

# Coin Denominations and Weight Standards in Fourth-Century BCE Palestine<sup>1</sup>

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## *Abstract*

Epigraphic material of the fourth century BCE and other written sources are surveyed in order to identify the weight denominations and standards of contemporaneous Palestinian coins. It was found that there were probably local denominational systems and weight standards in the region, and that these were apparently based on the *sheqel* and its fractions. The Greek (Attic) denominational system and weight standard formerly associated with the coins were probably not known in Palestine.

This essay scrutinizes references to Greek (Attic) weight denominations and standards in fourth-century BCE Palestinian coins in modern scholarship. Careful examination of the contemporaneous epigraphic material at hand, however, suggests that it is best to view the coins of Edom (?), Judah, Samaria and Philistia as based upon a *sheqel* standard (Fig. 1).

## THE CASE OF EDOM

In several of the Edomite ostraca allegedly discovered at Khirbet el-Qom the term *kesef* (*ksp* and *ksp'*, silver) as references to silver money is noted.<sup>2</sup> The term *ksp* appears also in one of the Aramaic ostraca discovered at Tel Arad (Naveh 1981:168, No. 41, 1, 6 and 1[recto]). Units of *ksp* normally appear abbreviated in these ostraca, *š* for *sheqel* (*šql* / *šqln*), *r* for quarter (*rb'* / *rb'n*), and *m* for *maneh* (*mnh* / *mnn*) or for *ma'eh* (*m'h* / *m'n*).<sup>3</sup> In this respect it is worth noting that the late

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2 For *ksp* (and *ksp'*), cf. Lemaire 1996:19, No. 5, 4 (*sic*); 2002:130, No. 254, 1; p.181, No. 365, 3; Eph'al and Naveh 1996:82, No. 180, 1; p. 90, No. 199, 1, 3, 4; p. 92, No. 201, 1.

3 For *š* = *šql* / *šqln*, cf. Lemaire 1996:19, No. 5, 5; 2002:162, No. 297, 1, 2; p. 164, No. 307, 3 (?); Eph'al and Naveh 1996:68, Nos. 141, 1, 2; 142, 1; p. 82, No. 180, 2, 3, 5. Cf. also Lemaire 2002:60, No. 94, 3 for *šqln* (pl.) spelled in full.

For *r* = *rb'* / *rb'n*, cf. Eph'al and Naveh 1996:24, No. 6, 2; p. 26, No. 11, 3; p. 56, No. 106, 3; p. 60, No. 115, 3; p. 68, No. 140, 2; p. 80, No. 174, 3, 6 (recto); p. 82,

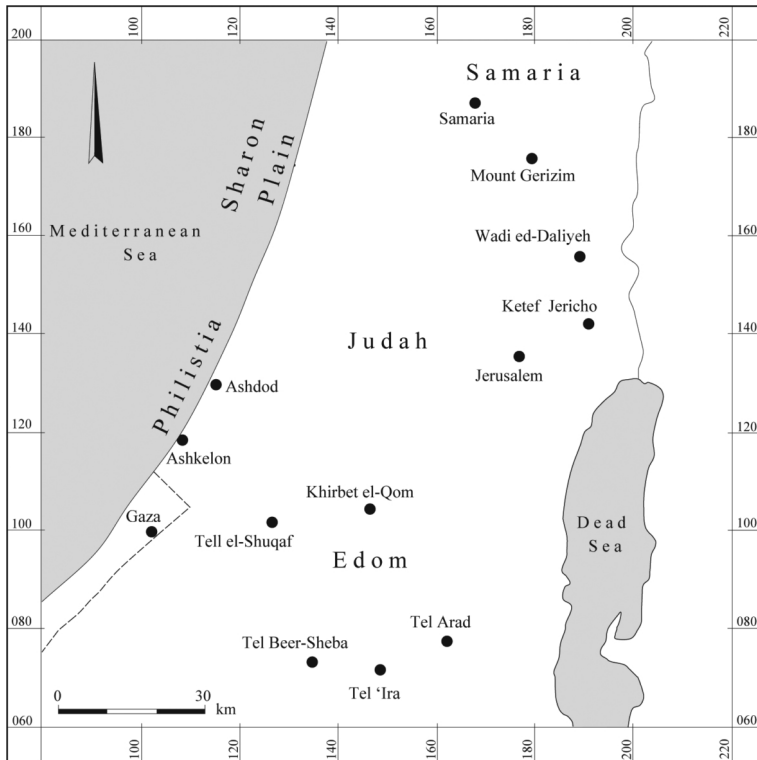


Fig. 1. Map of Palestinian sites mentioned in the text

fourth century papyrus discovered at Ketef Jericho is full of abbreviated  $\check{s}$  (for *sheqel*) and *r* (for quarter) on both verso and recto (Eshel and Misgav 2000). References for *sheqel*, quarter and *ma'eh* abbreviated as  $\check{s}$ , *r* and *m* can also be found in few of the Aramaic ostraca discovered in Tel Beer Sheba (Naveh 1973:81, Nos. 16, 2, 3; 17, 1; 1979:188, 37, 3, 4), and one of the Aramaic ostraca of Tel 'Ira (Naveh 1999:412, No. 8, 2, 3; Lemaire 2002:227–228). All the above suggests a vivid monetary economy in fourth century BCE Edom; the *sheqel* formed the basic weight standard, equal to four quarters, whereas the quarter was equivalent to six *ma'ehs*. This denominational system is in fact similar to that of the Attic weight standard, even though the weights of the *sheqel* and Attic *tetradrachm* differ. In the Attic system it was the *tetradrachm* which formed the

No. 179, 1, 3; p. 84, No. 184, 1–6; p. 86, No. 191, 3; Lemaire 2002:131–132, Nos. 255, 1 (?), 2–8; 256, 2. Cf. also Lemaire 2002:75, No. 129, 2 for *rb'* spelled in full but not necessarily in the contexts of silver money (see Eph'al and Naveh 1996:86, No. 189, 3, 4).

For *m* = *mnh* / *mnn* or *m'h* / *m'n*, cf. Eph'al and Naveh 1996:26, No. 16, 3; p. 62, No. 122, 1 (?); p. 68, Nos. 140, 1; 141, 1; p. 90, No. 199, 5.

basic unit of weight, equal to four *drachms*, with the *drachm* corresponding to six *obols*.

Until Gitler, Tal and van Alfen (this volume) Edomite coins had not been identified, so there were no finds to associate with the above epigraphic evidence. Now it appears clear that Edomite coins followed a *sheqel* weight standard. This is important because, as will be seen below, the coins from neighboring Philistia, Judah and Samaria were customarily identified as Attic standard denominational units (i.e., *tetradrachms*, *didrachms*, *drachms*, *obols* and *hemiobols*). The Attic standard was based on the actual weight of the respective coins, which appeared to approximate Attic weights, but not on epigraphic evidence.

### THE CASE OF JUDAH

Epigraphic evidence in the Persian period for Judean use of the *sheqel* system may come from an ostrakon from the City of David with the word *maneh* (Naveh 2000:12, No. 24). There is no indisputable reference in the Bible for the use of a Greek denominational system. Indeed, the Septuagint (Ἑσδρας β' 2:69) translates χρυσίου δραχμημᾶς for the “gold *drachms*” (*zhd drkmwnym*) found in Ezra (2:69) and Nehemiah (7:70, 71). Without doubt, however, Achaemenid *darics* are indicated.<sup>4</sup>

Recently, Ronen pointed out that the *yhd* coins have two weight groupings, with average weights of 0.26 g and 0.48 g, which do not harmonize with any Greek (Attic) weight standard (2003–2006:28–29). Ronen concluded that the *yhd* denominational system was based on the *sheqel* which at the end of the First Temple period was about 11.4 g (Kletter gave the weight as 11.33 g; Kletter 1998:139–140). Thus the coins averaging 0.48 g corresponded to the biblical *gera* (1/24 *sheqel*), whereas those averaging 0.26 g correspond to the biblical half-*gera* (1/48 *sheqel*).<sup>5</sup> Ronen thus rejected Meshorer’s (and many others) designation of an Attic weight standard for the *yhd* coinage. The two recorded *yhd* coins of 2.72 g and 2.70 g (*TJC*:197, Nos. 2–3) would both become, in Ronen’s view, quarter *sheqels*, rather than Meshorer’s (and others) designation of these coins as *tetrobols*. In this respect it should be emphasized that apart from the *yhd* coins (Ariel 2002: Table 3) the archaeological evidence is scant. All we have is a stray

4 The Septuagint generally translates a *sheqel*, including the “*sheqel haqodesh*”, by the word *didrachma* and *beqa* by *drachma*.

5 According to the Bible one *sheqel* denomination equals twenty *gera* (Exodus 30:13; Leviticus 27:25; Numbers 3:47; 18:16; Ezekiel 45:12). The archaeological evidence favors one *sheqel* equaling 24 *gera* (Kletter 1998:80–83, 140, Fig. 11). The two ratios for the *sheqel* / *gera* relationship — biblical 1:20 and archaeological 1:24 — suggests there were two different denominations, a *sheqel haqodesh* and an (unqualified) *sheqel*, the latter used in daily transactions.

find of a limestone weight from Tell el-Shuqaf (in the Judean foothills) that bears the inscription *pym* in the standard Aramaic script of the Persian period and weighs 112 g (Stern 1982:217, Fig. 362). Inconsistent with the Iron Age *pym*, such a weight may likely correspond to 10 Persian-period *sheqels*.

On the other hand, Ronen also argued that during the period of the Macedonian hegemony and Ptolemaic rule the *yhd* coins' weight standard shifted to a Greek model. He thus accepted Meshorer's (*TJC*) designation of coins Nos. 31 and 31a as *hemidrachms*, weighing 1.75 g and 1.55 g respectively. One must admit, however, that such weights for Attic *hemidrachms* are still much lower than that of the idealized Attic weight standard of the period. The average weight of 236 statistically analyzed Ptolemaic *yhd* "quarter *obols*" is 0.18 g (Gitler and Lorber 2006: n. 3, Appendix 2), suggesting that *yhd* Ptolemaic *hemidrachm* should weigh 2.16 g. The weight of 2.16 gm for a *hemidrachm* further implies a 4.3 g for a *drachm*, which is in fact the proper Attic standard for this denomination.

#### THE CASE OF SAMARIA

Samaria too has its own epigraphic material referring to denominations. In the legal Aramaic documents (deeds of slave sales and others) found in the Wadi ed-Daliyeh papyri the recurrent term *ksp' š* refers to the amount paid in silver *sheqels* (*šqln*) (e.g., Gropp 2001: WDSP 1, 3, 8; WDSP 2, 3; WDSP 3, 8; WDSP 4, 3, 9, and p. 238). References for silver *maneh(s)* (*ksp / ksp' mnh / mnn*) is also abundantly found (e.g., Gropp 2001: WDSP 3, 9; WDSP 5, 10; WDSP 6, 11, and p. 239).<sup>6</sup> The most dominant Samaritan coin denomination recorded as described by Meshorer and Qedar was the *obol* (mean weight is 0.65 g). Meshorer and Qedar also identified *drachms*, *hemiobols* and quarter *obols*. Given the striking evidence for the use of the *ksp' š[qln]* in the Wadi ed-Daliyeh papyri it is surprising to discover that the Attic coin denominations as put forward by Meshorer and Qedar (1991: 67–69; 1999:69–71) have never been questioned. The so-called Samaritan *drachm*, with a mean weight of 3.63 g, is relatively close to the contemporaneous Sidonian 1/4 *sheqel*, averaging 3.12 g (cf. Elayi and Elayi 2004:588). In other words, when compared to the Sidonian coin weights, there are differences of some 16% — roughly the same deviation as to the Attic system. If the so-called Samaritan *drachm*, was in fact equivalent to the quarter *sheqel*, the so-called *obols* could have been designated *ma'ehs*, and *hemiobols* half-*ma'ehs*. This is not to say that Samaritan coinage follows a Sidonian weight standard, but given the epigraphic and numismatic evidence, it is very likely that the Samaritan coinage follows a local weight standard, where the basic unit was the *sheqel*, which from the numismatic evidence weighed 14.52 g.

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6 According to the Bible one *maneh* equals 60 *sheqels* (Ezekiel 45:12).

## THE CASE OF PHILISTIA

The denominations of Philistian coinage weight standard has been dealt with extensively (Gitler and Tal 2006a:315–328),<sup>7</sup> but no epigraphic evidence from Persian-period Philistia was brought to bear on the subject. Evidence, however, is available, in eleven bronze weights apparently discovered at Ashqelon (Iliffe 1936:68, Pls. 34:4–14). These weights were published together with Egyptian(-stiled) bronze figurines. Both weights and figurines were bought in part from an antiquities dealer (apparently from the same hoard) and retrieved in part from excavations at Ashqelon, carried out in the place where the purchased objects were allegedly found. All finds were dated to *c.* the fourth century BCE. Four of these weights are in the form of animals (reclining bulls [2], ram [1] and lion [1]); the two complete ones (reclining bull and ram) weighed 427.5 g and 40.5 g respectively. According to Iliffe they were probably based on the Attic *drachm* standard (Iliffe 1936:68, n. 1, Pls. 34:4, 6), although one would expect a heavier weight for the ram (i.e., 42.75 g). The other seven bronze weights are in the form of rough cubes (or truncated pyramids). Four of these weights have incised marks, which Iliffe considered “of doubtful significance ... may be some form of numerals; they are certainly not Semitic” (Iliffe 1936:68, n. 4, Pls. 34:8–14). Lemaire’s study of these weights has proven the incised marks to be Phoenician letters; based on their paleography they were attributed to the Persian period (1980:20–32, *passim*).<sup>8</sup> Stager, on the other hand, dated Iliffe’s figurines and weights to the seventh century BCE, based on comparable figurines and weights discovered in Late Iron Age contexts in his excavations at Ashqelon (1996:69\*). Kletter persuasively argued that Stager’s excavated weights were badly preserved and had no inscriptions, and therefore did not definitely belong to the same system and period as that of the weights published by Iliffe. Kletter added that while Stager’s finds demonstrated that these types of weights could well have been used during the seventh century BCE, the date was not necessarily limited to this period alone (2000:36\*; see also Elayi and Elayi 1997:277–279). It should be borne in mind that the range of Iliffe’s weights is 78.8–13.8 g — with not all weights intact — and they may fit well a *sheqel* weight standard ranging between 15.7 and 13.8

7 Philistian coinage followed “an Attic denomination system (1 [= tetradrachm], 1/2 [= didrachm], 1/4 [= drachm], 1/8 [= hemidrachm], 1/24 [= obol], 1/48 [= hemiobol]) ... but used a local (Eastern?) weight standard remarkably close to that of the later Ptolemaic Attic standard ... It is hard to imagine that this correspondence in weight is a coincidence, and may suggest that Ptolemy I adopted a local standard” (Gitler and Tal 2006a:305).

8 However, according to Lemaire a date in the Late Iron Age II is more acceptable, although one cannot absolutely reject a date in the Persian period (Lemaire, pers. comm.).

g.<sup>9</sup> Iliffe's weights, therefore, allow us to speculate that the Philistian coinage as well followed a local weight standard, with the basic unit being a *sheqel*, weighing (according to the numismatic evidence) 14.32 g. While not proposing the *sheqel* as the standard denomination, Gitler and Tal have previously raised the idea of a local Philistian weight standard.<sup>10</sup> Were the standard shown to be based upon the *sheqel*, the customary designation of the Philistian coins with Greek denominational terms would have to be revised.

### BRIDGING THE DIFFERENCES

The only epigraphic evidence on the ratio of the *sheqel* and the Greek *stater* comes from the Elephantine papyri dated to the late fifth century BCE. There we find two shekels are equated to one *stater*.<sup>11</sup> One text adds that the *stater* is "silver of *Yawan*" (= Greece; *ksp ywn*; Kraeling 1953:270, No. 12, 5). Porten (1968:64–65) following Kraeling (1953:40, 275–276) was of the opinion that the term *stater* (*sttr*) refers to the Athenian *tetradrachm* that prevailed in the Greek world at the time.

Following Porten's view, two *sheqels* equaled one Athenian *tetradrachm* whose accepted weight is 17.2 g (for the weight see Nicolet-Pierre 2000:41; Elsen 2002:23). It is thus suggested that one *sheqel* weighed 8.6 g. The *sheqel* would thus be equivalent to a *didrachm* (as quoted in the Septuagint, above n. 4), and a half-*sheqel* (4.3 g) correspond to a *drachm*. Consequently a quarter (2.15 g) equals three *obols* and *ma'eh* (0.35 g) is the same as one *hemiobol*.

Comparing this reconstruction with the weights of Philistian and Samaritan coins, generally identified as *drachms*, *obols* and *hemiobols* — the dominant denominations — some differences become apparent. Based upon recent statistically reliable weight analyses, the mean weight of 218 Philistian *drachms* was 3.58 g. That of 247 Philistian *obols* was 0.63 g and that of 52 *hemiobols* was 0.26 g (Gitler and Tal 2006a:315–328, *passim*, especially Table 5.4). Furthermore, the

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- 9 Weights are as follows (denominations are speculative): No. 34.36 weighs 78.8 g (6 *sheqels* of 13.1 g); No. 34.37 weighs 11.2 g (1 *sheqel*); No. 34.38 weighs 15.7 g (1 *sheqel*); No. 34.39 weighs 21.5 g (2 *sheqels* of 10.75 g); No. 34.54 weighs 44.3 g (4 *sheqels* of 11.07 g); No. 34.55 weighs 15.6 g (1 *sheqel*); No. 34.56 weighs 13.8 g (1 *sheqel*). For measurements see Lemaire 1980: 21–21, Nos. 2 [= 34.36], 3 [= 34.54], pp. 24–25, Nos. 14 [= 34.38], 15 [= 34.55], p. 26, No. 22 [= 34.39], p. 28, No. 28 [= 34.57]. Weight No. 34.37 was not published by Lemaire.
- 10 Above, n. 7. Moreover, it was suggested that Ptolemy I's two reductions of the Attic weight standard (312/305 BCE and 300/290 BCE) were probably influenced by local (Philistian, Samaritan and Judean) weight standards.
- 11 Cowley 1923:130, No. 35, 3–4 [Porten and Yardeni 1989:114, No. B4.6, 3–4] = / כספ ש [כספ] סתתרי // הו [כספ] סתתרי; Cowley 1923:130, No. 35, 9 [Porten and Yardeni 1989:114, No. B4.6, 9] = / כספ שק[לנ] // הו [כספ] סתתרי; Kraeling 1953:270, No. 12, 5 [Porten and Yardeni 1989:94, No. B3.12, 5] = // // // // // כספ יונ סתתרי /// שקלנ תלתה הו

mean weight of 15 Samarian *drachms* was 3.63 g; that of 134 Samarian *obols* was 0.65 g and that of 64 *hemiobols* was 0.28 g (Gitler and Tal 2006a: Table 5.5). Thus the equivalence of a 0.35 g *ma'eh* / *hemiobol* according to Porten's textual interpretation deviates by some 25% from the Philistian/Samaritan *hemiobol* which averaged 0.27 g.

Can this gap be bridged? One explanation may be that the insufficient weight of the "*hemiobols*" (in comparison to that of "*obols*" and "*drachms*") can be explained by the difficulty to produce minute flans of unified weight and their more recurrent use as one of the smallest denominations (i.e., "small change"). Another more far-reaching alternative was proposed by Lemaire, who recently suggested an alternative *sheqel* / *tetradrachm* relationship where one *sheqel* equals one *tetradrachm* (2004:139–140), rather than one *didrachm* as suggested by Porten. Lemaire mentioned this with respect to one of the ostraca allegedly found at Khirbet el-Qom (2002:131–132, No. 255). According to his interpretation of the text, the ostrakon referred to a head tax of two quarters for each person mentioned there. Lemaire's argument is partly based on Josephus (*BJ* 7:218; *Ant.* 3:195; 18:312), and the New Testament (*Matt.* 17:24, 27), which in turn refer to the half-*sheqel* Jewish head tax acknowledged to have been in place by the end of the Second Temple period (if not earlier).<sup>12</sup>

Lemaire's view, with a half-*sheqel* equated to a *didrachm* (and consequently a quarter equaling a *drachm* and *ma'eh* the same as an *obol*) presents some difficulties. From a numismatic point of view one hardly finds local *didrachm* denominations (only two recorded Philistian *didrachms*). According to Lemaire's reconstruction (of Khirbet el-Qom No. 255, Tel Beer Sheba No. 17, Tel 'Ira No. 8, and Ketef Jericho papyrus), one would expect more such denominations, as these could have been used for payment of the head tax. This, however, may not weaken Lemaire's argument, since two quarters could always meet the need for the head tax payment.<sup>13</sup> It is likely that Lemaire was also influenced from the weight standard of the Phoenician *sheqel* of the time roughly averaging 13.5–14.0 g<sup>14</sup> — somewhat closer to that of the Attic *tetradrachm* (17.2 g). Here too, however, a

12 Lemaire suggested that while there was a one-third *sheqel* annual tax in the days of Nehemiah (Nehemiah 10:33), the half-*sheqel* tax was the practiced from the mission of Ezra onwards (post-398 BCE; Lemaire 2004:140). The idea that an offering of one-third of a *sheqel* for sanctuary needs was fixed in the time of Nehemiah and that at a later stage it was raised to a half-*sheqel* (as found in the Exodus accounts) was put forward by Wellhausen (1905:153). Liver (1963:181–185), on the other hand argued that Nehemiah's one-third of a *sheqel* was a different tax than that of the standard half-*sheqel* offering.

13 Quarters are more common than half-*sheqels* in many of the Edomite ostraca, possibly supporting the idea that this was a common coin denomination.

14 Elayi and Elayi 2004:586–587 argued that the *sheqel* of Sidon had three successive "modified standards": about 12.70 g (first series), 14.01 g (after reevaluation) and 12.83 g (after devaluation).

deviation of some 25% is apparent. Albeit, given the ratio of the *sheqel/stater* mentioned in the Elephantine papyri, reference is probably to the Babylonian *sheqel* which weighed around 8.6 g.

It is been suggested here that the silver money circulating in fourth-century BCE Palestine followed local weight denominations based upon the *sheqel*. Each of the minting provinces of Palestine may have had varying weight standards for their local *sheqel*.<sup>15</sup> The high variability in weight of the smaller fractions (the *ma'eh* ["*obol*"] and half-*ma'eh* ["*hemiobol*"]), may lie in the difficulty of producing minute flans of a unified weight. This would preclude our using their average weights to attempt to determine the *sheqel* standard employed. On the other hand, in the higher denomination (the quarter, or "*drachm*"), whose variability in weight should be less, a more accurate figure for the *sheqel* can be obtained from the average weight. Multiplying the average weight of the Edomite quarter (3.99 g) by four, a figure of 15.96 g results for the Edomite *sheqel*. In the same manner the Samarian quarter (3.63 g) yields a *sheqel* of 14.52 g, and Philistian quarter (3.58 g) produces a weight of 14.32 g for its *sheqel*. Based upon both numismatic and archaeological evidence, the *sheqel* in Judah weighed 11.33 g.

The weight of the Edomite *sheqel* is the heaviest of the four groups, certainly reflecting a separate *sheqel* standard. The differences in weight between coins of Samaria and Philistia are quite marginal (Table 1). Their heavier weight standard in comparison to that of the Judean *sheqel* may be explained by the fact that Judean money was purer from a metallurgical point of view, being more oriented to Temple payments (Ronen 2003–2006:29–30; Gitler and Lorber 2006:25). With the lack of a secure internal chronology for Persian period *yhd* coins, we cannot exclude the possibility of change in the weight standard in the course of that period.<sup>16</sup> This is to say, if most Persian period *yhd* coins were produced in the very latest part of the Persian period or (especially) during the earliest stages of the Hellenistic period,<sup>17</sup> the 11.33 g *sheqel* weight standard might not have been

15 The possibility of a unified weight standard for all Palestinian coinages cannot be rejected out of hand given the insignificant quantity of coins examined. It may be emphasized, however, that different *sheqel* weight standards also are found in Phoenicia. Ongoing metrological analyses carried out by J. Elayi have shown that each of the operating Persian period mints, namely Tyre, Sidon, Gebal (Byblos) and Arwad have different *sheqel* standards (Josette Elayi, pers. comm.).

16 The same holds true for the coinages of Philistia, Samaria and Edom.

17 Such a possibility was raised by Ariel (2002:288–290) for Meshorer's Persian-period *AJC* 1: Nos. 3, 4, 6 and 8. Type Nos. 3, 4 and 6 were discovered in Cave VII/1 together with a posthumous *tetradrachm* of Alexander III (319–315 BCE). Type Nos. 8 and 17 (which dates to 333–323 BCE according to Meshorer) were discovered in Caves IV/6 together with a *drachm* of Philip III Arrhidaeus (323–317 BCE), three posthumous *tetradrachms* of Alexander III (319–315 BCE [1] and (310–301 BCE [2]), and an additional undated *drachm* (but probably posthumous). No evidence for Persian-period occupation was noted in either cave.



inconsistent with earlier, heavier Philistian/Samaritan/Edomite *sheqels*. The fact that we have many small Persian-period *yhd* coins (termed “*obols*”) weighing 0.6 g and above,<sup>18</sup> may suggest they followed a weight standard heavier than the suggested *sheqel* of 11.33 g.

Explanation for the high weight of the Edomite *sheqel* may lie in the worn character of the coins. Little attention was paid to the quality of the dies (especially the obverse), and this was compensated by a higher weight. As explained in detail in Gitler, Tal and van Alfen (this volume), the coins’ worn condition as well as their relatively high weights would have served to establish their identity.

There is epigraphic evidence of close interaction between the Edomites and Judeans at the time (e.g., Aḥituv 1999; Lemaire 2001:1152–1156). It is therefore possible that the Edomite *sheqels* follow the role of the *yhd sheqels*, that it was more oriented to Temple payments. According to Nehemiah 10:33 a one third of a *sheqel* annual tax was levied for the service of the house of *yhwh* in Jerusalem in his day. The possibility that *yhwh* was worshiped in Edom was raised by Lemaire based on one of the ostraca allegedly deriving from Khirbet el-Qom (2002: 149–156, No. 283; 2006:416–417). There, *byt yhw* is explicitly mentioned. The adoption by certain Edomites of a Jewish religious duty would thus not be too far-fetched, although evidence is limited indeed. It may therefore be no coincidence that the common Edomite coin averaging 3.99 g (Gitler, Tal and van Alfen, this volume) — possibly one Edomite quarter — is close in weight to one third of a *yhd sheqel* (3.77 g).<sup>19</sup> Conversely, it is also possible to view the amount of Nehemiah’s tax as having been influenced by the cult practice of a neighboring population, namely Edom.

Table 1. Differences in Weight Standards and Silver Content

	Average Weight	Average Silver Content <sup>20</sup>	Amount of Silver
Edomite <i>sheqel</i>	15.96 g	96.4%	15.38 g
Judean <i>sheqel</i>	11.33 g	97.0%	10.99 g
Samaritan <i>sheqel</i>	14.52 g	91.8%	13.32 g
Philistian <i>sheqel</i>	14.32 g	94.3%	13.50 g

18 E.g., *TJC*:197–198, Nos. 4a, 11, 12, 13.

19 From an elemental silver content perspective this would give roughly the same figures: 3.84 g of silver in the Edomite quarter as opposed to 3.66 g of silver in a third of a *yhd sheqel*.

20 Based on XRF analyses carried out on 271 Philistian coins (Gitler and Tal 2006a:329–330), 66 Samaritan coins (Gitler and Tal 2006b:58–59), 32 (Persian-period) *yhd* coins (Gitler and Lorber 2006: Table 4) and 34 Edomite coins (Gitler, Tal and van Alfen, this volume, with an overview on the XRF method).

The epigraphic, archaeological and numismatic evidence collected here has suggested that the identification of a Greek (Attic) denominational system and weight standard in Palestinian coinages of the fourth century BCE is not likely. A local denominational system and weight standards based on the *sheqel* and its fractions should be preferred.

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