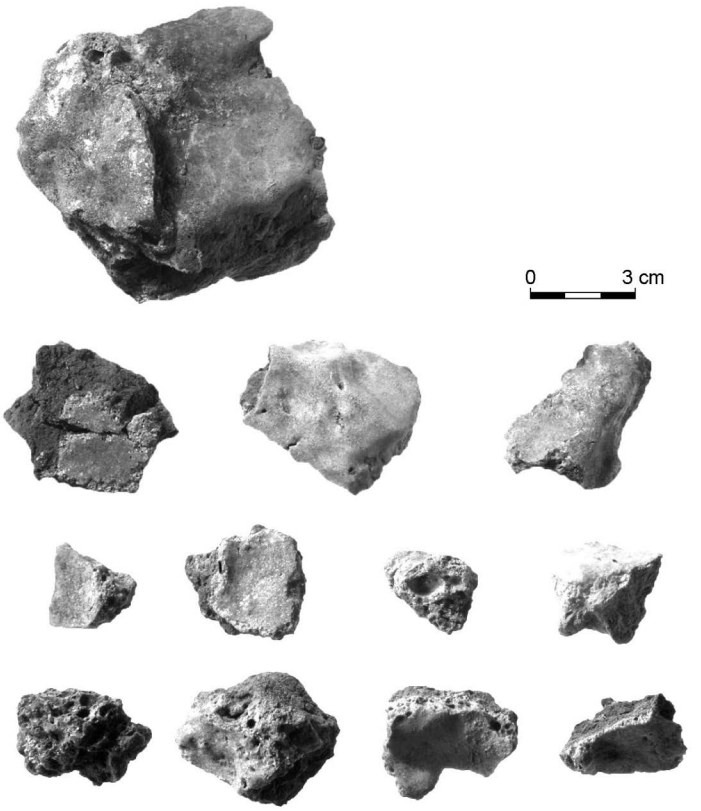

Fig. 13: Fragmentary glazed (vitrified) and unglazed fired mud-bricks from workshop furnace.

Fig. 14: Raw glass chunks.

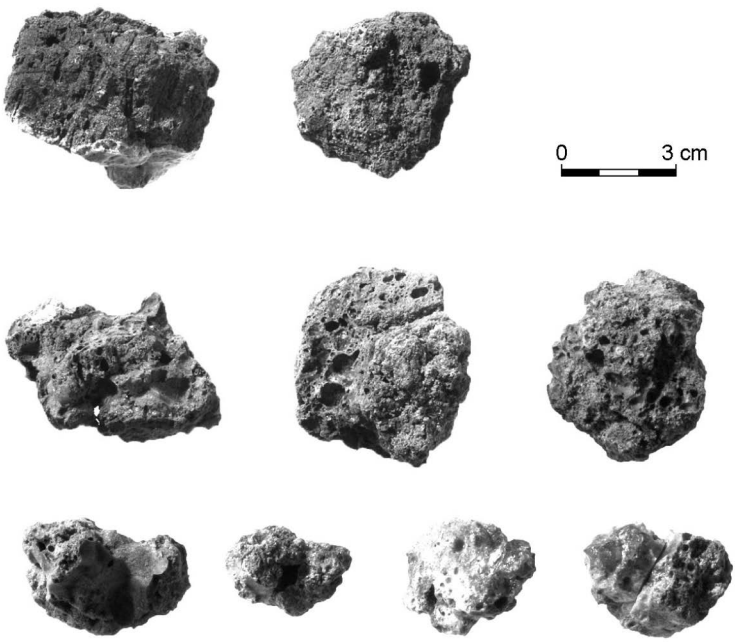

Fig. 15: Glass lumps.

period, they are common in the Islamic period owing to to the large amount of glass vessels decorated in this fashion (Whitehouse 2001: 81–82). A terracotta ribbed dip mold is known from a context of the 3rd–4th century CE at Komarowa, Ukraine (Stern 1995: 24, Fig. 8) and two metal dip molds with other designs are attributed to the Early Islamic period yet their origin is unknown, perhaps from the Middle East (von Folsach and Whitehouse 1993: Figs. 3, 6; Whitehouse 2001: 82, nos. 10, 11). However, such late antique stone molds are rarely found in secured archaeological contexts either in Israel or throughout the world. This mold can probably be dated more accurately to the 8th century CE, given the dating of most finds recovered with it and especially its stratigraphic location in the ashlar-built structure 'earliest' layer of discarded material/deposition. Hence this find's great importance. It is highly likely that the mold was used by the artisans who produced secondary glass at the site. However, no mold-blown ribbed vessels were found among the glass fragments in this refuse.

Eleven cylindrical or half-cylindrical moils made of colorless glass with a bluish tinge and covered with silver weathering were found (Fig. 17). Moils are waste glass that remains around the end of the blowing tube after the vessel has been removed, usually by cracking off (for definition see Price 1998: 333,

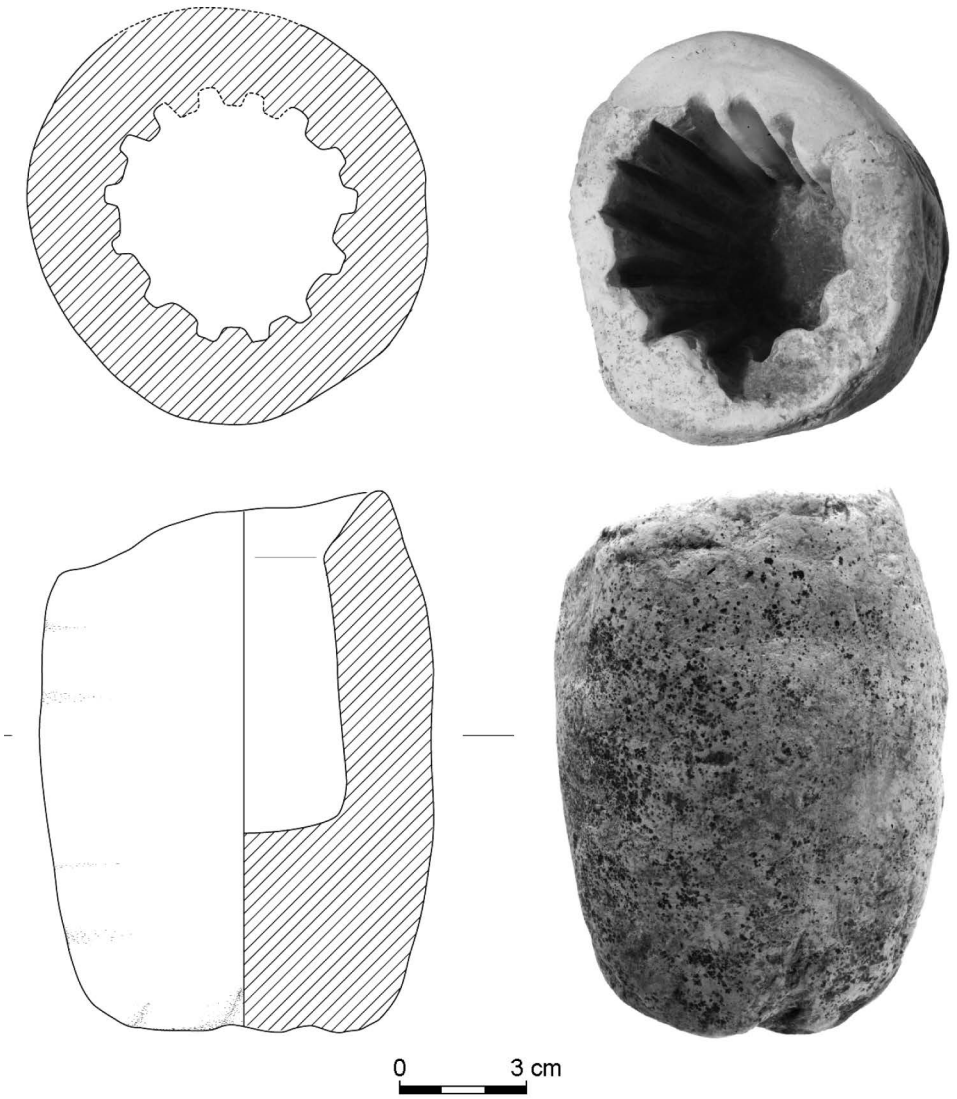

Fig. 16: A limestone mold for glass vessel blowing.

note 4; Amrein 2001: 22). They are typically cylindrical rods with one end cut off straight and the other end left rounded and uneven. These moils (1.5–3 cm in diameter) testify to the use of blowing tubes for the production of glass at the site. Glass moils appear in two basic shapes, depending on their distance from the blowing tube. Narrow cylindrical moils, like the ones found at the site (and in the Late Byzantine secondary glass refuse in Ramla (South), *cf.* Tal *et al*. 2008:

Fig. 17: Moils.

86–87, Fig. 8), are indicative of the upper part of the glass left around the end of the blowing tube, while broader moils, shaped like the upper part of a bowl indicate the lower part of the glass, cut from the top of an open, wide-rimmed vessel. Similar ones to the latter, together with cylindrical types, are known from a Late Roman glass furnace at Jalame (Weinberg 1988: 35, Pls. 3–5E, Color Pl. 3A; Amrein 2001: 22–33, Figs. 12.1, 15, 18, and 20–23, Pls. 10.5–8, 11.9–16, 12.17–19, and 17.56 and 57, with many western European parallels).[6]

Other working debris fragments are few and consist of a tiny cylindrical rod of light green glass and two rounded uneven glass pieces (Fig. 18). These objects are

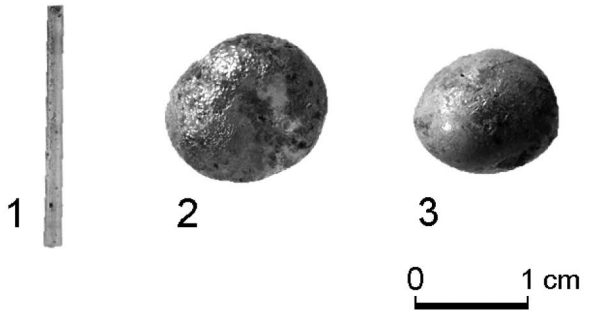

Fig. 18: Working debris fragments: 1) cylindrical rod; 2–3) uneven glass pieces.

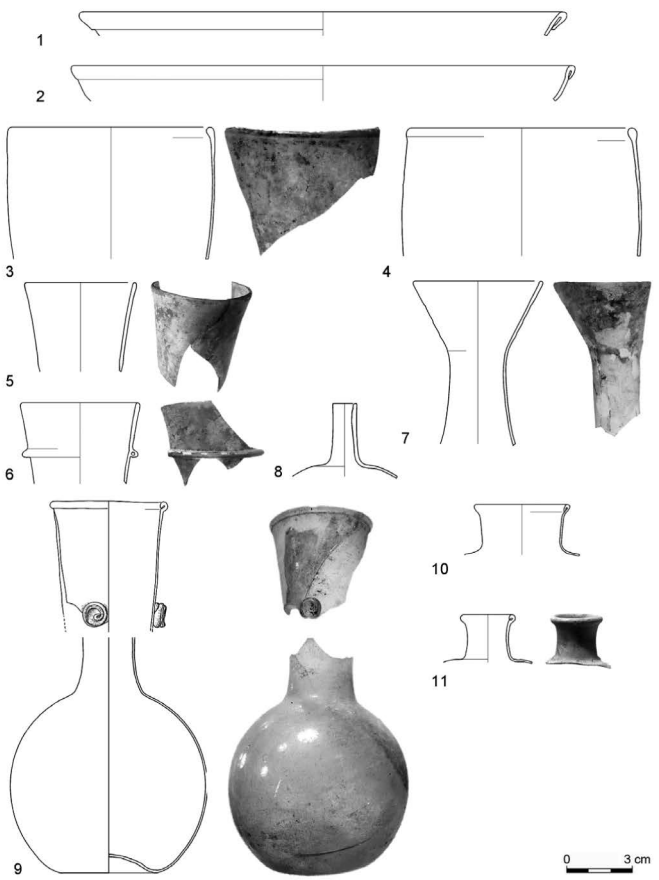

Fig. 19: Selection of glass vessels.

Fig. 20: Circular handles of cup-shaped glass lamps.

typical by-products from the making of glass vessels. The rod and glass pieces are perhaps the remains from the extraction of the primary gob of glass from the furnace or from the vessels formation. Similar finds were also discovered at Late Roman Jalame (Weinberg 1988: 33–37, Pls. 3–6, Color Pl. 3a).

Glass Vessels

The glass vessels found in the installation consist of about 160 vessel fragments of which only 36 are indicative pieces (Fig. 19). They are made of colorless, greenish-blue, yellow and yellow-brown glass covered with silver weathering and iridescence. A single bottle was found with a complete profile. The majority are bowls and bottles, but several jars, beakers, cup-shaped lamps and 'wine-glasses' were also found. The vessels are free-blown and mostly plain, apart from the complete bottle decorated with an applied circular plain stamp and a wall fragment decorated with a wavy trail.

The vessels cannot yet be attributed securely to the glass production debris, although they were found alongside it. Only chemical analysis can resolve the question of their context and use. Perhaps they are the remains of glass products made in the furnace. The repetitive appearance of one vessel type, the cup-shaped lamp with circular handle supports this assumption (Fig. 20). However, they could have been used also as cullet. It is less likely that these vessels were not connected to the production activities but were used as daily glassware at the site and dumped alongside with the furnace debris, pottery and other artefacts.

The vessels can be dated to the Late Byzantine to Umayyad/early ‘Abbasid periods, 7th-8th centuries CE, according to similar well-dated contexts at Beth Shean (Hadad 2005; Winter 2011), Khirbat el-Thahiriya (Jackson-Tal 2012) and Ramla (Gorin-Rosen 2008; 2010; Gorin-Rosen and Katsnelson 2005; Pollak 2007; Jackson-Tal 2008). They consist mostly of types indicating the stylistic continuation of the Byzantine-period glass vessels with few markers dated to the Umayyad and early ‘Abbasid periods.

Stone and Metal Objects

The handful of stone and metal objects found in the assemblage include one fragment of a basalt rotary quern (Fig. 21:1), a grinding implement which became widespread in the region since the Byzantine period on; an unidentified and highly corroded iron tool (a chisel?), with a broad, oval end and a narrower, rounded end (Fig. 21:2); a body of an iron nail (with its head and point missing) (Fig. 21:3); and two irregularly-shaped iron slags(?) (Fig. 21:4, 5).

Architectural-Related Artifacts

This term refers to artifacts of various materials found in the assemblage (in addition to the above-mentioned fired mud-bricks), which were clearly dismantled from abandoned or destroyed buildings and installations. These artifacts include clay roof tiles, marble slabs and mosaic tesserae.

The few fragmentary clay roof tiles (not illustrated) are represented only by flat lower tiles (*tegulae*) with square-sectioned fringes of the well-known type used in public and private structures between the Roman and Umayyad periods. As the more closely-dated finds from the assemblages (namely pottery and glass, above) normally date later than the period during which roof tiles ceased to be commonly used in our region, it is logical to assume that these specimens were reused or otherwise mixed with the later material.

Most of the eight fragmentary marble slabs found are made of a rather low-quality, large-grained yellowish-whitish marble (Fig. 22:1), while some are made of a more compact, fine-grained whitish-grey marble (Fig. 22:2). The thickness of the various slabs (between 2 to 4.5 cm) indicates that most (or all) were used – at least originally – as floor pavers, though the narrowest slabs may have been used also as wall revetment. It is likely that the slabs originated in Byzantine or Umayyad buildings, and were later dismantled to be reused elsewhere or to be burnt into lime, as was a common practice during Early Islamic times. One slab fragment bears straight and thin curved lines on both sides, which were made by chiseling small dots into the slab’s surface (Fig. 22:3). The nature of these lines – either decorative or functional – is unclear.

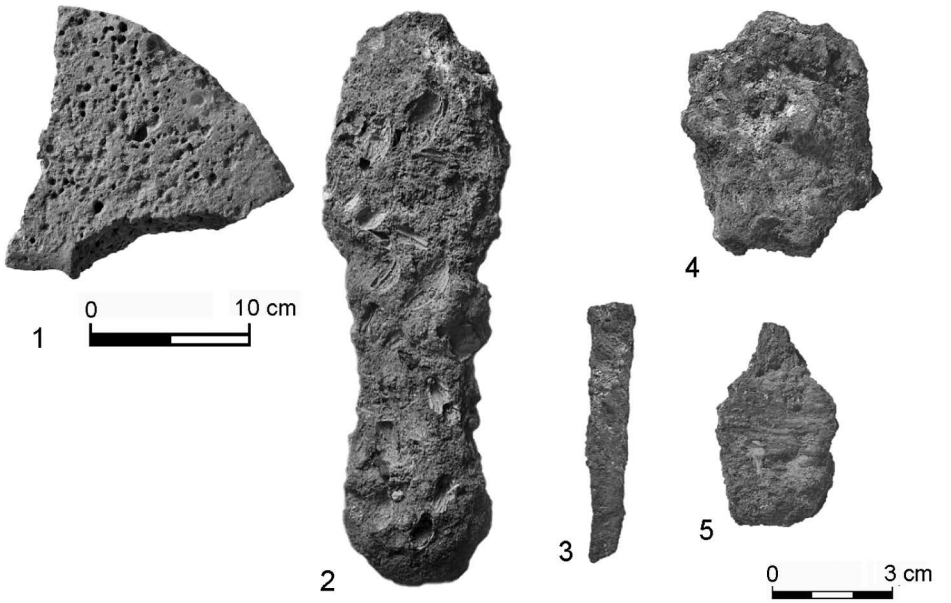

Fig. 21: Stone and metal objects: 1) basalt rotary mill; 2) iron tool; 3) iron nail; 4–5) iron slags (?).

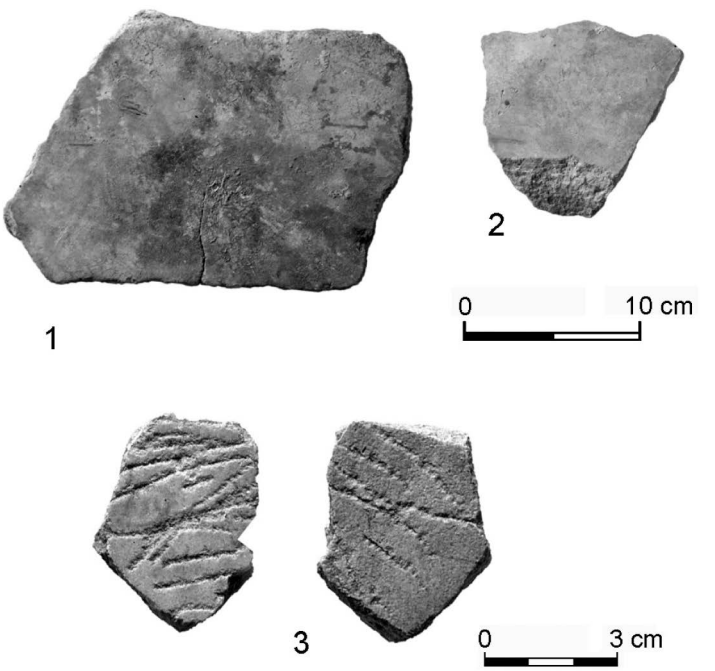

Fig. 22: Fragmented marble slabs.

The handful of white, coarsely-cut mosaic tesserae (not illustrated; the smallest is ca. 1.5 × 1.5 cm and the largest is ca. 3 × 3.5 cm) similarly originated in a nearby building or installation (such as the above-mentioned water tank), though their exact date cannot be determined.

Conclusions

Two clear phases of activity can be discerned in the ashlar-built structure excavated at Khirbet al-Ḥadra. The first original phase identified by the excavator was a Late Roman mausoleum, and the second was the reuse of the structure for refuse in the beginning of the Early Islamic period. It should be emphasized that this area forms part of the southwestern fringes of the site, where the settlement's cemetery apparently existed during Late Roman and Byzantine times (if not earlier). This is indicated by the excavation of two burial caves nearby, dated to the 4th and 5th centuries CE (Kaplan 1966a; Gorzalczany 1996); both, and especially the one excavated by Kaplan, belonged to Samaritan inhabitants based on the finds. These include a pendant and two polygonal finger rings, which bear Samaritan inscriptions written in Hebrew-Samaritan script that were found in the first cave, and ceramic lamps of the early Samaritan types, found in both caves.[7] Kaplan's identification of the ashlar-built structure as a mausoleum seems to derive from its architectural characteristics and proximity to the burial cave he previously excavated at the site.

Since no finds were retrieved associated with the structure's construction or original use, its exact date is unclear; the only obvious chronological detail is that the structure is earlier than the Early Islamic material discarded into it after it went out of its original use. Kaplan's Late Roman dating seems to have had no sound basis, probably derived from its identification as a mausoleum. The structure's compact dimensions and solid construction, as well as the use of ashlars is reminiscent of other Late Roman and Byzantine mausolea known from the country (e.g., Tsafrir 1984: 159–163; Aviam 2004: 277–289, 308). Nevertheless, the lack of a doorway (as indicated by the preserved remains) would have made access into the structure difficult, especially if sarcophagi would have been placed inside it, as suggested by Kaplan.

Alternatively, we suggest identifying this structure as a subterranean storage installation of a type known from other sites along the Sharon Plain and the Carmel coastal strip (notably Tel Qasile, Ḥorvat Gelilot, Apollonia-Arsuf, Caesarea and Shiqmona). In these sites, the installations (commonly termed 'pools' or 'barns') were usually arranged in clusters of four, though other combinations are known. In most cases, the installations – which vary in size and depth – have plastered walls and their floors are made of either plaster or crude white mosaic, with

or without a settling pit. However, a few other installations with ashlars-built walls and floor, very similar to the present example, are also known (e.g., Roll 1999: 40, Fig. 1.31). It has been suggested that these installations were used for the storage of foodstuff, both liquid and dry (the latter, mainly in non-plastered installations). Most of these installations have been dated – usually according to the finds accumulated inside them after they turned out of use – to the Late Roman and Byzantine periods, though at least in Caesarea such installations continued to be built and used well into the Early Islamic period (see Arnon 2011: 286–288; and also Ayalon and Levy 2011: 36*–43*, with additional references). The location of the installation of Khirbet al-Ḥadra at the site's fringes (where, as mentioned above, burial caves also existed) is also in accordance to what is known from most other sites in which such installations were found. The main detail in which the present installation differs from the others is in the apparent absence of at least one more adjacent similar installation. It is however very probable that this installation was functionally (if not physically) related to other nearby installations/structures, which were either demolished by modern development or not discovered. The 'traces of walls' discovered in the trench Kaplan dug perpendicularly to the ashlar-built structure's northern wall (above), may originally have formed another such installation.

Naturally, from both an artifactual and a behavioral archaeology perspective, the late deposit that completely filled the installation provides more data regarding the material culture, economy and daily habits of the site's inhabitants. Firstly, the chronology of this deposit was determined as the deposit composed of a series of earth layers, whose contents were quite similar. There were no identifiable differences between the layers in terms of chronology of pottery and glass finds; the entire deposit is homogenous, even if from the behavioral point of view it represents consecutive disposal activities. The correlation between the presence and absence of ceramic types and the dates provided by the associated glass vessels allows a more narrow dating of the assemblage to the late 8th/early 9th century CE.

Given the overall nature of the deposit's contents and its spatial context, several aspects can be emphasized. The finds retrieved from the deposit represent both domestic and industrial activities. The table and cooking pottery vessels and the glass vessels, as well as the animal bones (appendix, below), are mainly domestically-oriented artifacts, though their related behavioral affiliation (food preparation and consumption) should not be necessarily connected with a typical residential domain, as this behavioral mark may also be related to places where industrial activity occurred. Other ceramic types, including the storage vessels, water-wheel jars and lamps, the stone and metal objects and the architectural-related artifacts could have theoretically originated either in residential or industrial complexes.

As for the secondary glass production refuse and its associated materials, one can safely accept a typical industrial activity of glass vessel production. It is reasonable to assume that the workshop was located nearby whose refuse was discarded into the abandoned installation. Secondary glass production usually leaves poorer archeological traces than other fire-based industries, since the furnaces for recycling glass were often small and fragile.

Elsewhere, we puzzled over the idea that the debris of the secondary glass furnace found in the Late Byzantine secondary glass refuse at Ramla (South) hinted at the possibility that the furnace was dismantled by the artisans themselves (Tal *et al.* 2008: 95). Here too we encounter a similar phenomenon that could either relate to their secrets of knowledge or the furnace's building material fatigue. In any case, placing workshops and features associated with polluting (pyro-technological) industries, such as pottery and glass production, at the fringes of rural and urban settlements, is a well-documented phenomenon from many Palestinian Byzantine and Early Islamic sites, especially in the southern Sharon (*cf.* Roll and Ayalon 1989; Ayalon 1997).

The conversion of the abandoned, subterranean installation into a refuse dump fits a behavioral phenomenon well-known across the Mediterranean, namely discarding substantial amounts of refuse (during a single or several episodes) within abandoned cesspits, substructures of buildings, cisterns and wells (for some selected examples from Late Byzantine and Early Islamic Palestine, see Tal and Taxel 2012: 499, 502–505). Peña has suggested that since abandoned negative features of this kind would have represented significant hazards, especially for children and small domesticated animals, their infilling with refuse would have served a beneficial purpose (2007: 283). It may be that in many cases this refuse which was mixed with organic matter served as fertilizing agents of agricultural crops that were cultivated in nearby terrains. Whether this consideration was mere pragmatism (namely the reuse of an existing substructure instead of digging a new pit) or related to some other motive, the available contexts might suggest to relate the original use of this ashlar-built structure to wine production. In this manner the change of function, from a storage facility (of grapes) to that of refuse could suggest a shift in the religious identity of the site's population. Given the contents of the burial caves excavated by Kaplan and Gorzalczany (above), some of the site's inhabitants during the Late Roman and Byzantine periods were probably Samaritans, although other religious/ethnic groups cannot be excluded. There is good reason to believe that this Samaritan community continued to inhabit the site also during the latter part of the Byzantine period and the beginning of the Early Islamic period, but was later – sometime during the 8th century CE – forced to abandon it or alternatively to convert to Islam.

A contemporaneous Samaritan village nearby – Tell Qasile (ca. 3.5 km to the west of Khirbet al-Ḥadra; Fig. 1) – was totally abandoned by the early 9th century CE, and supplanted by a *khān* (caravanserai) on its summit. Tel Ḥashash, another small rural settlement to the south of Tell Qasile across the Yarqon river, which may also have been inhabited by Samaritans, was fully abandoned during the 8th century CE (Tal and Taxel 2010). The decline of both sites has been attributed, *inter alia*, to the gradual cessation of wine production, resulting in a negative impact on their heavily viticulture-based economy (Taxel 2009: 120–126; Tal and Taxel 2010: 111–120). Literary sources indicate a severe demographic and economic decline of the urban and especially rural Samaritan population in Palestine during the early ʻAbbasid period, accompanied by a Samaritan mass conversion to Islam. Settlements whose Samaritan population converted to Islam apparently continued to exist during the Early Islamic period (*cf.* Levy-Rubin 2000; 2002; Schur 2002).

Khirbet al-Ḥadra could be identified as a rural settlement whose Samaritan inhabitants were partially or fully converted to Islam in the course of the 8th century CE, and saw no special issue with reusing an older installation that may have been part of the local wine industry (hence forbidden to be used given its 'impurity'). The possibility that reuse derived from pragmatism without social change having occurred should not be dismissed. Nevertheless, this act might indicate a transformation of the settlement's physical appearance and probably its economic structure, which seems to have taken place no later than the beginning of the Early Islamic period.

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Notes

1 For an overview of these archaeological remains, see Taxel 2009: 127–131; Buchennino 2010.

2 The current study is supported by the Israel Science Foundation — Personal Research Grant (No. 118/12): The Archaeology and History of the Samaritan Settlement outside Samaria (*ca*. 150–800 CE), headed by O. Tal. The excavation file (A-225/1970) is kept in the Israel Antiquities Authority (IAA) archives, Rockefeller Museum, Jerusalem, while most of the finds are stored in the IAA warehouses at Beth Shemesh and Yiftaḥ'el.

3 These have been examined by Nili Liphschitz (of the Institute of Archaeology, Tel Aviv University), and were identified as belonging to a single beam/branch of either Aleppo pine (*Pinus halepensis*) or Cedar of Lebanon (*Cedrus libani*).

4 Drawings of pottery and glass vessels were produced by the Computerized Archaeology

laboratory of the Institute of Archaeology of the Hebrew University in Jerusalem (for the methods *cf.* Karasik and Smilanski 2011).

5 Comparison with the evidence from western Europe reveals that secondary glass furnaces vary in shape (rounded or rectangular) and are constructed of bricks, tiles, and stones. In most cases, only the lower part of the furnace is preserved, and the reconstruction of glass furnaces is therefore usually based on iconographic sources which are few and difficult to interpret (Foy and Nenna 2001: 47–66). In fact, the iconographic (archeological) sources are restricted almost to a lamp and a terracotta vessel, both of which are dated to the Early Roman period and show two levels in a rounded glass furnace. The lower level probably included the firing chamber, divided into two parts, and the upper level probably consisted of melting chambers, also divided into two sections, where the raw glass and recycled cullet were melted (Price 1988: 317–319; Stern 1995: 22; Foy and Nenna 2001: 61–62).

6 For conical moils, see Weinberg 1988: 35, Pls. 3–5e, Color Pl. 3A; Amrein 2001: 22–33, Figs. 12.1, 15, 18, and 20–23, Pls. 10.5–8, 11.9–16, 12.17–19, and 17.56 and 57, with many western European parallels. For broad moils, see Weinberg and Goldstein 1988: 87–89 and 98–101, Figs. 4.45 and 52; Amrein 2001: 23, Fig. 12.2.

7 Similarly to the excavation discussed here, Kaplan's excavation of the burial cave at HaGolan Street was published in a preliminary form. The final report and broader synthesis are currently under preparation by the authors together with the considerably larger Samaritan cemetery excavated at Tel Barukh.

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Appendix
The Faunal Remains

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The faunal assemblage from the refuse yielded 81 identified bone fragments (Table 1 for NISP and MNI) that included livestock animals as well as animals dying in the vicinity of the site such as cat and dog. The livestock assemblage included animals that were raised for meat, wool, and milk, as well as for labour and travel. This group is dominated by relatively equal proportions of cattle (*Bos taurus*), caprines (sheep [*Ovis aries*] and goat [*Capra hircus*]), in addition to donkey (*Equus assinus*), pig (*Sus scrofa*) and camel (*Camelus dromedarius*). The equid species was determined as donkey based on the observed patterns of enamel folds on the occlusal surfaces (Johnstone 2004: Table 4.1, Fig. 4.3). The pigs' status (domesticated or wild) could not be determined due to the lack of measureable bones. The assemblage was supplemented by a nearly complete skeleton of cat (*Felis silvestris*), missing only the skull and the feet. Based on the completeness of all bones and lack of any signs of butchery, it is assumed that the cat's skeleton was buried in articulation. Two dog (*Canis sp*.) bones were additionally recorded, as well as a mole rat *(Rattus rattus*) mandible but the latter could originate from a later intrusion as its context is not secure.

The small assemblage of the cattle and caprines includes the long bones, vertebrae and mandibles with a lack of the body extremities (metacarpals and feet bones) (Table 2). The presence of mandibles indicates that not only the meaty parts are present, thus these are probably the remains of animals raised on site or nearby. The few donkey bones include the feet bones as well (Table 2). Butchery marks are evident only on the caprines' remains.

The ageing profiles of domesticated livestock may contribute to our understanding of their exploitation aim. One cattle bone (ulna) was un-fused. This bone fuses at a late age (3.5–4 y; Silver 1969). Of the caprines, only two bones were un-fused (distal femur and proximal tibia, both are fused at age of 30–48 months; Zeder 2006), suggesting that both cattle and caprines were kept to an older age and slaughtered later in life after their exploitation for secondary products. The only young animal in the assemblage is the pig, which is represented

by two isolated teeth, most probably originating from a single individual. They include the milk tooth dP_4 which is shed at 12–15 months. Hence, the pig was exploited primarily for its meat.

The presence of caprines, cattle, donkey, camel and pig in the assemblage is typical for Early Islamic sites in the southern Levant (e.g. Horwitz and Dahan 1996; Cope 1999; Horwitz 2006; Sade 2005). Although pig presence in the assemblage is not expected, given the site occupation by Muslims at the time and the religious prohibition of its consumption, low frequency of pig remains was also found in Yoqne'am, where they constitute 2% of the identified assemblage (Horwitz and Dahan 1996), and high frequency of pigs was reported from Beth She'an (Horwitz 2006) and Caesarea (Cope 1999). The presence of various body parts of animals in the assemblage at an adult age, suggests livestock were raised and slaughtered on site after being exploited for various products, except for the pig which was butchered young and exploited for meat alone.

Table 1. Species frequency (NISP and MNI)

Species	**Common name**	**NISP**	**MNI**
Bos taurus	cattle	13	2
Ovis aries/Capra hircus	sheep/goat	11	3
Ovis aries	sheep	1	1
Camelus dromedarius	camel	1	1
Equus assinus	donkey	7	1
large mammal*		9	1
Sus scrofa	pig	2	1
Canis sp.	dog	2	1
Felis silvestris	cat	34	1
Rattus rattus	mole rat	1	1
Total		**81**	**13**

* large mammal = remains identified to body size group. Includes cattle, donkey or camel.

Table 2. Element frequency (NISP) of main domesticates

	Ovis/ Capra	*Bos taurus*	*Equus assinus*	*Camelus dromedarius*	*Sus scrofa*	large mammal
Mandible		2	5	1	2	
Scapula	3	2				1
Humerus		1				
Radius	3					
Ulna		1				
Pelvis						1
Femur	1					
Tibia	4	2				
Vertebra	1	5				
Ribs			1			7
2nd phalanx			1			
Total	**12**	**13**	**7**	**1**	**2**	**9**

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Charles Warren at Airaq Al-Amir in 1867

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It is not well known that Charles Warren visited Airaq al-Amir (also spelled 'Iraq el-Emir) in 1867.[1] At that time Lieutenant Charles Warren, as he then was, was active in Jerusalem for the Palestine Exploration Fund and was working to set up the Survey of Western Palestine. In July and August 1867 he set out on an expedition to Transjordan and arrived at Arak al-Emir, as he spells it, at 12.20 pm on 19th July, when the thermometer stood at 94° Fahrenheit (34° Celsius) in the shade. It is extraordinary that the expedition set out at the hottest time of the year, but this was perhaps the only time that Warren could spare from his regular work in Jerusalem.

Airaq al-Amir, literally 'the Cliff of the Prince', had been rediscovered in 1818 by the naval officers Charles Leonard Irby and James Mangles in their peregrinations through Egypt and the Levant. Luckily they had with them the gentleman-scholar William John Bankes, who was able to identify the ruins of the site with the description of Tyros by the Jewish historian Josephus Flavius (Antiquities XII: 229–236). Josephus describes it as the stronghold of Hyrcanus, the last of the Tobiads, who committed suicide there, according to Josephus, some time after 175 BCE, when Antiochus IV Epiphanes came to the Seleucid throne. Airaq al-Amir had been the country estate and military base of the wealthy Jewish Tobiad family since at least the 5th Century BCE, and the most prominent ruin on the site was the Hellenistic Qasr al-Abd ('Castle of the Slave'), which Josephus describes as a kind of residential fortress, decorated with animal sculptures.

Bankes made sketches of the ruins and wrote a description which was copied by Irby and Mangles in their account of the expedition (1823, 473–474). This publication brought the remote site to the attention of the scholarly world and was followed up by visits conducted by at least three French expeditions, led by Comte Melchior de Vogüé, Félicien de Saulcy and the Duc de Luynes in 1862, 1863 and 1864 respectively. The most important work on the site was done by de Saulcy, who published his findings in 1865, and came to the romantic conclusion that the Qasr had started as an ancient Ammonite or Moabite temple (1865, 224). The other two French savants disagreed and

considered it to be a residential castle, de Luynes even calling it "Le Château d'Hyrcan" (1871–76, 141), the name later adopted by the French team that reconstructed the ruins after 1976 (Will and Larché, 1991).

Warren must have heard of the work of these French explorers. De Vogüé's work was published in 1864 and de Saulcy's in 1865, though that of de Luynes only appeared posthumously in 1871–76. It is however doubtful that Warren would have seen the first two works so soon after publication in Paris and before his visit to the site, though he will have heard of the expeditions and probably met their leaders in Jerusalem where they also worked, both before and after their travels to the site.

Warren's account of his visit is included in his letter to the Palestine Explodation Fund as printed in the PEF Quarterly Statement No.6 (vol.1) 1869–70, and headed "Expedition to East of Jordan, July and August 1867" (pp.284–86). It is also reproduced as an Appendix to The Survey of Western Palestine, Jerusalem Volume (1884, 454ff.)

The party set out from Jerusalem on 17th July and consisted of Corporal Birtles (who was suffering from dysentery but insisted on joining), Corporal Phillips, the photographer and his assistant Edward Hanauer and Jerius, the dragoman or guide-interpreter. The party was accompanied by a number of local guards, varying from five to forty according to circumstances, led by one Sheikh Goblan, whom Warren praises for his competence and good manners.

On arrival at the ruins of Airaq al-Amir, Warren notes that five photographs were taken, most of them of the principal ruin, the Qasr al-Abd. One of these (Fig.1), shows Jerius the dragoman lying on one of the upturned monoliths of the ruins of the Qasr. Two more of these five are reproduced in a recent volume of photographs of Jordan published by Abujaber and Cobbing (2005, PEF.1134, 1138).

The party spent one afternoon and one early morning at the site and overnight their camp "was delightfully placed below Arak el-Emir, near the stream of Wadi Seir and the thermometer registered a minimum of 53* Fahr. during the night…". The Wadi Seir is indeed a delightful spot, running alongside and well below the main site. The name Seir or Tseir preserves the former Greek name of Tyros (Hebrew tsur, meaning 'rock') given by Josephus.

The party left Airaq early in the morning and proceeded south down the Wadi Seir to where it joins with other streams to debouch into the Jordan, and later they proceeded on to the more well-known ruins of Heshban.

Warren refers to the Qasr as 'the palace' and says that a plan was made of it on July 19th and further measurements and a sketch on 20th July. Unfortunately these drawings are no longer extant in the PEF records. However a draft plan and sketch of the monument are reproduced in The Survey of Eastern Palestine by C.R.Conder (1889, 79 and 80) and it has been suggested to me by Shimon

Fig. 1. Jerius, the dragoman, lying on a monolith (photo taken in July or August, 1867).

Gibson that these may be based on the work by Warren which is most likely to have been the case.

Warren has no hesitation in calling the Qasr a "palace" and makes no reference to other opinions. This is strange as the designation of "temple", inspired by the animal figures on the facades, started by de Saulcy, persisted even until the 1960s when it was still adopted by Paul Lapp who conducted the first true archaeological excavations at the site (Lapp 1963, 30–31).

Warren's brief visit to this Hellenistic site was followed somewhat later by Captain Claude Conder and Lieutenant Mantell in 1881 when they were working on the Survey of Eastern Palestine. They made a full survey of the fifteen caves on the site but they only made a cursory investigation of the Qasr, which Conder, following Warren, again describes as a palace (1889, 78). The latest interpretation of this fine but unfinished early 2nd Century BCE monument is that it was Hyrcanus's attempt to provide a mausoleum in memory of several generations of his distinguished Tobiad family, of which he was the last scion (Rosenberg 2005, 135).

Though Warren's so-far unpublicised visit to Airaq al-Amir makes little major contribution to our knowledge of this important site, it is interesting that such a busy explorer took the trouble to visit it, at a time when it was remote from the more famous ruins of Transjordan and when it was only accessible by mule or on horseback, with an armed guard to protect against the local Adwan Bedouin, who claimed the territory as their own.

Notes

1. I am grateful to Prof. Shimon Gibson for bringing Warren's account to my attention and to Felicity Cobbing, Executive and Curator of the PEF, for making it available to me.

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New Finds Dating from the British Mandate from the Tyropoeon Valley: the Givati Parking Lot Excavations near the Dung Gate

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In 2011, during excavations on the eastern slopes of the Tyropoeon Valley, in the modern Givati parking lot near the Dung Gate, a sewer pipe manufactured in Swadlincote, England, was exposed about 1.5 meters below ground. Other British finds from that period, such as ceramics, utensils and porcelain service sets were also found. These finds shed new light on the Tyropoeon Valley area south of the Temple Mount during the British mandate.

In November 2011 a new area of excavation was opened on the eastern slopes of the Tyropoeon Valley at the present Givati parking lot south of the Temple Mount (Fig. 1). Objects from the early twentieth century were uncovered directly beneath the asphalt laid down in the 1970s.

At the end of World War I, the area adjacent to the Ottoman city walls became a prohibited building zone from 1918 onwards (Kendall 1948:5–6). Later, the entire City of David was incorporated into the archaeological zone where any future construction or repair required a permit from the Director of Antiquities (Kendall 1948:28). From 1944, the whole area was also a part of the A-Tor-Silwan nature reserve (See Kendall 1948; the '1944 Scheme').

During the Ottoman period a large *bustan* (agricultural garden) occupied this area without much change until the second quarter of the 20th century. In our excavation several terrace walls with agricultural soil between them were discovered. Parallel to one of these walls, a brown-glazed clay sewer pipe was unearthed, (Figs. 2–3). One of these bears a stamped producer mark: 'T.Wragg & Sons Ltd, Swadlincote' (Fig. 4).

The town of Swadlincote in Derbyshire was known for its aluminum-rich clay deposits suitable for making salt glazed sewer pipes (AOC 2011:3.12–3.13). The producer, T.Wragg & Sons appears in Kelly's directory as early as 1881 as firebrick & drain pipe manufacturers. Over time they became one of the largest clay pipe companies in the area who exported their products all over the world.

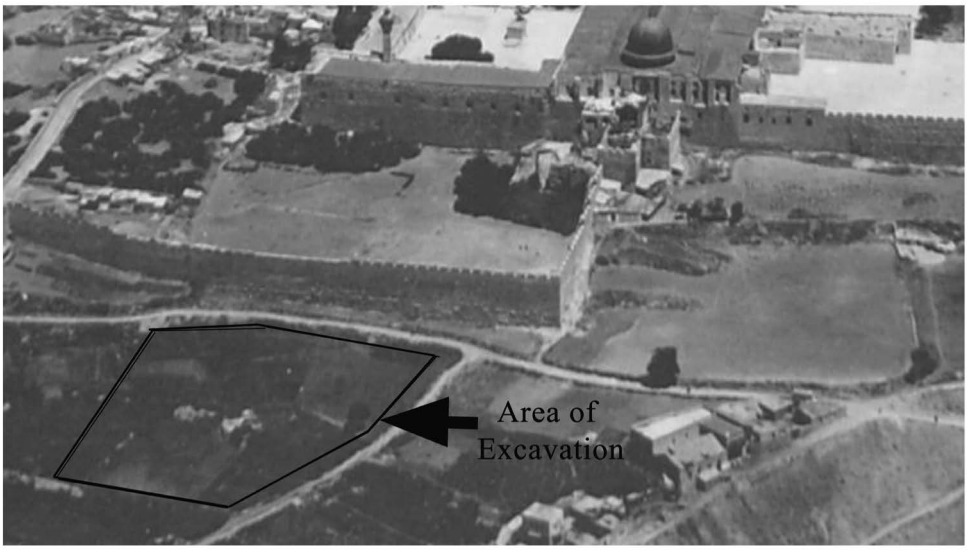


Fig. 1. An aerial view of the Temple Mount and the area of excavation. May 1936. (Courtesy of the IAA mandatory scientific archive: http://www.iaa-archives.org.il).

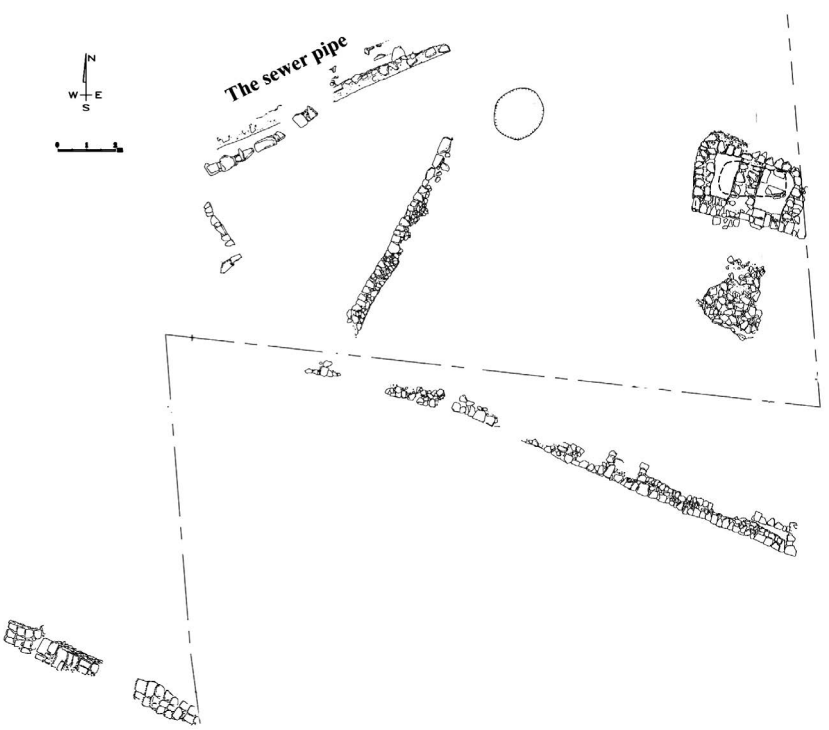


Fig. 2. Plan of the modern strata at the site (surveying by V. Asman and Y. Shmidov).

Fig. 3. One of the terrace walls and the sewer pipe running parallel to it (Givati excavations archive).

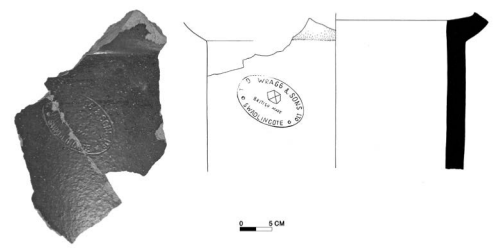


Fig. 4. The salt-glazed pipe fragment with T. Wragg & Sons producer mark (Photography: C. Amit, Drawing: E. Ruban).

Mr. Clyde Dissington of 'The Magic Attic', the local museum in Swadlincote, has kindly provided a short history of the manufacturer. According to him, in 1872 a Derbyshire local engineer developed a clay extrusion machine that greatly reduced the cost of pipe production and increased its quality. The first to recognise an opportunity and acquire these machines was Thomas Wragg, a brick manufacturer from Sheffield. Wragg purchased a few acres of land in Swadlincote, built sheds and kilns and installed his son John Downing Wragg as head of production. In 1875, when parliament strengthened the 1848 Sanitation

Fig. 5. T. Wragg & Sons advertisment (T. Wragg & Sons Advertising: May 1930).

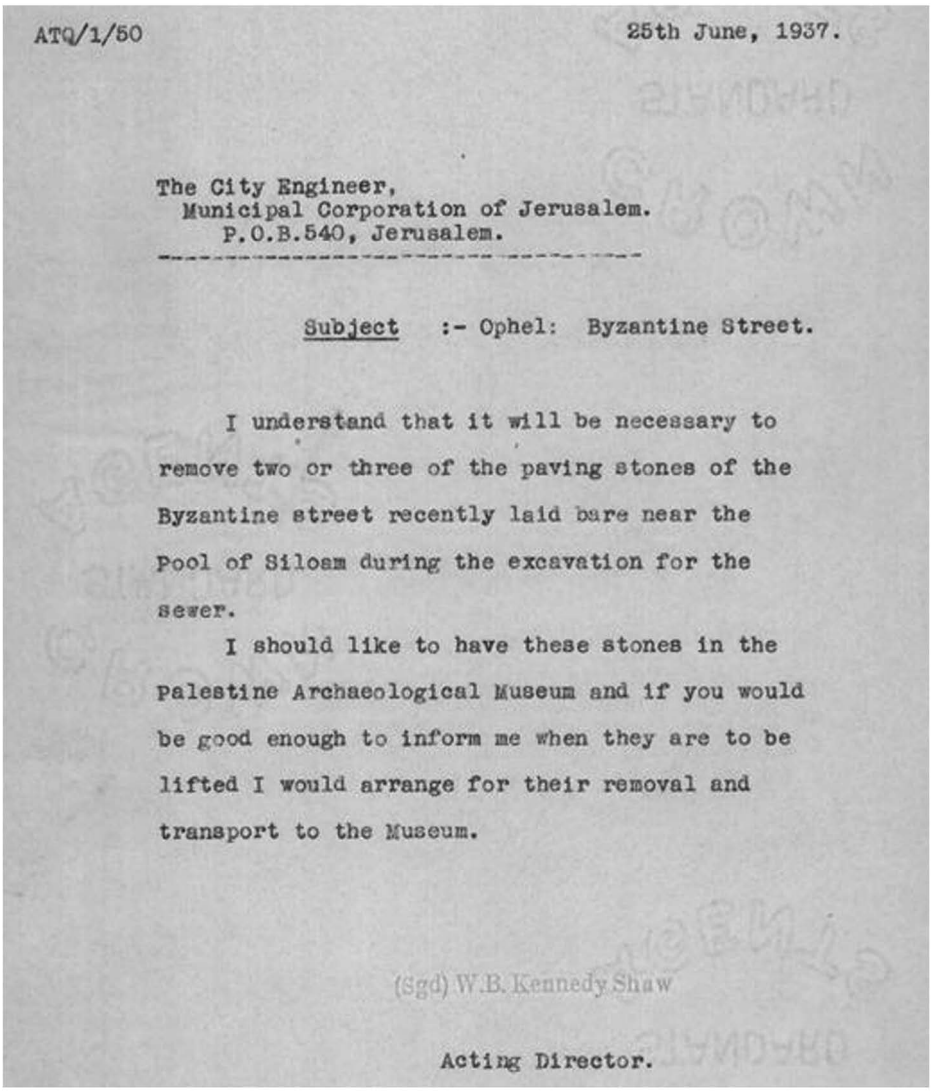
Act by making it compulsory, T. Wragg became the largest sanitary pipe maker in Swadlincote (Fig. 5). T. Wragg & Sons operated until the 1960's. In 1972/3, the company's works site and pipe yard (Fig. 6) were demolished.

Dissington suggested that the most probable date for the placement of these pipes in Jerusalem was between 1923 and 1945 when one of Thomas' sons, Sir Herbert Wragg was a Member of Parliament. To be more precise, archaeological excavation reports of the Mandatory Department of Antiquities point to the late 1930s. R.W. Hamilton and C.N. Johns both report archaeological shaft excavations inside the old city of Jerusalem in preparation for sinking new sewer pipes during the British Mandate (Hamilton 1932, 1933; Johns 1948–49:93, Fig.3). Yet Johns did not describe his own 1937 shaft excavation at the southern section of the Tyropoeon Valley outside the city walls, south of the modern Givati parking lot. This salvage excavation took place between 18 June and 3 July 1937, preparing the construction of manhole VI, part of the new main sewer tunnel serving the city. Notes, plans and photos from Johns' excavation were recently published by Reich and Shukron (Reich and Shukron 2009). Of particular interest is a paved street and sewer tunnel from

Fig. 6. Aerial view of T. Wragg & Sons works site in Swadlincote (courtesy of the Magic Attic Museum).

the Early Roman Period (inaccurately dated by Johns to the Late Roman Period; Reich and Shukron 2009: 44). During Reich and Shukron's recent excavation of another section of this Early Roman period sewer tunnel, they also encountered thick brown-glazed clay sewer pipes which according to the residents were laid during the British mandate (Shukron and Reich 2008: 138). These were certainly connected to the ones found by our team.

In the Israel Antiquities Authority archive (www.iaa-archives.org.il) there is a pertinent letter relating to the construction of this sewer line. On the 25th of June 1937, W.B. Kennedy Shaw, Director of Antiquities sent this letter to the City Engineer (Fig. 7). Shaw asked that paved stones from the Byzantine street excavated between the Ophel and Siloam pool, (those that had to be removed for the new sewer), ought to be sent to the Palestine Museum. Although Johns imprecisely dated the street to the Late Roman period, it is doubtful whether Shaw was referring to a different ancient street. We may conclude that both Johns' shaft excavation and the letter to the City Engineer from the Director of Antiquities point to the same infrastructure work and new sewer pipes placed in the City of David area in June 1937.



ATQ/1/50 25th June, 1937.

The City Engineer,
Municipal Corporation of Jerusalem.
P.O.B.540, Jerusalem.

Subject :- Ophel: Byzantine Street.

I understand that it will be necessary to remove two or three of the paving stones of the Byzantine street recently laid bare near the Pool of Siloam during the excavation for the sewer.

I should like to have these stones in the Palestine Archaeological Museum and if you would be good enough to inform me when they are to be lifted I would arrange for their removal and transport to the Museum.

(Sgd) W.B. Kennedy Shaw

Acting Director.

Fig. 7. A letter from W.B. Kennedy Shaw to the city engineer (courtesy of the IAA mandatory scientific archive: http://www.iaa-archives.org.il).

This British sewer pipe is not the only interesting find from British Mandate times found in the excavation of the parking lot. In the fills of a particularly late stratum other small finds included: shoe soles, food cans, horse-shoes, fragments of porcelain services, glass and objects made of bone fragments. In particular, two salt-glazed bottles are noteworthy (Fig. 8). Both had a Bourne-

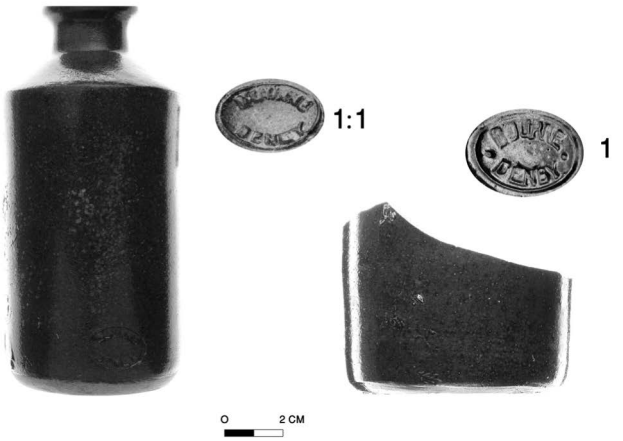


Fig. 8. Bourne-Denby salt-glazed bottles with the Bourne-Denby oval producer mark (photography: Clara Amit).

Fig. 9. Burgess & Leigh mug base with a 1916 production stamp (photography: Clara Amit).

Denby stamp, another renowned Derbyshire producer of ceramics. According to a certain Denby pottery representative whom we contacted, these oval marks were often stamped on bottles and containers for ale, ginger beer, ink and medicine. Based on the impression marks on the bottles, these two items were produced between 1901 and 1909. Since Bourne-Denby did not export to Jerusalem someone must have brought these two bottles from the UK.

Another object from a renowned British pottery producer was a porcelain mug whose base had a stamp from "Burgess & Leigh," the Burslem, Staffordshire pottery maker (Fig. 9). The stamp dates the production of this mug to 1916. The Burgess & Leigh (now Burleigh) factory still operates today from Stoke-on-Trent.

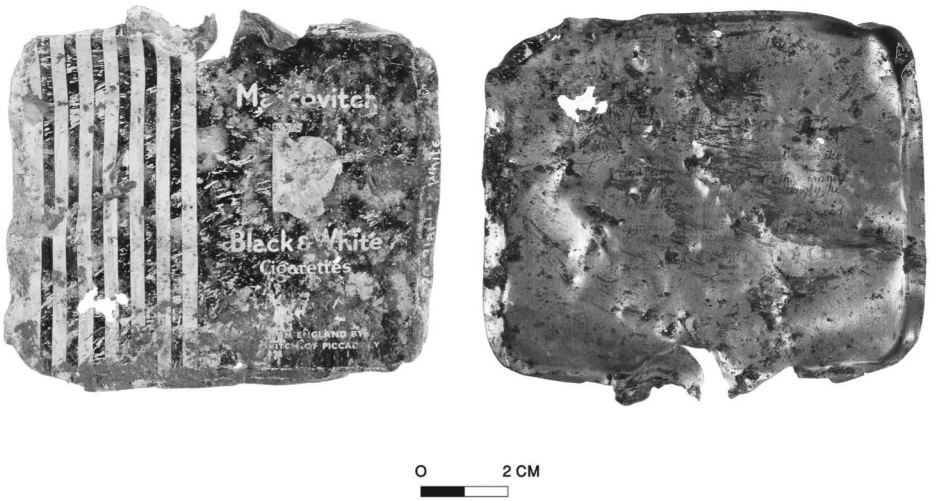


Fig. 10. Markovitch & Co. 'Black & White' cigarette tin cover (photography: Clara Amit).

Fig. 11. Markovitch & Co. 'Black & White' cigarette advertisement.

We also found a "Marcovitch Black & White" tin cigarette box cover (Fig. 10). On the top cover is the inscription: "Marcovitch Black & White Cigarettes made in England by Marcovitch of Piccadilly". Between the words 'Marcovitch' and 'Black & White' appears the company's logo of a man smoking. The inside of the tin cover tells the story of Marcovitch, and although it is barely visible we were able to reconstruct it using similar boxes from collectors' websites:

> Over 100 years ago Mr. Marcovitch commenced to make cigarettes in London. He made them for the manly dandies of his day and fittingly he made them good. To-day we still make only good cigarettes; the name of Marcovitch on a cigarette means quality in it. Marcovitch & Co. established over 100 years in Piccadilly, London

This inscription helps us date the tin cover to post 1934, as according to their advertisements it was established in Piccadilly one hundred years before, in 1834 (Fig. 11).

Conclusion

These finds from Givati parking lot near the Dung Gate, although not considered archaeological artifacts owing to their young age, afford information on the latest stage in the sequence of the site's archaeological strata. The discovery of the impressed sewer pipe provides us with a chance to investigate a period rarely touched by archaeologists. These finds attest to British Mandate policy by which the urban infrastructure was modernized while preserving antiquities. In addition, the small finds afford a glimpse into the circulation of British items in Jerusalem in the first half of the 20th century.

Notes

1. The salvage excavations in Givati parking lot were carried out on behalf of the Israel Antiquities Authority with the financial support of Elad Association. We wish to thank the excavation managers, Dr. D. Ben-Ami and Ms. Y. Tchekhanovets for their support during the writing of this study and our colleagues, the field managers at the site. We would also like to extend our gratitude to Mr. C. Dissington and Mr. K. Foster of the Magic Attic Museum in Swadlincote, Denby-Bourne customer support representatives and Ms. C. Amit for the photography of finds.

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Book Reviews

Yohanan Aharoni, Michael Avi-Yonah, Anson Rainey, Ze'ev Safrai and R. Steven Notley (eds.), *The Carta Bible Atlas*. Fifth Edition Expanded and Revised, 2011. Carta: Jerusalem. Pp. 232 pages + 40 new maps. $50. ISBN: 978–965–220–814–9.

What began life as *The Macmillan Bible Atlas*, edited by Yohanan Aharoni and Michael Avi-Yonah in 1968, has now reached this fifth revised and expanded edition, undertaken by Anson F. Rainey and R. Steven Notley. The change of name to *The Carta Bible Atlas* came with the fourth edition. (2002). Those who believe that an atlas should be primarily a collection of maps will welcome the addition of 40 new ones in this edition. In particular, maps reflecting extra-biblical episodes have been added with the aim of 'placing the biblical events in a solid framework of Near Eastern culture' (Preface to the fifth edition). Its chronological range has been extended by the addition of what the Preface rather grandly calls a 'chapter' (actually a single page) on the *Onomasticon* of Eusebius.

The latest edition continues the approach of its predecessors in concentrating heavily on the provision of maps, the majority of which aim to illustrate quite specific events although some are more general, with information about such things as geographical regions, mountains and rivers, and economy. There is a view that the provision of maps, particularly those which mark routes, battles, campaigns etc. can convey an unwarranted sense of confidence in the historicity of what is being mapped. This is, if course, not a necessary conclusion: works of fiction can be set in 'real' places or maps can be drawn of fictional settings. But there can be a cumulative effect and the reader of a volume such as this can be left with the overriding impression that most events happened as recorded in the biblical or other sources and that they can be mapped. The dust jacket speaks of a 'sweeping cartographic portrayal of biblical history' and the emphasis does indeed appear to be on history.

The Preface does add an important note of caution, pointing out that some sites are uncertain, and that boundaries, and particularly the routes of campaigns and journeys, are often conjectural. But it may be necessary to go further than this. On the map of 'The Exodus and Wandering in the Wilderness' (p.50) the traditional southern route is indicated, whereas in

the 1968 atlas a northerly route was shown, demonstrating that there has been uncertainty as to *where* it happened. However the more fundamental question 'Did it happen at all?' is not asked, implying that any uncertainly is geographical rather than historical. The juxtaposing in a single map of 'The Birth of Jesus and the Flight into Egypt' (p.173) could imply that the two events are equally likely to be historical; but in the case of the Flight to Egypt it is not just a question of the possible route but of *whether* it happened or (some would say more importantly) *why* the story was told. This is not to deny that the biblical writers had a keen geographical interest and placed their stories in geographical settings. Many of the maps are accompanied by references to biblical passage or other sources, underlining the links between text and geographical situation.

In addition to maps and accompanying text, many atlases include pictures, often now in colour. By contrast, *The Carta Bible Atlas* is not quite monochrome but is black, white and green throughout, apart from the impressive photograph of some of the Qumran Caves on the dust jacket! Opinions differ as to whether or not atlases should include photographs of 'biblical' lands and locations. On the one hand things may have changed significantly with the passage of two or three millennia, but on the other hand it may be possible to convey something of the lie of the land, and of such things as flora and fauna, to those who have never visited the region. *The Carta Bible Atlas* does not, on the whole, include pictures of places. It does however include numerous illustrations, predominantly line drawings but with occasional photographs, particularly of artefacts or inscriptions, many of which were present in the first edition. It has to be said that the quality of some of these is not good, some of the captions are rather minimal, and occasionally the positioning of a picture is strange. The object depicted on p.77 may well be a 'Philistine sword', but without an indication of its size or its provenance it is difficult to tell! The picture of an Execration Text from Sakkara is now next to a map whose source is given as Texts from the Mari Archives (p.27) and the relief of a fortified city from the palace of Asshurnasirpal II at Calah accompanies a map of the Campaign of Pharaoh Shishak (p.96).

There is undoubtedly a great wealth of material in the volume for the reader seeking to understand the Bible in the context of the ancient world, as is to be expected from the expertise of the contributors. But the atlas needs to be used bearing in mind some of these cautionary points about the importance of not confusing history and geography, and remembering that the Bible is above all theology.

Adrian Curtis
University of Manchester

Avraham Faust, *Judah in the Neo-Babylonian Period: The Archaeology of Desolation.* Archaeology and Biblical Studies, 18. Atlanta: Society of Biblical Literature, 2012. Pp. xiv + 302. $35.95. ISBN 978–1–58983–640–2.

Avraham Faust, Professor of Archaeology at Bar-Ilan University, here puts into book form his assessment of the debate about 'the myth of the empty land', which was initiated in the 1990s by biblical scholars such as Hans Barstad. Faust has been contributing to the debate in articles for several years and his title already makes clear that, over against Barstad and the archaeologist Oded Lipschits, he maintains that the archaeological evidence relating to the 6th century BCE indicates that the territory of Judah was, if not empty (which no leading scholar has actually asserted), then certainly 'desolate': there can be no question of life in Judah having continued as it had been before the Babylonian invasions.

After introducing the debate Faust develops his argument in a well planned series of chapters. The first re-examines the evidence from urban sites and confirms the generally accepted view that they were destroyed or abandoned in the late 7th or early 6th century, with some exceptions in the Benjaminite tribal area to which he returns later. The situation in the rural settlements (Ch. 2) is more controversial because of the difficulty in distinguishing 6th-century pottery from that of earlier periods and much of the evidence comes from surveys rather than excavations. To get round this problem Faust has proposed a method which infers that rural sites that were occupied both at the end of Iron Age II and in the Persian period were most probably also occupied in the period of Babylonian rule. Although the method is if anything biased in favour of continuity of occupation, the results are meagre, suggesting 6th-century occupation at only about 15% of sites occupied earlier and later. Another valuable indicator of occupation would be the presence of contemporary imported Greek pottery (Ch. 3), but this is almost completely absent. The next two chapters, on social and cultural change and demography, broaden the discussion to include a wider period and draw attention to major changes which Faust attributes to the effects of the Babylonian invasions. Traditional Judahite tombs and 'four-room' houses quickly disappear, the structure of kinship groups changes and (probably less relevant) there are new linguistic and cosmological developments. Even in the Persian period the number of settlements and the size of the population remained well below those of the Iron Age and this was probably a period of slow recovery after a much worse decline earlier, perhaps by as much as 90%. This need not be due entirely to deportation into exile, for other results of war would also have contributed. In Ch. 6 Faust argues that the effects of Nebuchadnezzar's invasions were far greater than those of Sennacherib's a century earlier, which were bad enough. Further comparisons are made in Ch. 7 with examples of 'post-collapse' societies elsewhere, to answer claims that such

massive devastation of the land is intrinsically improbable and would have been against the interests of the Babylonian rulers.

In turning his attention more directly to the presentation of the opposite 'continuity' view (Ch. 8) Faust points out that its proponents created a 'straw man' which it was easy for them to overturn. None of the previous generation of scholars (including W.F. Albright), as quotations show, had believed that the land became 'empty' after 586 or that exile was the only cause of depopulation. In addition the claim that the Babylonians simply continued the old system of provincial administration lacks evidence, except for the short-lived episode of Gedaliah. The land of Benjamin (Ch. 9) is often cited as a special case where urban life continued but Faust points out that even the evidence for this is shakier than many suppose and needs fresh examination. In Ch. 10 he sets out his own view of what life was like in 6th-century Judah, on the basis of excavated remains at sites such as Tel Batash and Khirbet Abu et-Twein. It is a bleak picture, with a population only in the thousands scattered across the land, with perhaps 15% of older villages still occupied. Others lived among the ruins, practising subsistence agriculture and without any evidence of continuation of the specialised production of wine or oil. In such circumstances changes like those described in Ch. 4 were entirely likely. A final chapter summarises the argument and points to some wider implications.

As a whole the book, which is very up-to-date and furnished with countless references and many footnotes which pursue the debate into detail, is a much better defence of the 'traditional' view of the period than those which have appeared before. Uncertainties of course remain and it is always possible that future discoveries could change the picture. But it seems unlikely that this will happen: the marshalling of several different kinds of argument greatly strengthens the case that is being made.

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University of Cambridge

Yardenna Alexandre, with contributions by Guy Bar-Oz, Ariel Berman and Noa Raban-Gerstel, *Mary's Well, Nazareth: The Late Hellenistic to the Ottoman Periods.* Jerusalem: Israel Antiquities Authority, 2012. Pp vii + 169 incl. illustrations, maps and plans. $30. ISBN: 9654062836; 9789654062831.

The idea of excavating a site which is associated with a well-known religious traditional relic site is a daunting undertaking especially when the public report may be scrutinized by the general public as well as by the academic community.

Yardenna Alexandre (YA, for short in this article) of the Israel Antiquities Authority was assigned in 1997–1998 to excavate the Mary's Well complex in Nazareth, Israel as part of the Nazareth municipality's plan to demolish the 1960s modern concrete well-house and to rebuild the 1860s stone well-house. Her long-awaited report appeared in April, 2012. It is a masterful multi-specialty archaeological report which answers many of the questions that have emerged in the past ten years about Nazareth in general and Mary's Well in particular. The 'Mary' of Mary's Well is, of course, the mother of Jesus of Nazareth and one of the central figures of Christianity and of Christian veneration, and the well became associated with one of the non-canonical Christian accounts associated with the announcement of the birth of Jesus by the well.

The whole issue of Nazareth's existence in the pre-Byzantine period is the subject of much interest in the past decade with controversies between archaeologists and literary text scholars (and denominational religious scholars) aligning themselves on two sides (and sometimes extremes) of the argument. One extreme view contends that there was 'no Nazareth' in the period of Jesus and another claims that there was a Nazareth in the period of Jesus; but this was based upon scant systematic archaeological evidence until Alexandre's publication. While Alexandre's publication includes extensive information about Nazareth in the Crusader, Mamluk and Ottoman periods the publication is also an important corrective to many of the speculative pieces that have been written about Byzantine, Roman and the Hellenistic periods in Nazareth and Galilee in general.

Based upon the extensive Hellenistic and Roman remains exposed at nearby Sepphoris and on the absence of literary accounts of Nazareth from before the first century CE (and even in first century CE writers such as Josephus Flavius, for example) some scholars began to conjecture that Nazareth was not a town or even a village in the Roman period. Based upon other excavations in the area, however, most scholars have continued to hold that there was sufficient evidence to hold that Nazareth was a settlement in the first century CE. The question has been: "What type of settlement?" There are no references to Nazareth in any literature or inscriptions prior to the NT, but there is a fourth century CE inscription that mentions Nazareth as a Jewish town in Galilee where priests settled, possibly in the late first century CE after the destruction of the Temple (M. Avi-Yonah 1962). Among many other Byzantine-era writings there is also a rabbinic source that holds that Nazareth was a priestly city. (Midrash Ecclesiastes 2.8) The fact that the NT genealogies give Jesus a priestly family background creates a new area for research by both textual and archaeological investigators in the Nazareth story: Nazareth as a small separate Jewish (priestly) settlement (perhaps of expats from Judea) which is set at a distance from the Romanized city of Sepphoris on purpose. A small priestly

settlement centered around the Mary's Well might have inevitably wanted to distance itself from the more "Roman" city of Sepphoris to allow for more regular water purification rituals(even though there are *mikvaot* at Sepphoris as well) at the same time that they are employed.

YA has clear pottery and coin evidence (Chapter 5, "The Numismatic Evidence" Ariel Berman) that points to a settlement in her Stratum V – the Late Hellenistic and Roman periods. There is sufficient pottery (a healthy representation of kraters, bowls, cooking pots and storage jars from Late Hellenistic-Roman periods) and coins (18 from the Late Hellenistic and Roman period) to make the statement that there was a settlement based upon this array of material culture in the Well. The evidence of Kefar Hananyah and Shikhin ware pottery forms and the Herodian knife-pared lamp indicate that "the population of Nazareth was Jewish and had Judean connections" (YA, p. 153) and that "it seems probable that a church was erected above the spring at some time in the Byzantine period " (YA, p. 154).

What is wonderful about this well-produced publication is that it included literary and early illustrations and photographs in her work (YA, Chapter 8) and alludes to the implications of the controversy in her conclusions with a new 'middle path'. Concerning the existence of Roman Nazareth YA writes: "The archaeological evidence at the fountain reflects continuous activity and occupation in the Roman period." (YA, p. 153). Regarding the Byzantine period, YA writes: "It seems probable that a church was erected above the spring at some time in the Byzantine period" (YA, p. 154).

If there is one suggestion that might be made about this work it is to add a petrographic study to the pottery finds. Up until the present time, neutron activation and simple petrographic and petrological analysis of the pottery were available to establish the original provenance of the pottery. The vessels could also simply be thin-sectioned for petrographic analysis which would add to our knowledge of the provenance of the pottery. This type of study, for example, would test the pottery source of the Kefar Hananya ware to see if it is indeed from Kefar Hananya, and the Herodian lamp to see whether it came from the Jerusalem area, and would compare the data with the results of other excavations where these examinations have been carried out. This would help settle on-going arguments about provenance, possibly having repercussions on ethnic identifications. The newest form of analysis 'Inductively coupled plasma atomic emission spectroscopy' (for short: ICP-AES), a chemical characterization of pottery, could be also be used to identify the specific chemical provenancing of the pottery and to tell whether indeed the pottery is from a Judean source or from a source associated with Jewish settlements.

The volume moves seamlessly from the architectural evidence to the pottery, glass and faunal evidence of the Crusader, Mamluk and Ottoman periods, the work

thus adding immeasurably to the body of knowledge on the Crusader and Mamluk periods. YA writes: "The Nazareth Crusader fountain house would thus be one of the earliest Crusader edifices in the Holy Land" (YA, p. 155).

The most important corroborative evidence for our own excavations at the Nazareth bathhouse and in the bathhouse cisterns near the Mary's Well complex are the Mamluk period bathhouse glass windowpane finds (Stratum II of YA) that parallel Mamluk bathhouse windows well-known elsewhere (YA, p. 100). For the past decade we have been working on the bathhouse some 15 meters from the public well-house (and some areas of the bathhouse may have been even closer in the Mamluk period). To date our conclusion has been that the Ottoman period hammam that was re-built (rather than originally built) by the Kawar family in the 19th century was built upon an earlier bathhouse dating at least from the Mamluk period, based (among other items) on C-14 retrieved from just below the present bathhouse floor. Based on our extensive geophysics work there, our hypothesis, however, is that the Mamluk period bathhouse may have been built upon an even earlier bathhouse; just as the Ottoman period bathhouse was built on the Mamluk period bathhouse.

The YA publication of Mary's Well joins the increasing body of publications on the Roman and Byzantine periods in the area of Nazareth by K. Dark, B. Bagatti, S. Pfann, alongside the work produced by those working on burial caves nearby Mary's Well. How big the settlement was in the Late Hellenistic and Roman period, how Jewish, and what the fate of this settlement was in the Byzantine period and Islamic periods remains to be seen. The existence of Mary's Well as the major water source of Nazareth may have assured that this settlement would be occupied during many periods, whilst geological and political forces may have played a role in determining periods of greater and lesser population in and near the village.

The information in this report will give future excavators another piece of the puzzle for understanding ancient Nazareth. The report was worth waiting for.

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Mayer Gruber, Shmuel Aḥituv, Gunnar Lehmann, and Zipora Talshir (eds), *All the Wisdom of the East: Studies in Near Eastern Archaeology and History in Honor of Eliezer D. Oren*. OBO 255. Fribourg: Academic Press; Göttingen: Vandenhoeck & Ruprecht, 2012. Pp. xxvii + 475 (Eng.) + 85 (Heb.). ISBN 978–3–7278–1719–9 (Academic); 978–3–7278–1719–9 (Vandenhoeck).

This is essentially a study on archaeology in honour of an archaeologist known for his survey of northern Sinai, his excavations at Tel Sera' and Tel Haror, and his

archaeological work in the Gaza Strip, among other work. Even those contributions that bring in textual material mostly still have an archaeological perspective. It has 22 contributions in English, 1 in German, and 5 in Hebrew (with English abstracts), along with an appreciation of the honoree in both English and Hebrew and a list of his publications. The English essays are the following:

Michael Artzy and Svetlana Zagorski, "Cypriot 'Mycenaean' IIIB Imported to the Levant" show that some ceramics from Tel Akko designated as "Mycenaean" have been shown by Neutron Activation Analysis and other techniques to have originated in Cyprus. Cyprus production of Mycenaean-type pottery began in the 13th century.

David A. Aston, "Cypriot Pottery and its Imitations from Hebwa IV" gives a survey of the Cypriot (and imitation) ceramics found in the tombs of the rescue excavations in the mid-1990s. (Tell Hebwa was one of the way stations in the "Ways of Horus" established in the reign of Tuthmosis III). Twenty-seven pieces are described, along with a presentation of the other pottery found in the tombs for context.

Rachel Ben-Dov "The Mycenaean Pottery from the Occupation Levels at Tel Dan" describes an assemblage of Late Bronze ceramic fragments (from a variety of vessel types) of Aegean origin from stratum VII occupation levels. The Mycenaean pottery is from Argolid Greece, while the few Mycenaean-style fragments come from the Lebanese coast north of Tyre. Tel Dan was at the junction of major trade routes, and Argolid Greece exported Mycenaean pottery to Cyprus and the Near East as luxury items at this time.

Daphna Ben-Tor and Othmar Keel "The Beth-Shean Level IX-Group: A Local Scarab Workshop of the Late Bronze Age I" return to a group of seals already noted by Keel. These appear to be imitations of individual Egyptian scarabs (thus differing from Middle Bronze Canaanite scarabs), and probably from a single workshop operating after Tuthmosis III had conquered Beth-Shean. These seals were found in a temple context, perhaps of a combined Egyptian-Canaanite cult; in any case, they argue for Egyptian-Canaanite technological cooperation.

Manfred Bietak and Karin Kopetzky "The Egyptian Pottery of the Second Intermediate Period from Northern Sinai and its Chronological Significance" comment on pottery from the Middle Kingdom and the New Kingdom in Oren's north Sinai survey, with regard to its implications for the land route across the northern Sinai to Palestine. The Middle Bronze pottery indicates that the trade between Egypt and southern Palestine was not conducted by Egyptians. After a gap, the trade along this land route was resumed at the end of Hyksos rule or the beginning of the 18th Dynasty, despite the fact that the Hyksos preferred trade by sea.

Ruhama Bonfil "Did Thutmose III's Troops Encounter Megiddo X?" discusses the archaeology of Megiddo, arguing that the structures of stratum IX are completely new, built according to new town planning. This is matched

by a change in pottery. Thus Tuthmosis III destroyed Megiddo X (not IX), with the aim of maintaining the local inhabitants' loyalty to their Canaanite rulers (who were clients of the Egyptians): he divided Canaan into several administrative centres with a minimum of military supervision. The beginning of Late Bronze I material culture is to be associated with Tuthmosis' conquest, not the start of the 18th Dynasty.

Annie Caubet "A Matter of Strategy, Taste or Choice? Glazed Clay versus Siliceous Faience" notes how the technology of glazing clay vessels and bricks developed at the end of the Late Bronze, though not used in Egypt which excelled in siliceous faience. However, glazed tableware was found mainly east of the Euphrates, while Greek style vernis ware and "Egyptianizing" faience figurines and amulets prevailed west of the River. It seems that local tradition, habit, and taste were the determining factors rather than economics or technological knowledge.

Lilly Gershuny "Zoomorphic Protomes in the Middle Bronze Age: An Innovation of the Period?" reports on a group of five vessels (related to those fashioned as complete animals or animal heads) that first appear in Canaan in the Middle Bronze. They are locally produced, showing that local potters had learned the new techniques. They all function as rhytons, with the liquid always poured out from the perforated animal's snout. She argues that these were used in drinking or libation ceremonies rather than daily life.

Victor Avigdor Hurowitz "The Return of the Ark [1 Samuel 6] and Impetrated Ox Omens [STT 73:100–140]" looks at the account of the return of the ark by the Philistines, with special concern for the actions of the cows who carried the ark to the Israelites (even though their calves were kept behind). The incantation text from Sultantepe also talks about divination by observing the behaviour of cattle. The parallel is impressive in that the two examples seem to be unique.

Kenneth. A. Kitchen "'Roy of the Rovers': An Egyptian Warrior in 2nd-Millennium Phoenicia?" discusses a hieroglyphic inscription on a bronze spear point from the Middle or Late Bronze, which he reads as RYNRHR and suggests means "Roy of Ro-Har" (Ro-Har being interpreted as a place name). The author discusses the possible place of origin and profession of "Roy", but considering that the object seems to be unprovenanced, the location of its owner in the Levant and his date in the period 1550–1400 BCE is all very speculative. As Kitchen admits, we do not even know whether the point or its inscription are genuine (interestingly, he does not seem to have seen the object itself, only photographs).

Maria Kostoula and Joseph Maran "A Group of Animal-Headed Faience Vessels from Tiryns" interpret faience fragments found in recent excavations at Tiryns in the Pelopponesus as parts of one or more head-shaped vessels, the first of a rare group of ceramics dating to the 14th and 13th centuries BCE. At least one vessel shows the head of a monkey or perhaps the demon Humbaba/Huwawa. Near

Eastern head-shaped cups are known but not previously in the Aegean. The vessel is a rhyton, interpreted as being used for ritual purposes, and probably produced locally (perhaps by foreign specialists) rather than imported.

Jodi Magness "Archaeologically Invisible Burials in Late Second Temple Period Judea" discusses burial practices at the end of the Second Temple period. Rock-cut tombs are easy to find and have been extensively studied, but they were evidently used only by the wealthy. Other types of burial (in the ground) seem to have been common for ordinary people, but although leaving less in the way of visible remains, they are attested in literature and have been found archaeologically in a few cases (e.g., at Qumran).

Aren M. Maeir, Itzik Shai, Joe Uziel, Yuval Gadot, and Jeffrey R. Chadwick "A Late Bronze Biconical Jug with a Depiction of a Scorpion from Tell es-Safi/Gath, Israel" focus on just one of the rich assortment of finds from the large Building 66323, destroyed in the late 13th century. The jug fragment contains a striking image of a scorpion depicted in some detail, though the decoration is done in a somewhat careless manner and probably produced locally. The scorpion is relatively well-known in Late Bronze Levant, and is here probably a fertility motif.

Pierre de Miroschedji "Egypt and Southern Canaan in the Third millennium BCE: Uni's Asiatic Campaigns Revisited" has a long article interpreting the autobiographical narrative of Uni, governor of Upper Egypt at the beginning of the 6th Dynasty (c. 2300 BCE), for historical purposes. He argues that Uni campaigned against the Canaanite inhabitants of what later came to be the Philistine coast, probably because they were interrupting the Egyptian sea trade with Byblos. The Egyptians were only trying to control piracy against their vessels, since they did not attempt to dominate this region until much later (under the 18th Dynasty).

Lorenzo Nigro "The Temple of the Kothon at Motya, Sicily: Phoenician Religious Architecture from the Levant to the West" interprets the history of the temple (C1-C2) by the basin considered a "kothon" (inner harbour). The temple (C5) was founded in the 8th century and destroyed in the middle of the 6th. Temple C1was constructed according to the "Four Room Building" (or "tripartite") schema and lasted to the beginning decades of the 5th century. It was then rebuilt as C2 with some changes and lasted until its destruction by Dionysius of Syracuse in 397 BCE. At that point, the cultic ruins were dismantled and collected into an open sanctuary (C3).

Bezalel Porten and Ada Yardeni "Dating by Grouping in the Idumean Ostraca--The Intersection of Dossiers: Commodities and Persons" publish the second of two articles that need to be read together (the first in *Eretz Israel* 29 [2009] 144*-83*). They concern the data from commodity chits, some of which fall into dossiers. The authors are able to gather data not only on prices and dates but also on the relations

between individuals named in the chits who interact with one another on a regular basis over a number of years. This information is recounted in a narrative (though technically detailed) section in the first part of the article but then given in tables in the last part. The authors are preparing a three-volume collection of these texts, less than half of which have yet been published.

Kay Prag "Footbaths: Secular, Ritual and Symbolic" gives a survey of 26 fragments of the so-called "footbaths." Some think they are braziers or hearths. They are often associated with gateways, which could suggest a ritual function, but they could also be for washing the feet of officals or messengers: "None of the evidence is conclusive" (p. 369).

Anthony J. Spalinger "Divisions in Monumental Texts and their Images: The Issue of Kadesh and Megiddo" seeks to interpret the inscriptions of Ramesses II's battle at Kadesh. Drawing on Tuthmosis III's capture of Megiddo, he argues that the poem gives a connected "official" account of the campaign, based on military daybooks kept during the attack. The bulletin is a type of *Königsnovelle* that dramatically highlights one episode only, Ramesses' conference with his military staff. In some cases there are pictorial representations but these reveal the common pharaoh as hero in battle and the Poem and Bulletin were often copied without the pictorial reliefs.

Varda Sussman "Oil Lamps of the Early Roman Period Decorated with Patterns Copied from Funerary Art, Phoenician Wall Paintings and Sculptured Sarcophagi" describes four mould-made lamps of Phoenician origin. Two of the lamps are identical and the two others differ from them and each other typologically. One has two human figures of uncertain identity on either side of the lamp's shoulder. All the lamps represent scenes inspired by tomb wall paintings and sarcophagi (alternatively, all were copied from a Roman source decorated with Erotes/Cupids). The lamps date from the mid-2nd century CE and were intended to be placed in burials.

Herbert Verreth "The Ethnic Diversity of the Northern Sinai from the 7th Century BCE until the 7th Century CE" sketches the broad picture of ethnic distribution. An article on the internet gives archaeological and written sources (www.trismegistos.org/sinai/). The Egyptian influence over the whole area was firmly established in the Ptolemaic period. Yet only a few toponyms and personal names show an Egyptian background, and there are only a few Egyptian inscriptions. This is because fortresses of the region were often manned by foreign mercenaries: Greeks, Phoenicians, and others. Most of the toponyms are Greek. We know from Jeremiah there were Jews in Magdolos. The Arabs roamed over the whole area, and the Nabataeans bordered Egypt. Some temples and shrines have been identified but not necessarily the gods associated with them. The Christians had a definite presence in the later part of the period.

Samuel R. Wolff and Celia J. Bergoffen "Cypriot Pottery from MB IIA Loci at Tel Megadim" catalogue the Cypriot pottery found in the salvage excavation. This establishes the presence of Cypriot pottery in Canaan already in the MB IIA (previously well attested only for MB IIB-C), suggesting a more significant coastal distribution for this period than previously thought. None has been found in the earliest layers of MB IIA, but these sherds are from the later MB IIA. In the so-called "Byblos run", Cypriot cargo was landed at a Levantine port (e.g. Ugarit), and was then carried by Levantine coasting vessels to ports further south on their way to Egypt. This would suggest that Tel Megadim was founded as a part of this international network.

Jak Yakar "The Nature of Symbolism in the Prehistoric Art of Anatolia" argues that the cosmic world order envisaged by prehistoric farmers was not essentially different from that of hunter-gatherers. He bases it on iconographic assemblages from Göbekli Tepe and other sites. The megalithic sanctuary near Göbekli Tepe seems to symbolize communication with mythical ancestors or forces of nature. Interestingly, the figures seem to be mostly male. Snake and bird motifs also seem to be links with the supernatural world. Animism appears to be at the core of their religious beliefs.

The German essay by Wolfgang Zwickel concerns famines in the southern Levant from the 14th century BCE to the 1st CE "Hungersnöte in der südlichen Levante vom 14. Jh. v. Chr. bis zum 1. Jh. n. Chr." He argues for four major periods of famine, based on the height of the Dead Sea, as well as literary accounts: beginning of the last third of the 14th century; conclusion of the 13th century, with a high point c. 1208/1205 BCE; second quarter of the 9th century (between 870 and 852 BCE), and between 445 and 433 (at the time of Nehemiah). Those in the second millennium BCE were the most severe. Other famines known in literature were of short duration and limited effect, while some are unsupported by scientific or other data and thus unlikely (e.g., Acts 11:28).

The essays in Hebrew are the following:

Einat Ambar-Armon and Amos Kloner "Hellenistic Oil Lamps from Maresha Decorated with Figures" describe a group of oil lamps that are shaped either as heads or complete figures (Plastic Lamps) or have decorations in specific areas. Because found in a stratigraphic context, they help to establish oil lamp chronology and typology as well as their distribution and the workshops producing them. The influence of the Hellenistic tradition on their creation is quite evident.

David Gal "The Process of Urbanization in the Northwestern Negev during the MBIII Period: Social and Economic Aspects" notes that the region would probably

support no more than 800 families which means that the volume of earthworks would have required help from elsewhere, such as the Delta. The "Malthusian model" can be used to explain the collapse of the settlement system in the mountain region, but providing a population for the Negev settlements. The "shifting frontier" model helps explain the creation of urban settlements in the frontier region of the Delta. The economy was founded on winter crops and herding. The circumstantial evidence points to the Delta Kingdom's contribution to the urbanization of the Northwestern Negev.

Itamar Singer "The First Treaty Between Hatti and Egypt" writes about the very first treaty (a treaty violated by Šuppiluliuma I). People from the Anatolian city of Kuruštama were transferred to Egypt, perhaps as professional soldiers. This treaty was probably made between Tuthaliya I and Amenophis II about 1417 BCE.

Ephraim Stern "Decorated Phoenician Finds from Israel" discusses four ivories decorated with Phoenician motifs: a rectangular spoon from the Assyrian period, an ivory plaque (from the time of the monarchies of Israel and Judah) with a praying figure in an Egyptian garment, a plaque showing a bearded king from the Persian period, and a stone chalice with the Phoenician motif of the Tree of Life with two sphinxes from the late Iron Age.

Oded Tammuz "The 'Shipyard Journal' and the 'Customs Account': An Investigation of the Nature of the Documents, of their Journey and its Circumstances and of the Benefits of Forgotten Lines of Inquiry" examines the preserved remains of two documents from ancient Egypt, the "Memphis Shipyard Journal" from Saqara and the "Custom's Account" from Elephantine. The former originated in a storage depot for small boats and harpoons established by the local Persian rulers, perhaps to hunt hippopotamus. The latter was an annual report by Egyptians who worked in a customs house. Both documents were kept in Memphis archives that were pillaged in a revolt against Persian rule in 463/462 BCE. One or both were salvaged as reusable for writing material; hence, the "Customs Account" became a palimsest for the *Wisdom of Ahiqar* far away in Elephantine.

This is a wide-ranging collection, with many insights from archaeology but also from documents and literature. It is excellently illustrated. For biblical scholars, the many contributions on the Middle Bronze Age and earlier may be of less interest but there is much from the "biblical period", especially the Late Bronze but also later. A worthy tribute to Professor Oren.

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Meir and Edith Lubetski (eds.), *New Inscriptions and Seals Relating to the Biblical World.* Society of Biblical Literature Archaeology and Biblical Studies 19. SBL: Atlanta, 2012. Pp. 313. $39.95. ISBN: 1589835565.

This volume is devoted to the study of items in the well-known antiquities collection of Dr Shlomo Moussaieff. It is a follow-up to an earlier volume, *New Seals and Inscriptions, Hebrew, Idumean and Cuneiform* edited by Meir Lubetski (Sheffield Phoenix Press, 2007).

The Foreword to the present volume by Lubetski tackles head-on the subject of artefacts obtained on the antiquities market. His discussion of the issues involved gives a fair and cautious hearing to both sides of the argument, though it principally concerns itself with the problem of collections being taken in by unprovenanced fakes. Such items should not be excluded from our field of vision unless there is clear evidence of forgery but I would have limited sympathy with a purchaser who *was* taken in since much of the trade in such pieces rests on dubious foundations.

And Lubetski sets aside some other aspects of the problem, such as the fact that the market in unprovenanced artifacts encourages wanton damage to archaeological sites as is happening extensively in present-day Syria. In the nineteenth and early twentieth centuries antiquities laws were extremely weak where they even existed; they are today much stronger, if not always enforced. But setting aside the legal question, there are also academic, ethical and moral issues.

The academic problem with this kind of artifact is that it has no clear archaeological or sometimes even topographical context (sometimes the place of origin is obscured by dealers who do not want the item to fall under the scrutiny of relevant authorities). The item is, as a result, diminished in its potential for throwing light upon the past. This diminution varies considerably from piece to piece. Common artifacts collected on the surface, such as fragments of pottery, may not be much diminished because they were of little intrinsic archaeological value even when they were picked up. By contrast a unique and very impressive object might be of little use as a guide to anything about the past if it has no archaeological context. The exceptionally fine statue, if it is unprovenanced and undated, is unlikely to tell us anything, even if it looks impressive in the front garden.

Of course the presence of inscriptions often changes the situation dramatically, though, like statues, they are frequently mute unless they contain a date or some other unique information. There are many examples of formulaic inscriptions which hardly vary from one instance to the other, so that an individual instance adds little or nothing to the sum total of understanding unless we know exactly where it came from.

The moral issue is much clearer: archaeological artifacts belong to the people of the states in which they were found. They are part of their heritage. Whether their precise provenance is known or not, they should be returned to the jurisdiction of the relevant antiquities department.

I do not pretend that my own epigraphic work has been able to treat these issues as black and white, so I am throwing stones from within my own glass house! Many of the pieces I have studied have slightly embarrassing histories: they have ended up in museums in the UK, France and the US by devious routes. One, the Orpheus Mosaic (with a Syriac inscription) which was on display in the Dallas Museum of Art for many years (having been bought at an antiquities auction in the US), has recently been repatriated to Turkey, since there is now evidence that it was removed illicitly from the city of Urfa. The Museum is to be congratulated in taking a responsible line in this instance.

In the case of artifacts held in museums since before antiquities laws were enacted, there is also the complex problem of the relationship between modern states and their nineteenth-century antecedents. The Palmyrene Tariff inscription (the provenance of which is known quite precisely) is in Russia; it was given as a gift by the Ottoman Sultan to the Russian Imperial Court. Should it now be returned to modern Syria (which did not exist as a separate state until 1946) and which at the time of writing has no effective government? Should the various artifacts in the Ottoman collections, now in Istanbul in the Turkish Republic, such as the Gezer Calendar and the Siloam Tunnel Inscription and the Greek inscription from Herod's Temple (all collected when these were in Ottoman domains) be sent to Israel? Or does it depend on which side of the 1967 armistice line they originally came from?

Several of the articles in the present volume touch on the question of authenticity and the reader is drawn into such questions. Alan Millard's contribution, on "Hebrew Seals, Stamps, and Statistics: How Can Fakes Be Found?" is specifically concerned with the role of statistics in the estimation of genuineness, discussing earlier theories on this, while Martin Heide discusses "The Moabitica and Their Aftermath: How to Handle a Forgery Affair with an International Impact", giving an excellent brief account of the key palaeographic and grammatical arguments which undermined confidence in the forgeries produced in the Shapira scandal of the 1870s and 1880s (touching also on the Yeho'ash Inscription). Chaim Cohen is non-committal on the authenticity of the Yeho'ash Inscription in his "Biblical Hebrew Philology in Light of the Last Three Lines of the Yeho'ash Royal Building Inscription (YI: lines 14–16)."

The material is so varied that this reviewer cannot comment usefully on all contributions. Three are by André Lemaire: "From the Origin of the Alphabet to the Tenth Century B.C.E.: New Documents and New Directions", "New Perspectives

on the Trade between Judah and South Arabia" and "A New Inscribed Stone Bowl from the Moussaieff Collection." The first of these surveys recent evidence on the emergence of the linear alphabet and includes the publication of several new inscriptions on arrow and axe heads. The second discusses new evidence on the "towns of Judah" in a Sabaic inscription published by Lemaire and F. Bron in 2009. The third (well beyond the "Biblical World") deals with an inscribed Palmyrene crater dated 154/5 CE and similar to one published earlier by F. Briquel-Chatonnet (1995) and from the same workshop.

Also dealing with post-biblical material is the important article by Matthew Morgenstern on the Mandaic magic bowls in the very significant Moussaieff collection of magic bowls. Morgenstern surveys existing published bowls and lists the Moussaieff bowls which he is about to publish in full, commenting on new lexica and parallels in formulae found elsewhere.

There is also a small group of cuneiform contributions, two by Kathleen Abraham: "A Unique Bilingual and Biliteral Artifact from the Time of Nebuchadnezzar II in the Moussaieff Private Collection" ("biliteral" here means "using two different scripts", cuneiform and Aramaic), and the artefact appears to be a jar lid and "Bricks and Brick Stamps in the Mouasaieff Private Collection." A third is by the late W. G. Lambert: "A Babylonian Boundary Stone in the Moussaieff Collection." One of the editors, Meir Lubetski (who also contributes two other articles to the volume, as well as the Foreword already alluded to) contributes a brief appreciation of Lambert, "A Teacher, A Colleague, A Friend: Wilfred G. Lambert, 1926–2011." The death of Lambert, one of the greatest Assyriologists in the history of cuneiform studies, was well worthy of note in this volume.

With scholarly contributions from such as those named above, as well as the remaining contributions by Peter van der Veen, Lawrence J. Mykytiuk, Robert Deutsch, Claire Gottlieb and Richard S. Hess, this is an important collection of papers.

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Oded Lipschits, Gary N. Knoppers and Manfred Oeming (eds.), *Judah and the Judeans in the Achaemenid Period: Negotiating Identity in an International Context*. Winona Lake: Indiana: Eisenbrauns, 2011. $64.60. Pp. xvi + 600, incl. 10 illustrations and one map. ISBN: 9781575061979.

This volume explores the profile of early Second Temple Judaism as it emerged from the diverse ethnicities of the Southern Levant in the Persian period. The papers, initially presented at a University of Heidelberg colloquium (06–08

April, 2008), trace the shift from the determination of "Judean" identity purely in geographical terms to its subsequent ethnic construction. The collection is divided into two parts: *Diversity Within the Biblical Evidence* and *Cultural,* which focuses on inner-biblical ideological differentiations and *Historical, Social and Environmental Factors*, where the relationships between geo-political and ethnic groups, including Babylonians, Samarians, Idoumeans, Egyptians, Moabites, Ammonites, Pheonicians are examined.

In the first contribution, "Judean Identity and Ecumenicity: The Political Theology of the Priestly Document," Konrad Schmid evaluates the covenantal blessings in Genesis 17 with reference to the perceived exclusion of Ishmael. Schmid maintains that the divine promises of progeny and land included Edomites and Arabs, together with Judeans and Israelites, since "the exclusive Judean privilege is not political but cultic." (p.26). This is followed by "Torah and Identity in the Persian Period," where Joachim Schaper looks at how legal formulations, such as ככתוב, "as it is written," or to the authority of the written law, as ככתוב בתורה were understood in Deuteronomy 23:2–9, Ezekiel 44:4–9 and Isaiah 56:1–6. In "The Absent Presence: Cultural Responses to Persian Presence in the Eastern Mediterranean," Anselm Hagedorn compares the literary features in Genesis 20 and the Book of Esther, clarifying how both texts reconfigure their remembered past. Christophe Nihan then suggests that conflicting views of communal inclusion (and exclusion) originated in diverse views of the role of the Temple as it became a centralized institution, in "Ethnicity and Identity in Isaiah 56–66."

Next, in "Trito-Isaiah's Intra-and Internationalization: Identity Markers in the Second Temple Period," Jill Middlemas documents how trito-Isaiah expands the understanding of ethnic identity, initially based on geographical and national criteria, to one that is characterized by religious and political concerns. Dalit Rom-Shiloni then provides a sophisticated analysis of the reception of Babylonian exilic theology in Second Temple sources, including Zechariah 1–8 and Deutero-Isaiah. In her paper, "From Ezekiel to Ezra–Nehemiah: Shifts of Group Identities within Babylonian Exilic Ideology," she pinpoints how the repatriate-exilic community successfully formulated their take-over strategy which both displaced and de-legitimized the indigenous Judeans. Jakob Wöhrle then discusses "Israel's Identity and the Threat of the Nations in the Persian Period: Reflections from a Redactional Layer of the Book of the Twelve," in which he dates the redaction of the "Foreign-Nations Corpus I," to the late fifth or early fourth century.

The complex question of intermarriage is here investigated by Yonina Dor, in "The Rite of Separation of the Foreign Wives in Ezra–Nehemiah." This analysis of the separatist ideology is based on the accounts of "membership registers" listed in Ezra 2:2–61 and Nehemiah 7:6–63, in which attendance at public and cultic events was restricted to the returned exiles. It is suggested that the first returnees

were able to perform a symbolic separation ceremony in which they denounced their sin and became thereby ritually absolved from expelling their foreign wives. While this is not entirely convincing - and I would also question the extent that this demonstrates "the elevation of pluralism over zealotry," (p. 186) – it does offer a fresh interpretation of this challenging issue. From a social anthropological perspective Katherine Southwood focuses on Ezra's purging and purifying "the Holy seed," זרע הקדוש by means of enforced endogamy. In her discussion of "The Holy Seed: The Significance of Endogamous Boundaries and Their Transgression in Ezra 9–10," she maintains that the construction of impermeable boundaries "also create(s) the representation of an extremely particularistic, perhaps somewhat insecure group who perceive that their identity is being threatened," (p. 208). This section concludes with Deirdre Fulton's contribution, "What Do Priests and Kings Have in Common? Priestly and Royal Succession Narratives in the Achaemenid Era." Fulton investigates the use of Achaemenid and Priestly genealogies (as in Ezra 7:1–5, 1 Chronicles 3:1–24, 5:27–41, 6:18–33, 8:33–40), in light of Ionian, Egyptian and Mesopotamian non-royal lineages where creating links with the classical past served to legitimize and privilege institutional authority.

The second section commences with Paul-Alain Beaulieu's fascinating study of "Yahwistic Names in Light of Late Babylonian Onomastics." Beaulieu examines Israel's "monotheizing onomasticon," in relation to its contemporaneous "hegemonic theophoric" equivalent in the late Babylonian city of Uruk. Here the preference of these urban elites for the god Anu indicates that "at most, we can talk about is henotheism, with a strong monolatric tendency in personal names," (p.257) and where it appears that the cult of Yahweh did not constitute the main referent of identity for Judeans living in the Aramaic cultural *koine.* Alongside this essay Laurie Pearce provides a brief comparison of the Judeans identified in the Murašu archive (454–405 BCE, Nippur) with those in the *āl-Yāhūdu* corpus (c. 572 BCE, which she locates now in the Nippur-Keš-Kakara triangle). In her paper " 'Judean:'A Special Status in Neo-Babylonian and Achemenid Babylonia?" she maintains that the Judeans were "a group of 'ethnically' homogenous state dependents," (p.271) who were well-integrated into Babylonian society and whose status was no different to that of any other deported group.

Donald Redford then provides an extensive analysis of the Egyptian motifs in Genesis 37 - Exodus 15, dating the Joseph and Moses narratives to the fifth or fourth centuries BCE, in "Some Observations on the Traditions Surrounding 'Israel in Egypt'," This study is complemented by Joachim Friedrich Quack, with "The Interaction of Egyptian and Aramaic Literature," who confirms that intense contact between vernacular demotic and Aramaic existed as demonstrated by the fragmentary versions of Ahiqar in Syriac, Egyptian demotic and Greek. Staying in Achaemenid Egypt, André Lemaire's piece, "Judean Identity in Elephantine:

Everyday Life according to the Ostraca," suggests that ethnicity in these records was determined by religion and ritual. This is particularly notable given that Judean Hebrew was neither spoken nor written by the scribes from this vicinity. More broadly, Bob Becking explores "Yehudite Identity in Elephantine," providing one of the most useful pieces (especially for teaching at undergraduate and post-graduate levels), where he outlines the elements which constitute this community's "prebiblical form of Yahwism," (p.415). Admittedly the identification of Pia, son of Pahi, as the second husband of Mibtahiah, daughter of Mahseiah, is no longer tenable as Joseph Modrzejewski (1996:26–36) has argued, but this is a relatively minor point. Reinhard G. Kratz then compares the representation of Hananiah (from two Aramaic letters from Elephantine), with that of Ezra and Nehemiah, in "Judean Ambassadors and the Making of Jewish Identity: The Case of Hananiah, Ezra, and Nehemiah." He clarifies how Persian authority was delegated locally, providing a basis upon which the biblical scribes could develop their accounts of the activities of Ezra and Nehemiah.

Moving away from text-based sources, Oren Tal presents, "Negotiating Identity in an International Context under Achaemenid Rule: The Indigenous Coinages of Persian-Period Palestine as an Allegory." As coins were the communicative medium of municipal, ritual and dynastic authority, the role of currency beyond its purely economic value is informatively described. Next, Joseph Blenkinsopp considers representations of the patriarch Abraham in "Judaeans, Jews, Children of Abraham." He concludes that "usage seems to point to the first century of Persian rule for the emergence of the ethnic-religious connotation of יהודים , justifying the appellative "Jew" rather than "Judean," (p. 467) *au contraire* Bob Becking (in this volume) and Shaye Cohen (1999). In "The Controversy about Judean versus Israelite Identity and the Persian Government: A New Interpretation of the Bagoses Story (*Jewish Antiquities* XI.297–301)," Rainer Albertz reconstructs aspects of regional ethnicity, inclusion and exclusion in the context of events described in c.445–401BCE. Jacob Wright then examines the tensions for Judeans serving in foreign armies, paying attention to the relationship between royal courts and their respective troops, in "Surviving in an Imperial Context: Foreign Military Service and Judean Identity."

In "'*el-medînâ ûmedînâ kiktabah*:' Scribes and Scripts in Yehud and in Achaemenid Transeuphratene," David S. Vanderhooft discusses the re-emergence of the archaic paleo-Hebrew script in Judea and Samaria during the Persian period, which is presumed to be primarily motivated by issues of identity. Manfred Oeming then provides a well-supported paper, "Jewish Identity in the Eastern Diaspora in Light of the Book of Tobit," in which he identifies the religious practices and ethno-centric elements presumed in this drama. His dating of this book to 250–170 BCE is extremely compelling.

Finally in "The Identity of the Idumeans Based on the Archaeological Evidence from Maresha," Amos Kloner outlines the epigraphic sources, purification installations, carved circumcised phalli and various burial complexes, which confirm that the Idumeans were the major *ethnos* at Maresha in the Persian and early Hellenistic period. Readers may wish to note also that photographs of all nine of the circumcised phalli have since been published by Ian Stern in the previous issue of this journal.

A collection of this significance warrants a comprehensive introduction summarizing each paper and also an index of subjects, enabling readers to conveniently locate elements of Second Temple religious practice, such as circumcision, shabbat, festivals, etc. While only one or two formatting errors were noticed (where the Hebrew letters appear reversed, as in footnote 33, on page 46 and also footnote 42, on page 48), these minor issues do not detract from this wealth of scholarship which collectively provides an eloquent affirmative to Sara Japhet's important question: "Can the Persian Period Bear the Burden?"

Cohen, S.J.D. (1999) *The Beginnings of Jewishness: Boundaries, Varieties, Uncertainties* (Berkeley and Los Angeles: University of California Press).

Japhet, S. (2006) "Can the Persian Period Bear the Burden? Reflections on the Origins of Biblical History." Pp. 342–352 in *From the Rivers of Babylon to the Highlands of Judah: Collected Studies on the Restoration Period* (Winona Lake, Indiana: Eisenbrauns).

Modrzejewski , J. M. (1996) "Mibtahiah and Her Husbands: A Family of Note During the Reign of Artaxerxes I." Pp. 26–36 in *The Jews of Egypt from Rameses II to the Emperor Hadrian* (Edinburgh: T & T Clark).

Stern, I. (2012) "Ethnic Identities and Circumcised Phalli at Hellenistic Maresha," in *Strata: The Bulletin of the AIAS* 30: 57–87.

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Eilat Mazar with Y. Shalev, P. Reuven, J. Steinberg and B. Balogh, *The Walls of the Temple Mount* (2 vols.). Jerusalem: Shoham Academic Research and Publication, 2011. Pp. 320 + 6 fold-out maps and numerous illustrations. $270 ($249 from BAS). ISBN 978–965–90299–7–6.

This impressive-looking publication by Eilat Mazar as principal author, provides a detailed description of the walls that enclose the Temple Mount in Jerusalem. It is comprised of two parts that are packaged in a box. Besides the main volume is a folder in the same sized format with pouches containing fold-out elevations of the four perimeter walls, for the most part only above present ground level,

represented by composite modern photographs and corresponding drawings placed side-by-side. On each sheet there is also a version of the drawing which includes subterranean portions, colour-coded according to the ascribed date of the different types of masonry. There are six sheets in all, with two each devoted to the longer western and eastern walls. In addition, there are copious illustrations in the text volume. The project to record the walls was a team effort, also involving Peretz Reuven, Balage Balogh, Yiftah Shalev and Jonathan Steinberg, who are given due credit in this monograph.

Because so much of the information in Mazar's publication builds on the work of earlier investigators, so as to place it in context I shall lead into it with some of this background. In 1864–65, with the financial backing of Baroness Angela Burdett-Coutts (perhaps the wealthiest woman in Victorian England and celebrated philanthropist), a team of British Royal Engineers led by Captain Charles Wilson carried out a topographical survey of Jerusalem to the standards of an Ordnance Survey. The main result of the survey was a 1:10,000 map of Jerusalem and its environs and a 1:2,500 plan of the walled city, which was so accurate that when a new one came to be made in 1937 only a revision of Wilson's map of the city was necessary. As part of their expedition, but using separate funding provided by James Fergusson, a pioneering architectural historian, Wilson and his team surveyed the walled enclosure of the Temple Mount, and they produced the first reliable map of this compound to a scale of 1:500. They also produced accurate plans of the Dome of the Rock and the Aqsa Mosque. The Jerusalem survey, which was accomplished and published within a year (in Southampton and not London, as stated in the bibliography), uncovered much new information about the shrines and related structures and also on the cisterns and underground passages of the Temple Mount. A great arch springing from the western wall beneath a Mameluk madrassa, first described by the Swiss explorer, Titus Tobler, was re-examined by Wilson and is named after him ("Wilson's Arch"). Charles Wilson was the first to pay proper scholarly attention to the stonework of the enclosure walls of the Temple Mount, examining the ancient masonry that was visible on the exterior. Wilson also had an excellent photographer with him, a Scotsman named James MacDonald who took the photographs that are included in Wilson's Survey publication, some of which are of the walls.

Encouraged by the results of Wilson's expedition, the newly-formed Palestine Exploration Fund (PEF) dispatched another small team of Royal Engineers, under Charles Warren, to investigate the ancient remains of Jerusalem with a particular brief to carry out excavations at the Temple Mount. Not being allowed to dig within the precincts, he concentrated on sinking subterranean shafts to the wall foundations, recording the different types of stonework encountered at different levels and other features, such as Robinson's Arch on the western side and the Herodian street below it. Warren continued digging in Jerusalem until 1870. His detailed drawings of the Temple Mount walls were fully published by the PEF in

1884 as part of a large portfolio entitled *Plans, Elevations, Sections, etc., Shewing the Results of the Excavations at Jerusalem, 1867–70* and an account of his labours was published the same year in the Jerusalem volume of the *Survey of Western Palestine*. His co-author of the latter, Captain Claude Conder, who was responsible for conducting most of the *Survey of Western Palestine* from the Litani River in the north to Wadi Beer-Sheva in the south at the behest of the PEF between 1872 and 1875, discovered a fragment of the enclosure wall of the Herodian Temple surviving on the western side above the level of the present esplanade, comprising an intact fragment of a pilaster course. All-too-brief biographical sketches of these and other key figures make up the second chapter of Mazar's publication and it is a pity that she does not, at the very least, refer to the fuller biographies of these colourful personalities in her bibliography for readers to follow up. It was only a century later, in the wake of the Six-Day War, that significant new exploratory work could be undertaken around the walls of the Temple Mount. This task was taken up by the grandfather of Eilat, Professor Benjamin Mazar, who focused his archaeological endeavours in the vicinity of the south western corner of the Temple Mount from 1968 to 1978. As part of these labours large quantities of fill were removed during which masonry that had been dislodged from the walls in earlier times was recovered and recorded, as was freshly revealed detail on the actual walls. Concurrently, elevation drawings were made of the sections of exposed wall abutting those excavations. Eilat Mazar, who is working on the final publication of her grandfather's archaeological findings, was clearly inspired by his work at this site and decided to take it further by documenting the visible construction in all four walls of the Temple Mount.

In this project the walls were recorded by modern techniques which are described in Chapter 1, devoted to the methodology that was employed. As Mazar points out (p. 21), the use of digital photography and image processing was indispensable and facilitated the removal of distortions produced by camera lenses and geometrical perspective, cross-checked against numerous on-the-spot measurements, to produce faithful panoramic elevations of long stretches of wall (a process known as orthophotography). In parallel, architectural drawings were made of all accessible areas based on the photographs and measurements. This operation clearly represented an enormous task: the complete circuit of walls measures no less than 1,550 m, of which roughly two-thirds was accessible to the team above ground, and the elevations studied varied from between about 10 to 30 m in height. To make matters worse, there were serious logistic issues and other problems that needed to be addressed, as pointed out by Mazar. Therefore, the successful completion of this project represents a sterling achievement.

The main body of the monograph, Chapters 3 to 6 (pp. 37–253), deals with each of the four walls in turn. The author summarises the findings of her predecessors, from

the 19th century onwards, for each portion of the wall and associated features and reproduces illustrations from their publications that she considers relevant to her own findings. She complements that information with her wealth of fresh observations and illustrations, occasionally photographs of details which were previously only available in drawings by earlier investigators. This makes for a lively and insightful account even if one does not accept some of her judgements. Virtually every facet is covered, including inscriptions in various languages and from different periods, carved into the masonry (or painted on it, in at least one case).

Chapter 7 (by Mazar, Shalev and Reuven) provides an exposition of the chronological mapping, mentioned above, which is essentially based on masonry styles and dressing techniques. There are no startling revelations here; but quite appropriately a caution is voiced about the masonry that is widely dated to the Umayyad period with the suggestion that some of it might be Byzantine. This reminds us that the dating of some segments of the masonry should be regarded as tentative. The general consensus is that all the masonry in the walls postdates the First Temple period and that verdict is essentially accepted by these authors; the earliest segment in their view is to be found on either side of the Golden Gate in the eastern wall. This they categorise as 'The First Temple period to Pre-Herodian', showing willingness to lend an ear to Leen Ritmeyer's view that it dates to the Persian period (annoyingly, his name is misspelt throughout the monograph). Following mainstream scholarly opinion, the ashlar courses arranged alternatively in headers and stretchers north of the seam in the eastern wall near the southeast corner is classed as 'Hellenistic/Hasmonaean', as argued by Yoram Tsafrir nearly 40 years ago (five years earlier than implied by the reference cited in this monograph; see Tsafrir 1975). In total, 22 phases of masonry construction are identified, although allowance is made for the possibility that some of these may overlap in their chronology.

The very brief Chapter 8 ('The Origins of the Herodian Drafting Style of the Temple Mount Wall') and Chapter 9 ('A Comparison of the Temple Mount Compound with Other Sacred Precincts from the Classical Period'), both by Reuven, are somewhat superficial and might have been better omitted altogether. On the subject of the Herodian drafting style and its origins, the authors show ignorance of two major studies published in *Levant*, Jacobson 2000 and Kropp and Lohmann 2011. With regard to the placing of Herod's Temple complex in the context of classical temple schemes, it is surprising that the authors did not consult the treatment of this subject in Jacobson 2007. Reuven is clearly better versed with the material close at hand and his last two short chapters, Chapter 10 ('The Pilasters in the Temple Mount Walls' – written with Shalev) and Chapter 11 ('Angular Cutting in the Early Islamic Gates of the Temple Mount Compound') contain important new information. There is a slight howler in the caption of

Fig. 10.25: for 'medallion cornice', read 'modillion cornice'. Fortunately, this is rendered correctly in the body of the text (p. 301).

If I have one disappointment with this monograph, it is that the value of the foldout elevations is compromised somewhat by the small scale of their reproduction. With the authors having gone to so much trouble to achieve accurate drawings and photographs of the walls, it is a pity that the user of these foldouts is unable to clearly resolve and study the courses of the masonry, let alone individual ashlars, in the published resolution of 1:400. Thus, for example, a course height of 1 m is reduced to a mere 2.5 mm in the printed versions! Since the photographic and drawn mapping of the walls was achieved using digital technology, it would have been an easy matter to have bundled in a CD-ROM (or Blu-ray disk) containing the wall elevations, capable of convenient magnification for study purposes, without loss of resolution; the high price of this publication certainly warranted it and could have absorbed the small extra cost involved. This caveat aside, there is no denying that Eilat Mazar's publication is a substantial addition to the literature of the Temple Mount and will, no doubt, serve as an important sourcebook for future study.

Jacobson, D. M., (2000). 'Decorated Drafted-Margin Masonry in Jerusalem and Hebron and Its Relations", *Levant* 32: 135–54.

Jacobson, D. M., (2007). The Jerusalem Temple of Herod the Great." Pp. 145–76 in N. Kokkinos (ed.), *The World of the Herods* (Stuttgart).

Kropp, A. J. M., and Lohmann, D., (2011). 'Master, Look at the Size of Those Stones! Look at the Size of Those Buildings! Analogies in Construction Techniques Between the Temples at Heliopolis (Baalbek) and Jerusalem, *Levant* 43: 38–50.

Tsafrir, Y., (1975). 'The Location of the Seleucid Akra in Jerusalem,' *RB* 82: 501–21.

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Jack Green, Emily Teeter, and John A. Larson (eds.), *Picturing the Past: Imaging and Imagining the Ancient Middle East.* Oriental Institute Museum Publications 34. Chicago: The Oriental Institute, 2012. Pp. 184 incl. 168 illustrations. $29.95. ISBN 978–1–885923–89–9.

Created to accompany the special exhibition Picturing the Past: Imaging and Imagining the Ancient Middle East, on view from February 7 through September 2, 2012 at the Oriental Institute of the University of Chicago, this volume explores various types of visual documentation and interpretation carried out since the mid-19th century for archaeological sites, buildings, and artifacts. The

book is structured as a series of essays followed by a catalogue of exhibition objects organized by theme.

The catalogue is introduced by items from the dawn of modern epigraphy at the Oriental Institute (including several objects related to the early work of James Henry Breasted). Next, a section on "The Epigraphic Process" uses a scene from Karnak to elucidate the classic "Chicago Method" (created by Breasted and brought into the digital age under W. Raymond Johnson). The accompanying entries, by Emily Teeter, Johnson, and John Larson, illuminate the process and underscore its trademark attention to detail. More information is provided by Teeter ("The Oriental Institute and Early Documentation in the Nile Valley") and Johnson ("The Epigraphic Survey and the 'Chicago Method'"). Relevant here is also the introductory essay by Jack Green, who notes Breasted's focus on comprehensive and accurate records rather than a more artistic approach that might have had a broader appeal but would have blurred the lines between what was clearly observed and what was inferred.

Several Facsimiles from Egyptian tombs and temples by luminaries such as Nina de Garis Davies, Amice Calverley and Myrtle Broome, and Prentice Duell illustrate their differing techniques and styles. Supplementing these and highlighting the crucial importance of facsimiles in bringing ancient Egypt to the fascinated attention of the general public are "The Sakkarah Expedition," by Ann Macy Roth, and "Facsimiles of Ancient Egyptian Paintings," by Nigel Strudwick.

Architectural Renderings and Reconstructions of sites, buildings, and scenes provide glimpses into the willingness of 19th and early 20th century artist-scholars, such as David Roberts and Joseph Lindon Smith (also discussed in an essay by Dennis O'Connor) to venture into the realm of imagination, taking what was and superimposing on it their best guess as to what might have been, and provoke discussion of the pros and cons of these methods. Teeter notes: "Reconstructions that are based on good evidence...are a very effective means of presenting the past. However, such images may have a seductive quality that has the potential to impact the objectivity of archaeologists and architectural historians..." On the other hand, Charles B. Altman's version of a New-Assyrian wall scene in which the recovered fragments are not distinguished from the reconstructed parts prompts Green to wonder: "...if Altman had been more cautious in his restoration would this painting be as well known today?" Current trends in site reconstruction are elucidated by Jean-Claude Golvin with an aerial reconstruction of Medinet Habu and an essay, "Drawing Reconstruction Images of Ancient Sites."

"Reconstructing the Past from Fragments" furnishes examples of other types of pictorial reconstruction, including 3D computer images of of architecture from Choga Mish by Farzi Rezeian and Abbas Alizadeh, accompanied by specific information on the archaelogical evidence used in their creation.

The use of photography both to document and popularize archaeology is illustrated by entries ranging from a turn-of-the-century stereoscope to a declassified image from a spy satellite. Essays on this powerful tool include "Photography and Documentation of the Middle East," by Teeter; "The Oriental Institute Photographic Archives," by John A. Larson; and "Aerial Photographs and Satellite Images," by Scott Branting, et al. The discussions of three-dimensional "Models and Copies" note their usefulness but also underscores the care that must be taken to distinguish between a cast made from a mold of an original work and a model, which can be an excellent way of communicating the original appearance of an object or structure, but is more subjective and open to error. The final exhibition topic, the "Future of Documentation," explores the role of new technologies in our quest to picture the past. Related here are Joshua Harker's Three-Dimensional Digital Forensic Facial Reconstruction," which discusses the techniques used for the mummy of Meresamun at the Oriental Institute; and "A Brief History of Virtual Heritage," by Donald H. Sanders.

The organization of the book results in some duplication of information, and several of the essays could have benefitted from additional copy editing. Expansion of certain topics, such as the potential challenges and drawbacks of the various techniques discussed, the need to balance broad popular appeal with accuracy, and how best to integrate "hard" data with artistic expertise and imagination would have been welcome. However, "Picturing the Past" provides an excellent overview of the history and methods of archaeological illustration and reconstruction, and emphasizes its essential goals of preserving information through documentation, providing increased access to information to scholars, and both engaging and educating the general public.

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Chad S. Spigel, *Ancient Synagogue Seating Capacities. Methodology, Analysis and Limits.* Texts and Studies in Ancient Judaism 149. Tübingen: Möhr Siebeck. 2012. Pp. 406. €129.00. ISBN 978–3–16–151879–9.

This volume is a revised and expanded version of the author's doctoral dissertation submitted to Duke University in 2008. While the monograph is rather focused and specific, the topic itself relates to a number of intriguing issues regarding synagogue and communal life generally, to which Spigel relates in his concluding chapter.

Chapter 1 provides an overall introduction touching on a number of subjects: recent scholarship on synagogue seating capacities, the goals of this particular study, recent studies on ancient synagogues, and a discussion of ancient demography. Chapter 2 addresses synagogue worship and furnishings, especially those connected to the question of seating. Chapter 3 details the coefficients relating to seating calculations, e.g., how much space should be assigned per person when sitting on a bench, sitting on floor mats, or standing. Chapters 4–6 form the core of the book and focus on specific case studies. Special attention is given to the Second Temple Gamla synagogue (Chapter 4) and to the cluster of four synagogues from the Late Roman Meiron region (referred to as Tetracomia)—Nabratein, Khirbet Shema', Meiron and Gush Halav (Chapter 5). A catalogue of the seating capacities of 57 ancient Palestinian synagogues extending over some 200 pages then follows (Chapter 6). Chapter 7, entitled "Conclusions," summarizes the findings from additional perspectives and also discusses several ramifications of the previous presentation and analysis. A bibliography as well as three indices (of sources, authors, and subjects) is appended at the end of the volume.

Spigel adopts a cautious approach in his analysis, emphasizing time and again that seating arrangements in various synagogues might differ markedly, even among contemporaneous buildings in the same region. In analyzing seating space, the author addresses each site individually, taking into consideration a variety of possible seating patterns—fixed stone benches, the addition of portable benches, sitting on floormats, or the use of balconies and other elevated areas (as at Khirbet Shema'); standing is regularly added as a further option. The author addresses the very basic question as to how much space an individual (man or woman) living in Late Antique Palestine would occupy, but a more or less concrete conclusion is never fully or satisfactorily reached (Spigel, pp. 52–57). Spigel suggests a series of possible scenarios for each of the synagogues he discusses. Beginning with the rule-of-thumb capacity (i.e., an oft-invoked coefficient reflecting how many people could be seated in a given space), he then proceeds with the following agenda: (1) what was the seating capacity of the permanent benches at a particular site? (2) what would have been the capacity of the main hall if the floor were used either for seating, standing, or both? and (3) what was the seating capacity under special circumstances, e.g., if the nave had a highly ornate mosaic floor, if the liturgy was conducted in the center of the nave rather than on a *bima* located against the wall, or if a balcony was to be included in the seating estimate? Based on all these variables, the estimates for the seating capacity in a given building might vary considerably (e.g., Gamla – 407, 444–454, or 509–536; Nabratein – 83–87, 99–103, or 90–107; Khirbet Shema – 199–227, 181–211, or 202–230; Gush Halav – 168–205, 154–188, or 143–173). In the case of Gush Halav, the question arises as to whether a balcony (or mezzanine) existed along with stairs leading to it and, if

so, how that would affect seating capacity; the balcony, of course, would add seats whereas stairs would reduce space. According to Spigel, the numbers would then be 170–226, 158–209, and 157–204. Moreover, seating capacity might change significantly depending on radically different theories regarding the suggested reconstruction of a given building.With regard to Ma'on (Nirim), estimates differ as to the number of worshippers that could have been accommodated—between 100–130 (Hiram) and 340–390 (Dunayevsky); (*cf*. Spigel, p. 342).

A second issue, the relationship between a synagogue's seating capacity and the population of an entire village or town (assuming it was largely Jewish), is likewise problematic. The geographic limits of such small settlements is usually unknown (was Meiron 105 or 300 dunams? – Spigel, p. 118), as was its population density. Regarding the latter, Spigel chooses a minimalist figure of 10–15 persons per dunam as a coefficient (e.g., pp. 112, 118, 129). Thus, the range of possibilities for each determination is large, and certitude elusive, as the author himself fully admits. To his credit, Spigel has worked hard at calculating the various options and has put figures on the table for future students and scholars to consider. Moreover, he has been forthright in admitting the uncertainties as well as in explaining why he chose a certain option.

Several additional aspects of this study deserve comment. Spigel admits on several occasions that his estimates regarding synagogue seating capacity are maximal, i.e., they reflect how many people could fit into a synagogue's space when fully packed. He readily concedes that this was often not the case, rendering it hard to surmise what percentage of the total population might have been accommodated in the synagogue hall (p. 132). Very often the author concludes that only a minority of the local population filled the hall—indeed a fascinating and rather surprising conclusion in and of itself.

On occasion, Spigel takes note of the question of separate seating for women in the synagogue, a subject he has also addressed in a recent article (2012). Therein he concluded that this practice differed from site to site; in this book, the topic is invoked en passant, mostly to justify further seating options. For example, if the women of Meiron were relegated to a gallery, then the adult male population might have been able to fit into the main synagogue hall. While this marginality of women cannot be proven, such speculation, as the author often says, "forces us to consider the possibility" (pp. 112–13). This same line of reasoning may also hold true for Khirbet Shema' (p. 131), where, if the author is correct, only some 30 women could have been accommodated as against 230 males in the main hall.

In addition to issues involving calculation of synagogue seating capacity and how this relates to the larger communal picture, several other questions should be raised. Besides the extensive catalogue, which is perforce brief and limited, in-depth discussions are devoted to the five above-noted synagogues,

Gamla and four from the Upper Galilee. It is never explained why this particular selection was made, nor is it clear why the author did not include synagogues from other parts of the country, such as the fourth–fifth-century Susiya synagogue, the well-preserved and famous fifth-century synagogue at Capernaum, the fifth-century Sepphoris synagogue, or sixth-century Bet Alpha synagogue? Why were only four synagogues from the same region given extensive treatment? Two would have sufficed to demonstrate diversity even in a situation of geographical and chronological propinquity. It certainly would have been valuable to include at least one building with a mosaic floor, wherein seating capacities would have been markedly different, given the presumed need to leave the decorated mosaic floor exposed.

Some issues of a historical or archaeological nature were omitted to the detriment of the analysis. For example, the discussion of Nabratein I should have taken into account Jodi Magness's forceful critique, in which she suggests that such a stage never existed (2010), while the discussion of the Bet She'arim synagogue assumed the destructive fall-out of the so-called Gallus revolt, an interpretation that has been rejected by most historians and archaeologists of late.

The volume concludes with a brief chapter that raises many of the above-noted issues: how to determine seating patterns from the range of options, what to do with differing assessments in reconstructing a building or dating it, and how to assess the broader demographic picture. Spigel takes note of the differences in synagogue settings resulting not only from various seating patterns, but from different internal furnishings and the use of mosaic floors as well. On a broader social level, Spigel tried to assess the percentage of Jews who probably attended the synagogue and why so many did not. What may have prevented or dissuaded them from doing so? Was there a difference between rural and urban synagogues in this regard? The author also relates to outlying areas of towns and villages and the degree to which people living there took advantage of a nearby synagogue. Assuming house synagogues were probably not that common, what role, if any, did they play in the overall worship setting of the contemporary Jewish community?

In all, this well-written and systematically organized volume contributes significantly to the ongoing discussion of the ancient synagogue, owing to its specific agenda of seating capacity but no less to the important issues that were raised as an outcome of Spigel's investigation. For this the author deserves our gratitude.

J. Magness, "The Ancient Synagogue at Nabratein," *BASOR* 358 [2010], 61–68

S. Spigel, "Reconsidering the Question of Separate Seating in Ancient Synagogues," *JJS* 53 (2012), 62–83.

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Mordechai Cogan (ed.), *Hayim Tadmor: "With My Many Chariots I have Gone Up the Heights of Mountains:" Historical and Literary Studies on Ancient Mesopotamia and Israel.* Jerusalem: Israel Exploration Society, 2011. Pp. 972. $120. ISBN 978–965–221–083.

Hayim Tadmor (1923–2005) was one of the best known and most important historians of the ancient Near East of the last half century, and the present volume makes clear why. Carefully and lovingly edited by his former student and colleague, Mordechai Cogan, it is an imposing collection of 971 pages gathering 45 of Tadmor's published essays, several of which contain small revisions, by Tadmor or Cogan, of their original publication and several are translated here into English from their original Hebrew for the first time. The volume builds on an earlier collection of Tadmor's previously published essays, also edited by Cogan, which was in Hebrew (*Assyria, Babylonia and Judah. Studies in the History of the Ancient Near East* [Mosad Bialik and the Israel Exploration Society, 2006]). But the present volume is more than double the size of the Hebrew collection, representing arguably the bulk of the major essays that Tadmor published in his career. Tadmor published in his career. Since Tadmor was pre-eminently an essayist - the two major exceptions being his Anchor Bible commentary, with Mordechai Cogan, on the book of II Kings (1988) and his magisterial edition of *The Inscriptions of Tiglath-pileser III, King of Assyria* (1994 reprinted with corrections and additions 2008, See the new edition, in 2011, edited posthumously by another former student, Shigeo Yamada, *The Royal Inscriptions of Tiglath-Pileser III [744–727 BC] and Shalmaneser III [726–722 BC]*) - it is this new volume that offers the best picture of the kind of history Tadmor wrote and the contributions he made with it.

The essays in the volume at hand focus on the two primary areas of Tadmor's scholarship: his first priority, Mesopotamia, especially of the first millennium BC and the Neo-Assyrian empire in that millennium, and a second priority on ancient Israel - these two areas were studied by Tadmor separately, but especially in connection with each other. Editor Cogan has divided the essays into seven parts. First is Historiography and Royal Ideology in Assyria. Its six essays offer a broad picture of how the Neo-Assyrian ruling elites saw the world around and above them and Assyria's governance of that world (Nos. 1,6). Tadmor payed attention to the territorial expansion of the Assyrian state in the Middle and Neo-Assyrian periods and the changes in world view that accompanied this (No. 6), the nature of Assyrian royal governance (No. 4,6), and the articulation and promulgation of this complex of ideas - this ideology - in the official written documents, viz., the so-called royal inscriptions (Nos. 1, 2, 3, 5).

The second part, Society and Institutions in Ancient Mesopotamia, gathers five papers on administrative, social, and cultural phenomena pre-eminently in first millennium Assyria and Babylonia: temple and royal cities and their structures, functions, and inter-relationships (No. 7); the question of whether and how kings and their courts could be held accountable, even criticized, for their actions (No. 8); the role of eunuchs in the governance of the Neo-Assyrian empire (No. 9); the influence of the West, particularly the Aramaeans, on this empire in culture, administration, and politics (No. 10); and a wide-ranging essay on the traditions of treaty and oath across the ancient Near East in the second and first millennia BC (No. 11).

This last article has a particular interest in the ancient Near Eastern background of treaty- and oath-making in biblical usage. Tadmor was an early proponent of this background, especially the first millennium connection with Assyria, and since then studies have multiplied almost exponentially, along with new evidence, especially the recent discovery at Tell Tayinat in southeastern Turkey of a western version of the Esarhaddon succession treaty, hitherto known only for the eastern vassals of Iran (Jacob Lauinger, "Esarhaddon's Succession Treaty at Tell Tayinat: Text and Commentary," *Journal of Cuneiform Studies* 64 (2012), 87–123). In this treaty and oath essay Tadmor offers an illuminating perspective on the use of the term *ade* - "loyalty oath" in his translation - in Neo-Assyrian praxis for the treaties between the Assyrian emperor and his vassal states (pp. 224–236). Emerging, as Tadmor argues, in Assyrian rule in the eighth century, the *ade* is, for Tadmor, to be contrasted with another relationship between emperor and subjects called *ardutu* "servitude", which pre-dated the *ade* but continued alongside it. For Tadmor, a key difference between the two was the emphasis in the *ade* on an oath of loyalty to the emperor, but as Tadmor describes the two terminologies and what he takes as their different conceptual ranges, it seems difficult to distinguish them in many instances. Much rests, as Tadmor recognizes, on what is explicit and what may be implicit: does an absence of mention of "loyalty" or an oath of loyalty in the *ardutu* mean, in fact, that none was given? Or if none was, in fact, given, what did that mean, particularly in view of the fact that any relationship to Assyria must have involved loyalty? The matter becomes important for Tadmor in regard to the relationship between Neo-Assyria - also its successor, Neo-Babylonia - and their subject states of Israel and Judah: were the latter bound to Assyria and Babylonia by *ade* or simply by *ardutu*? As Tadmor points out, an oath of loyalty is explicitly mentioned only for Zedekiah of Judah with the Babylonian emperor Nebuchadnezzar II.

Part III offers fourteen studies of specific Akkadian texts. Three of them edit - one of the essays with Tadmor's teacher, Benno Landsberger - important tablets from Hazor in second millennium BC Palestine, which exhibit characteristic Mesopotamian traditions in liver divination, lawsuit, and

scholastic lexicography (Nos. 21, 22, 23). The other essays focus on Assyrian and Babylonian historical texts of the first millennium including such fundamental studies as those on the inscriptions of the military campaigns of Sargon II (No. 12); on the compositional history of the inscriptional narrative relating to Ashurbanipal and the Lydian king, Gyges (written with Mordechai Cogan) (No. 17); and on the order and interpretation of the inscriptions of the last Babylonian king, Nabonidus (No. 19).

These textual studies in Part III are complemented by essays in Part V, Studies in the History of the Ancient Near East, which treat particular historical periods and episodes. Three are on periods from the second and first millennia BC: the age of Hammurabi, the end of the Late Bronze Age empires and "the club of powers" - Tadmor's felicitous, and widely adopted, phrase - that they formed, and that of the Philistines under the Neo-Assyrian empire (Nos. 28,29,30). A second group of three are on episodes of the first millennium: Sennacherib's campaign against Judah, the text and historical circumstances concerning the sin of Sargon II and its repercussions under his successors, and the complicated events behind the accession of Darius I as Achaemenid king (Nos. 31,32,33, the last with E.J. Bickerman).

Between Parts III, on texts, and Part V, on periods and episodes, is Part IV, which presents two comprehensive essays, distinguished by their bibliographical range and analytical detail, on the backbone of any historical reconstruction, chronology. In complementary fashion, they cover, first, the chronology of the ancient Near East as a whole in the second millennium BC (No. 26), and second, the chronology of ancient Israel and Judah of the first millennium BC (No. 27). The two essays grow out of Tadmor's doctoral dissertation at the Hebrew University, *Problems in the Chronology of the Ancient Near East in the Biblical Period* (1955, in Hebrew), and several subsequent essays.

Part VI turns to ancient Israel and Judah themselves, and its nine essays discuss problems of political, social, and cultural history, with emphasis on where Israel and Judah intersect with first millennium Assyria, Babylonia, and Achaemenid Persia. The subjects include the historical background of two biblical prophets, Hosea and Haggai (Nos. 35,40), the historical context of Cyrus's declaration of release from Babylonian exile (No. 39), the ways in which Judaeans of the Exilic and Post-Exilic periods viewed Israel's origins (No. 41), the relations of Ahaz of Judah with Tiglath-pileser III as depicted in the biblical II Kings (written again with Mordechai Cogan) (No. 37), popular groups vis-a-vis the monarchy in Israel and Judah until the Babylonian Exile (No. 34), the history of Samaria from its ninth century beginnings through the Achaemenid Persian period (No. 38), the apparently Arabian community of the Meunites from the biblical Chronicles and a hitherto unexplored inscription of

Tiglath-pileser III (No. 36), and the concept of longevity and the terms for it in Akkadian and Biblical and Mishnaic Hebrew (No. 42).

Part VII, the final section of the volume, has Tadmor reflecting, in three essays, on the profession of Assyriology, especially in its relationship with biblical studies, in its nineteenth century origins and its subsequent history (Nos. 43–44), and in the development of a program and then department of Assyriology at Tadmor's home institution of the Hebrew University (No. 45). Here can be found illuminating observations on George Smith, that passionate British genius of early Assyriology, and his views on how chronology was treated by the biblical authors and those responsible for the Assyrian royal inscriptions. Equally arresting is Tadmor's use of the Hebrew University archives to reconstruct the long and often difficult effort to establish Assyriology at the university, confronted as it was by an inability to attract several foreign scholars of eminence to join its permanent staff.

The preceding summary of this volume has had necessarily to be brief and selective. Yet we cannot conclude without a few general comments on the themes and approaches evident in the book. The first is the number of essays that are co-authored: so with Mordechai Cogan (Nos. 17,37), Elnathan Weissert (No. 15), Israel Eph'al (No. 16), Benno Landsberger and Simo Parpola (No. 32), Benno Landsberger and Yigael Yadin (No. 21), William W. Hallo (No. 22), E.J. Bickerman (No. 33), Miriam Tadmor (No. 25), and the present reviewer (No. 20). This association underscores the fact that Tadmor was not only a consummate scholar; he was an exceptionally lively and challenging colleague and teacher, whose students came to Jerusalem from around the world, and who encouraged collaboration with students, colleagues, and teachers in all his work.

A second point about the essays in this volume: they are the work of an historian: one, to be sure, who is perfectly competent in philological, literary, religious, and archaeological matters, but for whom these other fields are in the service of writing history. Or as Tadmor himself expressed it: "I must stress, however, that I am a historian: my tools are philological, and my *modus operandi*, diachronic." (p. 138).

In this regard, it is important to note that Tadmor did not begin his education in ancient Near Eastern philology nor biblical studies but in general history at the Hebrew University, particularly under Richard Koebner, known for his work on comparative nationalism and imperialism. Tadmor then moved into the history of the Second Temple period, under the challenging direction of Gedalyahu Alon, whose lectures Tadmor (under his original family name, Frumstein) helped to collect and edit for publication after Alon's untimely death. Already before Alon's death, however, Tadmor had decided that his strengths and finally interests lay in another direction, namely, the ancient Near East, largely before Hellenism. He was drawn there in particular by another magnetic teacher, Binyamin Mazar (originally Maisler), who emphasized the historical challenges of integrating the

study of ancient Israel within this broader ancient Near Eastern realm. It was also Mazar, I believe, who encouraged Tadmor to focus on Mesopotamia and cuneiform civilization as his specific anchor point in ancient Near Eastern history, as Mazar himself had done in his training in Germany in Berlin and Giessen. And Mazar had a hand as well in pointing Tadmor's path to advanced work in Assyriology at the London School of Oriental and African Studies, under Sidney Smith, and then at the Oriental Institute of the University of Chicago under its several cuneiform masters, foremost of whom was Benno Landsberger.

Historical studies for Tadmor, as the present volume demonstrates, are primarily those of politics and what might be called political culture and administration - thus, the nature, development, and function of polities. Although problems, say, in economic and social history do emerge in Tadmor's work (e.g., No. 34 on popular groups versus the monarchy in Israel and Judah), these are largely treated under the rubric of politics. We can go further and note that Tadmor's emphasis is on the political history and culture of the elites: how they operated in war and peace, and their *Weltanschauungen*. Tadmor, though well-read in the historiography of other cultures besides those of the ancient Near East (see in Part I), does not make as much explicit use of these studies and theoretical statements and models from the social sciences more generally as, for example, another great historian of the ancient Near East, Mario Liverani.

And since the most obvious and arguably basic evidence for this political culture of the elites was the official texts, the royal inscriptions, it is these that captured a significant part of Tadmor's research and writing. The point is repeatedly demonstrated that the line between the inscriptions as historical testimonies and as literary compositions, with their ideological visions often in epic-like formulations, is a very narrow one; indeed, the two cannot really be separated and must be examined as an interwoven complex. Tadmor works out this interconnection in such broader studies as Nos. 2 ("History and Ideology in the Assyrian Royal Inscriptions") and 3 ("Observations on Assyrian Historiography"), which have become standard treatments of the rhetorical features of the Assyrian inscriptions - e.g., the tendency to assign the major achievements of the Assyrian king to his first year, and the various terms for "reign" and "accession year" - and of the origins of one characteristic form of these inscriptions, the annals, in traditions that can be traced back to the Assyrian rulers of the second millennium BC, beginning with Shamshi-Adad I. There is also the important study of "Autobiographical Apology in the Royal Assyrian Literature" (No. 5), which remains the basic analysis of those Neo-Assyrian royal inscriptions that offer a public justification for a king who acceded to the throne in an unexpected, if not irregular fashion. And one should not forget the examination of "The Campaigns of Sargon II of Assur: A Chronological-Historical Study" (No. 12), which, first

published in 1958 as the fruit of Tadmor's work with Benno Landsberger, has not lost any of its importance despite an abundance of later publication, particularly on Sargon's campaign against Samaria.

It should be plain that this volume of Hayim Tadmor's essays contains an embarrassment of riches - a well of wisdom on the history of the ancient Near East and its documentary sources that future scholarship cannot ignore.

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Cynthia Shafer-Elliott, *Food in Ancient Judah: Domestic Cooking in the Time of the Hebrew Bible*. Bible World Series. Sheffield: Equinox, 2013. Pp. xiv + 239. £60.00. ISBN-13 978010908049–73–5; ISBN-10 1908049731.

The book's title, suggesting a comprehensive study of cooking in Iron Age Judah, belies its more narrow focus—it addresses the question of how cooked foods are prepared in two kinds of settlements: fortified urban sites and rural farmsteads of the Iron IIB–C periods. This aspect of daily life toward the end of the Judean monarchy is examined by analyzing household cooking vessels and installations; biblical texts, other ancient Near Eastern materials, and ethnographic reports are also considered.

Following an introduction, the first chapter reviews the resources used in this project, the two major ones being archaeological reports and "Jack Goody's food-preparation paradigms" (p. 22). As background to the two kinds of settlements being considered, the second chapter provides information about settlement types. The heart of the book is the long third chapter, which examines the pottery, other artefacts, and cooking installations found in domestic structures at four Judean sites: two dwellings each at two walled settlements (Tel Lachish and Tel Halif), and one dwelling each at two farmsteads (Khirbet er-Ras and Pisgat Zeev). Iconographic and literary sources from the ancient Near East—although of limited value because they reveal mainly elite meals—and ethnography related to cooking technologies are discussed in the fourth chapter. The fifth chapter considers what, why, how, for whom, and by whom food is prepared in four biblical passages (Gen. 18:1–8; Gen. 25:29–34; Judg. 6:19–21; 4 Sam. 13:5–10). Using the archaeological data presented in chapter 3, supplemented by biblical and other sources, the sixth chapter presents Shafer-Elliott's conclusions, including: food in the smaller dwellings of the two urban sites was prepared in larger vessels than food in the larger farmstead dwellings; clay ovens were probably the main installation for

cooking soups and stews as well as baking bread; food prepared in larger vessels likely included more meat than food prepared in smaller ones.

This book contains much material that, to this reviewer, seems extraneous. For example, detailed lists of the contents of every room of the dwellings are provided and analyzed, but only the cooking vessels and installations involve cooking techniques. Similarly, the author's extensive comments about household space seem irrelevant to the focus on food preparation, especially because most rooms were probably multi-use spaces used for different purposes depending on the season and time of day. Also, the apparent engagement with the "Goody paradigm," four phases of food production, seems unnecessary. Jack Goody's *Cooking, Cuisine and Class: A Study in Comparative Sociology* (Cambridge: Cambridge University Press, 1982) examines these phases—which he insists must be considered together—in order to understand why *haute cuisine* develops in some cultures but not others. But Shafer-Elliott has different goals and is looking at only one (food preparation) of Goody's four phases. Appealing to Goody's paradigm has guided her inquiry into the various aspects of food preparation, but it is of questionable interpretative value for her enterprise.

More serious are methodological problems in the author's use of archaeological materials. For one thing, her conclusions about the presence of food-preparation vessels in a room do not properly consider the fact that many of the reported types are vessel fragments, not whole pots, and thus are probably not indicative of the presence of a complete vessel of its type. Also, the volume of the vessels is not calculated; that would be necessary given that open and closed forms are much closer to each other in capacity by the end of the Iron II period than earlier. Another problem is that conjectures about what cooking installations were used do not take into account certain features (thickness and ware) of cooking vessels that relate to cooking techniques. Perhaps most serious is the small sample size of cooking vessels recovered from the incompletely excavated or poorly preserved rooms at the two farmsteads, in contrast to the rather complete repertoires recovered from the suddenly destroyed dwellings at Lachish and Halif; the conclusion that rural households used smaller cooking vessels is thus tenuous at best.

Unfortunately, the book also suffers from the lack of copy-editing. Grammatical mistakes, incorrect punctuation, flawed syntax, redundancies, curious lexical choices, and imprecise language too often interfere with the reader's ability to follow the discussion.

Despite these difficulties, the author is to be commended for analyzing cooking techniques in relation to the repertoire of ceramic cooking vessels and installations of late Iron II Judah. Distinguishing between the open and closed forms of cooking vessels is indeed important for determining the kinds of foods prepared. Her work

suggests promising avenues of research that can be pursued in relation to the corpus of data emerging from the growing attention to households in the archaeology of Syria-Palestine.

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Jens Kamlah (ed.), with the assistance of Henrike Michelau, *Temple Building and Temple Cult Architecture and Cultic Paraphernalia of Temples in the Levant (2.-1. Mill. B.C.E.) Proceedings of a Conference on the Occasion of the 50th Anniversary of the Institute of Biblical Archaeology at the University of Tübingen (28th-30th of May 2010*). Abhandlungen des Deutschen Palästina-Vereins 41. Wiesbaden: Harrassowitz, 2012. Pp. xxiv + 586, incl. 73 plates. €68 / $102 / £60. ISBN 978–3–447–06784–3.

Most of these articles were first presented as papers at a conference to celebrate the 50th anniversary of the founding of the Institute of Biblical Archaeology at the University of Tübingen in 2010. Those asked to present at the conference or just to contribute articles for the volume include some of the major excavators currently working in the Levantine region. The initiator of the conference and the editor of this volume, Jens Kamlah, has written thoughtful articles on Iron Age temples in Israel and the Phoenician region including the lost Temple of Solomon. This background certainly permitted him to bring together a group of presenters who represent the most current thinking on the development and use of temples in the Levant from the Middle Bronze Age to the period of the Second Temple in Jerusalem.

Though the title states that these are the proceedings of the conference, in reality they are not. The arrangement of the book does not follow the format of the conference. The contributions by S. Mazzoni (Temples at Tell ʿĀfiṣ in Iron Age I–III), F. Sakal (Der spätbronzezeitliche Tempelkomplex von Emar im Lichte der neuen Ausgrabungen), Chang-Ho (The Early Iron Age Temple at Ḫirbet ʿAṭārūs and Its Architecture and Selected Cultic Objects), E. Blum (Der Tempelbaubericht in 1 Könige 6,1–22. Exegetische und historische Uberlegungen), and E. van den Brink, O. Segal, and U. Ad (A Late Bronze Age II Repository of Cultic Paraphernalia from the Environs of Tēl Qašīš in the Jezreel Valley) were not originally included in the conference, and Kamlah's own addition to the volume (Temples of the Levant – Comparative Aspects) is different from his conference presentation (Die Tempel der Levante und der Tempel von Jerusalem). Novák's presentation was delivered in German but appears here in an English version. Though the conference included discussions for each section, these are not part of the published proceedings.

Temples, along with palaces and gates, were among the most impressive manifestations of architectural investment made by Levantine communities of the Middle and Late Bronze Ages and the Early Iron Age. Though several categories of temple types can be distinguished in the archaeological record for this 1000 year span, the articles here consider only the temples which formed part of an urban matrix, city temples. Ten of the contributions are about structures and physical remains. These articles divide into those by the site and written by the excavators themselves and those best classified as new analyses by scholars not engaged in the initial excavations. The contributions by T. Harrison (West Syrian *megaron* or Neo-Assyrian *Langraum?* The Shifting Form and Function of the Tell Taʿyīnāt [Kunulua] Temples), S. Mazzon, S. Bourke (The Six Canaanite Temples of *Ṭabaqāt Faḥil*. Excavating Pella's 'Fortress' Temple [1994–2009]), and Chang-Ho Ji provide the first detailed published analyses of these temple remains which have been found over the last fifteen years. As such, these are significant studies since they now allow for these temples to be really incorporated into the larger corpus of temple remains that has been formed over more than a century of excavations in the Levant. K. Kohlmeyer (Der Temple des Wettergottes von Aleppo. Baugeschichte und Bautyp räumliche Bezüge, Inventar und bildliche Ausstattung) has already provided several studies of the Weather god's temple from the citadel at Aleppo which he excavated, but this article is the most complete consideration of the changing architectural forms of the temple. S. Gitin (Temple Complex 650 at Ekron. The Impact of Multi-Cultural Influences on Philistine Cult in the Late Iron Age) and P. M. M. Daviau (Diversity in the Cultic Setting. Temples and Shrines in Central Jordan and the Negev) provide thoughtful reconsiderations of the structures already well published from sites that they have excavated as well as from comparative sites.

The temples at ʿAin Dara, Emar, Hazor, and Beth Shean were revealed in excavations during the last century and have been well published and analyzed. They already are structures that must be included in any survey of Levantine temple building. M. Novák (The Temple of *ʿAin Dāra* in the Context of Imperial and Neo-Hittite Architecture and Art) and F. Sakal offer new perspectives on these temples. Novák argues that the ʿAin Dāra temple along with its sculptural decoration is best understood as among the first manifestations of a Neo-Hittite identity which would come to influence other developments in the Levant during the Iron Age. Based on the new excavations at Emar, Skalal offers a revision of the two-temple terrace complex as initially proposed by the French excavators which stresses the longevity of hallowedness for the Temple of Baal and a more complicated double processional route for the two- temple grouping. S. Zuckerman (The Temples of Canaanite Hazor) provides a complete review of the sacred structures identified at the site and dating from the Middle through

Late Bronze Ages, and R. Mullen (The Late Bronze and Early Iron Age Temples at Beth-Shean) reconsiders, once more, the changing sacred landscape at Beth Shean as the site moved from the Egyptian sphere to a renewal of Canaanite identity in the 12th century B.C.E. J. Zangenberg (The Sanctuary on Mount Gerizim), working with the results of the excavations of Y. Magen, provides a picture of the earliest sanctuary on the site and its development from Iron Age II through the Early Hellenistic period. B. Morstatd (Phönizische Heiligtümer im Mittelmeerraum und ihre Kulteinrichtungen) supplies the first review of Levantine influenced designs in the western Mediterranean to include the new architectural discoveries of cult centers at Carthage and Kerkouan.

Three articles address the lost temples of Jerusalem using the textual evidence from biblical sources. E. Blum (Der Tempelbaubericht im 1 Könige 6,1–22. Exegetische und historische Überlegungen) takes up the challenge of yet again reconstructing the Temple of Solomon using the problematic text from 1 Kings and relating it to the ʿAin Dara. B. Janoski (Der Ort des Lebens. Zur Kultsymbolik des Jerusalemer Tempels) mines the text slightly differently looking for the connections between the descriptions of the building and the furnishings and the notion of the Temple as the "Place of Life." While the Temple of Solomon has generated an extensive bibliography of textual studies, far less interest has been shown in the lost Second temple. D. Edelman (What Can We Know about the Persian-Era Temple at Jerusalem?) navigates the textual material to provide both some notion of the physical appearance of the temple and the possible ways in which it functioned.

Most of the remaining articles treat issues of cultic objects, evidence for deities, and ideas about ritual practice. S. Ackerman (Women and the Religious Culture of the State Temples of the Ancient Levant, Or: Priestesses, Purity, and Parturition) attempts to isolate the roles that woman could have played in the more public rituals associated with the state temples in Levantine cities. O. Keel (Paraphernalia of Jerusalem Sanctuaries and Their Relation to Deities Worshiped Therein during the Iron Age IIA-C) works with the seal evidence from the Gihon Spring in Jerusalem and shows that Egyptian religious influences remained a feature of the city and of Judah until the Assyrian period, and that solar symbolism was particularly prominent. D. Vieweger (Die Kultausstatung "philistäischer" Heiligtümer in Palästina) reviews the architecture and the findings from *Naḥal Paṭṭīš*, *Tell el-Qasīle*, and the Favissa at *Yavnē;* all have been identified as Philistine and he points out that these are technically outside of the Philistine pentapolis and exhibit a heterogeneous mixture of architectural forms and finds. Rather than demonstrating a coherent Philistine religious culture, they suggest a mixing of several traditions and probably ritual practices that came together on the south coastal plain of Palestine in the Early Iron Age.

Jens Kamlah (Temples of the Levant – Comparative Aspects) provides a final article which attempts to bring together some of the ideas developed in the individual presentations by concentrating on features of the architectural designs. He reviews the categories of temple types that have now emerged in the study of Levantine temples, the nature of the morphological changes that occur in temple designs from the Early to the Late Bronze Ages, the nature of continuity at some sites (Aleppo and Pella), the ways in which the architectural forms conveyed the concept of the temple as the house of the god, and the roles of sculptural decoration in sanctuary settings and of sculpted cultic paraphernalia.

This is an impressive compilation of current views on Levantine temples, cultic items, and ritual practices. All the articles offer important contributions to the study, but there is too much here to go through systematically and offer criticism or commentary for each article. I will limit myself to a few observations on some of the articles. To categorize and classify building forms is standard practice in the study of architecture since it makes for greater ease of analysis. However, it can become an end in itself, and to some extent some of these articles reveal the problem. The temple *in antis*, so far as I can determine, first appears in Vitruvius (III.2.1), and though he credits his Greek sources with the category (ναὸς ἐν παραστάσι), there is no evidence that such a classification existed for builders in the ancient Levant. Therefore, our attempts to pigeonhole structures in this manner and then to refine the label even more by arguing whether a building is better considered *in antis* or *Langraum* strikes me as meaningless in the long run, since the builders of these structures would not have comprehended the rationale for such labels. I find the debates over the *migdal* classification even more troubling since this is a completely modern category invented by 20th century archaeologists. When dealing with ancient art, we should never let our need to classify by our systems take precedence over the objects themselves.

There seems to be a growing consensus that the temple at ʿAin Dāra probably represents the closest representation to the Temple of Solomon that has so far been found in the archaeological record. The concordance of many of the features in the temple with the descriptive section from 1 Kings cannot be denied, but this should not blind us to a couple of important distinctions. The evidence for a temple structure at ʿAin Dāra predates the earliest possible date for the Temple of Solomon, and if anything, the Temple of Solomon looks like the ʿAin Dāra temple because the Syrian structure was a prototype. However, the biblical text makes clear that the Temple of Solomon was part of a larger complex that included a palace. This is an old model, certainly going back to the Late Bronze Age at Tell Atchana, but the ʿAin Dāra temple stands alone. So far no evidence for a palace sharing the high place has been unearthed. So while

there are structural similarities to the two temples themselves, the larger setting for each is quite different. How important is the difference? I would suggest quite important. Temples that served as *de facto* court chapels (Guzana (Tel Halaf), the temple of the Storm god at Carchemish, the double temples at Tell Tayinat, and the Temple of Solomon) operated in a context quite different from those that stood alone. Our emphasis on design over context may be misguided. It suggests that the format of the temple had greater significance than the setting in which the building operated. A part of the problem may well lie with the source for our information on the Temple of Solomon, a highly problematic text, the origin for which is neither clear nor agreed upon.

One of the most important findings of the last two decades must be the Aleppo citadel temple of the weather god. Not only does this temple reveal that certain topographical spots could retain their sanctity for many centuries and through several changes in rulership and even populations, but that the sculptural decorations within the temple could be used to convey not just cultic information but political changes. None of the other Late Bronze Age or Iron Age temples has yet yielded such a rich display of interior sculpture. ʿAin Dara does have interior as well as exterior sculpture, and the description in 1 Kings would indicate a sculptural embellishment of the interior of Solomon's Temple, but neither comes close to what Kohlmeyer and his team found at Aleppo. Only at the Iron Age Neo-Hittite and Aramean cities of Carchemish, Sam'al (Zincirli), and Guzana can we find equally rich sculptural displays, but these are all exterior programs visible to a much larger public than the interior decoration at Aleppo. It may have been that some of the functions of the interior sculpture at the Aleppo citadel temple were performed by the sculpted paraphernalia that have been found in association with the southern Levantine temples, the Late Bronze Age and Iron Age sculpted ceramic fenestrated cult stands (Ṭabaqāt Faḥil, Beth Shean) and Iron Age model shrines (Pella), though these much more modest and portable objects clearly could not have been the focus of attention and ritual in a manner similar to that of the interior decoration at Aleppo.

The volute capital which appears for the first time in the Iron Age Levant has produced its own specific bibliography over the decades. There is general agreement that the find spot for this architectural member is never in purely religious contexts, and so it has come to be treated as an item associated with secular rather than with religious constructions, and this is the interpretation that Zangenberg has given to the fragments of volute capitals found at Mount Gerizim in the Persian level. However, Keel has offered a rather intriguing suggestion in regards to the seals from Jerusalem decorated with volute capitals (proto-aeolic). He argues that the capitals were indeed a reference to kingship, and one perhaps specific to Israelite kingship, but not one that denied a religious association. As

he points out, the main temple in Jerusalem was part of the palace complex, and as such a reference to the king's residence through the presence of the volute capital used for the seal could also be an indirect reference to the temple itself.

This is an important collection of writings. The volume is well edited, generously illustrated with good drawings, and lavishly supplied with excellent black and white photographs. We must thank Jens Kamlah for arranging the symposium and for producing the published proceeding in such a timely manner and Harrassowitz for publishing such a handsome book.

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Mordechai Cogan, *Bound for Exile. Israelites and Judeans under Imperial Yoke: Documents from Assyria and Babylonia.* A Carta Handbook Carta, Jerusalem. 2013. Pp. xiii + 177 incl. 5 maps and 37 Figs. $64.00. ISBN: 978–965–220–843–9.

Assyrian and Babylonian kings followed a long-established and widespread policy of deporting inhabitants of rebellious kingdoms, often replacing them with people from other regions a practice illustrated most extensively by documents and inscriptions from the Assyrian empire. Mordechai Cogan, who has previously translated Assyrian and Babylonian texts concerning Israel and Judah (The Raging Torrent, 2008) gathers cuneiform records that disclose the circumstances of exiles from the two kingdoms. After an Introduction (pp. 1–9) and a few documents about the provinces of Megiddo and Samaria (pp. 10–33), Ch. 2 identifies 'Israelites in Assyrian Exile' (pp. 34–53) through individuals' origins ('Samarian') or names. Cuneiform tablets supply a number of personal names commencing or ending with forms of YHWH, so clearly Hebrew (e.g. Hilqiyau = Hilqiah). Some men were incorporated into the army, one was a chariot driver, others were workmen or slaves. One sculpture showing Judeans working on Sennacherib's palace supplements the written sources (Fig. 28). The reason for exile is set out in Ch. 3, the longest (pp. 54–103), breach of 'Treaties and Oaths in the Assyrian Empire'. Cogan translates 'Esarhaddon's Treaty for the Succession of Ashurbanipal' (first translated by D. J. Wiseman in 1958 as 'The Vassal Treaties of Esarhaddon'), 'Esarhaddon's Treaty with Baal of Tyre' and 'Ashurbanipal's Treaty with the Tribe of Kedar'. For the first he has been able to include a few improved readings from the copy found at Tell Tayinat in 2009. If Israelite and Judean kings were forced to accept treaties like these, Cogan and others suggest, some of the curses they list, such as 'May the gods make your ground like iron, so that nothing can sprout from it' (p. 83, §63), may have given rise to similar curses in Deuteronomy (Deut.

28: 23). However, the Assyrian scribes drew on a long tradition of curses and there seem to be western influences in the Assyrian treaties, so their authors may have adopted those curses from the west; the argument for Assyrian models for Deuteronomy is far from certain (see K. A. Kitchen and P. J. N. *Lawrence, Treaty, Law and Covenant in the Ancient Near East* [2012], part 3, pp. 222–33). Cogan also points to many of the curses which occur in other biblical books and ancient near eastern texts.

While some exiles experienced forced labour or slavery, others enjoyed freedom. 'Judeans in Assyrian Exile' and 'Judeans in Babylonian Exile' (Chs 5, 6, pp. 119–57) list about fifty people with names clearly or likely to be Hebrew - another forty can be counted. Most are names known from the Bible, with the Divine Name appearing as *yau* for *yahu* in Assyrian and *yama* for *yaw* in Babylonian, which also has, rarely, *yahu* (Abda-yahu, p. 147, Shahid-yahu, p. 153). Legal deeds include one regulating the shares of an estate between a man's five sons, all with Hebrew names (6.05) and one reducing a man named Isaiah's daughter to slavery if she consorts with a Babylonian man or he abducts her without her resisting (6.06). A few years ago, Iraqi treasure hunters uncovered a new source for the Babylonian period, releasing on to the antiquities market scores of tablets from a place called 'Judah-ville' in the region of Nippur. Two are included here (nos. 6.04, 6.05) but the publication of many more will add numerous Hebrew names and expand knowledge of the exiles' activities to be set beside the long known Murashu archive from Nippur.

A few texts from other eras and kingdoms - Egypt, the Hittites - record deportations or list exiles, but the cuneiform documentation is the most informative outside the Bible. While the Hebrew reports are the only extensive sources from subjugated populations, Mordechai Cogan's book supplies a valuable complement to them.

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Martin Worthington, *Principles of Akkadian Textual Criticism.* Studies in Ancient Near Eastern Records 1. De Gruyter, Boston/Berlin, 2012. Pp. xxiii + 352. € 99.95. ISBN: 978–1–61451–051–2, e-ISBN: 978–1–61451–056–7; ISSN: 2161–4155.

Ancient scribes did not always attain the accuracy expected when they copied existing texts, nor did they aim for the consistency in spelling assumed nowadays. Their mistakes and variations can be revealing and instructive, as studies of

manuscripts from many ages and areas have shown. Now Martin Worthington's close scrutiny of Babylonian and Assyrian cuneiform texts, 'the examination of minutiae' (p. 38), presents for the first time a comprehensive analysis of textual changes found in them. (In 1920, Friedrich Delitzsch offered an initial collection of such scribal errors.) Most types of scribal error known in other cultures are evident, from simple haplography, lipography, dittography and metathesis to miscomprehensions and more complex confusions. The nature of the cuneiform script enabled the easy misreading of polyvalent signs to produce a new sense, or a nonsense. Thus in Gilgamesh XI 149, two manuscripts have the dove Ut-napishtim released after the Flood returning to him, but two have the preferable reading 'soaring upwards' (p. 119).

However, Worthington has done much more than collect and catalogue scribal differences and errors. He sets out four 'Potential rewards deriving from the study of textual change': elucidating obscurities, tracing patterns of transmission, revealing the attitudes and practices of scribes and suggesting approaches for future work. His first four chapters, with many sub-divisions, cover, in Ch. 1, methods of transmission and ancient attitudes to texts (notions of fidelity, apprentice or pupil copies), in Ch. 2, problems in dealing with errors (oddities, orthography, stemmata), in Ch. 3, 'mechanisms of textual change' (all types of error, misunderstandings, deliberate changes and redactions), in Ch. 4, variations in orthography and grammar. In Ch. 5 he uses his findings to consider the ease of reading cuneiform texts in the first millennium. Colophons reveal there was considerable circulation of tablets within Babylonia and Assyria so that scribes would have to read unfamiliar scripts, some, of course, being more accustomed to legal and administrative than 'scientific', ritual, or literary works. (Here surveying the contents of some ' private libraries' could expand the point.) A relevant aspect is spacing, for, Worthington states, without punctuation it was hard to identify clause or sentence boundaries, although the layout might sometimes help (p. 258, and n. 847). While words were not divided, scribes avoided splitting words between lines and might space signs so that a short word filled a line, or crowd them in, in order to include a whole clause in one line, in 'scholarly' texts and also in letters and legal deeds. Here comparison could be made with Jewish scribal habits of completing a word at the end of a line or of 'stretching' letters to fill a line. In the Old Hebrew script, by contrast, because a point commonly separated one word from the next, a word could be split at the end of a line. Native readers of either script would intuitively discard many possible readings however the words were divided. Scribes of cuneiform had additional aids to correct reading: particular signs would rarely be used in certain positions and signs for single vowels could mark precisely the value of an adjacent vowel which Worthington terms 'disambiguated *plene* spellings' (pp. 266–69). *Plene* spellings were optional and appear erratically in some manuscripts, for

example, varying between two copies of Sennacherib's 'Rassam cylinder' which share oddities and seem to have been copied by the same scribe (pp. 128–32). A similar variety appears in ancient West Semitic manuscripts (see Millard 1991). Many Assyrian royal inscriptions survive in multiple copies, so where the same odd reading occurs in several, but not all, it points to an erroneous exemplar (e.g. a short inscription of Shalmaneser III, pp. 122–23, 133–34). From these comments it should be plain that textual criticism of Akkadian offers instructive analogies for studying Hebrew manuscripts. In Ch. 6 Worthington discusses choice between variants and, with compelling cases, suggests there should be greater readiness to adopt conjectural emendations.

The book's real importance is its demonstration of the value of textual criticism in improving the interpretation of Akkadian compositions of all sorts, notably several passages in the Epic of Gilgamesh, including one which Worthington demonstrates does not portray a homosexual relationship between Gilgamesh and Enkidu as has been widely supposed (pp. 204–09). Persevering readers, undiscouraged by Akkadian phrases and technical discussions, will appreciate the work of ancient scribes much better. Despite concentration on errors and vagaries, Worthington's work should inculcate greater respect for competent scribes whose legacy we enjoy! (Ironically, errors exist in his book!)

Delitzsch, F., (1920). *Die Lese- und Schreibfehler im Alten Testament* (Berlin and Leipzig).
Millard, A., (1991). 'Variable Spelling in Hebrew and Other Ancient Texts', *Journal of Theological Studies* 42: 106–15.

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Pau Figueras, *The Pagan Image of Greco-Roman Palestine and Surrounding Lands*. BAR S2495. Oxford: Archaeopress, 2013. Pp. ii + 252 incl. illustrations, gazetteer and glossary. £39.00. ISBN 9781407311098.

During the Hellenistic and Roman periods the majority of people who inhabited Palestine were pagan. Nevertheless, most scholarly research on the history and archaeology of Palestine in these periods has been devoted to the Jewish and Christian communities and their archaeological remains. Therefore, the increase in recent years in the number of studies dealing with the various gods worshipped in Palestine (e.g., Ovadiah and Mucznik 2009) and the temples and shrines erected in this region (e.g, Ovadiah and Turnheim 2011) is much welcomed. Pau Figueras' new book is another addition to this growing body of research.

The aim of the book is to collect all appearances of pagan motifs in Palestine and surrounding countries (modern Israel, parts of Jordan, Lebanon, Syria and north Sinai) during the Hellenistic, Roman and Byzantine periods. The items presented in this study include: temples and shrines, open-air cult sites, altars, inscriptions and sacred writings, statues and figurines, stelae, betyls and obelisks, carvings and reliefs, cult objects, coins, finger rings and bracelets, amulets, gems and cameos, tombs, coffins and sarcophagi, mosaics and paintings. The collection refers not only to the representations of pagan motifs whose origin lies in the Greek and Roman religions, but also to motifs that are related to the cults of the Edomites, Nabataeans, Itureans, as well as those used by Jews and Christians to adorn their synagogues, churches and tombs. The book professes to deal only with the archaeological evidence for the pagan legacy in this region and does not include references in ancient texts from which much information concerning pagan practices in Palestine could have been drawn.

The book is divided into two main sections. The first, entitled 'Archaeological Gazetteer,' follows a geographical sequence in alphabetic order as its format, and includes a short summary of the information collected by the author about each site, together with relatively small, black and white illustrations of the relevant archaeological remains, and a few bibliographical references. The second section, entitled 'Explanatory Index,' offers short explanations (also in alphabetical order) on the names of gods, goddesses, beliefs and superstitions, and syncretism, as well as a record of cultic objects and structures, with appropriate references to the places and illustrations recorded in the first section.

Figueras' extensive collection is an impressive and meticulous work. Students of archaeology, as well as interested layman, will surely find it useful as a search tool for the appearance of certain motifs in this region in various visual media and throughout a vast time span. Yet the author in his introduction claims that his work does not pretend to be an exhaustive one and indeed one should admit that the entries are indeed rather short, in many cases incomplete and also not up to date. Thus, for example, the entry on Paneas refers to the Augusteum erected at the site by Herod according to Flavius Josephus and mentions only the identification made by Zvi Ma'oz of that building, without referring to other suggestions to identify it elsewhere. The site of Omrit, where the same Augusteum is identified by the site's excavators, does not appear at all in the book, though most impressive remains of three successive temples were unearthed at the site. Other entries, such as the one on Jerusalem, Khurvat 'Aleq (should be 'Eleq), are incomplete and lack reference to recent publications of intaglio gemstones, decorated furniture, statues and figurines. As a whole the entries are too short, the bibliography in many cases insufficient and the illustrations are too small and not always clear.

Most of all, however, an analysis and overall discussion of the pagan image of Palestine is lacking. Figueras mentions at the start of his introduction that his late venerated teacher, Prof. Michael Avi-Yonah, expressed his intention some forty years ago to conduct a comprehensive research on the historical and archaeological legacy of paganism in Hellenistic and Roman Palestine. Unfortunately, Avi-Yonah did not fulfil this intention. While this work is a start, the archaeology world still awaits the publication of such a research.

Ovadiah, A. and Mucznik, S., (2009) *Worshipping the Gods: Art and Cult in Roman Eretz Israel* (Leiden).
Ovadiah, A. and Turnheim, J., (2011) *Roman Temples, Shrines and Temene in Israel* (Rome).

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Hannah M. Cotton, Leah Di Segni, Werner Eck, Benjamin Isaac, Alla Kushnir-Stein, Haggai Misgav, Jonathan Price, Israel Roll and Ada Yardeni (eds.), *Corpus Inscriptionum Iudaeae/Palaestinae: Volume 1, Jerusalem, Part 1: 1–704. Part 1 The Hellenistic Period up to the Destruction of the Temple in 70; Part 2: The Roman Period from 70 to the Reign of Constantine; Late Antiquity from Constantine to the Arab Conquest.* Berlin: De Gruyter, 2010. Pp. xxvi + 694. $195. ISBN: 978–3–11–022219–7.

Hannah M. Cotton et al., with contributions by Robert Daniel and assistance of Marfa Heimbach, Dirk Kossmann and Naomi Schneider, *Corpus Inscriptionum Iudaeae/Palaestinae Vol. II Caesarea and the Middle Coast, 1121–1260.* Berlin and New York: De Gruyter, 2011. Pp xxii + 918 incl. illustrations, maps and plans. $252.00. ISBN: 9783110222173.

The Corpus of which these magnificent volumes are the first instalments is an important milestone in epigraphic publication for the ancient world as a whole, as well as a watershed in the study of the highly diverse, mutable, complex – and famous – region that they cover. They are the first two to appear, out of a projected nine. The plan excels firstly in its breadth of conception and wide geographical scope (the project extends beyond the borders of Israel and stops sensibly where the writ of other Middle Eastern corpora begins to run). Particularly striking is the linguistic range: the editors write that 'traditional linguistic divisions and exclusions previously adopted for epigraphic corpora [were]…abandoned'. Combining Greek and Latin with Semitic texts, and others too, such as Armenian and Georgian (in Volume 2), makes good historical sense in dealing with multi-lingual societies;

and the result is coverage of no less than eight languages, not to mention, within these, six different types of Aramaic and two forms of proto-Arabic. A consistently high level of scholarship is guaranteed by the expertise of an unusually large core team (eight active participants), plus (so far) eight more authors responsible for particular contributions, three dedicated assistants, and then an enlisted range of support and guidance, both institutional and individual. The result is exemplary in thoroughness of research (with fresh inspection of even the smallest fragments wherever humanly possible); in the determined hunting down of data; in the clarity and thoughtfulness of the overarching structure, with a sensible degree of flexibility in the organization of individual volumes; in the precision, starting from the precise location of each find-spot in terms of the geography of today's Jerusalem, and generally offering a good photograph, transliterations and, where appropriate, translations, and an intelligently edited and marked up text; in the meticulous attention to detail; in the sound judgment, control and economy of the commentaries (with initials indicating the particular editor responsible), even when it comes to matters that have been highly controversial, such as the supposed ossuary of James brother of Jesus, or the Talpiot burial cave that contained ten 'unexceptional' ossuaries, partly damaged by a demolition blast, belonging to the family of Yeshu'a; in the judiciousness of the select bibliographies for texts of significance and the completeness of the general bibliographies; and, last but not least, in the learning, concision and immediate usefulness of the two general introductions, both by Benjamin Isaac.

The production has been a remarkable two-centre operation, based in Jerusalem, but with a counterpart labouring in Cologne. The painstaking teamwork, co-ordination and sheer determination of the overall directors, Hannah Cotton and Werner Eck, is particularly to be applauded. The very substantial support of the Deutsche Forschungsgemeinschaft should be singled out, alongside that of the Hebrew University.

These two volumes take the total so far to an almost unbelievable 2160 entries. Formulaic, 'mass-produced' inscriptions, i.e. stamps and marks of various kinds have been excluded. But milestones will appear in due course in their own volume. As a research tool, as a reference work, and indeed also as absorbing reading, the corpus will only achieve its full potential with a full roster of indexes; so far we do at least have indexes of personal names to each volume, with that for Volume 1 appearing at the end of Part 2. The provisional indexing whose appearance on the internet has been promised is eagerly awaited.

The volumes here under review offer dramatically contrasting bodies of material, drawing upon the diverse skills of several editors. Volume 1, Part 1, which is, as we shall see, the record of a very largely and very distinctively Jewish Jerusalem that was none the less by no means a parochial place, is

dominated by personal burials in the shape of 590 funerary inscriptions, mostly from the ossuaries characteristic of the immediate area, in which bones were deposited by way of secondary burial in tombs cut into the rock, once the flesh of the laid out body had disintegrated. The practice is well explained in Isaac's introduction. Over half of the known containers bore only schematic patterning and were without inscriptions altogether, but attention has been paid to virtually every possibly intelligible trace of would-be writing, however rudimentary the scratches and squiggles – and many are just that. As for the funerary inscriptions themselves, most are nothing more than a name or names, but choices of name alone are eloquent when viewed in quantity and carefully interpreted. Other types of text are far less numerous in the volume, but they include a few that are very familiar, and all have been authoritatively re-presented. Much of the editorial work in 1.1 has been most ably carried out by Jonathan Price.

In Volume 1 Part 2 Jerusalem has become an intensely Christian city. Ecclesiastical material dominates from the start, for the surviving public epigraphy of the post 70 CE Roman colony of Aelia Capitolina that was in time established over the ruins of the former city is sadly limited. It is the religious world that mainly fills the post-Constantinian section, and that is inseparable even from the small number of imperial or official documents. As it happens, an imperial rescript of the mid-sixth century was found in re-use in the church of the Holy Sepulchre (785). The construction of dozens of churches, including some monumental edifices, is graphically documented by Isaac in his introduction (appearing in Volume 1.1), a particularly helpful accompaniment to the numerous building inscriptions and dedications of 1.2. The celebrated Christian Holy Places burgeoned during this period; inscribing on walls, mosaic floors or objects, was the order of the day, so those famous places are amply represented here. At the same time, less well-known sites, whether churches, chapels, monastic buildings, caves or simple pilgrims' graffiti, proliferated around the city and in its outskirts and the surrounding hills. The arrangement of this volume is, as before, geographic for cases where provenances are known, which for the later period is in quite a high proportion of them; but this time geography sits under the customary generic headings commonly employed. Maps serving both 1.1 and 1.2 appear at the end of this second part, and they serve well the purpose of displaying the sacred geography of Christian Jerusalem and of locating find-spots.

Volume Two is in its content the most varied volume to date. Caesarea has been extensively excavated over the past decades, and indeed the preparation of a corpus of Latin and Greek inscriptions by Holum and Lehmann, published in 2000, is duly registered as having provided much of the spadework. This was a truly mixed

city already in the first century CE, when it was the capital of the Roman prefect/procurators and the source of ethnic violence that helped trigger the Great Revolt. After 70 CE, the Roman military presence was much increased, and the city's status elevated to that of a *colonia*. In addition, Caesarea became a very significant Christian centre in late antiquity. But it is also to late antiquity that belong long known vestiges of what was apparently a synagogue to the north of the city, and it is good to see its texts set out in full even if the crop is rather disappointing. These too have been edited by Jonathan Price. In Caesarea Latin was a significant component in the linguistic mix, above all in public texts associated with imperial officials and in those of the *colonia*, including dedications to emperors. The unrivalled mastery of Werner Eck (who had already dealt with such texts in 1.1) is brought to bear on this material, and another find from a German university. Walter Ameling, having joined the editorial board, handles the small but significant collection of 'pagan' Greek inscriptions, which are associated with a revealing range of Graeco-Roman cults. Isaac's introduction gives readers in under eighteen pages just what they most need in order to contextualize the evidence. I hope to discuss this volume in detail on a future occasion.

In the rest of this review I offer some notes on Part 1 of Volume 1, whose riches, offer countless rewards to the attentive historian. Even though most of the inscriptions were known before, some had slipped out of view, and their re-presentation here makes an impact that deepens immeasurably our understanding of their period as well as raising new questions. It is not an unreasonable proposition that the study of Second Temple Jerusalem is best begun right here – before even taking note of the city's archaeological sites or its indispensible historian, Flavius Josephus, or the priceless Dead Sea scrolls that were produced and collected in the Judaean wilderness by a community in opposition to Jerusalem. For in this humbler material we catch the highly distinctive atmosphere of the city, and even the voice of pre-70 CE Jerusalem's ordinary inhabitants (and sometimes their masters) residing still in their own usually simple artefacts.

The absence of public inscriptions emanating from the majority Jewish population, and the remarkably restricted number of donor inscriptions associated with Herod's Temple, raises anew the question of Jewish attitudes to the epigraphic habit of the Romans. The collection of miscellaneous significant texts in the very small first section, 'Inscriptions of religious and public character', includes just seventeen items, some more Roman than Jewish, such as the long-known warning inscription from the Temple enclosure (2) found in two copies and complementing Josephus's account; the *titulus* from the cross (15), taken of course from its literary source, the four Gospels (differing slightly in the four versions); and the brief inscriptions, taken from Philo's *Embassy to Gaius,* that were allegedly on the gilded shields set up within Jerusalem by Pontius Pilate in the reign of Tiberius,

to the fury of pious Jews. Other texts of substance have Diaspora associations, such as the record of a donation from a Rhodian to Herod's Temple in 18–17 BCE (3), and the almost certainly pre-70 synagogue inscription of Theodotus (9) written on a limestone slab found in a cistern in the Ophel. It may be that the sheer thoroughness of the Roman destruction in the summer of 70 CE of the Temple Mount and its surrounds, and their subsequent treatment in and after the reign of Hadrian (still a matter of uncertainty) have resulted in the loss of epigraphic data from Herod's Temple itself; but equally, and following Solomon's precedent, there may have been none.

In a different sphere, the quality of the writing and carving on the ossuaries raises similar questions in relation to Jewish reservations concerning public recording or memorializing. The observation made by Price in discussing the authenticity of the James ossuary should be noted: 'ossuary inscriptions were essentially labels identifying the deceased for the benefit of the family in their private sealed caves; there was no wider "audience"'. Thus, even a designation such as 'brother of', found in the James inscription, was only a marker and as such not common. Display would have been immodest, as Josephus tells us in his *Against Apion* (2.205). A minority of the texts are nicely carved (eg 33). But the crudity of much of the lettering is striking. One incision was apparently done with a nail (eg 408). Another is described as 'inexperienced scratches' (485). Many are 'insecurely written' (for an example, see 46). In bilingual texts, the Greek is likely to be better written than the Hebrew or Aramaic; thus the ossuary of Selampsin daughter of Ariston is described as having 'Greek letters shallowly but precisely incised; formal Jewish script less expert, some letters gone over more than once' (and for another example see 28). This disparity may be culturally significant, or it may simply reflect the disparity in skills of those who did the writing, whether commissioned masons or private individuals. It is also telling that the lettering may well be inferior to the carving of the designs on the ossuaries (387), the latter obviously a job for professional craftsmen working with simple pattern books.

A contrast with these small chests is provided by the 'elegant' limestone sarcophagus of Queen Sadan from the so-called Tomb of the Kings in Wadi Joz 123, likely that of Queen Helena of Adiabene, inside which the discoverer, de Saulcy, reported in 1864 having found a richly robed female skeleton whose bones instantly crumbled to dust on exposure to the air. And yet even here the Aramaic incision is fairly crude, an indication perhaps of a chosen style rather than lack of the wherewithal to employ skilled craftsmen.

It is presumed that burial in rock-hewn tombs around the city ceased after 70, and we must suppose that the habit of ossuary burial of bones in family tombs was disrupted and that the tradition sooner rather than later came to an end (though a few such arrangements have been found in the later necropolis of Beth She'arim, outside

Judaea). Nor would Jerusalem any longer have been a possible burial place for Jews from other regions, or indeed from the near Diaspora, as seems to have been the case before the destruction. Among instances of outsiders are the Hebrew, Aramaic and Greek inscriptions of several deceased individuals from Beth She'an/Scythopolis in one burial cave (410–2).The Palmyrene script also makes its appearance.

Yet in the main the burials must be local, and perhaps the single most striking feature, highly visible when surveying the material en masse, is the amount of Greek, at whatever level, present among the Jews of Judaea, along with the not negligible presence of Latin. The repertoire of names is astonishing. An assessment could in theory already have been made from Tal Ilan's indispensible *Lexicon of Jewish Names in Antiquity* (2002–8). But now the concentration, organization and specific boundaries of the surviving corpus, so effectively presented, are truly telling. We encounter Ptolema, and also Cleopatra (558), Demarchia (202), Tryphon (220), Verutarion (a woman) together with Nikandros (222), Chares (290; a name recorded also by Josephus, *Jewish War* 4.18, in connection with Gamla in the Golan), Erotas (292), Kyria (302; written in Greek), Maria (312; written in Hebrew/Aramaic), Rufus (385), Aristoboulos son of Iasion (387), Africanus Furius (?) (412), Julia, figuring beside Iouda (554), Furinus (582), Psyche (584), and a good number of others.

On the other hand, there are multiple examples of the Hebrew/Aramaic names common in the period, and alongside them we have not a few appearances of other biblical names such as Sha'ul and Ishmael, while we also meet a Hillel, a David, and, again, Mattya, Hezkya, Elazar, Shapira, Bar Giora, and Shalom (a woman). It does not take a prolonged search to discover a mixture of languages and scripts within one cave. A full analysis of the groupings of different kinds of names in particular tombs or zones would undoubtedly be fruitful.

Alongside the naming patterns come contrasts in custom and behaviour. What might be deemed imported practices, such as the cursing of those who disturb a grave, are not unattested (see 385; in Greek, and 507, protecting the burial of Tertia, bilingual in Greek and Hebrew/Aramaic). But they are easily outweighed by evidence of Judaism in action: a Nazirite (Hananiya the son of Yehonatan, 70), a member of the priestly course of Yakim (Menahem, 183), the granddaughter of the High Priest Theophilus (Yehohana of the Caiaphate family, 534), proselytes (Ioudas son of Laganion, 551; the non-local Ioudan the proselyte of Tyre, 174); Megiste the priestess (297; written in Greek) is more mysterious. Even the curse mentioned above appears twice in a Judaized version that employs a vow formula, either in Greek (287) or in Aramaic (*qorban*, 466). The noteworthy re-interment of the bones of King Uzziah recorded in the first person by an unknown agent on a (probably genuine) limestone plaque in quite nicely written Aramaic also carries the injunction 'not to open' (602).

The edited inscriptions exhibit what might be called the Jewish cosmopolitanism that characterized Jerusalem, and Isaac's introduction points us to Acts 2.5–11 – 'now there were dwelling in Jerusalem devout men from every nation under heaven…', while reminding us that one major source of this remarkable diversity was the practice of thrice-yearly Temple pilgrimage. The collected inscriptions of the Jerusalem volume of CIIP draw us right into this multi-faceted world; and the chasm between the contents of the two parts of this first volume reveal with horrifying clarity that when the Temple and the city fell, and its population was destroyed or dispersed, along with the countless casualties, a rich and unique way of life was lost that could never be replaced.

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Avraham Faust, *The Archaeology of Israelite Society in Iron Age II*. Winona Lake, Indiana: Eisenbrauns, 2012. Pp xviii + 338. $49.50. ISBN: 9781575061795.

Avraham Faust's latest book is a fully revised and updated English version of his Hebrew monograph, מבט אכיאלוגי: המלוכה והחברה בתקופת הישראלית (2005), which in turn was based on his Bar-Ilan University doctoral dissertation (1999). The author's work, accordingly, has been known to specialists for at least a decade now, but since this English version will reach a much wider audience, I will approach this review as if this were a totally new volume – which to some extent it is, given the ever-increasing amount of evidence applicable to Faust's ongoing project, notwithstanding its roots stretching back to the late 1990's.

The key word in the title is 'society', for while many works by archaeologists report their findings and attempt to place their excavation within the larger picture of ancient (economic, political, military, etc.) history, insufficient attention has been paid to how archaeology can inform social history. To some extent, the springboard for Faust's monograph (and its earlier versions) is a comment by William Dever (1995) regarding a 'serious deficiency' in the field of archaeology, which as a whole fails to utilize the revealed material culture in order to reconstruct the social structure of ancient Israel and surrounding peoples. Faust has answered that challenge in strong fashion, and his book no doubt will serve as the basis for all future discussion on the topic.

The bulk of the monograph is to be found in Chapters 3 (pp. 39–127) and 4 (pp. 128–177), which present and analyze the data for the urban and rural societies, respectively. As one can see from the disproportionate length of these two chapters, not surprisingly there is considerably more material available concerning the urban

setting than there is regarding the rural landscape. In addition, for the former chapter, Faust is careful to distinguish between Israel and Judah, and for Judah, between the 8th century and the 7th century. One important data set will serve here to illustrate Faust's attempt to reveal the social aspects of ancient Israel.

Through a series of lists and graphs, Faust pays close attention to the sizes and locations of the residential houses in the different cities, especially in those cases, such as Hazor, Tirzah, Tell en-Nasbeh (Mizpah), Tell Beit Mirsim, and Beersheba, where such data are forthcoming in critical mass. These houses range in size from 50–160 sq.m. (experts will recognize Building 2a from Hazor as an exquisite 160-sq.m. house, for example), with an occasional outlier (such as the huge 250-sq.m. Governor's House at Beersheba), and are found in such places as 'residential neighborhood', 'near the city citadel', 'near the city gate', etc.

When the numbers are crunched, we learn that in Israel "there was a relative socioeconomic continuum [with] clear differences between the different strata but not a polarized reality of a few rich and many poor; between these two groups there appears to have been a middle class" (p. 68). The situation in 8th-century Judah was different, with "clear socioeconomic differences": "A narrow stratum of society was the wealthy elite, while the rest of the population was in a much worse economic condition" (p. 95). For 7th-century Judah the vast majority of the evidence comes from Jerusalem only, where "these gaps are wider" still. Towards the end of the chapter, the contrast between the two kingdoms is spelled out explicitly: "An analysis of the settlements shows that at the end of the eighth century B.C.E. there were usually only two classes in Judahite cities (except in Jerusalem, particularly in the seventh century B.C.E.): a lower class including the vast majority of the population . . . and a very limited upper class of the very rich. In contrast, in Israelite cities there was more of a spectrum between the richest and the poorest. The socioeconomic gap in Israel was no smaller, but there were also middle classes" (pp. 116–117). While specialists in the field may have been familiar with this picture before, Faust's analysis (to repeat) is certain to reach a broader array of readers now. For statements on this matter from the biblical prophets, one will wish to consult Amos and Isaiah for the northern and southern kingdoms, respectively.

Chapter 3 also includes a wide-ranging discussion on the role of the city gate, as the place of justice, as a commercial center, and as an area where the poor would gather. Faust garners a variety of biblical verses (e.g., Amos 5:12, Prov 22:22) in support of this last aspect, which has not received sufficient attention in the literature. As indicated above, by necessity Chapter 4 on the rural landscape constitutes a shorter treatment. The chapter divides the discussion between villages and farmsteads (the biblical חצרים [see Lev 25:31 etc.] most likely). The villages have a wall; most of the houses are of the four-

room type; the residences are quite large, c. 120–130 sq.m.; and these villages typically specialized in oil and wine production. The farmsteads are essentially a single large house, also c. 130 sq.m. or even larger, once more of the four-room type, with a pen for animals.

Faust makes the important point that the rural four-room houses are larger than their urban counterparts, a feature which translates into different social aspects: the former most likely housed extended families, "including parents, married sons and their children, unmarried daughters, unmarried aunts, and other relatives who remained living there for various reasons, slaves (?), agricultural workers, and others"; while the latter typically "were inhabited by nuclear families" (p. 160).

As one indication of how widely Faust reads the social-historical and social-scientific literature, I present here an instance of how he builds on the findings delivered in an article whose subject matter is far removed from the world of ancient Israel. Faust cites M. J. Kolb and J. E. Snead, "It's a Small World after All: Comparative Analysis of Community Organization," *American Antiquity* 62 (1997), pp. 609–628, to the effect that villages are characterized by three important components: a) social reproduction; b) subsistence economy; and c) self-identification. Faust finds all three of these elements present in the ancient Israelite villages, as revealed through the archaeological data: "they were large enough to entail social reproduction through the interactions of their components; the community enabled a subsistence economy; and the existence of boundary walls shows that the communities maintained a large degree of self-identity and differentiated themselves from the outside world" (p. 171).

The remaining chapters examine specific issues in the study of ancient Israelite society in more in-depth fashion: fortified structures attached to the military (Ch. 5); political organization in both Israel and Judah (Ch. 6); the four-room house (Ch. 7); and 'pots and peoples', to use the author's felicitous phrase (Ch. 8), though this chapter discusses other topics as well, such as faunal remains. Space does not allow a detailed summation of Faust's views on each of these subjects, though naturally many will want to read especially chs. 7–8 carefully, given the deep interest in and ongoing discussion of the four-room house, the collared-rim jar, and the presence or absence of pig bones. To be sure, much of the treatment appears in slightly different form in the author's *Israel's Ethnogenesis* (London: Equinox, 2006), so that his opinions on these subjects are by now well known. In short, while the 2006 book dealt mainly with the emergence of Israel in the historical and archaeological record, and the 2012 book under review concerns the period of the monarchy, a consistent picture emerges in the two different epochs. A prime example is the lack of painted pottery both in early Israel and in the later kingdoms of Israel and Judah.

On the question of whether or not one can tell an Israelite from a Canaanite, and vice versa, in the archaeological record, Faust directs the reader's attention to the rural villages, where the essential differences may be seen. In the northern urban centers (for example, Megiddo), "there are indications of Israelites and Canaanites-Phoenicians living side by side" (p. 249). Not so in the rural sector, however. The residents of the valley villages (e.g., Tel Qiri) were Canaanites-Phoenicians; especially noteworthy is "the great similarity between the villages discussed here and the Bronze Age villages" (p. 252). In the hill-country villages, by contrast, one finds evidence of a different population, with their four-room houses and so on – and these people, of course, are the Israelites.

If I had to select one sentence that serves as an overarching statement regarding this crucial issue, and which speaks to the essence of Israelite society, it would be the following: "in complete contrast to the heterogeneity typical of the Bronze Age population, Israel was far more homogeneous. Even though there were undoubtedly differences in wealth, property and status, the archaeological findings reflect an unprecedented architectural uniformity in all strata of society and in both kingdoms (evidence for a degree of shared ethnic identity). This uniformity is also reflected in the Bible" (p. 229), to which Faust add the following footnote, "Although minimalists see the picture arising from the Bible as a deliberate forgery of course" (p. 229, n. 25).

I do not mean to imply that the issue to which I have just devoted two paragraphs dominates the monograph – it does not – but given the intense interest in the subject, I thought it pertinent to say more than a passing word. Indeed, as the bulk of this review hopefully has demonstrated, the main points of discussion relate to kinship structure, community organization, socio-economic stratification, and the like.

To round out this review, note that Chapters 1 and 2 introduce the subject with the history of the field and the *status quaestionis*; a concluding Chapter 9 provides historical, diachronic analysis, as per its title "From Hamlets to Monarchy"; and an Epilogue provide some ideas about future directions. In sum, Faust has sifted (pun intended?) through an enormous amount of archaeological data buried (ditto?) in excavation reports, and then has distilled this data through the sociological and anthropological lens (as we have come to expect from his pen), in order to weave a coherent narrative depicting Israelite society during the Iron II period. The result is an elegant statement, from which historians, archaeologists, and biblical scholars alike will benefit.

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Katerina Galor and Gideon Avni (eds.), *Unearthing Jerusalem, 150 years of Archaeological Research in the Holy City*. Eisenbrauns, Winona Lake, Indiana, 2011, Pp. xix + 490 incl. figs. 204. $79.50. ISBN 978–1–57506–223–5.

This is a substantial volume on the history of Jerusalem as mainly revealed by archaeology. It is the result of a conference held in 2006 at Brown University in Providence, Rhode Island, USA and it encompasses the 26 papers delivered to the conference by distinguished scholars from several countries. The collection is divided into five parts, The History of Research, From Early Humans to the Iron Age, The Roman Period, The Byzantine Period, and The Early Islamic and Medieval Periods. Each period is covered by at least three papers which are all separate presentations but eventually add up to a comprehensive history. Each paper has its own bibliography and illustrations which leads to some duplication, but makes it easier to read it section by section, as the specialist is likely to do. On the other hand there is no index but, as the papers are concentrated each on one period, it is not difficult to locate the required subject.

The History of Research comprises seven papers, one each on the work done by the British (Shimon Gibson) the German Protestants (Ulrich Huebner), the Americans (Joan Branham), the Ecole Biblique (Dominique Trimbur), the Franciscans (Michele Piccirillo†), the Israel Exploration Society (Ronny Reich) and the Department of Antiquities and the Israel Antiquities Authority (Jon Seligman). All are useful summaries and give a fair background to the research efforts of the different nationalities.

The Early Humans section (Ofer Bar-Yosef) is a detailed analysis of the Paleolithic, Natufian and Neolithic cultures, very interesting in fact but rather remote from Jerusalem sites, except for some evidence of the PPNB in the early farming areas of Motza and Abu-Ghosh to the west of the city. The scant archaeological remains of the four thousand years from the late Neolithic to the Late Bronze Age are described by Aren Maeir, mainly as tombs inside and outside the city, and the later building remains of the LBA, when Jerusalem and its ruler Abdi-Hepa come into focus in the El Amarna letters. The importance of Jerusalem in the Iron Age is doubted by Israel Finkelstein who sees it as a reflection of the more successful Northern Kingdom as a vassal at times to Assyria, and which suffered greatly when it went on its own under Hezekiah. Yet he acknowledges that Judah achieved statehood in the eighth century BCE with a population influx from the north, after the fall of Samaria.

Part Three, the Roman period, opens with the proposal of Joseph Patrich that the Temple on the Temple Mount was situated alongside the large cistern no.5, where the bronze “sea” and laver could be fed with a water wheel, much water

being needed to flush the areas of animal slaughter, and thus he places the Temple diagonally across the Mount. The idea is shown on sketches by Leen Ritmeyer and it just looks out of place to see this grand edifice so to speak sliding awkwardly into the eastern wall , but the proposal has practical logic to support it.

Doron Ben-Ami and Yana Tchekhanovets describe the extensive work that is still in progress on the huge Givati parking lot, and which they identify as the "Palace" of the Royal Adiabene family who came to Jerusalem in the first century CE. It is a large rich site and, as described by Josephus, it was the major building in the Lower City, and the finds bear this out. The site exhibits strong evidence of the Roman destruction of 70 CE. when it appears that the inhabitants fled via the basement to the area of the Shiloam pool and beyond. The Pool and its surroundings are described by Ronny Reich and Eli Shukron who uncovered the shallow steps that surrounded it. It is assumed that this was a large public *miqveh*, or ritual pool, used by pilgrims before ascending to the Temple Mount and it is suggested that there were screens to provide privacy and modesty within this large pool. Also described is the long stepped passage that leads from the pool to the Mount which was built over a large drain that was found to contain domestic remnants, indicating that it was used by refugees fleeing from the wrath of the Roman army.

The paper by Zvi Greenhut shows details of a rare domestic unit on the hillside opposite the pool. It is a three-storey house set into the hillside and the majority of the sherds date from the late Hellenistic-early Roman period. These were the apartments of perhaps three families of high status, indicated by the fine panel decoration. Numerous coins from the excavation are listed by Donald Ariel, they were all bronze and included one rare sheqel of the Jewish War. Hillel Geva describes what he calls the "New City" of the Second Temple period, after it expanded to the north in the third and second centuries BCE and the area changed from agricultural to urban usage. It was later only lightly populated and not fully inhabited again until Byzantine and later periods. Judy Magness discusses Aelia Capitolina and states that by numismatic evidence we now know it was established by Hadrian before 132 CE. and therefore a possible cause for the Bar-Kochba war. She claims that, compared to the present Old City, it only occupied the northern half, the southern was occupied by the Tenth Legion where evidence is based on a Roman bath-house and an army bakery.

The Byzantine urban layout is carefully delineated by Oren Gutfeld by tracing the many different early pavings of the City which he uses to describe the location of its streets and buildings. He makes a careful analysis of the three types of street that vary in width, type of paving slab and types of under-road drainage. Leah Di Signi reveals unknown epigraphic evidence to the history of the Church of the Holy Sepulchre, some of it reflecting on a rebuild after the Persian invasion

of 614 CE. The hinterland of Jerusalem in the Byzantine Period is the subject of Jon Seligman's paper and he records the numerous monasteries that dotted the area around the city. He describes several of them in detail and expands on their agricultural surroundings, which included large vineyards producing over two million litres of wine annually.

The last part starts with the transition from the Byzantine to Islamic period by Gideon Avni. Although the Temple Mount was completely transformed by the building of the Dome of the Rock and El-Aqsa Mosque, there was little fundamental change elsewhere, although the Moslems were careful to eradicate as many Christian symbols as possible. The Kathisma Church, started in the 5th century, became a mosque and lasted until the eleventh. The Church of the Holy Sepulchre did not suffer but was renovated, though later partly demolished in 1009. Donald Whitcomb points out the importance of the Madeba Map to pilgrims who wished to visit the City, and the accuracy of the work by Al-Muqadassi (985 CE) in describing the layout of the Islamic city. The addition of six palaces, a diwan, a bathhouse and a mosque at the south-west corner of the Temple Mount represents the typical administrative compound of a Moslem town and incorporates all its essential elements. The City was divided into sectors, with the Moslems to the east, the Christians to the west and the Jews apparently in the south.

The ancient walls of Jerusalem are meticulously surveyed by Shlomit Weksler-Bdolah, who has conducted several digs along their line and describes the whole length in detail, beginning with the Romano-Byzantine works and all the various ins and outs of the Ottoman walls caused by bedrock moats, earthquakes, sundry destructions and later rebuildings. She tells how the walls were destroyed in 1219 to deny the city to any later Crusades and eventually rebuilt by Suleiman the Magnificent in the sixteenth century.

The wonderful Ayyubid monuments are described by Mahmoud Hawari in full architectural detail, showing how the austere style of the Ayyubids was able to incorporate many Crusader elements in secondary use, thereby enriching their plainness without too much effort. Finally Robert Schick details the Mamluk and Ottoman period with the lament that so much of it has been carelessly destroyed as being of little consequence, it should have all been recorded, and he makes a plea for what remains to be properly documented while it is still standing.

With its detailed accounts and descriptions of so many periods in the history of Jerusalem, it is fair to say that this is a very valuable volume that highlights the many fascinating aspects that make up the history of the Holy City in all its variety, eccentricity and beauty.

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Gershon Galil, Ayelet Gilboa, Aren M. Maeir, Dan'el Kahn (eds.), *The Ancient Near East in the 12th–10th Centuries BCE. Culture and History. Proceedings of the International Conference held at the University of Haifa, 2–5 May, 2010* (Alter Orient und Altes Testament, 392). Münster Ugarit-Verlag, 2012. Pp. xviii + 647. €116. ISBN 97838683506611.

Cleanly edited, handsomely produced, and nicely packaged, this large volume publishes over 30 studies by specialists in diverse disciplines, some of whom had not physically attended the conference. What brings the papers together is a focus on the shift from the second into the first millennium BCE, so a backdrop to the formation of Israel as a nation and as a culture. There is hardly any minimalist intrusion here, as much because few of the contributing Biblicists share that persuasion, as because a good number of papers deal with archaeology (so wielding criteria for dating) or with records from beyond Israel.

The articles are sequenced alphabetically by author, a pity in that such a large harvest can be unwieldy and few will read the book from first to last (600 page) to access its riches. Luckily, the Preface does compile them under several headings: Mesopotamia and Anatolia (5 papers), Egyptian empire (4), history of Israel (a dozen), The Philistines (8), and culture (5). The indexes (of authors, biblical sources, and subjects), rather rare in such collections, are helpful.

It would take *chutzpah* to evaluate contributions on so many subjects and points of view and I beg forgiveness for slighting many of them. Very useful are papers that give comprehensive (with limits) review of a subject, such as André Lemaire's "West Semitic Epigraphy and the History of the Levant during the 12th–10th Centuries BCE." The paper breaks out of its title limitations to cover inscriptions into the 8th c. More narrow in its goal, but no less appreciated is Alan Millard's brief overview "Scripts and their uses in the 12th–10th Centuries BCE." Here belongs also several reviews/overviews of archaeological excavations, among them Yosef Garfinkel, Saar Ganor and Michael G. Hasel's "The Iron Age City of Khirbet Qeiyafa after four Seasons of Excavations," Moti Haiman's "Geopolitical Aspects of the Southern Levant Desert in the11th–10th Centuries BCE," and Larry G. Herr's "Jordan in the Iron I and IIB Periods."

A set of papers researches moments in Mesopotamian and Egyptian history, some less relevant than others to the volume's subject. Yigal Bloch's "Assyro-Babylonian Conflicts in the Reign of Aššur-rēša-iši I" nicely illustrates its subtitle, "The Contribution of Administrative Documents to History-Writing." It sharpens the disadvantage facing historians of pre-monarchic Israel (precisely the period studied in this volume) in lacking equivalent documentation. Dan'el Kahn goes beyond his title "A Geo-Political and Historical Perspective of Merneptah's Policy in Canaan" in reviewing Egyptian military involvement in the Western Mediterranean through

Dynasty 20. His first paragraphs are filled with bibliographical information on the famous mention of "Israel" in the pharaoh's stela. He hardly does anything with it, however. Troy Leiland Sagrillo evaluates "Šîšaq's Army: 2 Chronicles 12:2–3 from an Egyptological Perspective." He is impressed by the Chronicler's sound, albeit occasionally anachronistic, control of military details that were not extant in 1 Kings.

John P. Nielsen tells us a about success on "Nebuchadnezzar I's Eastern Front." Frederick Mario Fales offers a "A Retrospective View" on "Ḫanigalbat in the Early Neo-Assyrian Royal Inscriptions." Rather than being moribund after the failure of Mitanni, Hanigalbat remained an entity around the Ṭur Abdin plateau well into the ninth century. Mario Liverani reports on recent excavations at Arslan Tepe in offering a review of "Melid in the Early and Middle Iron Age: Archaeology and History." Several papers survey our knowledge of the evidence but not without a specific point to make; among them are Ran Zadok's "The Aramean Infiltration and Diffusion in the Upper Jazira, 1150–930 BCE," an update of his Tadmor Volume study (1991), Christoffer Theis and Peter van der Veen's "Some 'Provenanced' Egyptian Inscriptions from Jerusalem: A Preliminary Study of Old and New Evidence," and Ephraim Stern's compact collection of evidence for the culture of northern Sea People (the Sikils among others) as inspired by his Tel Dor excavations, "Archaeological Remains of the Northern Sea People along the Sharon and Carmel Coasts and the Acco and Jezrael Valleys BCE."

For obvious reasons, the Sea People are nicely featured in this volume, with interest on their encounter with the Egyptians then in control of Palestine (Wolfgang Zwickel, "The Change from Egyptian to Philistine Hegemony in South-Western Palestine during the Time of Ramesses III or IV"; Assaf Yasur-Landau, "Chariots, Spears and Wagons: Anatolian and Aegean Elements in the Medinet Habu Land Battle Relief") to their settlement in the Pentapolis in the southern Levant (Avraham Faust, "Between Israel and Philistia: Ethnic Negotiations in the South during the Iron Age I"; Aren M. Maeir, "Insights on the Philistine Culture and Related Issues: An Overview of 15 Years of Work at Tell eṣ-Ṣafi/Gath"). Although titled as a question, Michal Artzy does find evidence for "Continuation and Change in the 13th–10th Centuries BCE: Bronze-Working Koiné?" Walter Dietrich's "David and the Philistines: Literature and History" can be read in conjunction with some of these papers as well as the report on Tel Qaiyafa (above), as he reassesses, with due caveats and caution, the biblical testimony on the matter.

Most interesting within this group, is the late Itamar Singer's "The Philistines in the North and the Kingdom of Taita," a paper that goes beyond exploitation of newly recovered evidence for Philistine settlement in the Amuq region of North Syria. By opening on a pungent review of Susan Sherratt's thesis about the indigenous, socio-economic rather than migratory context for

Philistine culture and by linking exploration of the past with what he calls the "interpretive Zeitgeist" in our days, Singer gives us good reason why we will deeply miss his searching intellect. He writes with much excitement (as well as heroic evocation of his own past suggestions) about the kingdom of Palastin, elsewhere known also as Walistin, warning us all against a too hasty association with the familiar Philistines. Amen to that.

Several studies are hard-core contributions to ideas generated in the Bible, some to collate details drawn from archaeology, comparative religion, and biblical testimony, for example Wolfgang Zwickel's "Cult in the Iron Age I–IIA in the Land of Israel." Reinhard Achenbach offers his own take on "Divine Warfare and Yhwh's Wars: Religious Ideologies of War in the Ancient Near East and in the Old Testament" by carrying the analysis deep into the first millennium. Two papers reflect on the construction of Solomon's temple. The late Victor Avigdor Hurowitz updates his fundamental study with "Yhwh's Exalted House Revisited: New Comparative Light on the Biblical Image of Solomon's Temple," by referring to newly recovered temples in neo-Hittite Cilicia. He confirms the Bible's vivid knowledge of temple construction, symbolism, and ceremonials in the ancient world. Gershon Galil goes one better and strives to make biblical testimony contemporaneous with the temple's construction ("Solomon's Temple: Fiction or Reality?"). Since no ruler in the ancient world leaves testimony of a building inscription to honor a predecessor, Solomon (or his circles) should be credited with the Bible's testimony. Whatever the truth of his insight, it remains dubious to compare biblical descriptions on the temple embedded in narratives and manipulated over the centuries with the punctual testimony of royal building inscriptions. On this basis, we might attribute to Moses (or his scribes) all those cultic constructions reported in the Pentateuch. Yet historiographic narratives that we find in Greece are full of reports on the construction of shrines that are attributed to venerable ancestors. This is not to say that we must date what is said about Solomon's temple to a corresponding age but that it is always best to draw comparisons from material in the same genre.

A number of papers have slight linkage with the conference's theme; they are welcome nonetheless. Yigal Levin reflects on "Ideology and Reality in the Book of Judges," distinguishing between stories about individual judges that are realistic to life in Iron Age I and a Deuteronomistic framework that artificially massages them into an ideology of a covenantal based kingship. The thesis is similar to other proposals (see my Anchor Yale Bible commentary, now in print), but Levin rehearses the issues cleanly. Koert van Bekkum ("Coexistence as Guilt: Iron I Memories in Judges 1") too finds memory of Iron I culture in the opening chapter of Judges1 despite the manipulation of the text over time. Moshe Garsiel revisits comprehensively his scarcely verifiable hypothesis that the Books of Samuel were

the products of two authors living at opposite ends of Solomon's reign. His final pages summarize it once more. Michael Avioz asks, "The Davidic Covenant in 2 Samuel 7: Conditional or Unconditional?" before opting for the former.

Aaron Koller offers a title that covers it all, "The Kos in the Levant: Thoughts on its Distribution, Function, and Spread from the Late Bronze to the Iron Age II" to which is attached an appendix on excavated examples. For him, the *kôs* is a bowl, an identification that gives him leave to discuss banqueting, feasting, and artistic depiction about such occasions. Yet there are enough references for the *kôs* as held with one hand to suggest that it also was a goblet or a cup, however large it might be. (In a Mari metaphor, a *kāsum* had a mouth large enough to catch excrement.) I imagine that the term applied to a variety of drinking vessels and it might not be useful to insist on just one form. Richard S. Hess offers a rather parochial look at "The Distinctive Value of Human Life in Israel's Earliest Legal Traditions." For him Israel's law of slavery and of homicide shows it espousing the "fundamental equality of all people and the unique worth of each person." Hard to accept are analyses that cut across literary categories and are unconfirmed by living documentation.

By no means least because here it is last, is editor Sandra Jacobs's "נפש תחת נפש 'A Life for a Life' and *napšāte umalla*," an appealing, detailed study that perhaps is too categorical in deciding that a living substitute is intended when the phrase occurs in the Covenant Code. תחת cannot mean "a substitute" in the famous talion formulations ("an eye for eye…") and it takes special pleading to claim them irrelevant to the thesis. All in all, this is a stimulating volume, providing a good inkling on research in these early decades of the new millennium.

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Joan E. Taylor, *The Essenes, the Scrolls, and the Dead Sea*. Oxford: OUP, 2012. Pp. 448 pages, incl. 56 figures and col. plates. £30.00. ISBN 978–0–19–955448–5.

This is a book of two halves. The first is a prodigious work of scholarship by the Professor of Christian Origins and Second Temple Judaism at Kings College, London, delving into the Essenes in Ancient Literature. This is not my field of expertise; moreover, as this review is for an archaeological journal, I will make only one minor comment on this essentially textual study. Taylor successfully brings the Essenes from the outer margins of Judaism where they have often languished, into a more mainstream position in Judaic philosophy. But in doing so she does, perhaps, over emphasize the influence they might have had in day-to-day practical

life. They 'were not a small group' (p. 196) she writes, quoting classical authors who variously used words such as 'throng' or 'multitude' or 'huge numbers' in reference to Essenes. Yet if those same authors' figure of 4,000 is correct that is a very small proportion of the total population in the Second Temple period, which historians have estimated as about 4,000,000 of whom half were Jews, 1,250,000 were Samaritans, and the rest 'foreigners'. Thus the Essenes were only 0.2% of the total Jewish population. The second half of the book, which attempts to place the Essenes near the Dead Sea, and, in particular, at Qumran, is less convincing. The meticulous scholarship of Part I is less evident, particularly in the coverage of the archaeology.

Although certain classical authors place the Essenes vaguely in an area northwest of the Dead Sea, the site of Qumran is never specifically mentioned. Taylor wants us to believe that the Essenes received Qumran as a gift from Herod on the basis of a possibly apocryphal story in Josephus. At the end of a passage concerning Herod's attempts to recover the goodwill of the people at a time of unpopularity during his reign, in part by releasing them of a third part of their taxes, his current problems are dropped and a story of his childhood is tacked on in which one Menahem the Essene predicted that he, Herod, would become King of the Jews. As a result, we are told, Herod honoured the Essenes, though it does not indicate any particular manner in which they were so honoured. Taylor, whilst being initially cautious - 'If it is historically correct that the Essenes ... received honours and gifts from Herod ...' (p. 128) – nonetheless goes on to take the leap that the 'surmise that the gifts given by Herod to Essenes included a tract of land between En Gedi and Jericho' (p. 247). Even if the story is true and not merely an indication of Josephus' own interest in divination, and if a youthful Herod was indeed impressed by one soothsayer's predictions it seems entirely out of character that the adult Herod would relinquish control over a small part of his important Jordan Valley holdings that stretched as far south as En Bokek. He does not come across as an altruist who might carelessly give something away without clear gain for himself. The work of another scholar is invoked as supporting the supposition; 'as Samuel Rocca noted ... Herod also gave gifts of parts of his royal estates.' (p. 270). However Rocca indicates that the Jordan valley estate was exploited directly by the crown and that most of 'Herod's gift lands and colonies were situated outside the Jewish areas.' (Rocca 2008: 215).

Taylor says that 'Josephus' description creates many gaps it is all too easy to fill with assumptions,' (p. 103) and to me the gift of Qumran to the Essenes by Herod is one of them. To consider whether it is likely that Herod would give away Qumran to the Essenes, or to anyone else, it is necessary to look more closely at the archaeology of the Royal Estate in Jericho, a site with which, having excavated there for ten years, I have some familiarity. Too much reliance is put on the

descriptions of Jericho given by Josephus and Strabo. Taylor writes that the Jericho area was 'watered from the highly esteemed spring at Ain es-Sultan' (p. 311 and see p. 226) based on Josephus, who accounted for the large area under irrigation to the erroneous belief that the spring 'waters a larger space of ground than other waters do,' but was unlikely to have traipsed all over the Royal Estate. Somewhat misleadingly Taylor mentions briefly that Strabo refers to the Hasmonean palace 'which he' (i.e. Strabo) 'notes had gardens stretching northwards and eastwards, involving complex irrigation systems.' (p. 217). Strabo merely refers to a large garden 'watered with streams' and the more precise details come from the published archaeological record although it is to be noted that the volume dealing specifically with the irrigation systems (Netzer, 2004) does not appear in the bibliography and Taylor does not question whether Josephus' claim may be too simplistic.

Ain es-Sultan had, of course, supported a settlement in Jericho since Neolithic times but when the Hasmonean dynasty, in need of a steady source of income, saw the possibility of harvesting large quantities of two high value cash crops, dates and balsam, if only they could irrigate previously uncultivated land, they had to go to considerable lengths to bring water by aqueduct from Ain Qelt, c 8 km to the west in Wadi Qelt, as the Sultan spring had no spare capacity. This water did allow for the successful development of irrigated agriculture on the flat land to the north of where the Wadi Qelt emerges from the scarp cliffs. Land to the south of the wadi, however, was irrigated, by a huge pool, Birkat Musa, 'the largest man-made water tank ... in the country' (Netzer and Garbrecht 2002, 377), which must have been fed by diverting some of the permanent, and occasional flood, water that ran in the wadi. Only as agriculture flourished did palaces begin to be built on the north bank utilising the same water supply. To expand irrigated agriculture on new fields to the east of the first plantations, and to allow for larger palaces to be built, the Hasmoneans had to be bring water from Ain Na'aran, to the north of Ain es-Sultan, by an aqueduct that had to run for some 5 km along 'tortuous contours' (ibid 373) on the scarp face. As it would have required frequent repairs following winter floods its water would have been 'expensive'.

When Herod wanted to further increase the water supply for the estate he brought water to the head of the Na'aran aqueduct from Ain el Auja a further 8 km to the north. The total course to the fields would have been at least 14 km. He also exploited the two upper springs in Wadi Qelt by building a 20 km long aqueduct, which 'incorporated ten bridges and five tunnels in order to overcome the many small ravines descending into the wadi' (Garbrecht and Peleg 1994, 167). The Qelt water was used to develop fields south of those irrigated by Birkat Musa, fields which may have reached to within 8 km of Qumran. Thus ultimately all the water required for the success of the Royal Estate had to be brought to the site either by a 14 km long aqueduct from the north; by two from the west, one 8 km long, the other over 20 km; or was gathered in

the largest open pool in Palestine With the difficulty that was encountered bringing water to the Royal Estate it seems certain that both the Hasmoneans and Herod would have exploited, and kept under their control, the locally falling rain water that could be gathered with comparative ease at Qumran only 14 km to the south, not for agricultural purposes, because the land there was not suitable, but for various water intensive industries producing low return, but necessary, goods without using the 'expensive' water of Jericho itself. It is unlikely that either the Hasmoneans or Herod would have tolerated a group of people exploiting this water for their own purposes, which would have been seen as a major sign of political weakness, particularly as Qumran was at the foot of a track leading up into the Buqe'ah.

An unusual feature of the water system at Qumran is a water raising dam (as against a baffle dam that diverts water into a side channel or directly into a cistern). It is not mentioned by the classical authors nor by Taylor. Its construction would have required specialised and expensive technological knowledge, probably from Roman engineers, something only likely to be available to Herod. He probably received assistance from Marcus Agrippa, and the dam, whilst prestigious in itself, was primarily designed to expedite the construction and supply of two of Herod's most impressive constructions, Hyrcania and Herodium. Herod was a keen builder, an enthusiasm he shared with Agrippa. When visited by Agrippa in 15 BCE Herod proudly escorted him around his prestigious building projects. It seems inconceivable that Herod would relinquish control over a site that played a part, however minor, in his building programme.

Based on the pragmatic realities of the water systems of the Royal Estate in Jericho – very much glossed over in this book - and of the dam in Qumran, which is not mentioned at all (rather than on a possibly apocryphal story, and a supposed act of uncharacteristic generosity on the part of Herod),equally valid alternatives to some of the archaeological interpretations of Qumran, accepted here by Taylor, will be advanced in my forthcoming volume *Qumran Revisited*, whose publication is scheduled with Archaeopress of Oxford. Taylor emphasises that the area widely surrounding Qumran was exploited in the Hasmonean period for 'both military and economic reasons' (pp. 221, 223, 239, 247) although little thought is given to what the economic exploitation would be in Qumran itself where the growing of crops would be extremely limited. In an article published in an earlier manifestation of Strata (Stacey 2008) I pointed out that the Dead Sea littoral had been used since time immemorial for winter grazing of sheep brought down from the Buqe'ah in the brief period of verdancy following winter rains. During our long winter seasons excavating in Jericho in the 1970s and '80s we were aware that such transhumance still continued. Following rain we would see flocks being brought down to the plains under the control of Bedouin shepherds, although our Bedouin workers explained that the sheep belonged to fellahin in the hills, and that the mutually

beneficial relationship between the families of the owners and of the shepherds went back many generations, the sort of relationship that Essene shepherds may well have had with clients two thousand years ago. I suggested that a sizeable part of the economic activity in Qumran was to do with the seasonal presence of those sheep, generating the production of wool, hides, glue etc. Although my article is referred to (p.268 where the quote reads: 'As David Stacey has noted, Qumran must have been a locus of seasonal activity, manned only by guards during the hottest months of the year, when life here would have been almost intolerable.' This is not strictly true as I envisaged the site totally abandoned in the summer months and did not suggest any 'guards'), the presence of sheep is ignored and not discussed. Indeed it is unclear what economic activity is envisaged for Qumran during the Hasmonean period.

Too much uncritical reliance is placed on the work of others e.g. Humbert (p. 252–3) and Mizzi (p. 260). Mizzi's claim that the number of stone vessels found at Qumran is greater 'than is usual at comparable sites' (p. 260), and thus reveals an unusual concern with ritual purity, may be undermined by the publication, hopefully early in 2013, of *Hasmonean and Herodian Palaces at Jericho Vol V*, edited by Rachel Bar-Nathan. Taylor states that from the time of Herod there was a 'radical change to the Hasmonean square structure ... consistent with new occupants creating industries not original to the site' (p. 342 my italics). Whether an isolated 'Hasmonean square structure' ever existed either as 'a property of the Hasmonean aristocracy' (thus Humbert), or as 'a fortified farmstead' (thus, apparently, Mizzi, p. 260) seem unlikely as there was neither sufficient water for farming or for year round occupancy, nor any signs of architectural luxury. And are we to believe that the industrial unit in the west is only a Herodian addition - unlikely as, at least in L 101, Hasmonean jars and mudbrick presumably fallen at the time of the earthquake of 31 BCE were found; or that the pottery kilns beneath L 48/9 are not Hasmonean (have they, perhaps, been relegated to the Iron age along with the inconvenient pools L 117 and L 118 in an as yet unpublished article noted on p. 253. f.n.28)? The archaeological details are discussed fully in my forthcoming book in which I conclude that the industrial exploitation of Qumran began under the Hasmoneans and that its products were of equal importance in the Herodian period. What changed was the expansion and ambition of the royal building program.

In the final chapter the Essenes are assigned a particularly important, possibly exaggerated, role in the gathering and processing of herbal remedies near the Dead Sea. In an age when everyone had to rely on herbal remedies the Essenes certainly did not have a monopoly over them. The Dead Sea region did have some unique flora, useful for both dyes and medicine, which the transhumant shepherd would have been in an ideal situation to gather. Other plants, said by classical sources to be of importance in the Dead Sea pharmacology, are scarcely to be

found there and could be found far easier elsewhere. In the Hebrew University's online 'Flora of Israel' (http://flora.huji.ac.il) neither Mandrake nor Madder are considered as having a distribution near the Dead Sea, and Rue is far more common in the uplands. Whilst the classical scholarship makes the first half of this book such a success, an over reliance on those same sources, as opposed to delving into the pragmatic realities of the 'facts on the ground,' reduces the efficacy of the second.

Garbrecht, G. and Peleg, Y., (1994). "The Water Supply of the Desert Fortresses in the Jordan Valley," *BA* 57/3: 161–170.

Rocca, S., (2008). *Herod's Judaea*. (Tübingen: Mohr Siebeck).

Netzer, E., (2004). "Hasmonean and Herodian Palaces at Jericho." Vol. II. IES Jerusalem

Netzer, E. and Garbrecht, G., (2002). "Water Channels and a Royal estate of the late Hellenistic period in Jericho's Western Plains." Pp 367–379 in Amit, Patrich and Hirschfeld (eds). *The Aqueducts of Israel* (JRA Supplementary Series 46, Portsmouth R.I.).

Stacey, D., (2008). Seasonal Industries at Qumran. *BAIAS* 26, 7–29.

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Anthony Frendo, *Pre-Exilic Israel, the Hebrew Bible, and Archaeology: Integrating Text and Artefact* (Library of Hebrew Bible/Old Testament Studies 549; London: T&T Clark, 2011). Pp. xii +120. $120.00. ISBN 9780567415639.

The author of this excellent examination of method in the study of the archaeology of ancient Israel states at the start of his work that the book is long overdue partly because of 'new administrative tasks assigned to me at the University of Malta, as well as the pressure of deadlines linked with the publication of academic papers' (p. xi). Unfortunately, the present reviewer has been in much the same situation, so that this review in *Strata* is long overdue, and I do thank Sandra Jacobs and the editor David Milsom for their patience.

Having now read and digested Anthony Frendo's work in full, I can sum it up by the short recommendation of 'essential reading' for all those working in the field of the history and archaeology of Israel. It is not a long book, but every chapter homes in on key issues that have – dare I say – stymied academic discussion of evidence. Frendo identifies that the key problems in regard to maximalist and minimalist positions (and he does not like these terms) are epistemological and methodological, and therefore tries to explore an elementary grammar on 'joining, without confusing, written and non-written evidence' (p.7).

Both archaeological and literary evidence provide gateways to the actual past, but both can be preserved randomly, in a fragmentary and selective state. While postmodern theorists have championed the subjective, seeing history as invariably a text of the present and the search for the actual past a futile one (p.52), Frendo notes the inherent confusion here between history and historiography. History is knowledge of the actual past, but historiography is a reconstructed presentation of the past (p.14). How do we find out what was actual? The study of texts and the analysis of archaeological material must go hand in hand in a methodology of critical realism.

In proposing this, Frendo stands firmly in a camp opposed to 'postmodern' notions that would accept textual evidence as useful only if it is subjected to tests that are impossible to do, without allowing any tests on its own claims. The view that texts are too subjective to be valuable for understanding the actual past is countered by careful, informed and coherent analysis. He notes that the maximalist and minimalist argument is largely about whether we endorse the relativism and scepticism found within the 'postmodern' position on texts. He does not. However, he takes the subjective as an essential beginning point, in that every researcher begins with unproven assumptions that need to be carefully examined (p.101).

The historiography of the classical world is brought to bear on the question to show how such authors as Herodotus, Thucydides, Quintilian and Polybius knew their fables from their fact: a *fabula* was not a *historia*, though an *argumentum* could be a more complex entity. The question then is one of genre, in regard to the biblical narratives, or multiple genres, and what the authors thought they were doing in the 6th century when they collected together both oral and written material in the final forms of the texts that became in due course canonical. Frendo insists time and again on just how many components of these texts have to be pre-exilic for the various redactional and interpretive elements to come into play.

Frendo rejects a literal and simplistic face-value reading of texts, and insists on the undertaking a kind of archaeological examination of literary material, with careful analysis of their composition and redaction history, context and so on. This must be done independently of archaeological examination, so that the historical material and the archaeological data can then be compared.

In Frendo's view, archaeology cannot really prove texts or *vice versa*; what one ultimately hopes for is a convergence or compatibility of data, the 'converging probabilities' long ago proposed by Newman (p.100). Absence of evidence does not prove a negative. You cannot claim that a city like Byblos did not exist in the Late Bronze and Iron Age when it is otherwise attested in the Tell el-Amarna tablets, among other evidence, even though there are no strata of this time (pp.30–31). However, positive archaeological evidence that is contrary to a historical

thesis can disprove it. This is the principle of falsification rather than verification (p.5); logically two contradictory statements cannot both be true at the same time. The main point is that if something did take place historically then existing archaeological and historical evidence should point in the same direction (p.105).

In Chapter 7 Frendo provides some discussions that demonstrate how his method can be used, in particular he looks at how archaeology can illuminate Rahab's house, particularly the word *gir* (probably 'edge'), in Josh. 2: 15. He explores how the text itself is composed of layers of a core piece of narrative and then a later editorial explanation (15a and 15b), as evidenced by the Greek Septuagint (LXX) version. He likewise explores developments of walls from the Middle Bronze to the Iron Age. The point is that an Late Bronze house built into the ruins of a Middle Bronze wall with its back wall forming the city wall is 'explained' to later readers familiar with a casemate wall in which the back broad room formed a compartment, where presumably a window would not be expected. Frendo also notes how the LXX rejects the addition of 'with a rope' so that the original text should simply read: 'she let them down through the window' (p.78); this piece of the story originated at a time when people still understood the kind of house being described.

The macro-archaeological question of pre-exilic Israel as an entity is tackled in Chapter 8 not so much by archaeology but by textual study of numerous relics: these are already evidenced in the 8th and 7th century prophets, and were traditions that were used then in post-exilic Israel, with a certain spin. The notion that if a text is rhetorical, or even propagandistic, it cannot preserve truth and must be classified as fiction is given short shrift (pp.102–3). Frendo quotes James Barr to support the notion that 'ideology is a set of ideas – it can affect historical narrative and bias it, but it does not originate it' (p. 102). The story has to begin somewhere else.

Frendo completed his book ahead of important studies, which he acknowledges, by Philip Davies, Hugh Williamson and Lester Grabbe, all of which appeared in 2007, and it would be interesting to know how he would now present the debate about the discoveries at Khirbet Qeiyafa. There is undoubtedly more he could say, and he will, time permitting. He is careful to respectfully endorse points made by scholars with whom he engages critically, and he writes clearly and concisely, with quite important points made in the notes as well as the main text. He has read and processed intelligently a vast number of important scholarly works and writes with great erudition. Most significantly, he is convincing. His approach is clearly one that is essential to apply if progress is to be made in understanding pre-exilic Israel and this book is extremely important reading for students and scholars in the field.

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Jodi Magness, *The Archaeology of the Holy Land from the Destruction of Solomon's Temple to the Muslim Conquest*. Cambridge: Cambridge University Press, 2012. Pp. 385 incl. illustrations. $32.99. ISBN: 9780521124133.

In this beautifully-produced volume, Jodi Magness provides a superb introduction to the archaeology of the region of ancient Palestine, and creates a focus that is somewhat different from the usual presentations of 'biblical archaeology.' Magness puts the issue of pre-exilic Israel largely to one side (though it is profitably discussed in relation to Jerusalem on pp. 24–46), and concentrates on a time period that has been somewhat neglected, at least in terms of a holistic appraisal, from the Second Temple to Byzantine periods. This book is an invaluable overview and full of Magness's characteristically sound and insightful judgements. It will be much used by students and scholars alike, even without footnotes.

Magness is concerned to introduce the material, and thus in each era she begins with looking at the general historical situation of the eastern Mediterranean and Middle East, and then the specific historical situation of Palestine, with maps to orientate the reader, thereafter introducing some key archaeological sites and artefacts. In the Introduction she looks at the region and its peoples, and notes her use of 'Palestine' as referring to the modern state of Israel, Hashemite Kingdom of Jordan and Palestinian Territories. She provides a review of chronology, and the subject of archaeology, including its basic principles, including methods of dating.

Magness then turns to Jerusalem, in Chapter 2, considering here the topography (with reference to biblical texts) and pre-exilic background, including water systems. The Babylonian and Persian periods are discussed in Chapter 3. Here there is a careful appreciation of the division of the land between the Sanballat dynasty (in Samaria), the Tobiads (in Rabboth-Ammon) and Nehemiah and his successors in Jerusalem, with comments on Persian remains in Jerusalem, Mt. Gerizim, Tell Jemmeh, Kedesh, Dor, Ashkelon and the Wadi ed-Daliyeh cave, which takes us into the Hellenistic era (post 331 BCE). The amount of Greek pottery and coinage in Persian-period coastal sites is presented, and serves to show how already before Alexander the cultural influence of the West was felt on the Palestinian seaboard, with the local imitations minted by the fourth century BCE, even before Alexander's conquest.

The Early Hellenistic Period (332–167 BCE) is discussed in Chapter 4. The archaeological sites presented are Samaria and Shechem, Straton's Tower, Jerusalem, Iraq el-Amir (Tyros) and Marisa, with Magness rightly noting the influence of Alexandria here. Sidebars describe the Zenon papyri and Greek architecture. The better known era relating to the Maccabean revolt and the Hasmoneans is covered in Chapter 5, with a presentation of Jason's tomb and Petra, though not the Hasmonean palaces now so well-known from Ehud Netzer's work,

probably because these are looked at in terms of their Herodian developments (in Chapter 8 and 10), and in fact the index entry of 'Hasmoneans' is worth following to find a wider corpus of Hasmonean material.

Chapter 6 contains a summary of the discovery of the Dead Sea Scrolls and Qumran, which is justified given that the Scrolls have loomed so large in terms of the archaeological discoveries of the region. Magness's understanding of Qumran as being occupied by Essenes is clearly argued, with a focus on animal bone deposits as representing the remains of communal meals, ritual baths for the careful maintenance of ritual purity, a majority of adult males in the cemetery representing a largely male group, and special toileting arrangements reflecting Essene practice as described by Josephus. Magness appears to cite the chronology given by de Vaux (p.112), but actually it is her own, viz. 'in the second half of the first century B.C.E., the settlement suffered two destructions: by earthquake (31 B.C.E.) and by fire (ca. 9/8 B.C.E). After the earthquake, the inhabitants cleaned up the site and repaired the buildings. After the fire, which seems to have been the result of an enemy attack, the inhabitants abandoned the settlement briefly before reoccupying it.' De Vaux's conclusion, in his influential synthesis *Archaeology and the Dead Sea Scrolls* (1973), was that the fire probably arose as the result of the earthquake (pp.22–23), after which the buildings were not immediately repaired and the site abandoned, with the repairs leading to the beginning of Period II done in the reign of Archelaus (4–1 BCE). Magness has (in my view correctly) countered de Vaux's theory of post-earthquake abandonment, and also argued persuasively elsewhere for Period Ib continuing through to a fire caused by human agents sometime *after* 9/8 BCE, see *The Archaeology of Qumran and the Dead Sea Scrolls* (2002), p. 66–69. At any rate, the difference between her chronology and that of de Vaux needs to be clarified in the next edition or printing.

Chapter 7 begins a series of chapters on the archaeology of the Herodian period, with special attention here given to Jerusalem. This chapter is very useful for those interested in the city at the time of Jesus and the First Revolt. Chapter 8 turns to Caesarea Maritima, Samaria-Sebaste, Herodian Jericho and Herodium, and Chapter 9 to the region of Galilee, with the context of Jesus explored in Sepphoris, Capernaum, Chorazin, Gamla, Nazareth and the Sea of Galilee. Chapter 10 is a very good summary of the archaeology of Masada, while Chapter 11 provides a clear presentation of types of tombs from Iron Age II through to 70 CE, with a section here on the historical evidence for the death and burial of Jesus and his brother James, with a sidebar countering the claims made about the Talpiyot tomb and James ossuary (pp. 245–54).

Chapter 12, on the period from 70 CE to 135/136 CE concentrates on the Nahal Hever and Nahal David discoveries by the Dead Sea, while Chapter 13 turns to Hadrianic Jerusalem (actually 135–300 CE), while using the 6th Madaba mosaic

map, which may be misleading for some readers, though this is to show the core design of the decumanus and the Hadrianic northern gate. In Chapter 14 Magness provides a succinct summary of her argument concerning the dating of synagogues, in which she presents the traditional typology but questions in particular the early dating of some of these types, preferring a dating in the fourth to sixth centuries, and she provides also a succinct and useful discussion of the Helios and Zodiac cycle on synagogue mosaic floors. The final Chapters 15–17 take readers through Byzantine Palestine (313–640 CE) and on to the early Islamic period. Chapter 15 concerns Jerusalem, with a review of the Church of the Holy Sepulchre, Nea church and the Cardo, while Chapter 16 looks at Beth Shean, Gerasa, the Negev, desert monasteries and Chapter 17 the Dome of the Rock and al-Aqsa.

Throughout, the book is very nicely illustrated, with numerous fine photographs, many of which were taken by Magness's photographer husband Jim Haberman. My only significant criticism is that there is no extensive bibliography, and only a few selected books and articles appear at the end of each chapter. While it might be justified that footnotes should not be included, for such an introductory work, the lack of a more significant bibliography means that many of Magness's own important scholarly articles are not provided for further reading, even when they form the basis for certain chapters. Nevertheless, this is a very good book that does exactly what it intends to do, in introducing the archaeology of Palestine to beginners in the field. It will be much used in classes for years to come.

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Lester L. Grabbe and Oded Lipschits (eds.), *Judah Between East and West: The Transition from Persian to Greek Rule (ca. 400–200 BCE).* London: T & T Clark, 2011. xviii + 317 pp. $140.00. ISBN 978–0–567–04684–0.

This volume includes many of the papers that were given at a conference in Tel Aviv that was planned for 2001 but in the event was not held until 2007. Judging from the conference programme, which is also included in the volume, it would appear that some of the papers were subject to considerable further revision in the meantime. It is noteworthy here as well that the conference was partly sponsored by the (British) Academic Study Group for Israel and the Middle East, hence explaining why most of the participants were from either British or Israeli universities.

The thirteen papers that are published are summarized at length in an introduction by Grabbe (in fact, at 30 pages the introduction is nearly the longest

'article' of all), and although he valiantly tries to bring some of the material together in his final section on 'themes and topics', nothing can hide the great diversity of contributions. The 200 years in question are historically among the least well known in the entire history of Judah from the beginning of the first millennium BCE to the present. The written sources that address it directly are few (as Grabbe shows in his own contribution), the attribution of others (such as biblical texts) to this period is highly controversial (as illustrated here by the survey and discussion by Lena Sofia-Tiemeyer), the nature of the relevant archaeological evidence is a matter of dispute, as I will discuss below, and even the question of the self-identity of the inhabitants of Judah is less clear than one might have supposed (see James Aitken).

One valuable source is, or ought to be, the later historian Josephus. It is generally agreed, however, that he was not as clear as we might have hoped about the closing decades of Persian rule; he seems to have thought, for instance, that there were only two kings Artaxerxes and Darius, whereas in fact there were three. The result is that in our terms he shortened the period by at least as much as two generations. This not only adds to our problem in dating some items that he records (to which Artaxerxes is he referring, for instance), but it also suggests that he himself might have had some difficulties in knowing what happened when. A few decades ago some elements in his narrative which had been previously dismissed as unreliable appeared to be vindicated by the discovery of the Wadi ed-Daliyeh papyri, but more recent research, not least by Grabbe himself, has reignited the debate. Since this relates in particular to the development of religious life in the northern part of the country, and further to the question of the dealings that Alexander the Great may or may not have had with Jerusalem and the nascent Samaritan community in either Samaria or Shechem, it is also relevant to note that recent archaeological work on Mount Gerizim has suggested that the Samaritan Temple may have been built as early as the middle of the Persian period and not in the early Hellenistic period (say around 300 BCE), as had previously been thought, not least because of Josephus. It is not difficult, therefore, to understand Grabbe's expressions of frustration in his introduction, when he deals in particular with the chapters by Menachem Mor and Aryeh Kasher. Mor seeks to defend Josephus's account of the building of the Samaritan temple, which obliges him to dismiss the evidence of current archaeological research which was undertaken since he originally formed his views on this subject quite a long time ago, and Kasher seeks to defend Josephus's account of a meeting between Alexander and the Jerusalem High Priest, for which, of course, there is no other evidence and which Grabbe regards as unlikely in the extreme. These disagreements are interesting in themselves, but they also serve to illustrate well how many uncertainties we face as we try to understand this elusive period which was nevertheless so crucial for the emergence of Judaism and Samaritanism in their recognizable later formats.

Without being able here to discuss every paper, it will be appropriate in Strata to note especially the contribution from archaeology to these debates. Some details are relatively straightforward: Amos Kloner, for instance, notes the evidence from inscriptions and coins about the language situation in Idumaea while numismatic and other evidence in relation primarily to the coastal cities is discussed by Oren Tal. The real problems arise when archaeology and biblical texts are compared in relation to Jerusalem through these centuries.

On the one hand, Oded Lipschits offers a relatively conventional outline in which he allows some written materials to contribute when archaeology is silent. Thus, although no Persian period wall in Jerusalem has been certainly identified, he allows the account of its building in Nehemiah 3 to be taken more or less at face value and he uses the related finds of some other materials to support the conclusion that there was a Persian period settlement there, albeit reduced considerably in size and number from its previous state under the monarchy (he estimates a population of 1,000–1,250 in the pre-Hellenistic period). He tries to offer rational explanations for the lack of fuller material evidence as well. On the other hand, Israel Finkelstein argues that if we have not found a wall, then there was no wall. He reads the same material remains as Lipschits with a more critical eye, so arriving at an estimated population of 400–500 people (and hence only about 100 adult men). The real growth in Jerusalem is only late Hellenistic (the Hasmonean period) and the outline account of the building of the wall in Nehemiah 3 (on which he follows David Ussishkin in seeing it as encompassing both southern hills of the city, not just the eastern spur, as Lipschits and others prefer) should be dated to that later period. If this means we must completely revise our understanding of Nehemiah 3, making it reflect a second rather than a fifth century date, then so be it. Similar conclusions, he also argues, should be drawn about the purported list of those who returned from exile in Ezra 2/Nehemiah 7.

The difference of opinion could hardly be sharper, though the two scholars do not really interact closely with each other. And this is disappointing, as in fact both of them have already published closely comparable articles or chapters elsewhere. (This detracts somewhat from the value of the volume, of course.) Equally, Finkelstein was presumably not in a position at the time of the conference to mention such careful analyses of his opinions as may be found, for instance, in Z. Zevit, 'Is There an Archaeological Case for Phantom Settlements in the Persian Period?', *Palestine Exploration Quarterly* 141 (2009), 124–37, though note might have been taken in revising his text for this publication. While Zevit deals with the question of the list of returning exiles, the main problem for Finkelstein, of which he indicates awareness but which he does not seriously address, is that in the book of Nehemiah wall building is not confined to the list of builders in chapter 3. This list certainly seems to derive from an independent source and so it could

theoretically be late Hellenistic. It needs here to be stressed, however, that not only this list but more or less the whole of the first-person account by Nehemiah in Neh. 1–6 is based on wall-building. Thus, if Finkelstein were correct, we should have to presume that this whole narrative was a late fiction. Of course, that can be raised as a question, but almost all scholars of whatever persuasion will quickly retort that this hardly seems plausible in view of all the other evidence which has (in my opinion correctly) been taken as indicative of a contemporary first-person account, however propagandistically biased. In fact, there are ways in which these divergent opinions might at least be brought closer to one another than at first appears, but the conference publication format, where each position is stated without apparent discussion or rejoinder, does not allow these to be explored.

The conference and this volume certainly tackle an intractably difficult and important subject, and some of the chapters shed elements of helpful light here and there. No reader can close the volume, however, without appreciating the degree to which further research remains a pressing requirement.

H.G.M. Williamson
The Oriental Institute, Oxford

Books Received

Edward Adams, *The Earliest Christian Meeting Places: Almost Exclusively Houses?* The Library of New Testament Studies, 450. London and New York: Bloomsbury T & T Clark, 2013. Pp. xiv + 263 incl. illustrations. £60.00. ISBN: 9780567282576.

Peter Alpass, *The Religious Life of Nabataea*. Religions in the Graeco-Roman World, 175. Leiden: Brill, 2013. Pp. xvi + 256, incl. 56 illustrations. €134.00 / $174.00. ISSN: 0927-7633; ISBN13: 9789004190511.

Ze'ev Meshel, wth contributions by A. Aḥituv, Liora Freud et al., *Kuntillet `Ajrud (Ḥorvat Teman): An Iron Age II Religious Site On The Judah-Sinai Border*. Jerusalem: Israel Exploration Society, 2012. Pp. xxxv + 364 incl. plans and illustrations. $96. ISBN 9789652210883.

Micheal D. Press, *Ashkelon 4: The Iron Age Figurines of Ashkelon and Philistia: Final Reports of the Leon Levy Expedition to Ashkelon 4*. Harvard Semitic Museum & Eisenbrauns, 2012. $49.50. Pp. xiv + 264. ISBN: 978–1–57506–942–5.

David Stacey and Greg Doudna, with Gideon Avni, *Qumran Revisited: A Reassessment of the Archaeology of the Site and Its Texts*. BAR International Series 2520. Oxford: Archaeopress, 2013. Pp. 150 incl. illustrations. £29.00. ISBN 9781407311388.

Adam Zertal (ed.), *El-Ahwat, A Fortified Site from the Early Iron Age Near Nahal 'Iron, Israel: Excavations 1993–2000.* Culture and History of the Ancient Near East 24. Leiden: Brill, 2012. Pp. xix + 485 incl. illustrations and maps. €125. 00 / $185.00. ISBN: 9789004176454.

Summaries of Lectures

THE PRAYER HALL AT MEGIDDO: THE WORLD'S OLDEST CHURCH BUILDING?

EDWARD ADAMS
King's College, London

The remains of an early Christian place of worship were discovered in 2005 in the grounds of the Megiddo Prison in northern Israel. The excavator has dated the 'prayer hall' to the early third century, which would make it the oldest surviving church building, but the dating has been challenged by other authorities. The lecture gave an overview of the discovery, discussing the date of the building and assessing its significance for our knowledge of early Christian architecture, early Christian belief and early Church life.

CALENDAR PLAQUES FROM IRON-AGE JUDAH AND THEIR IMPLICATIONS FOR PENTATEUCH RESEARCH

JONATHAN BEN-DOV
University of Haifa

In numerous Iron Age archaeological sites in Judah known as centres for administrative activity, excavators have found small bone plaques, (c. 2×4cm). These plaques were perforated with up to 30 holes arranged in rows, typically with 5-10 holes in each. Over one hundred years ago, Flinders Petrie was the first to unearth such a plaque at Tel el-Farah South (near Gaza), while the most recent one was found by Ronny Reich in the City of David excavations, in the context of an 8th century BCE Jerusalem administration office. Petrie surmised that these objects served as calendars, with pegs inserted into consecutive holes to follow the march of days of a particular month. This lecture surveys these finds in their archaeological contexts, and explores their meaning to help understand the type of time-measuring and the calendrical system used by Iron Age Judean clerks. These finds also shed light on date formulas and other calendrical markers in priestly writings in the Torah.

RETURN TO MESOPOTAMIA: EXCAVATIONS AT TELL KHAIBER, NEAR UR

STUART CAMPBELL
University of Manchester

Southern Iraq is generally recognised as one of the most important regions for archaeology in the world. In the fourth and third millennia BC,

a network of city states developed; probably the first urban civilisation in the world. This Mesopotamia society developed a culture to which many later traditions trace their roots, and gives it a unique relevance to a wide range of people today. However, war, sanctions and civil unrest in Iraq has also made normal archaeological research impossible since the 1980s, which has left our understanding of early Mesopotamia civilisation increasingly stagnant and cut off from advances in archaeological techniques.

In 2013, Tell Khaiber became the first British archaeological project to take place in southern Mesopotamia for twenty five years. This lecture will present the initial investigations at the site and outline their potential to shed new light on our understanding of Mesopotamia c.2,000 BC and earlier. It will also consider the different ways in which this period can be understood and the way in which archaeology can address different constituencies.

KANDALANU THE CHALDEAN (?)

JACOB DAHL
University of Oxford

This talk will revisit one of the more interesting, but unresolved, puzzles of the Ancient Near East, namely the question of the identity of Kandalanu, the last king of Babylon under Assyrian hegemony. The few sources from his reign have been studied for almost a century since it was first suggested that Kandalanu and Assurbanipal were the same person, but no conclusive answer to his identity has yet emerged.

Dr Dahl suggested that it is not the sources that are faulty or incomplete, but rather the questions we ask of them. He proposed a new paradigm for understanding Assyrian-Babylonian relations in the dying days of the Assyrian Empire, and a surprising solution to the puzzle.

THE ARCHAEOLOGY OF ROMAN-PERIOD NAZARETH

KEN DARK
University of Reading

The lecture discussed the results of the first archaeological research project using modern methods to investigate the archaeology of Roman-period and Byzantine Nazareth and its hinterland as a whole: the Nazareth Archaeological Project. Moving beyond research agendas driven by 'Biblical Archaeology', the project works within the frameworks of mainstream Roman provincial archaeology and contemporary archaeological theory to investigate both period-specific themes and long-term dynamics.

Fieldwork from 2004 to 2010 included a survey of the broad valley (Nahal Zippori) between Nazareth and Sepphoris and a detailed re-investigation of the Sisters of Nazareth site in the present centre of Nazareth. The survey revealed a hitherto-unknown pattern of small settlements

established in, or immediately prior to, the Early Roman period and apparently abandoned at the end of the Byzantine period, while the work in the centre of Nazareth has wide-ranging implications for the size and character of Nazareth in both the Roman and Byzantine periods, especially when seen in the context of new information provided by recent Israel Antiquities Authority rescue excavations in and around the city.

DIVINE SIGHT, DIVINE JUSTICE AND EYE-STONES IN THE ARCHAEOLOGICAL RECORD AND IN THE HEBREW BIBLE

DIANA EDELMAN

In the Hebrew Bible, sight is an integral part of human and divine justice. A cluster of idioms expresses this understanding and a number of passages refer to God's eyes and assume that the deity sees what transpires on earth in the light of day and is able to dispense justice accordingly. This same understanding is found of other ancient Near Eastern gods who dispensed justice.

Eye-shaped stones were a regular part of Mesopotamian culture for almost 2000 years. They could symbolize the seeing capacity of a deity when used on divine clothing or appurtenances, they could be ritually activated to serve as good luck charms, and they could be offered as votive gifts to thank a deity for watching over a giver and saving his or her life, or to remind one to watch over the giver and hear his or her requests. A few biblical texts seem to refer to such eye-stones.

ARCHAEOLOGY AND BAR KOKHBA SINCE 1870: A NON-ARCHAEOLOGIST'S IMPRESSION

WILLIAM HORBURY
Cambridge University

Writing an historical study of the Bar Kokhba war has highlighted for Professor Horbury a variety of relevant archaeological and topographical work, from the early surveys of Palestine onwards. Focussing on this one historical topic provides a kind of cross-section of the archaeological investigations of various kinds carried on since 1840, including discoveries of coins and inscriptions. This lecture was a non-archaeologist's view of a long and rich archaeological story, with reference to many different archaeological sites, including Herodium.

DAVID TO NEHEMIAH: NEW FRAGMENTS FROM KENYON'S JERUSALEM

KAY PRAG
Manchester Museum

Such is the density of the archaeological investigation of Old Testament Jerusalem that almost every stone turned leads to controversy.

The subjects of recent debates have included the possible location of the Davidic palace and the existence of the city walls built by Nehemiah.

The archive from Kathleen Kenyon's work in the 1960s (the first scientific excavations in Jerusalem, under the auspices of the British School of Archaeology in Jerusalem) still has contributions to offer on these and other questions. The archive is kept in the Manchester Museum. Most of the major results of the excavations were published with commendable speed by Kenyon in preliminary reports and informative monographs.

The main focus of Kenyon's excavation of Iron Age remains was in her Site A, the great trench on the slopes of the south-east ridge, on which the final reports have since been published by H. Franken and M. Steiner. Iron Age remains in other areas excavated were on a much smaller scale. Current findings, now in process of publication, which reflect the more detailed analysis of the finds in two of these trenches, relate to major walls in Kenyon's Sites S.II and R, on the fringes of the Ophel area. These trenches were small, but of considerable depth and revealed long stratified sequences. A much larger area around Site S.II was later excavated by B. Mazar on behalf of the Hebrew University of Jerusalem and the Hebrew University of Jerusalem, and more recently by E. Mazar.

THE UTOPIAN TEMPLE PLAN OF THE DEAD SEA SCROLLS

LAWRENCE H. SCHIFFMAN
Yeshiva University

The Temple Scroll, recovered by Yigael Yadin during the Six Day War, rewrites much of the Pentateuch, setting out a utopian Temple plan for a gargantuan Temple extending over virtually all of what was then the city of Jerusalem. In addition, this scroll provided detailed prescriptions for the offering of sacrifices and other Temple rituals. This illustrated lecture will examine the architecture of the Temple complex, giving careful attention to the various structures, their purposes, and the manner in which they can be traced in biblical literature.

UNDERSTANDING TANIT

JONATHAN N. TUBB
British Museum

THE ANNUAL RICHARD BARNETT MEMORIAL LECTURE

One of Richard Barnett's many passions was the Phoenicians, both in their homeland and abroad, and his work on the Nimrud ivories remains essential for anyone dealing with this aspect of Phoenician material culture. The last 30 years have seen intensive research on many aspects of Phoenician and Punic culture, yet the religious beliefs of the Phoenicians and their cult practices

are still poorly understood and, on the basis of classical writers, have often been misrepresented. This lecture examined the goddess Tanit, known extensively from funerary stelae and other artefacts from Carthage, but only sparsely from the homeland, where her symbol, a triangle surmounted by a horizontal bar and a disc, appears on only a handful of objects, none of which can be dated earlier than the 4th century BC. Was she a Phoenician goddess at all or a creation of Carthage? Should the few instances of her appearance in the homeland be attributed to returning colonists? By separating the name from the symbol it is hoped that these questions can be answered and that an assessment can be made of her crucial role in religion and society.

THE SAMARITAN TEMPLE AND THE SONS OF JOSEPH

HUGH WILLIAMSON
University of Oxford

Excavations over the past twenty years on Mt Gerizim near Shechem (Nablus) have revealed traces of what is said to be the Samaritan Temple as being built considerably earlier than was previously thought, that is to say during the period of Persian rule rather than the Greek or Hellenistic rule which came later. The lecture looked at the evidence for this claim as well as introducing some important later inscriptions from the same site.

Interestingly, this would mean that the temple would have come into use shortly before the time when the biblical books of Chronicles were written. In one passage in those books there is a most unusual reference to a group known as the Sons of Joseph. The lecture will seek to show that in Samaritan tradition Joseph played a much more important role than has previously been realized, and that this was even recognized by the Jews of Jerusalem, as one of the lesser-known Dead Sea Scrolls as well as some other evidence shows. Perhaps, therefore, the author of Chronicles, by introducing a very positive reference to the Sons of Joseph in a way that was completely unnecessary for the purpose of what he was writing in the passage concerned, was seeking to build bridges with this alternative community—an unexpectedly early form of ecumenism!

Reports from Jerusalem

REPORT 46
DECEMBER 2012

Neolithic Beads and Figurines from Western Galilee

A large agricultural settlement extending over 20 hectares (50 acres) has been uncovered at Ein Zippori in the western Galilee. It is related to the Wadi Rabah culture that prevailed in Israel in the sixth to fifth millennia BCE, and collections of decorative beads in a large basin and ostrich images and figurines were found and demonstrated to the Press. The site excavators claim that these and other items are evidence of an early agricultural economy with extensive trade links.

Neanderthals and Homo Sapiens Interbred in Carmel

At the Nahal Me'arot caves in the Carmel range, recently granted UNESCO Heritage status, archaeologists have found tools of both Neanderthals and Homo Sapiens in close proximity. Daniel Kaufmann, working at the site, claims that the interbreeding of the two species, which genetic research has suggested existed in non-aggressive mating between the two sub-species, took place at this site where there is evidence of peaceful living side by side as early as 80,000 years ago.

Human Remains in Deep Well in The Jezreel Valley

In an emergency excavation preceding the enlargement of a junction at Enot Nisanit on Road 66 in the western Jezreel Valley, archaeologists from the Israel Antiquities Authority (IAA) have uncovered a well approximately 8m deep x 1.3m in diameter. The large diameter was reduced by two capstones set over the mouth. At the bottom of the well were found skeletal remains of a young woman and an older man of thirty or forty years of age. The excavation director, Yotam Tepper, thinks the water became undrinkable after the bodies had fallen into the well, and many romantic suggestions have been made as to why the two skeletons were found here together. The well shaft also contained remains of animal bones, charcoal and other organic materials which have enabled the finds, including the

human bones, to be dated to the early Neolithic period, about 8,500 years ago. A deep well of this early period is unique in Israel, according to Dr. Omri Barzilai of the IAA Prehistoric Branch, and indicates the population's impressive knowledge of the hydrology of the area and their ability to work together to undertake such a considerable community project.

REPORT 47
JANUARY 2013

Hasmonean Farm in Jerusalem

Remains of a farm site were uncovered in Kiryat Yovel in western Jerusalem by a team from the Israel Antiquities Authority (IAA) a month or so ago. The remains have been dated from the fourth century BCE to first century CE and include the outlines of a few scattered buildings and some artifacts like small incense jars and pottery tags that may have been used to label jar contents. The work is still in progress and the designation of the site as a farm may have to be revised as excavation proceeds, although it is known that farms as such did exist in the Hellenistic period.

Dead Sea Scrolls Digital Library

The Leon Levy Dead Sea Scrolls Digital Library was launched on 18th December, based on the between 15,000 and 30,000 fragments of the Scrolls, making up about 900 manuscripts, held by the IAA. The work of recording by high-resolution scanner is still in progress and is estimated to take another three years, at a cost of US$3.5 million. The archive can be accessed at http://www.deadseascrolls.org.il (the project is distinct from the eight scrolls owned by the Israel Museum which is also working with Google to digitalize its manuscripts). The work is described by director Pnina Shor, who states that each fragment is captured on six separate wavelengths, which are combined into one colour image that can be enlarged without loss of clarity. The fragments are also photographed by infra-red technology which produces a clear black and white image that is used to decipher faded examples. Shor claims that the few hundred scholars that specialize in Dead Sea studies can now access the material in the comfort of their homes, and it is equally available to the millions around the world who have shown intense interest but have not been able to visit Israel to see the originals for themselves. The project is named after Leon Levy who died in 2003, and whose Trust made the original donation to start the project. The Cambridge Digital Library has also

recently posted on line thousands of its ancient religious documents, including the Nash Papyrus of the first or second century BCE (that contains two portions of the Hebrew Bible) and the Cairo Geniza Collection.

Temple Site in Sinai

Reports have surfaced that the Antiquities Authority in Egypt has announced the find of four temples in Sinai dating back to the time of Thutmosis II (1518-1504 BCE). The temples are situated at Qantara, 2 miles east of the Suez Canal, on the military road to Canaan. The temple walls are in mudbrick and the largest is some 80m by 70m with walls of 4m thickness, decorated with paintings that indicate the religious nature of the buildings.There are also three ritual basins and a number of separate chambers for different gods in this large temple.

Sifting Excavated Material from Temple Mount

There has been a recent vague report of four truck loads of material being removed from the Temple Mount and dumped at a local tip. No further details have emerged but the removal of such material is illegal and although forbidden by a High Court ruling, it is still happening. This leads me to describe a recent visit to the Sifting site at the foot of the Mount of Olives that has been organized to deal with the massive amount of material that was removed from the Temple Mount after the unsupervised excavation of the tunnel entrance to the underground Mosque located in the so-called Stables of Solomon area. This material was rescued from a dump in Kidron Valley by Prof. Gabriel Barkai and is being steadily sorted and sifted at the facility that he has set up on the hillside below the site of the Hebrew University. It is worth a visit by tourists, who are welcome to come and hear an interesting lecture on the history of the Temple Mount, through the Israelite, Crusader, Byzantine and Islamic periods, and then proceed to the sifting area. It is a well-organized operation with about twenty sifting benches, each supplied with a spray water tap and buckets of raw material for dividing into six categories, such as pottery, stonework, metal and mosaic tesserae. It is fascinating work for children as well as adults, and the supervision by experts is both helpful and encouraging. Many important finds of the First and Second Temple periods have been sifted out and although few and far between, there is a lot to be learnt, and honourably felt, just from handling the historic debris. At the end of each session one of the experts will lecture on the most significant finds that were made that day.

The site is accessible by car on a small turning to the north from the main road of Derekh Ai-Tur (Shmuel ben Adyahu) which lies beyond the Rockfeller Museum, going east. Prof. Barkai or his student Zarhi Zweik are usually in attendance and Gabby estimates that they still have sifting work for the next fifteen years.

Ancient Temple Found at Motza

In a rescue dig before the improvement of Highway 1 leading to Tel Aviv, archaeologists have uncovered a large structure with massive walls, an entrance facing east and a number of ritual objects believed to be a temple of Iron Age IIA. The find was made at Motza, on the western outskirts of Jerusalem, by a team directed by Anna Eirikh, Hamoudi Khalaily and Shua Kisilevitz of the IAA. The inside of the building contains a smaller square construction, pottery vessels, chalices, and figures of humans and domestic animals, which are considered to have been used in cultic ceremonies. The temple is believed to be that of the town of Motza, on the borders of the tribes of Benjamin and Judah (Joshua 18:26). The important remains will be sealed and preserved and the highway extension built over them. The site will not be accessible in the future, but the internal remains will be removed and restored and exhibited in one of the Jerusalem museums.

REPORT 48
FEBRUARY 2013

"Debris" Removed from Temple Mount

As mentioned last month, six lorry-loads of material were removed from the Temple Mount in early January,discovered by Zachi Dvira (Zweik) who works with Gabby Barkai on the sifting project. The Jerusalem Police declared this to be ordinary debris, but the archaeologists see it as valuable excavated material, that has been removed from the Temple Mount against the High Court order prohibiting removal of any material from the Mount. Archaeologists are trying to retrieve the material from the local refuse dump and bring it to the sifting site for proper examination**.**

Preservation of 300 Historical Sites

The 700 million shekel (about £120m) programme is going ahead with one third dealing with Biblical and Second Temple sites, and the remaining with later periods. The earlier projects include funding for projects in the City of David, Tel Shilo, the Machpelah cave of the Patriarchs in Hebron and Herodian remains near Bethlehem. Although the news does not give full specifics, it is clear that the allocated money is being used for these purposes, and further funds will be made available in due course.

Israel Antiquities Authority Archives Digitalized

The above-mentioned fund is also being used to support the publication of a database with the records of the Israel Antiquities Authority (IAA). The documents will become available to scholars and include 19th century letters on excavations at the City of David, plans for the restoration of the Church of the Holy Sepulchre after the earthquake of 1927, and the extensive archives of the Rockefeller Museum. The work will give scholars access to valuable documents and will also ensure preservation of the archives, many of whose documents are suffering from disintegration because of poor paper quality and poor storage facilities in the past. Most of the documents are in English (they will receive Hebrew annotation) and are available on line - http://iaa-archives.org.il/ but no date has yet been given for the completion of the work.

Restoration of Avdat National Park

The Israel Nature and Parks Authority has now completed restoration of the UNESCO Heritage site of the Avdat National Park in the Negev, that was vandalized in October 2009. The work was carried out at a cost of nearly nine million shekels (£1.5m) but the Authority has made it clear that some of the archaeological evidence of original stonework has been lost forever due to the damage done by the vandals.

Herod the Great Exhibition at the Israel Museum

This fine exhibition opened at the Israel Museum on 12th February 2013 and will run for eight months. It is a tribute to Herod's great building projects and also to the lifetime of investigation that Ehud Netzer devoted to their uncovering. In fact it appears that it was Netzer who started planning the exhibition after his location of Herod's Tomb on Herodion, and before his tragic death at that site in October 2010. The exhibition mentions Herod's tumultuous life, as a great fighter, lover and indeed murderer, but it is his tremendous building structures that are given pride of place, such as his many palaces, the port of Caesarea and Herodion itself. Herod's tomb is shown with a reconstruction of the central tholos, using the actual carved stones from the site, and restorations of the three smashed sarcophagi that were found there. There are many clear wooden models, as were favoured by Netzer, of the tomb and other projects with ingenious films showing their locations in Masada, Jericho, Caesarea and elsewhere and how their construction took place in such difficult terrain. Netzer was of the opinion that Herod had played a personal role in the planning of these oversized projects. Without him no architects or engineers would have dared to produce such ambitious plans, he thought.

There are wonderful original oversized carved Ionic and Corinthian capitals as were used at the Temple porticos and at Herod's many palaces, but pride of place is given to the work at Herodion. The original unique paintings of the royal box at the intimate hillside theatre at Herodion are displayed.

It appears that everything Herod did was on the grandest of scales and with the finest materials. As has been truly said, 'emperors built for posterity but Herod built for eternity.' This exhibition, coming more than two thousand years after his death, makes that clear; it is a great tribute to the better side of Herod's genius and energy, and also to the indefatigable work undertaken by Ehud Netzer over nearly fifty years.

REPORT 49
APRIL 2013

Early Industrial Works Beneath Jaffa

In anticipation of renovated underground infrastructure plans for the streets of Jaffa, rescue digs by the Israel Antiquities Authority (IAA) have uncovered extensive industrial installations related to ancient liquid extraction processes such as presses, to produce wine and other alcoholic beverages. The remains date to the Byzantine period according to Dr. Yoav Arbel, Director of the IAA excavations. He said that they were evidence of just one phase of the extensive agricultural processes carried out in the Jaffa area from the time of the early Egyptian occupation of the 14th century BCE up to that of the Ottoman Empire, when fruit orchards were still prevalent in the surroundings.

Each uncovered unit consisted of a pressing floor connected to a collecting vat to hold the pressed liquids. The excavators thought that the discovered sections found under Hai Gaon Street represented only part of a larger industrial complex and that further installations would be found when the adjoining streets were investigated. The new infrastructure works, such as cables and drainage, were being laid carefully over the uncovered remains so that they would be kept preserved and protected, though not visible. The renewal project covers the Magen Avraham Compound of Jaffa and will result in improved drainage, landscaping and street lighting for the city.

Ancient Burial Cave on Mount of Olives Looted

Two young men were arrested by police in late February found digging into an ancient burial cave that was a known sealed ancient monument near to the

large Kidron Valley tombs, such as the so-called tomb of Absalom. The culprits admitted they were looking for buried treasure, as recorded by a spokeswoman for the IAA Theft Prevention Unit. The caves were thought to have preserved burial goods such as oil lamps and weapons, and it was not clear why such valuable remains had not been removed earlier by the IAA, seeing they were known to have been present in the tombs.

Preservation of Antiquities in Syria

Concern has been expressed over the preservation of the many objects of antiquity in Syria, during the present unrest and virtual civil war. One specific example has been mentioned, the looting and virtual destruction of the Jobar Synagogue in Damascus, one of the oldest in the world. It is situated in an old part of the city, is built over a cave dedicated to the Prophet Elijah and is presumed to date back, at least in part, to the first century CE. The plaque on the cornerstone claims it to be the "Shrine and Synagogue of the Prophet Eliahou Hanabi since 720 BC". It served the Jewish community until the early 19th century and was replaced by the more modern synagogue in the Old City where, it is reported, the Torah scrolls and other artifacts from the Jobar have been stored for safety. It is to be hoped that the extensive wall paintings of the Dura-Europos Synagogue which, it is understood, are stored in the open but under cover, in Damascus, will not be affected by the unrest. It is also reported that the ancient souk in Aleppo has suffered heavily, and many of its medieval stone vaults have been destroyed, as have other ancient markets and mosques throughout the country.

Biblical Faces Reconstructed by Jacobovici

In another of his controversial archaeology series, Simcha Jacobovici is showing faces that he claims are reconstructed from authentic skulls of biblical personalities. The series is being aired on Canadian TV and the first episode purports to show the face of a Philistine woman, who is designated "Delilah". It is based on a 3,000-year-old skull from a collection in Tel Aviv University. The face has been reconstructed in the way that forensic scientists work from skulls for police investigations.

A second episode shows the face of a man from a burial cave of the time of Jesus who, Jacobovici claims, was a man who knew Jesus. A third claim is based on the remains of an infant found inside a burial jar and is said to be that of "a sacrificed child". These claims are clearly highly speculative and have been dismissed by Joe Zias, formerly of the IAA, as "show business and not science". The actual reconstructions were mostly carried out by Victoria Lynwood of Montreal, who also reconstructed the skull of a 6,000-year-old warrior, whose teeth had decayed

to such an extent that it was unclear how he had been able to continue to eat. Although dismissive of the series, Prof. Gabriel Barkay of Bar-Ilan University said that it would spark renewed interest in archaeology and that was the one good side of the presentation.

REPORT 50
MAY 2013

Early and Unusual Ritual Bath in Jerusalem

Last April a mikvah of the Second Temple period was uncovered in Jerusalem, in the western suburb of Kiryat Menahem, in a rescue dig conducted before the construction of a major roadway project. The ritual bath is unique in that it was located underground in a cave, and the natural water was supplied by rain onto three basins and channels carved into the roof of the cave, an unusual feature. The area of the bath was rendered in a type of waterproof plaster, according to excavator Benyamin Storchan of the Israel Antiquities Authority (IAA). It is not clear how the mikvah was dated to the Second Temple period. After the bath went out of use, the basins and channels were filled with earth; a hole was cut in the roof and the cave acted as a local cistern. The local authority is interested to have it restored to the original mikvah structure with the three water basins and channels, and they believe it will serve as an attraction to local residents and visitors.

Battles in Syria Topple Ancient Minaret in Aleppo

The ongoing battles in Syria have claimed another ancient monument, this time the nine-storey tower Minaret of Aleppo's Mosque, allegedly of the Umayyad (661-750 CE) period. The tower had an internal stair to a high level canopied viewing gallery surmounted by a miniature replica mosque and Islamic crescent moon finial. The mosque stands in the Old City of Aleppo, which is a UNESCO World Heritage site. Both sides of the conflict have blamed the collapse on each other, the State saying that it was due to rebel fire, and the rebels blaming Government tank shelling. At present large areas of Aleppo are in rebel hands but State troops remain in control of many other sectors of the city. Much of the original Mosque has been destroyed as well as the medieval stone-vaulted Suk or market.

The Gabriel Revelation Stone

In conjunction with the present Herod the Great Exhibition (which is proving very popular) the Israel Museum is displaying an unusual artifact. It is a long and

narrow slab of stone inscribed in ink in two columns and dated by its calligraphy to 1st century BCE. It was found in 2007 on the east side of the Dead Sea and is on loan to the museum by the Jesselsohn family of Zurich. It is in two pieces that together make up 87 lines in neat square Hebrew script of the Herodian period, but with many lines unclear. The text purports to be written by the angel Gabriel in the first person, in conversation with a human being whom he warns of the destruction of Jerusalem but with the hope that God will save the city for the sake of the angel Michael and God's servant David. The final lines are unclear and may have referred to the destruction of the city or its survival.

The back of the stone is smooth but not inscribed and the lower section is soiled, so it appears as if the piece was mounted against a wall with its base set into the ground. The artifact is exhibited together with early manuscripts relating to the angel Gabriel, and part of the War Scroll from Qumran, which uses a similar script. The exhibit will remain open until mid February 2014.

Byzantine Mosaic Floor in Northern Negev

A mosaic floor was recently found in the grounds of Kibbutz Beit Kama, 20 km. north of Beersheba, where the area is being prepared for the extension of the Trans-Israel Highway (Motorway 6) to Beersheba and Eilat. The mosaic floor is virtually complete in size but some portions are badly damaged, though the colours are vivid and the portrayal of doves, peacocks, jars of wine and vine branches is clear. The large square area is bordered by a heavy guilloche frame in black, red and white tesserae, set around a circular centrepiece with the four corners, between round and square, portraying stylized amphorae. According to the excavator, Dr. Rina Avner of the IAA, the mosaic floor belonged to a public building that had evidence of a complex water supply. In view of the emphasis of the mosaic on drink, it was perhaps a hostelry that was part of a large Byzantine settlement of the 4th to 6th centuries, spread over 6 hectares alongside the ancient roadway to Beersheba from the north.

REPORT 51
JUNE 2013

UNESCO Delegation to Jerusalem Old City

At the end of May a delegation of UNESCO professionals arrived in Jerusalem to inspect new works and renovations in the Old City, which became a World Heritage site in 1981, but was also on the list of endangered sites. It was last

inspected in 2004 and the current mission was to check the general state of preservation of the interior and particularly the walls, which had recently been renovated under the direction of the Israel Antiquities Authority (IAA). The UNESCO report was to be presented and then discussed in June in Paris, when Israel wanted to negotiate the replacement of the Mugrabi Gate access where a bridge is planned, but that had been strongly opposed by the Arab administration, the Waqf. Unfortunately Israel called off the tour of inspection at the last minute because the Palestinians had, they said, "politicised" the inspection, when the Palestinian Authority in Ramallah claimed in public that "the visit of the UNESCO Mission is a preface for the victory of Palestinian and Arab diplomacy". The Israeli side saw this as an attempt to politicise the inspection that was planned to be purely professional. It is hoped that the cancellation is only temporary and that the inspection, which was to cover six mosques, six churches and six synagogues, will be rescheduled to a later date.

Oldest Known Torah Scroll Found at Bologna, Italy

It was recently announced that Prof. Mauro Perani had discovered that a Torah scroll held in the library of the University of Bologna had been wrongly ascribed to the seventeenth century. It was really to be dated to between 1155 and 1225 said Perani, basing himself on the features of the script and format, and supported by two C14 tests. If all this is correct, the scroll would be the earliest complete Torah scroll (Sefer Torah) known to date. According to a photograph, the writing on the scroll is very clear and the parchment colour has only slightly darkened. The University reported that the scroll was probably acquired in the nineteenth century after Napoleon's suppression of the local monasteries.

Mameluke Hostelry in Cana of Galilee

Work has recently been carried out on an extensive salvage dig at Kfar Kanna in the Lower Galilee near Nazareth. The plot, with an area of about four dunams (nearly two acres), belongs to the Custodia Terra Santa (Franciscan Order) and is located near to the Wedding Churches that commemorate Jesus's first miracle of the water turned to wine at the Jewish wedding in Cana (Kfar Kanna). The excavation conducted by the IAA, under the direction of Yardenna Alexandre, uncovered a complex of five rooms built of stone walls on two sides of an extensive open courtyard. The rooms were roofed with short local timbers supported on stone arches, which were found in a collapsed state on the floors. The site is on a gentle rock slope to the west and rainwater was drained into a reservoir or cistern that served the residents. The abundant pottery remains and a few coins date the building to the Mameluke period, and the large quantities of animal bones on the

site, together with a mass of culinary and dining vessels, suggest that the major activity was the preparation and consumption of meat meals.

The presence of imported vessels hints at foreign connections and this combination of the finds points to the possible identity of Christian pilgrims coming to the site of the miracle in the Mameluke and early Ottoman periods (15th to 16th centuries). Digging below the surface exposed limited earlier remains of the Roman and possibly Byzantine periods. After recording, the owners plan to construct a school and community centre on the site.

Computer Advance in Geniza Research

A team of computer scientists from Jerusalem and Tel Aviv, led by Prof. Ya'akov Choueka of the Friedberg Genizah project, is piecing together all the disparate fragments of the Cairo Genizah. Their work is enabling variously-held fragments to be pieced together in a matter of weeks, rather than the years needed for more traditional methods which required scholars to travel to the different locations. Choueka claims that his team are reconstructing "the original Genizah" and the information is being posted on line (at "Genizah.org") for viewing by the public as well as scholars. The results of the project will be presented to the 16th World Congress of Jewish Studies in Jerusalem from July 28th to August 1st this year.

REPORT 52
JULY 2013

Faces From the Bible?

Every few weeks, Simcha Jacobovici broadcasts a programme entitled the 'Naked Archaeologist' on Israel TV. He scours archaeological sites to bring sensational results to the viewers, uses material provided by professional scholars, and brings together different artifacts to try and explain problems of the early history of Israel. His programmes are not recognized as serious by professional archaeologists but they are attractive to laymen and sometimes bring unusual content to the public. One of his latest works was to try and recreate the faces of Biblical characters by using the work of professional forensic artists on skulls dug up from known contexts and with known dates. In his latest programme he displays the face of a beautiful lady whom he equates with Delilah, based on the skull of a Philistine female from the time of Samson; a male from the turn-of-the era Galilee, whom he claims may have seen Jesus; and a baby whose remains were found in a Canaanite jar burial, possible evidence of infant sacrifice. Jacobovici, an Israeli-Canadian, says that his illustration

of these figures helps viewers to understand better the Biblical contexts from which they come. This is hardly serious archaeology but his programmes do give some shaky substance to the accounts in the Bible. They are condemned by most serious scholars but one has to recognise that the public appreciates them.

Jerusalem Cistern with Remains of Cooking Pots

Near Robinson's arch by the Western Wall of the Temple, Eli Shukron of the Israel Antiquities Authority (IAA) has uncovered a small underground cistern with the unusual content of two cooking pots and a small oil lamp, dated to the time of the Roman siege of Jerusalem in 70 CE. He claims that this is evidence that the eating of meals took place in the cistern, where it would be hidden from view by others. It would thus illustrate the fact, recorded by Josephus, that during the Siege the extreme scarcity of food forced the inhabitants to eat their precious produce in secret, so as to avoid it being stolen by the rebels and partisans. He recorded that the people ate their meals shut up in "the darkest corners of their houses" and Shukron believes that the finding of two cooking pots in this small cistern is evidence of such extreme practice.

Roman Period Roadway in Northern Jerusalem

In the course of a salvage dig prior to the laying of a drainage pipe in Beit Hanina, a village just north of the Jerusalem city border, the IAA has uncovered the remains of the Roman road from Jerusalem to Jaffa. The roadway was 8m. wide and laid with large level paving slabs that showed evidence of heavy wear by pedestrians. It is the best preserved section of Roman roadway in the Jerusalem area according to David Yeger, the dig director.

The section uncovered was part of the road that ran through Beit Horon (there was another parallel road further south) and was still in use during the Talmudic period.

Carmel Mountains Cave, Grave Flowers

The earliest ever evidence of flowers used at a graveside was found at the Rakefet Cave on Mount Carmel, dating to the Natufian period between 12,000 and 14,000 years ago. The expedition, headed by Dani Nadel of Haifa University, uncovered 29 human skeletons and in some of the tombs they found the marks of flowers pressed onto the rock surface. Nadel claims that they have been able to identify the floral species in at least two of the plants, but gave no details.

Egyptian Sphinx at Hazor

During the ongoing excavations at Hazor, in northern Israel, the fore section of a royal sphinx has been uncovered. The large fragment is the front part of the sculpture, showing no head but the two front paws with, luckily, an inscription between them indicating that this was the image of Pharaoh Menkauree, also known as Mycerinus (2532-2504 BCE), whose name is associated with the smallest of the three Giza pyramids. The co-directors of the excavation, Prof. Amnon ben-Tor and Dr. Sharon Zuckerman, say that it is the only known sphinx of this Pharaoh ever discovered. The whole unbroken body would have been about 1.5 m. long and they think it was sent to Hazor in the 14th century BCE in the Amarna period as some kind of goodwill gesture, at a time when Egypt held hegemony over the area.

Inscribed Canaanite Pottery Shard, Jerusalem

In what is claimed as the earliest-ever inscribed shard found in Jerusalem, an early Canaanite line of text of the tenth century BCE has been found on the broken piece of a neckless pithos or jar, recently unearthed in a dig by the southern wall of the Temple Mount, The excavators think that the short one-line text, as yet undeciphered, gives the name of the jar's owner or its contents. Watch this space.

REPORT 53
AUGUST 2013

Syrian Civil War Damage

Due to the ongoing disturbances, it is reported that the famous 12th century Crusader castle, the Crac des Chevaliers, has suffered severe damage. The castle is located on a hill outside the city of Homs, where the rebels have been using it as a stronghold and base for their snipers. In their attempt to regain control of Homs, the castle was bombed by Government forces and suffered a direct hit which destroyed some of the internal fortifications. In the past the Crac des Chevaliers has been a great tourist attraction.

Khirbet Qeiyafa, and King David's Palace?

On 17th July Prof. Yossi Garfinkel of Hebrew University organized a tour of the site at Khirbet Qeiyafa in the Elah Valley, south of Beth Shemesh, where he has been digging for the last five seasons. He announced that his work here was now complete and that he would be moving his team to Lachish for the next season to re-examine its early strata. During a festive site dinner for the occasion, he also announced that he had found the remains of a luxurious mansion and large storage facility that he designated as King David's palace on the site of Khirbet Qeiyafa which he has identified as biblical Sha'arayim, because of its two gates. Garfinkel claims that the presence of a well-planned city with a royal palace of the time of the 10th and 11th century BCE., as dated by ^{14}C analysis, is evidence of state organization under a central authority and administration during the early years of the Judean monarchy. In his opinion the archaeological evidence thus underpins the Biblical account, but this is not a view accepted by other scholars. The site excavations will be preserved and the area will shortly be laid out as a national park, making it easily accessible to visitors.

Tell Es-Safi, The Philistine Gath

After seventeen years of excavation, the archaeologists of Bar-Ilan University, under the direction of Prof. Aren Maeir, demonstrated to the press the various stages of the development of Tell es-Safi, one of the cities of the Philistine pentapolis which lies in the plain inland from Ashkelon. Evidence is now clear of its various destructions and redevelopments from the 17th to the 9th centuries BCE. Heavy destruction occurred under Hazael of Damascus in about 830 BCE, and then the rebuilt houses show evidence of sliding off their foundations which the archaeologists attribute to the earthquake of 760 BCE, mentioned in the Book of Amos (1:1). The mudbrick houses somehow survived and evidence of extensive burning relates to the later destruction by the Assyrian Emperor Sennacherib on his way to assault Jerusalem in 701 BCE.

The Bar-Ilan archaeologists will shortly be able to use the latest on-site equipment, as they expect to receive an X-ray Fluorescent Spectrometer (XRS) for use together with their Fourier Transform IR Spectrometer (FTIR), equipment that is usually confined to the laboratory and which will now be available for use on site. This will allow microscopic samples to be analysed on site, said Maier, which will save having to send them away for analysis, and so save valuable time and give the site the information it requires on the spot. It will allow for evidence to be gathered in the field which previously had to wait for long periods to be processed in off-site laboratories. The

equipment has been donated by the university president, Prof.Moshe Kaveh, who had recently visited the site with his grandchildren and was impressed by their keen interest.

Ancient Oil Press in Jerusalem

In an emergency salvage dig before foundations were constructed for the dormitory of the Jerusalem College of Technology, the Israel Antiquities Authority (IAA) has uncovered an ancient olive press consisting of a large collection vat, a stone bowl and a stone wheel, all within a karst (limestone) cave.

No date has been given but the IAA said that the existence of the ancient press, and another similar one found in the area a few years ago, is evidence of a thriving early olive-oil industry in the Bet Hakerem area of west Jerusalem. The discovery will enable the College and the IAA to retain the finds *in situ* to demonstrate the workings of an ancient oil press which forms part of the history of technology.

Matching Geniza Fragments Online

Computer scientists have devised an online system to record disparate fragments from the Cairo Geniza that are held by different museums and individuals, and enable them to be matched and put together without having to travel to the various locations where they are held. The system has been devised by Prof.Ya'acov Choueka of the Friedberg Geniza Project of Tel Aviv University, who has, with a team of programmers, digitized 360,000 fragments that are looking for a match. The images come from 60 collections all over the world and the system was recently unveiled at the 16th World Congress of Jewish Studies at the Hebrew University last month. The project is still looking for another 300,000 fragments from museum libraries in Western Europe, Russia and some private collections. Individuals will be able to access the system at http://www.geniza.org.

Village of Shikhin in Galilee

A joint expedition of the Kinneret College, Samford University and Kentucky Christian University, co-directed by Dr. Mordechai Aviam of Kinneret, has recently uncovered the village of Shikhin in the Galilee near to Tzippori (Sepphoris); the latter was the capital of the Galilee at one time. The village is mentioned by Josephus Flavius and in the Talmud as a village of many potters in the first century CE. The site has evidence of the remains of an early synagogue and considerable pottery works, including moulds for oil lamps which are rare in a village. The excavation is important, according to Aviam, as it fills in a gap in the history of the Galilee between the First Temple and the Hasmonean periods when there has been little evidence of its inhabitants. The proximity of the village to the former capital is also

important as it will demonstrate how the local population lived in the rural areas in relation to the centre, and the expedition is keen to uncover more of the material culture that will demonstrate how the rural population lived.

Crusader Period Hospital in Jerusalem

The Israel Antiquities Authority announced that they had discovered part of the original hospital that stood in the Christian Quarter of the Old City, called the Muristan, which is a Persian word meaning hospital. The area was named for the Knights of St. John Hospitallers who occupied it after they were evacuated from the El Aqsa Mosque on the Temple Mount, and now the site of the hospital has been found. The original building covered an area of 1.5 hectares (nearly 4 acres) but only one section remains on a site owned by the Wakf (Islamic Religious Authority) and is to be developed as a restaurant by the Grand Bazaar Company of East Jerusalem. The exposed section is characterized by large pillars and gothic vaults spanning six metres (20 ft) and would have been surrounded by smaller halls. The IAA team, led by Amit Re'em and Renee Forestany, said that they identified the large hall from work done by Conrad Schick before 1900 who had mapped out its ruins from documents of the period in Latin and French. Re'em claimed that the hospital had been divided into several departments and could have accommodated up to two thousand patients in an emergency.

At that time, the Crusader staff worked with Arab colleagues whose knowledge of medical matters was far in advance of that of their Christian colleagues. Saladin, who defeated the Crusaders in 1187, renovated the hospital and allowed several Crusader monks and nuns to remain there to serve the local people. The existing hall is not yet open to visitors but will soon be renovated as part of the new restaurant whose clients will be able to appreciate and absorb its medieval atmosphere together with its gastronomic delights.

Samaritan Byzantine Occupation by Appolonia

In advance of the northern development of Herzliya, archaeologists from Tel Aviv University, led by Prof. Oren Tal and the IAA, led by Moshe Ajami, are examining a number of refuse pits that were the town dumps of an extensive Samaritan settlement, just south of ancient coastal Apollonia-Arsuf, of the late Byzantine period. The main pit so far excavated has thrown up 400 Byzantine coins, 200 Samaritan lamps, and gold and silver jewelry that includes an octagonal ring inscribed with the Hebrew name of God on the outside of each of the eight sides. Some of the lamps were still sealed and unused and the excavators are intrigued by the fact that much of the refuse had been dumped before use. They speculate

that there may have been some cultic reason for the Samaritans to discard unused material. They said that the community was a large one and that the octagonal ring was evidence of a high level of religious observance during the period of the sixth century. Investigation of the material continues and it is the intention of the IAA to clear all the findings from the site so that development of the area can proceed. [Evidence that the occupation was substantially Samaritan has not yet been verified but should be forthcoming when the coins are examined further, *SGR*.].

REPORT 54
OCTOBER 2013

Assyrian Period Finds at Ashdod-Yam

A small number of trial digs were conducted at Ashdod-Yam in the 1960s which demonstrated the antiquity of the port but it is only this year that excavations were resumed, this time under the direction of Dr. Alexander Fantalkin of Tel Aviv Archaeology Department. The expedition has uncovered a fortification system of the port dating to the 8th century BCE, the period of the Assyrian occupation, as well as much later evidence of the Hellenistic period of the 2nd century BCE after the time that Alexander the Great was making his way down this coast to Egypt. The excavators found remains of a building of that period with Hellenistic coins and weights. This has been just the first season of the excavations and more finds are expected.

Jerusalem, Pottery Fragments from Before 586 BCE

Fragments of pottery that can be dated to the reign of Zedekiah, the Judaean client king appointed by the Babylonians in 597 BCE, have been uncovered at the City of David excavation conducted by Dr. Joe Uziel and Nahshon Zanton for the Israel Antiquities Authority (IAA). The fragments include small figureheads, lamps with single and multiple spouts, inscribed handles and above all a bowl fragment with an incomplete inscription in paleo-Hebrew lettering, which reads as "....ryah bn bnh..." The excavators point out the similarity with the name Zechariah ben Benayah, the father of the prophet Jahaziel (2 Chron.20:14) who advised King Jehoshaphat (870-845 BCE) about going to war against Ammon and Moab. They also point out that the inscription was written on the bowl before firing and thus was not just something written on it as a sherd, and so it might imply possible ownership of the bowl.

Nimrud Fortress, 13th Century Lion Relief

Qa'alat Nimrod is a 12th and 13th century fortress in the upper Galilee and one of the finest castles in Israel. Mark Twain, who found Jerusalem to be a dirty and unpleasant city, praised Nimrod Castle as one of the finest monuments of the Holy Land. It looks like a Crusader castle but is in fact an Ayyubid and Mamluk foundation built to protect the road from the coast to Damascus against the Crusaders, It was strengthened and reconstructed by the Mamluk sultan Baybars in about 1270 CE. Today it stands prominently in a National Park where recently a large lion relief was found and identified by Dr. Moshe Hartal of the IAA. The lion was the royal symbol of the sultan Baybars and the stone carving is over one metre long. It is a rare and monumental piece that probably came from the castle and is the second one of a lion to be found in this area in the last fifteen years.

Gold Cache found near Temple Mount

The gold items were found just about 50m south of the Temple Mount in the Ophel excavations conducted by Dr. Eilat Mazar of the Hebrew University over the last four years. The extraordinary find consisted of 36 gold coins, a pair of gold earrings, a silver ingot and a large 10cm. gold medallion on a short chain, depicting a seven-branch menorah, a shofar and a scroll which Mazar thought might have adorned a Torah scroll. The artefacts were found in two locations, one hidden below floor level and the other hastily scattered above the floor as if left in a hurry. Both are dated by the excavator back to 614 CE when there was a short invasion of Jerusalem by the Persians to 629 CE. Dr. Mazar thinks that the hoard was destined as a contribution to a synagogue to be built near the site and abandoned at the threat of the Persian invasion and never retrieved by the owners. The gold coins have been dated by Lior Sandberg of the Tel Aviv Institute of Archaeology to a series of Byzantine rulers dating from the 4th to the early 7th centuries CE. After preparation, it is intended to exhibit the artefacts worldwide before placing them for public display in the Israel Museum.

Award to Prof. David Ussishkin

The Percia Schimmel Prize for 2013 will be awarded to Prof. David Ussishkin at the Israel Museum on 4th February 2014. It is given for Distinguished Contribution to Archaeology in Eretz Israel and the Lands of the Bible. David Ussishkin is retired professor of Archaeology at Tel Aviv University and directed the excavations at Lachish for many years from the 1980s. He has recently published the five

definitive volumes of that expedition and is at present co-director with Israel Finkelstein of the renewed Megiddo excavations. He has been a frequent and popular lecturer to the AIAS in London.

Stephen Gabriel Rosenberg
W.F.Albright Institute of Archaeological Research, Jerusalem

Grant Report

Catherine Quine
University of Nottingham

Thanks to the generous grant I received from the Anglo Israel Archaeological Society I was able to return to Tel Azekah for the 2013 season. The Lautenschlager Tel Azekah Expedition began in 2012 and so was only in its second season this year. Tel Azekah is situated in the Shephelah, on the Elah valley, in the vicinity of Phillistine Tel es-Safi as well as Lachish and Bet Shemesh, thus making it a key city in the region. It was destroyed by Sennacherib in the eighth century BCE and is mentioned three times in the Hebrew Bible. Having worked in area S2 in 2012 which is situated on a man-made terrace that runs around the tel, I was privileged enough to be offered the position of assistant supervisor in S2 this year. Interestingly, the Iron Age destruction layer we expected to find from Sennacherib's destruction has seemingly escaped area S2 which jumps very quickly into the LB. Our previous excavation is 2012 had uncovered an LB warehouse, a paved plaza adjoining a cistern, and a pavement beneath the LB warehouse. Our aims this year were to excavate the cistern, dig beneath the pavement and try to expand and understand our plaza.

The cistern excavation took much effort, in particular from Prof. Bob Cargill who spent most of the season in it, and yielded some interesting finds including a horse and rider figurine. The bottom of the cistern had a clean Iron Age IIC fill which allowed us to date its last possible use, and the stratigraphy then continued up to a Persian/Hellenistic layer towards the top of the cistern. Part of my duties as assistant supervisor was to manage all of the registration of the finds from our area, so I spent a lot of time organising the sifting of the buckets from the cistern and documenting all the heights of the various finds and pottery buckets.

We expanded the plaza square and found that the paving continued towards the edge of the terrace and included a silo which had been carved into the same bedrock as the cistern. We excavated the silo and found some organic matter which may one day tell us more about it. The silo has a hole in the bottom which we

Fig. 1. View of the site

believe would have been used for a pillar or column, perhaps to hold some form of a roof. There may be other silos in the area as it was fairly small but we did not have time to excavate further.

Beneath the pavement that lay under our warehouse from 2012, we discovered another LB building, this time with pillar bases in a line along the Western side of the building which corresponded to some huge boulders in the Eastern side of the building. This we named the pillar building and it was easily dateable to the LB with beautiful pottery found upon its floor, and the fact that it was beneath two other LB buildings. We found that the floor continued on the other side of the boulders and so we expect that there will be another line of pillar bases beneath our baulks on that side, and that the huge boulders will prove to be in the middle of the room. More excavations will take place next season to establish this. Beneath this LB pillar building, we found another building, termed the 'boulder building' as it uses the boulders and then carved bedrock as its boundary points. The carved bedrock runs to the edge of this building and then drops away beneath it, how deep it goes is a question for next season. The pillar building has been built directly on top of the 'boulder building' and uses it as a foundation. The 'boulder building' has been tentatively dated LB, but has only been summarily excavated thus far.

The cistern, silo and plaza have all been dated to the LB, as have the warehouse, pavement, pillar and boulder buildings that adjoin them. Thus we have an unusual amount of LB layers for a site in the Shephelah which is an exciting prospect. The pillar building, plaza and silo are clearly of elite standard. One of our tasks for next season will be to establish what kind of building this was, whether administrative,

Fig. 2. Excavating the cistern (left to right): myself, Omer Sergei, Mandy Morrow, Arianne Goren and Bob Cargill,

or something else. We will also be excavating the 'boulder building' and taking down our baulks in an attempt to understand our carved bedrock. I owe much gratitude to our directors, Prof. Oded Lipschits, Tel Aviv University) Prof. Manfred Oeming (Heidelburg University) and Dr. Yuval Gadot (Tel Aviv University) as well as Omer Sergei, who supervised S2 and who offered me the opportunity to be on the staff team this year, allowing me the chance to understand the archaeology of the site from a new perspective.

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Strata requires all articles to be presented in line with the typographical conventions of the publication, which follows the basic form of the Harvard reference system. Within the text, references are made in brackets in the form of the author and date of publication, followed by page numbers, e.g. (Aharoni 1979: 44–52). The full reference is to be given in the bibliography at the end of the article, as follows:

Book:
Aharoni, Y., (1979). *The Land of the Bible, A Historical Geography* (London).

Article:
Naveh, J., (1989). 'The Aramaic and Hebrew Inscriptions from Ancient Synagogues', *Eretz-Israel* 20: 302–310 (Hebrew).

Chapter:
Gibson, S., (2001). 'Agricultural Terraces and Settlement Expansion in the Highlands of Early Iron Age Palestine: Is There a Correlation Between the Two?' Pp. 113–146 in A. Mazar (ed.), *Studies in the Archaeology of the Iron Age in Israel and Jordan* (Sheffield).

An abstract of no more than 100 words should be included at the beginning.

The article can be divided between headings and sub-headings, with no capitalisation. The headings are in bold, with a space before the text, while the sub-headings are in italics, with no space before the text.

Please note additionally:

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- There are end-notes rather than foot-notes.
- Do not format your work with indentations, hanging paragraphs and so on, but type it up without justified margins, one and a half spaced, in Times New Roman font.
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