

# NEW TYPOLOGY AND CHRONOLOGY OF THE GREY LUSTROUS WHEEL MADE WARE IN ISRAEL

By *Eli Yannai*<sup>1</sup>

## INTRODUCTION

The grey/black juglets were first published by PETRIE during his excavations in Egypt (PETRIE 1906:15). From the very beginning of research into Cypriot pottery GJERSTAD dealt with the unique characteristics of the juglets and their definition as characteristic of the Canaanite pottery of the Middle Bronze Age (GJERSTAD 1926: 201, 206). During Petrie's excavations at Tell el-Ajjul 38 juglets were found and they were categorized together with other vessels of Mycenaean, Minoan, Anatolian and Cypriot origin (PETRIE 1933: pl. 39:68A3'). Sjöqvist pointed out the technological similarity and the lustrous finish of some of the BLWMW juglets and the group of Tell el-Yehudiya ware. He believes the origin of the BLWMW is not in the early Cypriot pottery; rather they are the earliest imported vessels from Canaan to Cyprus (Sjöqvist 1940: 55, 86, 103). After the excavations at Megiddo, Gordon Loud defined the juglets as Cypriot imports to the Land of Israel followed by a question mark he placed after the definition (LOUD 1948: pl. 26:12). In 1969 Ruth Amiran defined the juglet as a vessel whose origin lies in the pottery of the Land of Israel and Syria. In her opinion the globular form and rounded base were influenced by the shapes of the imported Cypriot vessels (AMIRAN 1969: 146). HENNESSY also defined the juglets as imported from Cyprus (HENNESSY 1963: 53). Eliezer OREN deals with the grey black juglets in a unique-

ly ambiguous manner: one the one hand as a Cypriot import to the Land of Israel (OREN 1969: 130) and on the other as a vessel manufactured in the Land of Israel and exported to Cyprus (OREN 1969: 134; 1973: 77). According to Åström's catalogue, in Cyprus this type of ware is diverse and besides the juglets includes shallow and deep bowls and jugs (ÅSTRÖM 1972: 217–220). With the exception of the juglets, until now no other vessels have been defined in Israel that have been made with the technique and in the form of this type of ware.

Since Eliezer Oren's study was published in 1969, grey juglets have been found in the Land of Israel in Tomb 902 at Kabri (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002), in a tomb at Yiftach'el (BARDA and BRAUN 2003), in the LBI stratum at Tel Kinneret,<sup>2</sup> in a rich tomb at Jalame,<sup>3</sup> in Tomb 62 at Pella,<sup>4</sup> in two rich tombs in 'Ara (ILAN, GADOT and YANNAI forthcoming), in a tomb at Jatt (YANNAI 2000, 2005), in four rich tombs at Bahan (PORATH, DAR and APPLBAUM 1985: 221–223; GERSHUNY forthcoming),<sup>5</sup> in a large rich tomb at Shechem,<sup>6</sup> in tombs at Askar near Shechem (MAGEN and EISENSTADT 2004: pls. 3:19, 5:13, 14, 6:18), in a tomb at Zawata (EISENSTADT, ARABAS and ABLAS 2004: pl. 7:17, 18, 19, 20), in a tomb on the Mount of Olives in Jerusalem (SALLER 1964), in Stratum XXIIa at Tel Ashdod (DOTHAN and PORATH 1993: fig. 3:10), in two tombs at Tell Beit Mirsim (BEN ARIEH 2004: fig. 2.73:85) and we assume that sev-

<sup>1</sup> Israel Antiquities Authority

<sup>2</sup> We wish to thank Stefan Muenger for bringing this juglet to my attention.

<sup>3</sup> We wish to thank Karen Coballo-Paran for her permission to cite this within the framework of this publication.

<sup>4</sup> The objects from the tomb in Pella were published in the preliminary report (POTTS, COLLEDGE and EDWARDS 1985: fig. 9: 5) and in the final report (MCNICOLL, EDWARDS, HANBURY-TENISON, HENNESSY, POTTS, SMITH, WALMSLEY and WATSON 1992: pl. 58:2). In the preliminary report a juglet with a spherical body was published and in the final report a juglet with a base was pub-

lished. According to the information that was provided me by Steve Burk, other juglets were found in the tomb that were not published.

<sup>5</sup> The tomb was excavated by Gershon Edelstein and Ram Gophna in the 1960's. the finds were turned over to Lily Gershuny for publication and she refuses to grant access to them.

<sup>6</sup> The tomb was excavated by Krista KLAMER in 1968 and was partially published in *Qadmoniot* (KLAMER 1981: 32–33). Scores of juglets of several types were found in it but the excavator is preventing any access to the finds.

eral other juglets have been found that were not brought to my attention.<sup>7</sup>

The catalogue of juglets that will be discussed below is incomplete and does not include all of the juglets that were found in the country. Some of the juglets from Tel el Ajjul were found in the collections of the Rockefeller Museum in Jerusalem, but most of the juglets from Ajjul send by the excavator to collections all over the globe.<sup>8</sup> Juglets that were also found at Tel Gezer and Tel Gemme are not included in the catalogue because we were unable to locate them. The catalogue includes the juglets from the excavations that were published after that appearance of Duncan's corpus and does not include the juglets from the excavations that were conducted in the country from the end of the 19<sup>th</sup> century until the 1920's. Two rich assemblages from tombs in Bahan and Shechem are not presented in the catalogue due to technical reasons.

In 2000 Yannai published the finds from a tomb at Jatt, on the northern coastal plain of Israel (YANNAI 2000). Petrographic analysis conducted on the juglets from Jatt has shown that some of the juglets, particularly the grey and red lustrous juglets, were imported into the Land of Israel from Cyprus. Despite these results the view that the juglets were made in the Land of Israel and Syria was still held by some of the Israeli researchers in 2002 (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002: 119–120) and also in 2003 (BARDA and BRAUN 2003). Recently a juglet was published that underwent petrographic analysis that proved it originated along the northern Lebanese/Syrian coast (MAGEN and EISENSTADT 2004).

In 1999–2000 two tombs located in Wadi cAra, on the way to Megiddo, were excavated that yielded a wealth of finds from the Middle and Late Bronze Ages. A group of twenty grey black juglets was found in the tombs along side other imported Cypriot vessels (ILAN, GADOT and YANNAI forth-

coming). Some of the jugs and juglets that were uncovered in the tomb at Jatt (YANNAI 2000) and in the tombs at 'Ara are rare types and some of them combined in one vessel typical features of a number of different Cypriot wares. For this reason some of the vessels were examined petrographically by Y. Goren of the Tel Aviv University and Amir Gorzalczany of the Antiquities Authority. The petrographic examinations have confirmed that the juglets belonging to the BLWMW are not a homogenous group; many of them were made in Cyprus, some were made on the Lebanese coast and some were produced along the coast of Israel. The petrographic examinations have provided us with new insight into this group of ware. On the one hand this ware shares a number of structural qualities. On the other, it includes several different types that have a number of unique typological traits. We will therefore define the juglets belonging to this group as Grey and Black Lustrous Wheel Made Ware (GBLwmw).

The outer hue of the juglets imported from Cyprus is light grey, sometimes with yellow spots (SjÖQVIST 1940: 54) and some of the juglets are dark grey. Between the light and dark grey juglets there are juglets that occur in all the other shades of grey also. A number of juglets are treated with a dark red slip. The red color indicates that the outer color of some of the juglets is a result of the slip applied to them but on some of the juglets the color is a result of the firing and no traces of a slip were found on the surface of the juglet. The special luster that is created on the surface of the juglet as a result of its quality burnish is what has given the juglets their name.

The outer surfaces of most of the local juglets in the Land of Israel are hand burnished. The hand burnish on the local juglets is neither meticulous nor is it of a very fine quality like the burnish that is on the Cypriot juglets. Some of the

<sup>7</sup> In the Lachish excavations complete information was not reported on all of the juglets and the exact identification of each type is not certain. Dozens of juglets were found at Ajjul and only some are presented in the catalogue, most of which are intact juglets. In addition to the juglets that are presented here, dozens of fragments of juglets were found that cannot be sorted typologically.

<sup>8</sup> In Petrie's list of excavations I located 32 tombs at Ajjul in which gray juglets were recorded in them. In Oren's article (OREN 1969) another 13 tombs were listed in

which gray juglets were found. The juglets were apparently identified according to the tomb registry cards that Petrie excavated and that are today located in London. These juglets are not discussed below because we do not have any details regarding which other vessels were found in the tombs. If the data from the tomb registry cards is correct the number of gray juglets that was found at Tell Ajjul is slightly greater than that in the catalogue discussed in this article. I am unable to answer why the data on the gray juglets is missing from the list of the tombs in the publication.

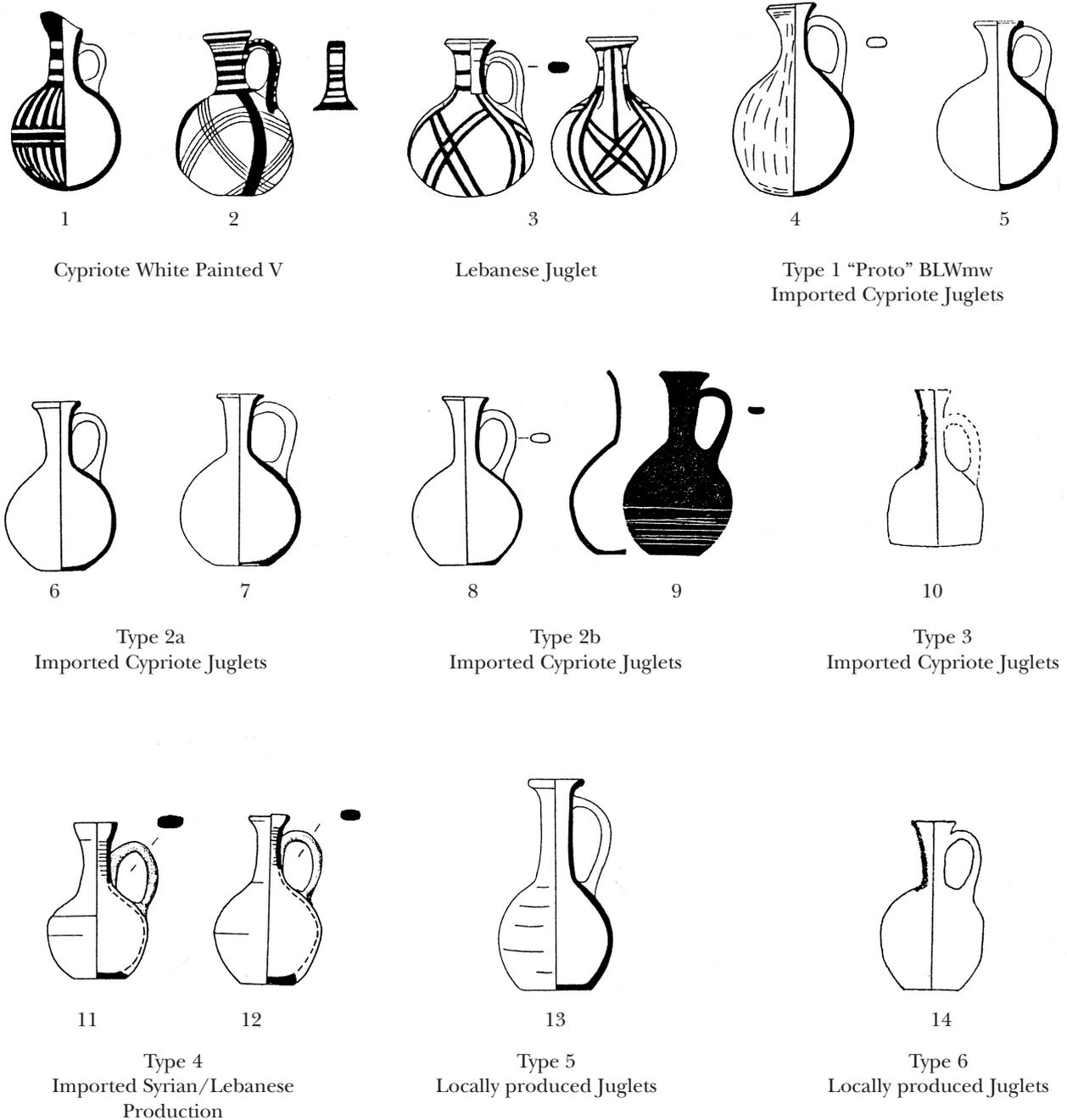


Fig. 1 Black Lustrous Juglets from Cyprus, the Syrian/Lebanese Coast and Israel

Canaanite juglets are treated with a sloppy vertical burnish and some are not burnished at all, leaving the surface of the vessel matte and lusterless. Combining the local juglets with the imported juglets into one group is based on the similarity of the shape of the neck which distinguishes the assemblage of juglets in this ware, and also the reduction firing technique that turned the surface of the juglet grey or black. Most of the juglets that were checked were made in Cyprus and there are juglets that were made on the Syrian/

Lebanese coast and in the Land of Israel. The different forms, the quality of the different finishes and the surface colors of the juglets are uniform and unique to each of the different production centers in Cyprus and on the coast of the Levant.

**THE TYPOLOGY**

The increase in the number of juglets that have been found in archaeological excavations and classification of the juglets in light of the petrographic examinations has facilitated a renewed

division of the juglets into different types that are comprised within this group of ware. Below we will present a catalogue of the grey black juglets and the assemblages in the Land of Israel in which these juglets were found. Based on the petrographic examinations, Types 1–3 were made in Cyprus, Type 4 was made on the coast of Lebanon and Types 5–6 were made in the Land of Israel.

#### GROUP ONE: IMPORTED CYPRIOT JUGLETS

*Type 1* (Sjöqvist Type 2)<sup>9</sup> – “Proto-Grey Lustrous” (Fig. 1:4, 5) (Catalogue Nos. 1–10) Hand-made spherical base and body, neck that is about half the length of the body’s height, flaring lotus-like rim and a handle that extends from the upper part of the body and is connected the entire length of the neck. Most of the juglets are black or dark grey in color. The Shape of type 1 juglets is very similar to a globular body type of White Painted V (Fig. 1:1,2), Red on Black and Bichrome Ware juglets (GUY and ENGBERG 1938: pl. 41:27; PETRIE 1933: pl. 39:J 67A6’). These juglets had influence on some Cypriot pottery production centers (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002: fig. 5.61:10).<sup>10</sup>

This Cypriot juglet (Fig. 1:3) shows that the Cypriot White Painted V juglets with a spherical body influenced several pottery production centers in different respects. In Cyprus the potters who produced BLWMW juglets using reduction firing were influenced by it. The Cross Line Style of decoration on a spherical body is also similar to the group of Cypriot origin Bichrome juglets and jugs with a spherical body. The combination of a decoration from one Cypriot group on a spherical body of another Cypriot group, which was made on a wheel using a clearly Canaanite technique, is apparently a result of the transition from vessels in the style and techniques characteristic of the end of the Middle Cypriot period to vessels made on a wheel at the beginning of the Late Cypriot period. As we will see later, the beginning of the production of BLWMW juglets in Cyprus is a result of the same processes.

Therefore one defined the Type 1 juglet with the globular body from the Middle Cypriot period as “proto”, so as to differentiate it from the other types that were made with a flat base.

#### THE CATALOGUE

1. *Kabri - Tomb 902*: (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002: fig. 5.61:9).

The juglet was found together with a Type 2a grey black juglet (No. 12 in the catalogue), two White Painted VI juglets imported from Cyprus. One unique juglet with globular body, orange clay and decorated in a Cross Line Style originated from the Cyprus or Syrian/Lebanese coast (see above) (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002: fig. 5.61:9–12). The date of Tomb 902 is based on two scarabs that are incised with the name *Yakabamw*. Based on the two scarabs the tomb dates to the MB2B. No vessels were found in it that date to the Late Bronze Age.

2. *Megiddo - Tomb 5040A from Stratum IX on the tell*: (LOUD 1948: pl. 51:3)

The juglet was found together with a typical lamp from the Middle Bronze Age and beginning of the Late Bronze Age (LOUD 1948: pl. 55:8). Also found were two jugs that are unique to Stratum IX (LOUD 1948: pl. 48:1, 9) and a jug characteristic of the Middle Bronze Age that was found in Strata IX–X at Megiddo (LOUD 1948: pl. 50:26).

3. *Megiddo - Tomb 1100A*: (GUY and ENGBERG 1938: pl. 54:20)

This juglet was found together with a Type 2b grey/black juglet (No. 48 in the catalogue). The grey/black juglets were found together with bowls and carinated bowls that resemble the carinated bowls from Strata IX–X at Megiddo, a jug with a trefoil rim that is quintessentially of Middle Bronze Age tradition, dipper juglets and cylinder juglets and a White Painted VI juglet. The tomb is contemporary with Stratum X or the beginning of Stratum IX.

<sup>9</sup> Sjöqvist’s Type 2, with a globular body, is designated Type 1 in this study. Juglets belonging to Types 2–8, which are the most common types of juglets in this group, do not appear in Sjöqvist’s catalogue. Therefore I prefer to assign new numbers to the types rather than base the new data on Sjöqvist’s catalogue.

<sup>10</sup> The juglet published by Scheftelowitz as local made but according to its form, the technique with which the

decoration is painted and the Cross Line Style decoration it is Cypriot origin juglet. But, the brown material mixed with numerous small bits of temper is most similar to the fabric of the juglets from the Syrian/Lebanese coast. Therefore, until we have an exact date for it from a laboratory analysis, it will be impossible to ascertain if the juglet is Cypriot or Syrian.

4. *Megiddo - Tomb 251*: (GUY and ENGBERG 1938: pl. 26:17)

A Type 2b grey/black juglet (No. 11 in the catalogue) was found with the juglet. Also found with the juglets were bowls, a jug and dipper juglets similar to the vessels from Strata IX–X at Tel Megiddo.

5. *Bet Shean - Tomb 42*: (OREN 1973: fig. 30:11)<sup>11</sup>

The Type 1 juglet was also found in the tomb with a Type 2b juglet (OREN 1973: fig. 30:13), Monochrome bowls of an early type, several Chocolate on White vessels and a rare Bichrome bowl. Oren is of the opinion that the tomb is contemporary with Tomb 1100a–d at Megiddo in which a Type 3 juglet was found and dates only to the LB1A; no evidence was found in it indicating any later use of the tomb (OREN 1973: 98).

6. *Pella - Tomb 62*: 4 (POTTS, COLLEDGE and EDWARDS 1985: fig. 9:5)

This Type 1 juglet was found together in the tomb with a Type 2a juglet (MCNICOLL, EDWARDS, HANBURY-TENISON, HENNESSY, POTTS, SMITH, WALMSLEY and WATSON 1992: pl. 58:5) (No. 17 in the catalogue). Chocolate on White bowls, jugs and juglets, a RLWMW jug and an early form of a Monochrome bowl were also found. No Base Ring jugs were found in the tomb. These finds are contemporary with the Types 1 and 2a juglets.

7. *Lachish - Tomb 7011*: (TUFNELL 1958: pl. 77:774)

A rare Black Slip III juglet from Cyprus (TUFNELL 1958: pl. 79: 814) was found together with the juglet in this unique tomb. This type of Cypriot ware is usually dated to the Middle Cypriot Age 3 (YANNAI 2000:61). A typical Middle Bronze Age jar (TUFNELL 1958: pl. 87:1008) was found together with the two juglets. The second jar (Type 1008) at Lachish was found in Tomb 7014, which is a typical tomb from the Middle Bronze Age (TUFNELL 1958: pl. 69:537; 77:733, 751, 753). A Type 5 juglet (see below) was found along with the vessels that are characteristic of the MB 2 which were in Tomb 7011. That juglet is the only

vessel that is not definitely defined as a Middle Bronze Age vessel; it is also the latest vessel, which was found in the tomb (see the chronological discussion below).

8. *Ajjul - Tomb 301* (PETRIE 1933: pl. XXXIX: 68A3')<sup>12</sup>

The location of the tomb is not marked on the excavation plans and according to its number it was excavated inside the tell, in an area south of the "Governor's Palace". The stratigraphy in this area is unclear (PETRIE 1933: pl. XLVI). The gray juglet (PETRIE 1933: pl. XXXIX) that was found in the tomb was selected by Petrie as a prototype for the Type 68A3' juglets with a globular body. Among the other vessels found together with the gray juglet was a large bowl (DUNCAN 1930:10E2), a large jug with a base ring and globular body (DUNCAN 1930:34B), a jug with a short wide neck (PETRIE 1933: fig. XXXV: 35F2), a dipper juglet (PETRIE 1933: pl. XXXVIII: 51G16) and a lamp (DUNCAN 1930: G3). All of the vessels are characteristic of the MB2B and are dated by Petrie to the time of the 15<sup>th</sup> Egyptian dynasty.

9. *Ajjul - Tomb 364* (PETRIE 1933: pl. XXXIX: 68A3')

A tomb that is apparently composed of three secondary tombs (PETRIE 1933: pl. XLVIII). The other vessels found in the tomb include a large diameter bowl with a flat body and a rim that is folded in (DUNCAN 1930:21B), this bowl is most characteristic of the Middle Bronze Age; a Type 43 jar that could not be found in the catalogues; a Middle Bronze Age jug with a spout attached to its rim (PETRIE 1933: pl. XXXIX: 64Q) and a lamp that could not be found in the publications. No finds later than the Middle Bronze Age were recovered from the tomb.

10. *Ajjul - Tomb 1532* (PETRIE 1934: pl. LXVII: 68A3')

A pit tomb (PETRIE 1934: pl. LXI) that is stratigraphically detached from its surroundings. A flat bowl with an inwardly folded rim (DUNCAN 1930:6C2) and a carinated bowl (18K2') were found in it. The two bowls are from the MB2B. A

<sup>11</sup> Oren published another juglet with a body whose lower part was reconstructed as a sphere (OREN 1973: fig. 30:12). Juglets with a similar body were sometimes found with a base and therefore we are uncertain whether the reconstruction of the spherical body of this juglet is correct.

<sup>12</sup> I wish to express my deepest gratitude to Celia Bergofen who allowed me access to information she has regarding the distribution of the gray juglets from the Tell el Ajjul tombs.

scarab bearing the name of Amenhotep I was found in the tomb.

### Conclusion

Five juglets with globular bodies were found in assemblages dating to the MB 2b only.<sup>13</sup> One is a juglet from Tomb 42 at Bet Shean, the second is a juglet from Tomb 902 at Kabri that is well-dated to the MB2B based on the two scarabs engraved with the name *Yakbamu*, the third juglet with a globular body that was found in Tomb 7011 at Lachish and two juglets from tombs 301, 364 at Ajjul. The parallels and objects accompanying these three juglets indicates that the Type 1 juglet with the globular body first started to be traded in the markets of the Land of Israel at the end of the Middle Bronze Age, parallel to the MC3.

The juglet with the globular body from Tomb 7011 at Lachish, tombs 301, 364 and 1532 at Ajjul are Type 1 juglets that was found in an assemblage that did not also contain Type 2 juglets. Type 1 juglets with a globular body were found with Type 2a juglets in Tomb 902 at Kabri and a Type 1 juglet was found together with a Type 2b juglet in Tomb 42 at Bet Shean. The latest BLwmw juglet were found in Tomb 1532 at Ajjul (No. 10 in the catalogue), dated the end of Type 1 juglets to the earliest 18<sup>th</sup> Dynasty king – Amenhotep I.

The rest of the juglets with a globular body were found in assemblages with Type 2 juglets and they were found mixed together with finds that date to the MB2B and the LB1. No juglet with a globular body was found in a tomb that did not contain finds from the MB2B. Based on these finds we can assume that the Type 1 juglets with a globular body are amongst the earliest of the groups of grey juglets and it seems that the production and marketing of them came to a halt already in the MB2 or perhaps in a very early phase of the LB1A, parallel to the MC3.

**Type 2** (Catalogue Nos. 11–96) The Type 2 juglets are the most common of the group of grey

burnished juglets. In light of the findings of the study Type 2 is divided into two secondary groups. The two groups are characterized by a flat base with a small diameter, a spherical body, cylindrical neck, lotus-like rim and a handle that extends from the upper part of the body and is connected the entire length of the neck, from its top part to its bottom. They range in color from light grey and even light yellow through all the shades of grey to extremely dark grey. Black juglets of this type are very rare. The surface of the juglets is densely and uniformly hand burnished. The two types of juglets mainly differ in the shape of the body, the angle at which the base is connected to the body and the length of the neck in relation to the height of the body.

*Type 2a:* (Fig. 1:6,7) The Type 2a juglets were made with an almost spherical body that is occasionally slightly squat. The diameter of the base is quite small and the angle at which the base is connected to the body of the juglet is almost imperceptible (and difficult to discern in drawings). The neck is short and is a third or a quarter of the height of the vessel's body.

*Type 2b:* (Fig. 1: 8,9) The Type 2b juglets were made with a more elongated form; the body is spherical and in most instances slightly ovoid. The diameter of the base is large and the angle at which the base is connected to the body is acute and accentuated. The length of the neck is equal to the height of the body.

### CATALOGUE OF THE TYPE 2A JUGLETS

*11. Yiftach'el - Tomb 1* (BARDA and BRAUN 2003: fig. 4:23)

Fourteen grey juglets were found in Tomb 1 at Yiftach'el (BARDA and BRAUN 2003: 93). The excavators only published two juglets from this large group: one Type 2a juglet and a Type 7 juglet (BARDA and BRAUN 2003: fig. 4:24). The excavators did not differentiate between the two types<sup>14</sup>

<sup>13</sup> Tombs 364, 301 and 1532 from Tell el-Ajjul are not included in the count of the tombs from the Middle Bronze Age even though the vessels that were found in them are ascribed to this period. I prefer to base the information on more credible drawings. All of the vessels that were found in them are dated by Petrie and Duncan to the Second Intermediate Period in Egypt. 20. Celia BERGOFFEN published a gray juglet from Tomb 1154 (BERGOFFEN 2001: fig. 4) but in the list of finds

from the tomb published by PETRIE (1932: pl. LVIII) the vessel that appears in Bergoffen's article does not appear.

<sup>14</sup> The excavation report was written by the excavators more than ten years before its publication and has since not been updated. Based on the information available to the excavators when writing the report, the juglets were published as vessels originating in the Land of Israel.

and only published one of each type.<sup>15</sup> Based on the finds in Tomb 1 at Yiftach<sup>e</sup>l, the tomb was used for interment from the beginning of the MB2A. A single early type of Base Ring juglet treated with a red lustrous slip (BARDA and BRAUN 2003: fig. 9:4) dates the final use of the tomb to the end of the LB1B (See below).

12. *Kabri - Tomb 902*: (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002: fig. 5.61:9)

The juglet was found together with a Type 1 grey black juglet, two White Painted V–VI imported Cypriot juglets and a Cypriot juglet with a globular body decorated in the Cross Line Style (KEMPINSKI, GERSHUNY and SCHEFTELOWITZ 2002: fig. 5.61:8, 10–12). The chronology of Tomb 902 has already been outlined above in the discussion of the Type 1 juglets. The tomb dates from the MB2B.

13. *Megiddo - Tomb 251*: (GUY and ENGBERG 1938: pl. 26:18)

This tomb is dealt with above in the discussion of the Type 1 juglets (No. 4).

14. *Megiddo - Tomb 2009 in Stratum IX* (LOUD 1948: pl. 51:4)

The vessel is not whole. Judging from the height and shape of the neck it is either a Type 1 or 2a juglet but certainly does not belong to the Type 2b juglets. The juglet was found together with an elongated dipper juglet (LOUD 1948: pl. 50:22) and an imported Cypriot Bichrome juglet decorated in the Cross Line Style. Based on the presence of the Bichrome juglet, the vessel found in this tomb is Type 2a or Type 1.

15. *Megiddo - Tomb 2106 in Stratum IX on the tell* (LOUD 1948: pl. 59:5)

The juglet was found in the tomb together with short dipper juglets with a prominent shoulder (LOUD 1948: pl. 58:7), an elongated dipper juglet (LOUD 1948: pl. 58:14) and a teapot (LOUD 1948: pl. 59:9). The excavator has determined that most of the vessels that were found in Tomb 2106 are

also present in Strata VIII–X. Therefore in assigning the tomb to Stratum VIII he based his determination on stratigraphic considerations but the scholars are right that contend that the assemblage of vessels that was found more suitably belongs to Stratum X or Stratum IX at the latest (STEWART 1955:49, ÅSTRÖM 1957:214, WRIGHT 1961:135, n. 49, OREN 1969:135, AMIRAN 1960:30). The excavators of Megiddo also reached the same conclusion (SHIPTON 1939:15).

16. *Megiddo - Tomb 3004 Stratum IX on the tell* (LOUD 1948: pl. 59:5)<sup>16</sup>

The excavators of Megiddo published Tomb 3004 from Stratum VIII. Clair EPSTEIN examined the field diaries of the Chicago expedition and reached the conclusion that Tomb 3004 is belongs to Stratum IX and not Stratum VIII (EPSTEIN 1963:101). A cylindrical juglet decorated in the Bichrome style (LOUD 1948: pl. 59:6) was found in it. A similar juglet also was found in Lachish (TUFNELL 1958: pl. 77:772) and also in Tomb 1100A at Megiddo (GUY and ENGBERG 1938: pl. 45:19). The juglet was also found together with a typical White Painted V–VI zoomorphic vessel (LOUD pl. 247:5). Similar zoomorphic vessels were found at Ajjul (PETRIE 1931: pl. 50:257; 1933: pl. 40:408; 1934: pl. 56:101R), Ugarit (SHAEFFER 1949: fig. 74:20), Hazor (YADIN *et. al.* 1961: fig. CCLXXVII:3), Gezer and Bet Shemesh (MACALISTER 1912: pl. 126:22, 25; GRANT and WRIGHT 1938: pl. 25:9). These vessels were dealt with by Karageorghis (KARAGEORGHIS 1965: fig. 26:1), ÅSTRÖM (ÅSTRÖM 1957:224) and GERSHUNY (GERSHUNY 1991:38–40). These imports are in keeping with the Tufnell's conclusion that the production and marketing of grey juglets did not continue beyond the first half of the 15th century CE (TUFNELL 1958:192).

17. *Pella - Tomb 62*: (MCNICOLL, EDWARDS, HANBURY-TENISON, HENNESSY, POTTS, SMITH, WALMSLEY and WATSON 1992: pl. 58:2)

See Juglet 6 regarding the accompanying objects and chronological conclusions.

<sup>15</sup> In the storehouses of the Antiquities Authority in Bet Shemesh there are about another ten juglets, most of which are Type 2b. We wish to thank Letecia BARDA, of the publication company and Galit Litani, curator of the Bronze Age collections at Bet Shemesh for assisting us in locating the juglets.

<sup>16</sup> Two Type 2a juglets were found in Tomb 3004 (LOUD 1948: pl. 59:5); the two juglets were broken. We are uncertain if both of the juglets are Type 2a. The excavator did not describe each juglet separately and described both of them in a laconic manner.

18. *Bet Shean - Tomb 27* (OREN 1973: fig. 37:13)

Tomb 27 is later than Tomb 42 and contains Base Ring jugs, juglets and bowls together with a typical White Slip II bowl (OREN 1973: fig. 37:3, 4, 5, 8, 9, 10, 11). OREN dates Tomb 27 to the Late Bronze Age 1 and 2 (OREN 1973: 99).

19. *En Nashab Tomb* (Gal and Zori 2005)

A MB2B and LB1A tomb include large group of 'Chocolate on White' bowls.

20–26. *Jalameh*

The tomb at Jalame was excavated by Karen Covello-Paran on behalf of the Antiquities Authority. It is located slightly north of Jenin, in the southern Jezreel Valley. In the tomb were several hundred vessels of numerous types that date from the Middle Bronze Age 2b and the beginning of the Late Bronze Age. No Base Ring 1 vessels were discovered in the tomb and based on the vessels that were found in it, it is contemporary with Tomb 42 at Bet Shean.<sup>17</sup>

27. *Ashdod - Stratum XXIIa*: (DOTHAN and PORATH 1993: fig. 3:10)

The juglet was found in excellent stratigraphy, inside a clean assemblage of the MB2B. Above this stratum is another layer (XXI) from the Middle Bronze Age and above them is Stratum XX where a fragment of a typical Bichrome vessel was found (DOTHAN and PORATH 1993: fig. 4:19). Fragments of typical BR I ware were found above them in Stratum XIX (DOTHAN and PORATH 1993: fig. 6:13, 14). From a stratigraphic standpoint the juglet from Ashdod is the earliest juglet that was found in a stratigraphic context in an excavation in Israel.

28. *Ajjul Tomb 331* (PETRIE 1933: pl. XXXIX: 68G4")

A pit tomb in the cemetery dating to the time of the 18<sup>th</sup> dynasty (PETRIE 1933: pl. XLVIII), next to other pit tombs, among them Tombs 394 and 397 that are presented below. These tombs were excavated in an open area northeast of the tell. Only two vessels were found in them: the gray juglet and a jug (PETRIE 1933: pl. 36 XXXIX: G7). It is possible the jug dates from the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

29. *Ajjul Loc. GCC - Group 2020* (PETRIE 1952: pl. XXVIII: 68A7)

Locus GCC is located in the lower city (PETRIE 1952: pl. XXXIII) and in it was the group of artifacts – 2020. This group includes two small bowls – one hand-made (DUNCAN 1930:13X2) and the other flat and open (PETRIE 1952 pl. XXV: 14Z2). Neither of the bowls is of any help in dating the tomb.

30. *Ajjul Loc. GJJ - Group 2119* (PETRIE 1952: pl. XLI)

Locus GJJ is north of the large courtyard building in the bottom stratum of the lower city (PETRIE 1952: pl. XXXII). The other vessels found together with the juglet include a bowl or chalice with a high pedestal (PETRIE 1952: pl. XXV: 17V5'), a dipper juglet with a short body (PETRIE 1933: pl. XXXVIII: 53C) and a small jug with a shoulder handle (PETRIE 1952: pl. XXVII: 60Q3"). These finds may date from the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

31. *Ajjul Loc. GHF - Group 2100* (PETRIE 1952: pl. XLI)

Locus GHF was located in the southwestern corner of the excavation in the lower city. Apart from the gray juglet no other finds were published from the tomb.

32. *Ajjul Tomb 394* (PETRIE 1933: pl. XLVIII)

A pit tomb in the western group of tombs in the cemetery dating to the time of the 18<sup>th</sup> dynasty. This tomb is situated next to other pit tombs, among them Tomb 331, mentioned above and next to Tomb 397 (below). These tombs were excavated in an open area north of the settlement's eastern gate. Among the vessels found in the tomb were a jar-jug (DUNCAN 1930:38H1), a dipper juglet with an elongated body (DUNCAN 1930: 51G7) and a jug (PETRIE 1933: pl. XXXVIII: 60Q15) with a globular body and a short narrow flaring neck. Jugs of this type are characteristic of assemblages that date from the end of the Middle Bronze Age and are not present in Late Bronze Age assemblages.

33–34. *Ajjul Tomb 397* (PETRIE 1930: pl. XLVIII)

A pit tomb in the cemetery dating to the 18<sup>th</sup> dynasty, just to the south of Tomb 394 that was presented above. The vessels that were found in it

<sup>17</sup> I wish to thank the excavator, Karen Covello-Paran of the Antiquities Authority, for permission to present details about the tomb.

include a black juglet and a Type 60Q9 jug (PETRIE 1933: pl. XI) which based on its form dates to the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

35. *Ajjul Tomb 402* (PETRIE 1933: pl. XLVIII)

A pit tomb in the northern group of tombs in the cemetery that dates to the time of the 18<sup>th</sup> dynasty. Apart from the black juglet only a Type 74O18 cylindrical juglet was found in it. Juglets of this type were also found in contexts dating to the end of the Middle Bronze Age as well as in the beginning of the Late Bronze Age.

36. *Ajjul Tomb 404* (PETRIE 1933: pl. XLVIII)

A pit tomb in the cemetery that dates to the time of the 18<sup>th</sup> dynasty, several meters west of Tombs 394 and 397 that are presented above. Only the gray juglet, with no other accompanying items, was found in the tomb.

37. *Ajjul Tomb 1003* (PETRIE 1932: pl. LII)

A pit tomb in the cemetery that dates to the time of the 18<sup>th</sup> dynasty. A broken black juglet without a base was found in it (PETRIE 1932: pl. XXXV: 68) and PETRIE did not define it as a specific sub-type. A carinated bowl (DUNCAN 1930: 16K2) was also found together with the gray juglet. This type of bowl can date to either the Middle or Late Bronze Age.

38. *Ajjul Tomb 1031* (PETRIE 1932: pl. LII)

A pit tomb in the cemetery that dates to time of the 18<sup>th</sup> dynasty. Together with the gray juglet (PETRIE 1932: pl. LVI) a Type 1–2 Base-Ring jug was found (PETRIE 1932: pl. XXXV: 74K4). This gray juglet is the only juglet that was found together with a base-ring juglet and it may also belong to Type 2b.

39. *Ajjul Tomb 1522* (PETRIE 1934: LXVII: 68A2)

The exact location of the tomb does not appear in the plans. The nearest tombs numerically are Tombs 1521 and 1523, which are next to each other, next to and north of the wall between Complex EAT in the north and Complex EDC in the south (PETRIE 1934: pl. LXII). Despite the proximity to Tombs 1521–23, this is not proof that the tomb was located near them; however the possibility should not be negated. In the tomb were a carinated bowl (PETRIE 1934: pl. IV: 18J9) and a drop-like bottle whose manufactured was inspired by similarly shaped Egyptian vessels (PETRIE 1934: 31K7).

40–41. *Ajjul Tomb 1539* (PETRIE 1934: pl. LXI)

A pit tomb in the built-up area L.A., c.

1 m north of the wall dating to the Middle Bronze Age IIB and the beginning of the Late Bronze Age. A Type 60M4 jug and two Type 68A2 gray juglets were also recovered from the tomb (PETRIE 1934: pl. LXVII).

42. *Ajjul Tomb 1904* (Type 68A2)

A pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV), next to Tombs 1925 and 1928 in which imported Type 2B gray juglets (below) were found. A flat bowl (PETRIE 1934: pl. XLVII: 16B2), jar (DUNCAN 1930: 43F3) and a dipper juglet with a dumpy body (PETRIE 1934: pl. LIV: 53C2) were found in it. These vessels can date from either the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

43. *Ajjul Tomb 1905* (Type 68A2)

A pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV), c. 10 m west of Tombs 1926 and 1927 in which Type 2B gray juglets (below) were also found. Also found in the tomb was a base-ring bowl that is open and flat (PETRIE 1931: pl. XXXVII: 6C1), a bowl (PETRIE 1934: pl. XLVII: 16B2), a large jar jug (DUNCAN 1930: 38B4) and squat jar jug (PETRIE 1934: pl. LV: 38J2). These vessels can date from either the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

44. *Ajjul Tomb 1908* (Type 68A2)

A pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV), c. 5 m north of Tomb 1925 and near Tombs 1904 and 1928 in which gray juglets were also found. Among the other vessels found in the tomb was a hemispheric bowl adorned with a red stripe on the rim (DUNCAN 1930: 20H), a jar (DUNCAN 1930: 43E5), a dipper juglet with a small body (PETRIE 1931: pl. XLVII: 51P5), a dipper juglet with a piriform body (PETRIE 1931: pl. XLVIII: 60W4), an imported Cypriot Base-Ring Type 1 juglet (PETRIE 1934: pl. LVI:89J0) and an imported Cypriot White Painted V juglet (89A'). These vessels can date from either the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

45. *Tell Far'ah (South) Tomb 613* (DUNCAN 1930: 68A2)

A pit tomb in Cemetery 600, west of the tell (PETRIE 1930: pl. LI; LXVII). The juglet has a squat body, similar to the Type 2a juglets. Its shape is different than the juglets that were found in Tombs

611, 612, 624, 657 at Tell Far'ah, which are clearly Type 2b juglets. The juglet was also found with a White Painted V teapot (DUNCAN 1930: 64F2), a White Painted IV jug (DUNCAN 1930:89A), an early form of a Monochrome bowl (DUNCAN 1930: 19F1), a bichrome jug (DUNCAN 1930: 37C), a typical jar (43C1, 2) and a dipper juglet (52A3).

Based on the assemblage of Cypriot vessels, the tomb dates to the end of the MBIIB or the beginning of the LB1A.

#### CATALOGUE OF THE TYPE 2B JUGLETS<sup>18</sup>

46. *Hazor - Tomb 8112 in Area F on the tell* (YADIN *et al.* 1961: fig. 240:4)

Tomb 8112 is dated to Stratum 2 and the objects that were found in it were placed inside of Channel 3043 of Stratum 3 (YADIN 1961: fig. 77:3). Based on the chronology of the strata at Hazor, the tomb dates to the LB1. During the course of the excavation at Hazor different phases were not discerned during the Late Bronze Age 1 and it is difficult to ascertain if the tomb is from the beginning of the Late Bronze Age 1 or the end.

47. *Megiddo - Tomb 258* (GUY and ENGBERG 1938: pl. 27:9)

The juglet was found together with bowls, a carinated bowl, a jug and juglets of the types that were found in Strata IX–X.

48. *Megiddo - Tomb 1100A* (GUY and ENGBERG 1938: pl. 54:21)

This tomb was discussed above in the context of Juglet 3 (Type 1).

49, 50. *Megiddo - Tomb 77* (GUY and ENGBERG 1938: pl. 41:23, 24)

These two juglets were found together with a jar and four dipper juglets that are characteristic of Stratum IX, a White Painted V teapot and a juglet. Based on the ceramic assemblage Tomb 77 is parallel to Stratum X or the beginning of Stratum IX.

51. *Megiddo - Tomb 1141* (GUY and ENGBERG 1938: pl. 49:4)

The upper part of a Type 2b juglet. Also found with the juglet was a Bichrome jug of either local

manufacture or imported from the Syrian/Lebanese coast (GUY and ENGBERG 1938: pl. 49:5), a bowl, cooking pot, squat jar, three lamps similar to the types found in Strata IX–X on the tell and along side of which were several fragments of vessels from the same strata.

52. *Megiddo - Tomb 3018C* in Stratum IX

The juglet was found together with an imported grey Cypriot juglet (Type 1 or Type 2a; LOUD 1948: pl. 51:4), two Bichrome vessels (LOUD 1948: pl. 48:5, 56:4), a bowl that is characteristic of the LB1A–B (LOUD 1948: pl. 54:13), a bowl similar to the Chocolate on White bowls (LOUD 1948: pl. 53:16), a jug decorated with red painted geometric patterns (LOUD 1948: pl. 49:1), a locally produced jug that resembles Bichrome jugs (LOUD 1948: pl. 49:10) and a biconical jug from the LB2 (LOUD 1948: pl. 49:18).

53. *Megiddo - Tomb 2031* (GUY and ENGBERG 1938: pl. 26:12)

This tomb was discovered in Area BB and was designated by the excavators as Stratum XII dating to the MB2b. A bowl (GUY and ENGBERG 1938: pl. 29:28) and a piriform juglet (*Ibid.* pl. 23:16) were found in it. These two vessels date at the very latest to the LB2. A gray juglet (*Ibid.* pl. 26:12) and an imported Cypriot Base Ring juglet (*Ibid.* pl. 26:11) were found together with these vessels. The juglet is dark gray and decorated with painted white stripes using the “brush combing method”. Juglets decorated in this style date to the 13<sup>th</sup> century BCE. The assemblage of finds demonstrates that the tomb was at the elevation of Stratum XII but it is reasonable to assume that it was originally from Stratum VIIb. In Stratum VIII were early types of imported Base Ring ware (LOUD 1948: pl. 58:18–20) together with an early type of monochrome bowl, a late bichrome jug and an early type of White Painted teapot (*Ibid.* pl. 61:20, 59:8, 10). Therefore we can reasonably assume that a gray juglet decorated with white stripes is contemporary with Stratum VIIb and later that Stratum VIII.

54–58. *cAra - Tomb 1*

The tomb no. 1 at *cAra* contained 980 pottery vessels together with other finds from the Late

<sup>18</sup> One juglet was found at Gezer in an unclear stratigraphic and chronological context and was removed from the catalogue (DUNCAN 1930: 60:X4).

Bronze Age 2B until the 13<sup>th</sup> century BCE and it will be published in the future. Four Type 2 b juglets underwent petrographic examination and all of them are Cypriot imports.

59–63. *cAra - Tomb 2*

The Tomb no. 2 at *cAra* contained 780 pottery vessels from MB2a to LB2b. 4 type 2b juglets were found at the tomb deposits.

64. *Bet Shean - Tomb 42* (OREN 1973: fig. 30:13)

Tomb 42 was discussed above in the context of Juglet 6 (Type 1).

65–70. *Jatt - Tomb 7* (YANNAI 2000: fig. 6: 63–66)

Tomb 7 at Jatt contains a large number of early types jugs and juglets – Red Lustrous Base Ring (YANNAI 2000: fig. 7; 73–76; 8:77–86), an early type of Base Ring 1 bowl and an early monochrome bowl (YANNAI 2000: fig. 8; 87, 88) together with a Black Slip III juglet (YANNAI 2000: fig. 7:72) and a Cypriot RLWMW jug (YANNAI 2000: fig. 7:71). The tomb dates to the Late Bronze Age 1B (YANNAI 2000: 61). Eight grey juglets were found in the tomb at Jatt: four of them belong to the Type 2b Cypriot group, one is red and three are black. One of the juglets from Jatt is a Type 3 juglet and its origin is in Cyprus. Three of the juglets are of Canaanite types, two are Type 5 and one is Type 6. No Types 1 or 2a imported Cypriot juglets with a globular body were found in the tomb at Jatt.

71. *Bahan* (PORATH, DAR and APPLBAUM 1985: fig. 106:5)

At Tel Bahan four rich tombs that contained hundreds of vessels from the Middle and Late Bronze Age were exposed. The tombs are slated to be published by Lily Gershuny.

72. *Lachish - Tomb 1555* (TUFNELL 1958: pl. 77:776)

The juglet was found together with a unique grey juglet with a Type 8 piriform body (TUFNELL 1958: pl. 77:775) and an imported Cypriot Base Ring juglet (TUFNELL 1958: pl. 80:860).

73–75. *Lachish - Fosse Tomple 1* (TUFNELL, Inge and Harding 1940: pl. 51b:276)

Three Type 2b juglets were found in the ancient fosse temple (Fosse Temple 1). The three juglets were found in Favissae 128, 207, 258, which are ascribed by the excavator to the Fosse Temple 1.<sup>19</sup> The date of the Fosse Temple 1 was determined mainly by the LMIIA type Mycenaean goblet that was found in the destruction level. The grey black juglets that were found in the favissae are earlier than or contemporary with the Mycenaean goblet.

76. *Tell Beit Mirsim - Tomb 1* (BEN ARIEH 2004: fig. 2.73:85)

Tell Beit Mirsim is located on the western fringes of the Judean Mountains, on the border of the Shephelah. Tomb 1 was excavated in a salvage excavation after some of its contents were plundered by tomb robbers. Therefore, the finds that were published from it are incomplete (BEN-ARIEH 2004:7). In the opinion of the excavator the tomb dates to the LB1 and 2. Among the finds that were recovered from the tomb is a locally manufactured black juglet (Catalogue No. 162). Based on the Cypriot finds, particularly the late type of Base Ring and Milk Bowl vessels, I believe there are no vessels in the tomb earlier than the 13<sup>th</sup> century BCE and that the Type 2a black juglet is the earliest vessel in the tomb.

77. *Ajjul - Tomb 211* (PETRIE 1931: pl. LX)

A pit tomb that was excavated inside the Copper Age Cemetery, east of the tell and south of the Middle Bronze Age cemetery (PETRIE 1931:pl. LV; 1933:pl. XL).

78. *Ajjul - Tomb 241* (PETRIE 1931: pl. LX)

A pit tomb that was excavated in the Copper Age Cemetery (PETRIE 1931: pl. LX) several meters from Tomb 211. Among the vessels found together with the gray juglet was a bowl with a lotus-like body made in the Egyptian technique (PETRIE 1931: pl. XXXVII: 6E13), an imported Mycenaean spherical flask (PETRIE 1931: pl. XLIX:69P5; FS189/FM 19:32 Multiple Stem and Tongue, Tongue-Shaped) and two Cypriot Base-Ring

<sup>19</sup> Favissa 128 is some distance away from the temple, ca. 30 m to its north and was ascribed to the temple based on the finds discovered in it. Favissa 258 was located outside of Temple 1, below the western wall of Temple

2 and therefore its ascription to Temple 1 is certain. Favissa 207 was located below Room A of the Fosse Temple 2 and therefore its ascription to Fosse Temple 1 is not in doubt.

juglets (Types 89J9, 89K2). The Mycenaean flask appears in LEONARD's catalogue and is defined as Type LHIII A: 2 (LEONARD 1994: 84:1250).

79. *Ajjul - Tomb 281* (PETRIE 1931: pl. LXI:68A5)

A pit tomb that was excavated in the Copper Age Cemetery (PETRIE 1931: pl. LV), c. 10 m south of Tomb 241, mentioned above. Besides the gray juglet the following vessels were found in the tomb: a krater with two handles (PETRIE 1931: pl. XL:28A4), an early type of a monochrome bowl imported from Cyprus (DUNCAN 1930:19C) and another vessel (29G4) that could not be found in the reports but based on its form and place in DUNCAN's catalogue is a sack-like Egyptian vessel. Based on the monochrome bowl that was found in it, the tomb dates to the end of the Middle Bronze Age or the beginning of the LBIA. A scarab bearing the name of Amenhotep I was also found in the tomb.

80. *Ajjul - Tomb 368* (PETRIE 1933: pl. L)

The location of the tomb could not be found on the plans. The following vessels were also found in the tomb: a Cypriot hemispherical bowl (DUNCAN 1930: 19M); a Mycenaean pyxis (PETRIE 1933: pl. XXXVIII: 55P10; FS94/FM Linear?), based on its shape it is a Mycenaean import but judging by the quality of its production it can be a local imitation. Given its form it belongs to Type LHIII A (LEONARD 1994: 36:409). A Mycenaean stirrup jar (PETRIE 1933: pl. XXXIX:64M2). The stirrup jar does not appear in LEONARD's catalogue. Based on its globular body and tall neck as drawn by PETRIE, it is not defined in Furumark's classification. A Type 68A4 gray juglet (PETRIE 1933: pl.L), flask (DUNCAN 1930: 85R5), large jar jug (PETRIE 1933: pl. XXXIV:34Y6'), a small jug jar (PETRIE 1933: pl. XXXIV:34Y11), a Base-Ring 2 jug (PETRIE 1931: pl. 89H2) and a Type 34Y6' jug that cannot be found in the catalogue. Based on the Mycenaean and Cypriot vessels that were found the tomb dates to the Middle Bronze Age 2B and it seems this is one of the latest assemblages in which gray juglets were found.

81. *Ajjul - Tomb 374* (PETRIE 1933: pl. XLVIII)

The juglet (68A3) was found together with an early type of Base-Ring I juglet (PETRIE 1934: pl. LVI: 89J2) and a group of vessels from the end of the Middle Bronze Age (BERGOFFEN 2001: fig. 2A). This tomb is the one of three tombs at Ajjul (i.e. Tombs 368, 375) where a BLWMW juglet

from the Late Bronze Age was found together with a Base Ring I juglet. The Base Ring juglet is a rare type and not many parallels to it have been found in the Land of Israel.

A pit tomb located in the northern part of the cemetery dating to the time of the 18<sup>th</sup> dynasty. A bowl with a tall narrow pedestal, similar to the Chocolate on White bowls (DUNCAN 1930: 17V7) was found in it. Three different variations of this bowl were published. According to the type number, 17V7, it was published in Duncan's corpus (DUNCAN 1930: 17V7) from Tomb 610 in Tell el Far'ah South. It was published a second time by PETRIE (1931: 17V7) in Assemblage 257. These two bowls have a tall very narrow base and a round, slightly closed body with a very thin wall. These bowls typify the Chocolate on White ware bowls. Another bowl with the same type number was published from Tel Ajjul (PETRIE 1933: pl. XXX:17V7). According to the numbers attached to this bowl it originated in Tomb 374 at Ajjul. This bowl has a tall broad base-ring, has a very open form and flat rim with a very large diameter (BERGOFFEN 2001: fig. 2A:17V7). The two variations that were published by Petrie, the small closed one and the large open one, are completely different from each other. In light of the contradiction in the articles it is difficult to know which bowl was really found in the tomb. The two variations date to the end of the Middle Bronze Age or the beginning of the Late Bronze Age. Also found alongside the bowl in the tomb were a jug jar (PETRIE 1931: pl. XLIV:34Z8) and a jug with a large body and a shoulder handle (PETRIE 1930: pl. XXXVI:38O3"). OREN (1969: 128) and Celia Bergoffen have both discussed the date of the tomb. Both discussions date the tomb based on a Base-Ring juglet. In Oren's opinion it is BR1 and in Bergoffen's opinion it belongs to BR2 (BERGOFFEN 2001: 38). Based on the photographs on file in the archives of the Antiquities Authority it seems the juglet was wheel-made. Therefore I am not certain the juglet is a Base-Ring vessel at all and could very well be a juglet that was imported from Lebanon and not Cyprus.

82. *Ajjul - Tomb 375* (PETRIE 1933: pl. L)

A tomb whose location is not marked on the plans but according to its number and the numbers of the tombs that Petrie published, it is from the cemetery that dates to the 18<sup>th</sup> dynasty. Petrie determined that it dates to the reign of Thut-

mose III, probably based on a scarab bearing his name that was found in the tomb (PETRIE 1933: pl. L). In the tomb were found a Cypriot WP V juglet (PETRIE 1933: pl. XXV:37X8), a Type 43E2 jar, and a Type 43C2 jar (PETRIE 1933: pl. XXXVII: 43C2'), a jar characteristic of the end of the MB2B and a Mycenaean type globular flask (PETRIE 1933: pl. XXXIX:83K'). The drawing does not specify the globular flask's motif model and therefore it is difficult to date it. A Base-Ring juglet (PETRIE 1932: 89K5) was found together with the Mycenaean flask. Based on the Cypriot juglet the tomb dates to the 14<sup>th</sup> century BCE.

83. *Ajjul - Tomb 873* (PETRIE 1942: pl. XLI)

The location of the tomb could not be found on the excavation's plans but according to its number it was in the built complex in the southwestern corner of the tell. The tomb contained one gray juglet (PETRIE 1935: pl. XXVIII:68A7) together with two bowls (13X2, 14X2).

84. *Ajjul - Tomb 1007* (PETRIE 1932: pl. LVI)

A pit tomb, on the eastern fringes of the cemetery that dates to the 18<sup>th</sup> dynasty (PETRIE 1932: pl. LII). The tomb contained a gray juglet and half a scarab dating to the Middle Bronze Age (PETRIE 1932: fig. VII:2), without any other funerary offerings.

85. *Ajjul - Tomb 1008* (PETRIE 1932: pl. LVI)

A pit tomb, on the eastern fringes of the cemetery that dates to the 18<sup>th</sup> dynasty (PETRIE 1932: pl. LII). Besides the Type 89A5 gray juglet, a jar (43E5) and dipper juglet (PETRIE 1932: pl. XXXIV: 51P9) were found in the tomb. The two vessels can date from either the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

86. *Ajjul - Tomb 1161* (PETRIE 1932: pl. LVIII)

A pit tomb, on the eastern fringes of the cemetery dating to the 18<sup>th</sup> dynasty (PETRIE 1932: pl. LII). Besides the gray juglet, a single dipper juglet (PETRIE 1932: pl. XXXIV: 51P3) was found in the tomb.

87. *Ajjul - Tomb 1918* (PETRIE 1934: pl. LXVII)

A northernmost pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV), c. 10 m from Tombs 1925 and 1928. The other vessels that were found

together with the gray juglet are a large deep bowl with a high base ring (PETRIE 1933: pl. XXX: 17V4), a carinated bowl (PETRIE 1934: pl. XLVII: 16K8), a dumpy jar (PETRIE 1934: pl. LII:43C2') and a dipper juglet with a short body (PETRIE 1933: pl. XXXVIII:53R6). All of these vessels can be from the end of the Middle Bronze Age or the beginning of the Late Bronze Age.

88. *Ajjul - Tomb 1922* (PETRIE 1934: pl. LXVIII)

An amphoriskos with a candlestick rim (PETRIE 1934: pl. LV: 60Q25') was found in the tomb. This amphoriskos can be from either the end of the Middle Bronze Age or the beginning of the Late Bronze Age. An amphoriskos with a broken neck (PETRIE 1934: pl. LV: 60Q25') was found together with the gray juglet. Similar amphoriskoi appear in assemblages from the Late Bronze Age 1.

89. *Ajjul - Tomb 1925* (PETRIE 1934: pl. LXVIII)

A pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV), slightly north of Tomb 1928 which is described below. Also found together with the Type 68A5 gray juglet was a large diameter bowl with a high base ring, curved wall and rim with an inner ring (PETRIE 1934: pl. XLVII: 17V12)<sup>20</sup> and a dipper juglet (51P8). This juglet aids in determining the date of the tomb.

90. *Ajjul - Tomb 1926* (PETRIE 1934: pl. LXIV)

A double pit tomb in the Lower Cemetery, several dozen meters south of Tombs 1925 and 1928, and adjacent to Tomb 1927. In addition to the Type 68A5 gray juglet found in the tomb was a jar with two handles (PETRIE 1934: pl. LII: 43C°). This jar may date from the end of the Middle Bronze Age or the beginning of the Late Bronze Age. Also found with the tomb was a juglet imported from the Lebanese coast (PETRIE 1934: pl. LIV: 52R2'). These juglets were found in contexts that date to the 15<sup>th</sup>–14<sup>th</sup> centuries BCE (YANNAL, GORZALCZANY and PEILSTÖKER: forthcoming).

91. *Ajjul - Tomb 1927* (PETRIE 1934: pl. LXVIII: 68A3)

A pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV) next to Tomb 1926. A bowl (PETRIE 1934: pl. XLVII) and a jug (Type 34Y6') that was not found in the catalogue were discovered together with the Type 68A3 juglet.

<sup>20</sup> This bowl does not appear in the list of finds published by Petrie.

92. *Ajull - Tomb 1928*

A pit tomb in the Lower Cemetery (PETRIE 1934: pl. LXIV) slightly south of Tomb 1925, presented above. A carinated bowl (Type 16B3) was found together with the juglet (Type 68A5). This bowl may date to the end of the Middle Bronze Age or the beginning of the Late Bronze Age (PETRIE 1934: pl. XLVII:16B3).

93. *Tell Far'ah (South) - Tomb 611* (DUNCAN 1930: 68A5)

A pit tomb in the southern group of Cemetery 600, west of the tell (PETRIE 1930: pls. LI, LXVII) and next to Tombs 612, 613, 624 and 657. Two jug-jars (DUNCAN 1930: 38C2, 38H2) were found in it.

94. *Tell Far'ah (South) - Tomb 612* (DUNCAN 1930: 68A4)

A pit tomb in the southern group of Cemetery 600, west of the tell (PETRIE 1930: pls. LI, LXVII). The juglet was found together with a White Painted V teapot (DUNCAN 1930: 64F1) decorated with a horizontal stripe painted around the middle of the body and painted vertical stripes. Teapots decorated with this pattern are found in assemblages from the 15th century BCE in the Land of Israel and to the best of our knowledge do not exist in the 16th century BCE. An early type of monochrome juglet (DUNCAN 1930: 19C) and a jar-jug were (DUNCAN 1930: 38C4) found.

95. *Tell Far'ah (South) - Tomb 624* (DUNCAN 1930: 68A3)

A pit tomb in the southern group of Cemetery 600, west of the tell (PETRIE 1930: pls. LI, LXVII). No other vessels besides the juglet were found in the tomb.

96. *Tell Far'ah (South) - Tomb 657* (DUNCAN 1930: 68A5)

A pit tomb in the southern group of Cemetery 600, west of the tell (PETRIE 1930: pls. LI, LXVII). The juglet was found together with a jug (DUNCAN 1930: 68H2) and a Type 43C2 jar. The two vessels are of no value in determining the chronology of the tomb.

**The Type 2 Juglets – Conclusion**<sup>21</sup>

35 Type 2a grey juglets were found in different assemblages.<sup>22</sup> In Tomb 902, in Tombs 251, 2106 and 3004 at Megiddo, in Stratum XXIIa at Ashdod, in Tomb 1 at Tell Beit Mirsim and in Tomb 62 at Pella. These tombs and strata date to the end of the MB2B. In the tomb at Yiftach'el and in Tomb 902 at Kabri the Type 2a juglet was found along side Type 1 juglets. About half of the Type 2a juglets were found in assemblages that are firmly dated to the LB1A, before the start of the BR I imports or when the manufacture and marketing of the BR I vessels first began. Based on these findings, it seems that the beginning of the production and marketing of the Type 2a Cypriot juglets began at the end of the MB2, parallel to the Type 1 juglets.

According to the findings in the strata and the tombs from the end of the MB2 (Stratum XXIIa at Ashdod, the tombs at Jalame,<sup>23</sup> Tomb 42 at Bet Shean and perhaps Tomb 62 at Pella), the Type 2a juglets were found in assemblages that predate the first importation of Base Ring ware to the Land of Israel.<sup>24</sup>

Only two BLwmw juglets were found with the earliest BR I types. One in tomb 1031 at Ajjul and one in tomb No. 1 at Yeftachel. The Type 2b juglets were found together with very early types

<sup>21</sup> A group of grey black juglets of this type was found in a tomb at Dominus Flevit on Mount Zion in Jerusalem (SALLER 1964: fig. 36: 2, 5). In my estimation, some of the juglets that were published in figure 36 do not belong to this type ware and therefore we are cautious in attributing them to any particular group.

<sup>22</sup> Celia Bergoffen published a gray juglet from Tomb 1154 (BERGOFFEN 2001: fig. 4) but in the list of finds from the tomb published by PETRIE (1932: pl. LVIII) the vessel that appears in Bergoffen's article does not appear.

<sup>23</sup> The tomb at Jalame was excavated by Karen Covell-Paran of the Antiquities Authority. The tomb dates to

the Middle Bronze Age 2B and four BLWMW juglets were found in it. We wish to thank Ms. Paran for her permission to mention this within the framework of this study.

<sup>24</sup> These finds match for example the finds in Tomb 32 at Enkomi where a typical Type 2a juglet was found (COURTOIS 1981: fig. 17:8) together with Tell el-Yahudiyeh, Red on Black, and Black Slip juglets and other typical vessels of the Middle Bronze Age on the Syrian coast and from the Middle Cypriot period (COURTOIS 1981: fig. 17: 2, 5, 7, 9, 10). No Base Ring vessels were found in Tomb 32.

of BR I vessels.<sup>25</sup> If our assumption is correct, Group 2a is earlier than Group 2b. It can reasonably be assumed that the transition from Type 2a which is earlier than Type 2b, was gradual and ongoing. The difference between the two groups is more apparent in the earliest Type 2a juglets and in the latest Type 2b juglets. Juglets that were made during the transformation process between the two groups will be difficult to ascribe to either of the groups. If this division is correct, it will also aid in defining and dating of the earliest types of BR I vessels in the country.

Most of the juglets that were found in the tomb assemblages are Type 2b. Their production and the marketing of them began during the LB1A and ceased during the LB1B. In the LB2 juglets whose form was inspired by that of the Cypriot juglets were made in the Land of Israel and along the Syrian/Lebanese coast (AMIRAN 1969: 146).

BLWMW Type 2b juglets were found with BR I–II vessels side by side with Mycenaean LHIII A:2 (in tomb 241 for example) and dated the end of type 2b juglets manufacture until the early 14<sup>th</sup> century B.C.E.

**Type 3:** (Fig. 1:10) (Catalogue Nos. 97–100). These vessels are characterized by a flat base that is slightly curved, the upper part of the body is hemispherical and the lower part is almost straight, a long neck that is equal in length to the height of the body, flared rim and a handle that extends from the upper part of the body and is connected the entire length of the neck. The juglet is black and the surface is matte, smooth and was left unburnished.

### THE TYPE 3 JUGLETS

97. *Jatt - Tomb 7* (YANNAI 2000: fig. 70)

This tomb was discussed in the context of the Type 2 juglets.

98. *Bahan - Tomb*

The juglet was never published.<sup>26</sup>

99. *Lachish - Tomb 1555*

In the cemetery (TUFNELL 1958: pl. 77:773;<sup>27</sup> OREN 1969: fig. 3b, p. 135). Tomb 1555 and the parallels associated with it have already been discussed above. Tufnell's definition of the grey juglet with a flat base as Type 3 is based on the shape of the neck and rim that are unique to the group of grey black juglets (OREN 1969: fig. 3 left). The finds from the excavations at Lachish were processed by Tufnell in the 1940's and her correct definition of the juglet seems to be ground-breaking. After the excavation of the tomb at Jatt and defining the Type 3 juglet as a Cypriot import, Tufnell's definition was corroborated.

100. *Ajjul - Tomb 1024* (PETRIE 1932: pl. LII:68G8)

A small cist grave in the cemetery dating to the time of the XVIII Dynasty (PETRIE 1932: pl. LII). A small dipper juglet (31L3) was found in the tomb (PETRIE 1932: pl. XXXIV:53B2). The juglet is of no help in determining the chronology of the tomb.

### Type 3 Juglets - Summary

The tombs in which the Type 3 juglets were found are parallel to the time of the Type 2b juglets. The flat base juglets that originated in Cyprus is completely different than the two early types discussed

<sup>25</sup> These finds match the finds in Tomb 12 in the cemetery at Stephanina in Cyprus, where a group of Type 2b juglets was found (HENNESSY pl. L:3) together with early types of Base Ring I juglets (HENNESSY pl. L:7), proto Base Ring (HENNESSY pl. 1:5), Black Slip (HENNESSY pl. L:13, 14) and early types of White Slip II (HENNESSY pl. LI:12). Another juglet was found in Tomb 7 but the finds in this tomb are mixed and it is difficult to draw chronological conclusions from them. According to Hennessy's chronology, Tomb 12 is from the Late Cypriot IA period (LC1A).

<sup>26</sup> The juglet was found in the study collection of the

Institute of Archaeology of the Tel Aviv University and its provenance is probably in a tomb that was excavated by Ram Gophna. Over the years of teaching in the Tel Aviv University I have had an opportunity to examine the juglet and in my estimation it is imported from Cyprus. Unfortunately, the petrographic examination conducted are not available for scientific study.

<sup>27</sup> The juglet was identified in a photograph from Oren's article (OREN 1969: fig. 3b, second from left). We are uncertain whether the identity of the juglet in the photograph matches Oren's reference.

above. The flat broad base is very different than the globular body that characterizes the Cypriot pottery. The globular body is characteristic of Types 1 and 2. The grey shade of the Type 3 juglets is similar to the color of juglets with piriform (TUFNELL 1958: pl. 77:747) and cylindrical bodies (TUFNELL 1958: pl. 77:760) that were produced in Lachish during the Middle Bronze Age (TUFNELL 1958: pl. 77:759). The Type 3 juglets resemble the juglets with a cylindrical body, which have a long tradition in Canaanite pottery, and begins already in the MB2A and they are not at all connected with the juglets whose production was inspired by the juglets that were imported from Cyprus.

#### **GROUP TWO: BLACK JUGLETS IMPORTED FROM THE SYRIAN/LEBANESE COAST**

**Type 4:** (Fig. 1:11, 12) (Catalogue Nos. 101–104)

These juglets are characterized by a flat base, the lower part of the body is hemispherical and the upper part is slightly squat, the neck is somewhat conical and the rim is candlestick-like. A curved handle extends from the shoulder the length of the neck, sometimes from the bottom of the candlestick-like rim and sometimes from the middle of the neck. The juglets range from dark grey to black in color. The clay contains a large amount of brown, red and black temper and the surface of the vessel is smoothed and unburnished. Yuval Goren performed the petrographic analysis on the juglets. Four juglets were examined; of them, three juglets are black and one is not. The excavators believe that the form of black juglets provided the inspiration with which the fourth juglet was produced (EISENSTADT, ARABAS and ABLAS 2004: 82).

*101. <sup>c</sup>Ara - Tomb 1* (ILAN, GADOT and YANNAI forthcoming)

Tel <sup>c</sup>Ara is located in Wadi <sup>c</sup>Ara, c. 6 kilometers west of Tel Megiddo. It was excavated in a salvage excavation in which hundreds of vessels and unstratified finds dating from the Middle Bronze Age 2a to the Late Bronze Age 2b were found.

*102. Zawata - Tomb* (EISENSTADT, ARABAS and ABLAS 2004: pl. 7:17)

The juglet was found together with Type 8 grey black juglets and two juglets of undefined typology.

A number of Base Ring, Monochrome, White Shaved and RLWMW juglets were also found with it. The excavators are of the opinion that the tomb dates to the end of the MB2, to the LB1 and the beginning of the LB2 (EISENSTADT, ARABAS and ABLAS 2004: 83).

*103. Zawata - Tomb* (EISENSTADT, ARABAS and ABLAS 2004: pl. 7:18)

The rim of this juglet is more similar to a “candlestick” than that of Juglet 41.

*104. Askar (East of Shechem) - Tomb 4* (MAGEN and EISENSTADT 2004: pl. 5:13)

The juglet was found together with a locally produced Type 7 juglet. Most of the vessels in the tomb are from the Middle Bronze Age 2 and the Late Bronze Age 1.

#### **Type 4 Juglets - Summary**

Magen and Eisenstadt group the juglets from the tomb at Zawata that were imported from Lebanon together with the juglets from the tomb at Jatt that were imported from Cyprus (EISENSTADT, ARABAS and ABLAS 2004: 82). They did not distinguish between the Type 2 Cypriot imported juglets and lumped all the grey and black juglets into one group. Their approach ignores the fundamental typological differences between the different groups and is unacceptable in light of the petrographic results that corroborate the typological differences.

One juglet (No. 104) with a candlestick-like rim was found in the tomb at Askar. The authors did not mention any details pertaining to its origins and it did not undergo petrographic analysis.<sup>28</sup> The resemblance of the shape of this juglet to that of Juglet No.

102 and also Juglet 103 may indicate that juglets with a “candlestick” rim were made on the coast of Lebanon. The two juglets were found in two different tombs. Tomb 4 at Askar contained vessels from the MB2 and, in our opinion, perhaps also from the beginning of the LB1 (MAGEN and EISENSTADT 2004: 5) and the tomb at Zawata yielded vessels that date from the MB2 until the LB2 (EISENSTADT, ARABAS and ABLAS 2004: 82), among them also numerous vessels imported from Cyprus.

One juglet from Tomb 4 at Askar was found in an unclear stratigraphic context but the assem-

<sup>28</sup> We wish to thank Irina Eisenstadt for the information.

blage of vessels that were found in the tomb date from the beginning of the Late Bronze Age and from the end of the MB2B. According to these finds, the Type 4 juglets were brought to the Land of Israel at the same time as the Type 1 and 2 juglets. The grey juglets that were produced on the Syrian/Lebanese coast were part of different groups of vessels from these sources that were exported to the Land of Israel. One of the most common groups in this commerce were juglets whose production was inspired by the Cypriot vessels and were mixed amongst in the massive importation of vessels from Cyprus to the Land of Israel (YANNAI, GORZALCZANY and PEILSTÖKER 2003).

The group of juglets imported from the Syrian/Lebanese coast that was found in funerary assemblages in the Land of Israel also contains one juglet that is not grey, whose production was, without doubt, inspired by the Cypriot juglets. The juglet was found in Jerusalem and was published by Ruth Amiran (AMIRAN 1960: fig. 3:40; AMIRAN 1969: pl. 46:13). According to the petrographic examination the juglet was made on the Syrian/Lebanese coast and its fabrication was inspired by the shape of the Type 2b black grey juglets from Cyprus and it is decorated with a traditional Syrian/Lebanese decoration (YANNAI, GORZALCZANY and PEILSTÖKER 2003: 110–111). It is one of many other vessels from the Syrian/Lebanese coast whose production was influenced by the Base Ring vessels from Cyprus and were imported into the Land of Israel. It reinforces the assumption that the Type 2b juglets coincided with the beginning of the production of the early Red Polished Base Ring juglets (VAUGHAN 1997:366) that are included in the group of vessels defined as BR I. The combination of the form of the BGLwmw together with the traditional Syrian decoration and its exportation to the Land of Israel shows that in the juglet industry technologies and styles from different countries mixed with each other and produced different and strange hybrid vessels.

### GROUP THREE: JUGLETS FROM THE LAND OF ISRAEL

Based on the differences in form and technology, the locally produced grey/black juglets were made in different production centers that were far away from each other. Some of them are similar to the Type 2a Cypriot juglets and some of them are different than the Cypriot juglets. Except for some of the Type 5 grey juglets, the color of most of the locally produced juglets is

black. Not one of the locally produced juglets is treated with a quality dense burnish which is characteristic of the juglets imported from Cyprus. Some of the juglets are partially and carelessly burnished and most were left unburnished.

Including the group of locally produced juglets in one type of ware together with the Cypriot imported juglets is uncertain and not self-evident. The Type 5 juglets (below) are similar to the Type 2b juglets and it is reasonable to assume that they were made as a local imitation of the Type 2b juglets or their production was directly inspired by the latter. The Type 6 grey juglets are less similar to the imported juglets. The main differences between the imported juglets and the Type 6 juglets are the shapes of the base, the form of the body, the conical shape of the neck and rim and the proportions between the height of the body to the length of the neck and especially the inferior quality of the treatment of the surface of the juglet.

It is difficult to determine how many typological elements similar to those of the imported Cypriot grey juglets are needed to include the locally produced grey/black juglets in one of the wares with the imported Cypriot juglets. It is also difficult to determine whether in this generalization should relate to the similarity in form only or also to technological parameters and even petrographic parameters. Some of the local types are very different than the imported juglets and it is only their black or grey color that indicates the possible relationship between them and the groups of imported juglets. In light of the differences the question should be asked if each black or grey juglet that was made in this period is included in the group of grey juglets or it is necessary to separate juglets whose production was inspired by the imported juglets and grey/black juglets whose form differs from that of the Type 2b juglets. Within the framework of this article we have divided the juglets made in the country into two groups: those with a cylindrical neck and juglets with a conical shaped neck.

### Type 5: (Fig. 1:13) (Catalogue Nos. 105–109)

The juglets are characterized by a flat or slightly curved base, an elliptical body the lower part of which is wider than upper part and a cylindrical neck that is taller than the body. The handle extends from the upper part of the body and connects to the upper part of the neck or is attached the length of the neck, from its top to its bottom.

The juglets from Megiddo and <sup>c</sup>Ara are fired grey and are vertically burnished and the black juglet from Jatt is not burnished.

*105. Megiddo - Tomb 2031 on the tell* (LOUD 1948: 26:12)

This juglet was also found with a Type 2b juglet and a Cypriot Base Ring II juglet. The chronological problem with this tomb and the different opinions associated with its chronology were already discussed above (STEWART 1955:49; ÅSTRÖM 1957:214; AMIRAN 1960:30). OREN dated this tomb to Stratum VIII despite the fact that the excavators assigned it to Stratum XII in Megiddo (OREN 1969:30). Based on the Cypriot Base Ring II juglet, the locally produced juglet in Megiddo also dates to the Late Bronze Age 2.

*106. Megiddo - Tomb 3018C in Stratum IX on the tell* (LOUD 1948: pl. 51:2)

This tomb was discussed above in the context of the Type 2b juglets (LOUD 1948: pl. 51:4).

*107. Megiddo - Tomb 877c1* (GUY and ENGBERG 1938: pl. 14:15)

The juglet was found together with a Bucchero jug imported from Cyprus (GUY and ENGBERG 1938: pl. 14:21), a locally produced jug whose form was inspired by the Bichrome ware (GUY and ENGBERG 1938: pl. 14:22) and other locally produced vessels that are similar to the vessels from Stratum VIII on the tell.

*108. Ara - Tomb 1*

The tomb at <sup>c</sup>Ara was mentioned in the discussion on Type 2b juglets.

*109. Jatt - Tomb 7* (YANNAI 2000: fig. 6:67)

The tomb was addressed in the discussion on the Type 2b juglets.

### **Type 5 Juglets - Summary**

The five juglets, Nos. 105–109 that were found at Megiddo, Ara and Jatt are very similar to each other and different than the juglets that were found at other sites. According to the petrographic examination that was conducted on the juglet from <sup>c</sup>Ara, it was produced in the Land of Israel. It is reasonable to assume that it was produced at Megiddo or near the volcanic outcrops in the Carmel. The uniform shape of the juglets from <sup>c</sup>Ara and Megiddo reinforces the possibility that a production center was located in Megiddo,

where a local and unique type of grey juglet was made and that it was traded in the region of Megiddo and <sup>c</sup>Ara.

The Type 5 juglets were found in assemblages that are later than the assemblages in which the Type 1 and 2 juglets imported from Cyprus were found. They were found together with BR II jugs and juglets decorated with white on grey. Tomb 877c1 is dated to the 14<sup>th</sup> century BCE, Tomb 2031 is dated to the 13<sup>th</sup> century BCE and based on these two assemblages one can date the Type 5 juglets to the LB1B or 2A.

**Type 6:** (Fig. 1:11) (Catalogue Nos. 110–162)

These juglets are characterized by a flat base, slightly elongated elliptical body, cylindrical neck, straight rim with a sharp finish, without an everted fold. The handle extends from the upper part of the body to the upper part of the neck and descends along the neck, sometimes until the body. The juglets are fashioned from black matte fabric and are not burnished.

*110–111. Jatt - Tomb 7* (YANNAI 2000: figs. 6:68, 69)

The dating of the tomb was discussed above in context with Juglets 38–41, Type 2b in the catalogue. Juglet 110 is similar to the juglets from Megiddo and its body is slightly smaller. Juglet 111 is slightly curved and it has a flat base that is somewhat wider than that of the Type 2 juglets.

*112. Askar - Cave 4* (MAGEN and EISENSTADT 2004: pl. 5:14)

Cave 4 and its finds were discussed in the chapter dealing with the Type 4 juglets.

*113. Askar - Tomb 4* (MAGEN and EISENSTADT 2004: pl. 6:18)

The juglet was found in Cave 5, all of whose finds, without exception are from the MB 2B.

*114. Zawata - Tomb* (EISENSTADT, ARABAS and ABLAS 2004: pl. 7:17)

This cave was dealt with in the discussion on the Type 4 juglets from the Syrian/Lebanese coast and it dates from the end of the MB2B until the LB2.

*115. Lachish - Tomb 564* (TUFNELL 1958: pl. 77:778)

Along with this juglet, which was published, another 42 similar juglets were found in Tomb 4004.

*116. Lachish - Tomb 555* in the cemetery (TUFNELL 1958: pl. 77:777)

Two juglets were found in Tomb 555 in Lachish.

The juglets were found together with a jug imported from the Syrian/Lebanese coast whose form was inspired by that of the RLWMW jugs from Cyprus (TUFNELL 1958: pl. 79:815; YANNAI, GORZALCZANY and PEILSTÖKER 2003: fig. 3:8). Also found together with the juglets and jug were several Base Ring vessels that definitely date to the 13<sup>th</sup> century BCE (TUFNELL 1958: pl. 80:839, 840) and Base Ring vessels that probably date to the 14<sup>th</sup> century BCE (TUFNELL 1958: pl. 80: 849, 857, 860).

*117–161. Lachish - Tombs 4004, 4009 and 7011*

Besides the two juglets that were found in Tomb 555, 17 juglets were found in Tomb 4004, seven juglets in Tomb 4009 and one juglet in Tomb 7011. Based on these quantities the Type 6 juglets were very popular. In light of the large number of Type 6 juglets in Tombs 555 and 564 and Tomb 4004, it is reasonable to assume that this juglet is a type that was made in Lachish.

*162. Tell Beit Mirsim - Tomb 1 (BEN ARIEH 2004: fig. 2.69:45)*

See juglet No. 76 in the catalogue

**LOCAL GREY/BLACK JUGLETS FROM CANAANITE SITES WHOSE FORM WAS INSPIRED BY THAT OF CYPRIOT IMPORTED JUGLETS**

**Type 7:**

*163. Yiftach'el - Tomb 1 (BARDA and BRAUN 2003: fig. 4:24)*

This juglet is characterized by a curved base, asymmetric spherical body and a broad cylindrical neck that is shorter than the body. It is fashioned from very dark grey fabric. The surface is roughly knife panned and not burnished.

Fourteen grey juglets were found in Tomb 1 in Yifach'el (BARDA and BRAUN 2003: 93). The excavators only published two of the juglets from this large group: one Type 2b juglet and one Type 7 juglet (BARDA and BRAUN 2003: fig. 4:24). The excavators did not distinguish between the two types<sup>29</sup> and only published one juglet of each type. Besides the juglets that were published, another eight Type 2b juglets and another Type 7 juglet were found in the tomb. Based on the

finds in Tomb 1 at Yiftach'el, the tomb was used for burials from the beginning of the MB2A until the end of the LB1. A single juglet of an early type of Base Ring ware that is slipped a lustrous red (BARDA and BRAUN 2003: fig. 9:4) dates the end of the burial to the end of the LB1A.

**Type 8:** The juglet has an elongated piriform body, button base and a long narrow cylindrical neck the length of the body. The handle extends from the upper part of the body to the upper part of the neck; the shape of the rim is not known.

*164. Lachish - Tomb 1555 in the cemetery (TUFNELL 1958: pl. 77:775)*

No parallels were found for the juglet with the piriform body. The body of this juglet is similar to the body of the piriform juglets from the Middle Bronze Age and we can assume that Tufnell based her definition of it as one of the grey juglets on the long neck that is unique to this family of juglets. This juglet was found in Tomb 1555 along with an early type of Base Ring Cypriot juglet (TUFNELL 1958: pl. 80:860) and a number of other vessels characteristic of the LB1.

The sole parallel to this unique juglet was perhaps found at Aniba in southern Egypt (STEINDORFF 1937: figure - second juglet from the left). From the archaic photograph of the juglet from Aniba we are unable to determine if the juglet is similar to the Type 6 or Type 7 juglets or if it is a local Egyptian product without any relation to the juglets of the Land of Israel.

**Type 9:**

*165. Tell es-Sa'idiyah - Tomb 101 (PRITCHARD 1980: fig. 3:4)*

Tell e-Sa'aidiyah is located in the central Jordan Valley. Tomb 101 contains only five pottery vessels. The pottery vessels (two jars, two juglets and a pyxis) are not chronologically indicative. Bone artifacts and an impressive group of bronze objects were also found together with them in the tomb. In the opinion of the excavator, Tomb 101 dates to the 13<sup>th</sup> century BCE (PRITCHARD 1980: 29).

<sup>29</sup> See above, note 5.

No.	Type	Provenance			MBIIb	LBIa	LBIIb	LBIa
		Cyprus	Israel	Syria				
1	1				Kabri T. 902		+ No. 12	
2					Meg. T. 5040A			
3					Meg. T. 1100A		+ No. 48	
4					Meg. T. 251		+ No.13	
5					Beth Shan T. 42		+ No. 64	
6					Pella T. 62		+ No.17	
7					Lachish T. 7011			
8					Ajjul T. 301			
9					Ajjul T. 364			
10					Ajjul T. 1532			
11	2 <sup>a</sup>					Yiftach'el T. 1		
12						Kabri T. 902	+ No. 1	
13						Meg. T. 251	+ No. 4	
14						Meg. T. 2009		
15						Meg. T. 2106		
16						Meg. T. 3004		
17						Pella T. 62	+ No. 6	
18						Beth Shan T. 27		
19						'En Nasab		
20-26						Jallameh		
27						Ashdod XXIIa		
28						Ajjul T. 331		
29						Ajjul L. GCC/2020		
30						Ajjul L. GJJ/2119		
31						Ajjul L. GHF/2100		
32						Ajjul T. 394		
33-34						Ajjul T. 397		
35						Ajjul T. 402		
36						Ajjul T. 404		
37						Ajjul T. 1003		
38						Ajjul T. 1031		
39						Ajjul T. 1522		
40-41						Ajjul T. 1539		
42						Ajjul T. 1904		
43						Ajjul T. 1905		
44						Ajjul T. 1908		
45						Fara'h (S) T. 613		
46	2b						Hazor T. 8112	
47							Meg. T. 258	
48							Meg. T. 1100A	
49-50							Meg. T. 77 X 2	
51							Meg. T. 1141	
52							Meg. T. 3018C	
53							Meg. T. 2031	
54-58		+					Ara T. 1 X 4	
59-63							Ara T. 2 X 4	
64							Beth Shan T.42	
65-70		+					Jatt T. 7 X 4	
71							Bahan	
72							Lachish T. 1555	
73-75							Lachish Temple 1	
76		+					Beit Mirsim T. 1	
77							Ajjul T. 211	
78							Ajjul T. 241	
79							Ajjul T. 281	
80							Ajjul T. 374	
81							Ajjul T. 368	
82							Ajjul T. 375	
83							Ajjul T. 873	

Table 1 The typological division of the GBLwmw juglets in the Land of Israel and their chronology

No.	Type	Provenance			MBIIb	LBIa	LBIIb	LBIa
		Cyprus	Israel	Syria				
84							Ajjul T. 1007	
85							Ajjul T. 1008	
86							Ajjul T. 1161	
87							Ajjul T. 1918	
88							Ajjul T. 1922	
89							Ajjul T. 1925	
90							Ajjul T. 1926	
91							Ajjul T. 1927	
92							Ajjul T. 1928	
93							Fara'h (S) T. 611	
94							Fara'h (S) T. 612	
95							Fara'h (S) T. 624	
96							Fara'h (S) T. 667	
97	3						Bahan	
98		+					Jatt T. 7	
99							Lachish	
100							Ajjul	
101	4						Meg. T. 2031	
102							Zawata	
103							Zawata	
104							Askar	
105	5						Meg. T. 2031	
106							Meg. T. 3018c	
107							Meg. T. 877c1	
108			+				Ara T. 1	
109			+				Jatt T. 7	
110	6							Jatt T. 7
111								Jatt T. 7
112			+					Askar Cave 4
113								Askar Cave 4
114								Zawata
115								Lachish T. 564
116								Lachish T. 555
117–161								Lachish T. 4004,4009, 7011
162								Beit Mirsim
163	7							Yiftah'el T. 1
164	8							Lachish T. 1555
165	9							Tel Sa'idiyeh Tomb 101

Table 1 continued

## DISCUSSION

### Technological Aspects

The technology of producing grey and black vessels by reduction firing has a long history in both Cyprus and the Land of Israel. On the one hand there is the long tradition of producing grey and black juglets on a wheel during the Middle Bronze Age in the Land of Israel and on the other hand there is long tradition of producing hand made globular vessels in Cyprus.

There is no way of knowing what motivated the Cypriot potters to produce the first juglets of this group. In our opinion, these are a mutation of the globular type of White Painted V and Red on Black juglets and not the successors of the Tell el

Yahudiyeh ware. Based on the typological classification, the juglets developed in a number of phases: the earliest juglets of this family were hand-made at the end of the MC 3 with a globular body, a form well ingrained in the Cypriot pottery scene. It is reasonable to assume that the difficulty in producing a globular juglet without a base on a wheel compelled the Cypriot potters to produce a juglet in a form as close as possible to the globular body, which was rooted in their conscience and professional experience, while attempting to implement the new technology that they had adopted. Therefore in a very early phase the Cypriot potters abandoned the globular form, without the base, and produced a juglet with as narrow a base as possible and as globular a body

as possible. The fusion of the new technological solution of use with the wheel with the traditional globular form produced the Type 2a juglet, which is typified by an almost globular body, short neck and flat base, with no visible separation between the body and the base. These changes were made at the same time as the end of the Middle Bronze Age in the Land of Israel, the beginning of the Late Cypriot period. In a later phase producing juglets on a fast wheel compelled the Cypriot potters to produce the juglet with the elliptical body and the tall Type 2b neck. Since the Type 2b juglets were very popular in the marketplaces of the Levant, the potters in the Land of Israel and along the Syrian/Lebanese coast began to produce juglets that are similar to them in form and fired them using the reduction technique that rendered them a black and grey hue.

### **The Grey Black Juglets with the Cylindrical Body**

The juglets with a cylindrical body have an extremely long history in the pottery of the Land of Israel and they appear in the local repertoire already in the beginning of the MB2A. In the MB 2B, most of the juglets were fired with oxidizing firing and some of the juglets were fired with reduction firing and the surface of the juglet is black, brown or grey. Some of the grey juglets are decorated with perforations characteristic of the Tell el-Yahudiyeh ware and some are not decorated in this style. Most of the juglets with the cylindrical body that were found in the Land of Israel were made with a short neck, flared rim and double handle. From the standpoint of these elements there is no difference between the juglets with a cylindrical body and juglets with an elongated body from the MB 2B. The main difference between the grey black juglets imported from Cyprus and the locally manufactured juglets that were inspired by the form of the Cypriot juglets is the long neck and the open lotus-like rim that is unique to the Types 1 and 2 imported juglets.

Various scholars define within the group of grey black juglets all of the black or grey juglets, and ignore the typological details that clearly differentiate the BGLwmw juglets from the other grey black juglets (FISCHER and SADEQ 2000: fig. 8:10). The distinction is important because the group of BGLwmw juglets are imported, whereas the other juglets (such as those published by Fischer and Sadeq from Tell Ajjul and mentioned above) were not made in Cyprus and they were

made in shapes and with technology that are ingrained in the pottery of the Land of Israel.

The cylindrical body of the grey black juglets imported from Cyprus is not characteristic of the usual forms of Cypriot pottery which is usually typified by spherical forms. One can assume that the different shape of the juglets with a cylindrical body has its roots in Canaanite pottery and not the Cypriot pottery. These juglets probably were made in Cyprus and their production was likely inspired by the form of the juglets of the Land of Israel and Syria and they were exported from Cyprus to the Land of Israel as Cypriot imitation products of Canaanite pottery. If this assumption is correct then this is an exceptional case whereby the Cypriot pottery imitates the Canaanite pottery. If we correctly understand what motivated the Cypriot potters this is also an extremely rare instance in which the potters attempted to produce pottery vessels characteristic of the country to which the vessel was intended to be sent.

A discussion about grey black juglets with cylindrical bodies from Cyprus can assist in defining the grey juglet with a cylindrical body that are decorated in the Tell el Yahudiyeh style, which were found in Tomb 7 at Jatt. The juglet is made of grey clay and is treated with a black slip that is flaking slightly. The upper part of the cylindrical body of the juglet is curved and its base is straight. Its form slightly resembles the Type 3 grey juglets and it is decorated with incising in the style of Tell el-Yahudiyeh (YANNAI 2000: 52–53). The two grooved circles in the upper part of the body and the step at the seam of the neck with the body are similar to the combination that is on the Cypriot BLWMW jug that was found at Jatt and Ugarit (YANNAI 2000: 53–55, fig. 6:62).

The juglet from Jatt combines four features from the different groups in one vessel: in form it is a juglet with a cylindrical body that is typical of the Land of Israel. Its firing is that of a grey juglet. Its slip belongs to the Black Lustrous ware from Cyprus and in its decoration it is Tell el-Yahudiyeh ware from Egypt. In light of the combination of the form, decoration and technique the question arises: is this juglet link the Type 3 grey black juglets or the Black Slip juglets together with the juglets decorated in the Tell el Yahudiyeh style? The hypothesis that there is a possible connection between the Black Slip III ware and Tell el Yahudiyeh ware has already been discussed by scholars; however, no one supports this today.

At this stage in the study I have not found a similar juglet and the juglet from Tomb 7 at Jatt is unique. The Type 3 juglets are also extremely rare and until today very few juglets of this type were found: one or possibly more were recovered at Bahan (not published), one at Jatt (**No. 55**), one or more at Shechem (KLAMER 1981: 33), one at Lachish (**No. 56**) and one at Ajjul (**No. 57**). While writing the article during the 1990's I was uncertain in defining the production origin of the juglet but in light of the existing petrographic parallels we now have, there is almost no doubt that the juglet was produced in Cyprus. It is extremely ironic that this unique juglet is the only Tell el Yahudiyeh type juglet that was produced in Cyprus. Because of its Cypriot origin and despite the unique decoration, we have chosen to add the juglet to the Type 3 group of rare juglets.

#### **The Relation Between the Grey Black Juglets and the Tell el Yahudiyeh Juglets**

The group of Tell el Yahudiyeh juglets has been intensively studied. In the Land of Israel it is part of a large and diverse group of grey, black and red juglets that were not decorated in the special style of this ware. Several of the most common types of juglets decorated in the Tell el Yahudiyeh style are juglets with a piriform body and a button base. Tufnell felt that the grey juglets are from the last phase of the Tell el-Yahudiyeh juglets (TUFNELL 1958: 276). Oren is of the opinion that that the grey black juglets succeed the group of juglets from the Tell el-Yahudiyeh group (OREN 1969: 130). In the review of the assemblages presented in his article, OREN treats all the types of grey juglets as one group and the question arises: by treating each type separately will we draw different conclusions? This question should be asked in light of the petrographic data proving that the different types within each kind of ware were produced in different places. The production of the Tell el-Yahudiyeh juglets in the Land of Israel and in Egypt do not correspond with the production locations of the grey juglets in the Land of Israel and Cyprus. From a limited chronological viewpoint most of the grey juglets are later than most of the juglets decorated in the Tell el Yahudiyeh style but this does not necessarily indicate a direct continuation between these two groups.

At Tell el Mashuta in Egypt black juglets with a globular body were found (HOLLADAY 1997: pl. 7.7:4) together with juglets with globular body that are perforated in the Tell el-Yahudiyeh style

(HOLLADAY 1997: pl. 7:23:E). These juglets are dated with certainty to the Middle Bronze Age and Second Intermediate period in Egypt. The neutron activation analysis that was conducted on the Tell el-Yahudiyeh juglets that were uncovered in Cyprus have shown that some of the juglets originated in Egypt and not in Cyprus and some even have their origins in the Land of Israel (ARTZY and ASARO 1979: 139). In the group of juglets that was checked were two juglets with a globular body that are decorated in the Tell el Yahudiyeh style (ARTZY and ASARO 1979: fig. 3: Cypr. 8, fig. 5: Cypr. 6). Laboratory examinations of the juglets decorated in the Tel el Yahudiyeh style have shown that all of the juglets with the globular body were made in Egypt (KAPLAN, HARBOTTLE and SAYRE 1984: 232). These laboratory findings directly contradict the fact that all of the Type 1 and 2 BLWMW juglets with globular bodies were made in Cyprus. Therefore, in our opinion from a methodological standpoint, it is difficult to define juglets that were made exclusively in Cyprus as the "successors" of juglets that were exclusively made in Egypt and the proposal to consider them as the "successors" of the Tell el-Yahudiyeh juglets is incorrect.

#### **The Regional Distribution of the Juglets Produced in the Land of Israel**

The grey black lustrous juglets made by local potters that were found in the country can be divided into two different types. The similarity of the lustrous grey juglets stems from their being an imitation of the imported Type 2b juglets or the juglets whose production was directly inspired by the technology and forms of the imported juglets. The extensive distribution of the Type 2b juglets is indicative of its great popularity and it should be assumed that the great demand for these juglets motivated or enticed the potters on the Syrian coast and in the Land of Israel to produce similar juglets.

Traditionally, already from the fourth millennium BCE the local potters in the Land of Israel and on the Lebanese coast produced different vessels in each region of the country. Petrography is unable to define the origin of every juglet in a regional resolution that is necessary for an accurate study and therefore it is possible to locate the specific production places. The identification of the origin of these juglets is based on statistical considerations. Some of the juglets were found in several sites in large numbers (Type 5 in Megiddo

and its environs) and of some of the types a single juglet was found in one site only and it is difficult to ascribe a unique juglet to a specific site.

The Canaanite potters who produced the grey juglets wrestled with two conflicting incentives: on the one hand a quality, homogenous, dominant and imported source and on the other, the desire to express the local tradition accepted in the region or the settlement in which they produced the juglets. In the designing the local juglets and deciding on the quality of their finish the potters had to take into account their ability to market a product in lieu of a popular imported quality product. The evidence that most of the black grey juglets that have been uncovered to date were imported shows that the local potters did not reject the imports over the local product and were content to supplementing what was lacking in the great demand for these Cypriot juglets.

The distribution of the juglets that were made in the Land of Israel according to their places of production shows that the imported juglets were mainly found in the large cities (Hazor, Kabri, Yiftach'el, Megiddo, Bet Shean, Pella, Jatt, Shechem, Lachish and Tell el Far'ah (South) and in harbors (Tell al Ajjul). On small tells, far from the central trade routes, more locally manufactured juglets were found, as well as juglets imported from the Lebanese coast (Ara, Zawata, Askar and Jerusalem).

#### **Were the GBLwmw Juglets Made in the Land of Israel as an Imitation of the Juglets Imported from Cyprus?**

The influence of the Cypriot pottery on the pottery of the Land of Israel is manifested in different ways. The Canaanite potters, who were experienced in producing pottery vessels on fast wheels, did not try to compete with the Cypriot technologies of the White Slip, Monochrome, Base Ring and other Cypriot wares. For example, the Canaanite potters in the Land of Israel who produced jugs inspired and influenced by the form of the Cypriot Base Ring jugs did not attempt to imitate the colors of this unique Cypriot pottery. Therefore their definition as imitation vessels, despite the fact that it is very popular and accepted by scholars (AMIRAN 1969: 182), is only based on the form of the vessels which is similar to the original Cypriot ware. This view is antiquated and in our opinion is incorrect. A discussion about grey juglets is different than a discussion about Base Ring ware and the two subjects are not

at all similar to each other.

According to the division of the grey juglets to different types, the Type 5 juglets are similar to the imported Cypriot juglets whereas the Type 6 juglets are not. The Canaanite pottery did not have a tradition of producing spherical vessels and the Cypriot pottery did not have a tradition of producing vessels on a wheel. Therefore the meeting and combination of the technologies and forms of the traditional Cypriot pottery together with the Canaanite forms and technologies is neither obvious nor self-evident.

In light of the long history of grey juglets in the Middle Bronze Age in the Land of Israel, the question arises whether Canaanite produced grey juglets were made inspired by the technology and form of the grey juglets imported from Cyprus or were they an independent type that evolved from within the grey juglets in the Land of Israel and only the long narrow neck is similar to that of the imported Cypriot juglets. If this indeed the case it may be that all of the grey/black juglets produced in the country should not be grouped together with the Cypriot BLwmw juglets.

The grey black juglets, both in Canaan and in Cyprus, were made using similar technologies. On the one hand the Cypriot technology was influenced which adopted the production of black juglets on the wheel and on the other hand the Canaanite potters were influenced and began to produce similar juglets in the shape of the juglets imported from Cyprus.

It seems that the use of the identical technology of reduction firing that was common on both sides of the sea, created an environment conducive for these mutual inspirations.

In our opinion, the use of a wheel for producing BLWMW juglets in Cypriot pottery should not be considered as an imitation. Production on a wheel was the realm of several types of Cypriot ware that were made employing completely different colors and technology than those of the grey juglets, e.g. Bichrome vessels, RLWMW and Plain White WMW vessels.

In light of the mutual influence from both sides of the Mediterranean Sea, the question should be asked, should the Types 5 and 6 black grey juglets that were made in the Land of Israel be considered imitation vessels of the Types 1 and 2 juglets that were imported from Cyprus.

On the one hand the BLWMW was made utilizing a firing technique that was not foreign to the potters of the Land of Israel, and on the other

hand their unique form is different than the traditional assemblage of Canaanite forms. Therefore, it seems to us that their manufacture was directly influenced by the imported Cypriot juglets. On the face of it, the fabrication of all of the juglets that were produced with a form similar to those of the Cypriot Base Ring juglets was inspired by the latter's form. The difference between the Base Ring vessels and the BLWMW juglets is the use of the common technology of reduction firing. This essential difference is what differentiates between imitation vessels and imported vessels and between vessels whose manufacture was inspired by form alone. Therefore, in our opinion, one can define the grey black juglets in the Land of Israel as imitation vessels of the Cypriot juglets.

#### CONCLUSION

The earliest grey black juglets were made in Cyprus with spherical bodies. Their form was inspired by the WP V ware. The earliest Type 1 juglets – with the globular body – were found in the Land of Israel in assemblages from the MB2B. The latest BLwmw Type 1 juglet dated to the time of Amenhotep the 1<sup>st</sup>. Early in the 18<sup>th</sup> Egyptian Dynasty. One can assume that the production technique on the wheel made it difficult for the Cypriot potters to manufacture vessels without a base so they flattened the bottom part of the body and thereby created the Type 2a juglets. These juglets were found in assemblages from the MB2B and in assemblages from the beginning of the LB1A, before the start of the importation of BR I ware. In light of the chronology of the assemblages, it seems that the change from juglets with a globular body without a base to a globular body with a flat base transpired over a short period of time. During the transition from the Middle Bronze Age to the Late Bronze Age in the Land of Israel, the Cypriot potters modified the form of

the juglets from those with an almost globular body to the Type 2b juglets that have a slightly elongated spherical body. This type was more suitable for production on a fast wheel. These juglets were found in assemblages from the Late Bronze Age, mainly in assemblages that predate the beginning of the importation of the Base Ring I ware. In only one instance was a BR I juglet found together with a Type 2b grey juglet. These two vessels indicate that the start of the importation of the BR I juglets coincided with the end of the importation of the grey juglets. This overlapping was apparently short-lived and it may assist us in understanding what were the earliest types of BR I ware that was imported into the Land of Israel from Cyprus. The trade in grey juglets waned at the same time as the trade in the BR I juglets commenced. It is reasonable to assume that the demand for quality BR I juglets resulted in the decline for the demand of the grey juglets and brought about the halt in the production and trade of the latter. The trade in quality juglets compelled potters on the Syrian/Lebanese coast, and even the potters in the Land of Israel, to produce similar juglets. In light of the finds it seems that the production and trade of local juglets was both marginal and minimal. The Type 2a–b juglets imported from Cyprus were very popular and they constituted at least 90% of all the grey juglets. The locally produced juglets were mainly distributed in sites in the mountainous regions of the Land of Israel and most of the imported juglets were found in port sites and on the large tells in the country.

The latest Cypriot imported BLwmw juglets were found side by side with LHIII A:2 vessels in tombs at Tell el-Ajjul and can be dated according to the Mycenaean chronology. The last juglet inspired by the BLwmw shape were found in tomb 101 at the cemetery in Tell es-Sa'idiyeh in the Jordan Valley (PRITCHARD 1980: fig. 3:4).

## Bibliography

- AMIRAN, R.  
1960 A Late Bronze Age II Pottery Group from a Tomb in Jerusalem. *Eretz-Israel* 6:25\*–37\* (Hebrew); English Summary p. 27).  
1969 *Ancient Pottery of the Holy Land*. Jerusalem.
- ARTZY, M. and ASARO, F.  
1979 Origin of Tell el-Yahudiyah Ware found in Cyprus. *RDAC*:135–150.
- ÅSTRÖM, P.  
1957 *The Middle Cypriote Bronze Age*. Lund.  
1972 *The Swedish Cyprus Expedition, Vol. IV: 1C, The Late Cypriote Bronze Age, Architecture and Pottery*. Lund.
- BARDA L. and BRAUN E.  
2003 Tomb 1 of Second Millennium BCE at Yiftah<sup>c</sup>el. *Atiqot* 44:67–95.
- BEN ARIEH, S.  
2004 *Bronze and Iron Age Tombs at Tell Beit Mirsim*, IAA Reports 23, Jerusalem.
- BERGOFFEN, C.  
2001 The Base Ring Pottery from Tel el-<sup>c</sup>Ajjul, 31–50, in: P. ÅSTRÖM (ed.), *The Chronology of Base Ring Ware and Bichrome Wheel-made Ware*. Stockholm.
- COURTOIS, J.-C.  
1981 *Alashia II. Les tombes d'Enkomi, le mobilier funéraire (fouilles C. F.-A. Schaeffer 1947–1965)*, Paris.
- DOTHAN, M. and PORATH, Y.  
1993 *Ashdod V, Excavations of Area G. The Forth-Sixth Seasons of Excavations 1968–1970*, *Atiqot* 23. Jerusalem.
- DUNCAN, J.G.  
1930 *Corpus of Dated Palestinian Pottery*. London.
- EISENSTADT, I. ARABAS, K. and ABLAS, Z.  
2004 A Late Bronze Age Burial Cave at Zawata, 77–16, in: H. HIZMI and A. DE-GROOT (eds.), *Burial Caves and Sites in Judea and Samaria, from the Bronze and Iron Ages*, JSP 4, Jerusalem.
- EPSTEIN, C.  
1966 *Palestinian Bichrom Ware*, Leiden.
- FISCHER, P.M. and SADEQ, M.  
2000 Tell el-<sup>c</sup>Ajjul 1999. A Joint Palestinian-Swedish Field Projects: First Season Preliminary Report, *Ä&L10*: 211–226.
- GERSHUNY, L.  
1991 *Zoomorphic Clay Vases and Ruyta in Israel of the Second Millennium BCE*, Ph.D. Dissertation. Hebrew University, Jerusalem.  
forthc. Tombs at Bahan – Israel, *Atiqot*.
- GJERSTAD, E.  
1926 *Studies on Prehistoric Cyprus*. Uppsala.
- GRANT, E. and WRIGHT, G.E.  
1938 *Ain Shams Excavations IV*, Haverford.
- GUY, P.L.O. and ENGBERG, R.M.  
1938 *Megiddo Tombs*, OIP 33, Chicago.
- HENNESSY J.B.  
1964 *Stephania a Middle and Late Bronze Age Cemetery in Cyprus*, London.
- HOLLADAY, J.S.  
1997 The Eastern Delta During the Hyksos and Pre-Hyksos Periods: Toward a Systemic/Socioeconomic Understanding, 184–252, in: E.D. OREN (ed.), *The Hyksos: New Historical and Archaeological Perspectives*, Philadelphia.
- ILAN, D., GADOT, Y. and YANNAI, E.  
forthc. Two Burial Caves at <sup>c</sup>Ara – Israel. *IAA Reports*.
- KAPLAN, F., HARBOTTLE, M.G. and SAYRE, E.  
1984 Tell el-Yahudiyeh Ware: A Re-Evaluation, in: P.M. RICE (ed.), *Pots and Potters, Current Approaches in Ceramic Archaeology*, Los Angeles.
- KARAGEORGHIS V.  
1965 *Nouveaux documents pour l'étude du bronze récent à Chypre*, Paris.
- KEMPINSKI, A., GERSHUNY, L. and SCHEFTELOWITZ, N.  
2002 Middle Bronze Age, 109–175, in: A. KEMPINSKI (ed.), *Tel Kabri, The 1986–1993 Excavations Seasons*. Tel Aviv.
- KLAMER, C.  
1981 A Late Bronze Age Burial Cave near Shechem, *Qadmoniot* 53–54:30–34 (Hebrew).
- LEONARD, A. JR.  
1994 *An Index to the Late Bronze Age Aegean Pottery from Syria-Palestine*, Jonsered.
- LOUD, G.  
1948 *Megiddo II*, OIP 62, Chicago.
- MACALISTER, R.A.S.  
1912 *The Excavations of Gezer III*, London.
- MAGEN, Y. and EISENSTADT, I.  
2004 Ancient Burial Caves in Samaria, 1–76, in: H. HIZMI and A. DE-GROOT (eds.), *Burial Caves and Sites in Judea and Samaria, from the Bronze and Iron Ages*, JSP 4, Jerusalem.
- MACKEY, E.J.H. and MURRAY, M.A.  
1952 *Ancient Gaza V*, London.
- OREN, E.D.  
1969 Cypriot Imports in the Palestinian Late Bronze Age I Context, *Opuscula Atheniensia* 9:127–150.  
1973 *The Northern Cemetery of Beth Shan*. Leiden.
- PETRIE, W.M.F.  
1898 *Deshasheh*, London.

- 1906 *Hyksos and Israelite Cities*, London.
- 1930 *Beth-Pelet I*, London.
- 1931 *Ancient Gaza I: Tell el Ajjul*, London.
- 1932 *Ancient Gaza II: Tell el Ajjul*, London.
- 1933 *Ancient Gaza III: Tell el Ajjul*, London.
- 1934 *Ancient Gaza IV: Tell el Ajjul*, London.
- 1952 *City of Shepherd Kings*, London.
- PETRIE, W.M.F., and BRUNTON G.
- 1924 *Sedment II*, London.
- PETRIE, W.M.F., BRUNTON, G. and MURRAY, M.A.
- 1923 *Lahun II*, London.
- PORATH, Y., DAR, S. and APPELBAUM, S.
1985. *The History and Archaeology of Emek-Hefer*, Tel Aviv.
- POTTS, T.F., COLLEDGE, S.M. and EDWARDS, P.C.
- 1985 Preliminary Report on a Sixth Season of Excavations by the University of Sydney at Pella in Jordan (1983/84), *ADAJ* 29: 181–210.
- PRITCHARD, J.B.
- 1980 *The Cemetery at Tell es-Sa'idiyeh, Jordan*. Philadelphia.
- SALLER S. J.
- 1964 *The Excavations at Dominus Flevit (Mount Olivet, Jerusalem) Part II. The Jebusite Burial Place*, Jerusalem.
- SCHAEFFER, C.F.A.
- 1949 *Ugaritica II*, Paris.
- SHIPTON, G.M.
- 1939 *Notes on the Megiddo Pottery of Strata VI–XX*, Chicago.
- SJÖQVIST, E.
- 1940 *Problems of the Late Cypriote Bronze Age*, Stockholm.
- STEINDORFF, G.
- 1937 *Aniba*, Hamburg-New York.
- STEWART, J.R.
- 1955 When did BR Ware First Occur in Palestine? *BASOR* 138:47–49.
- TUFNELL, O., INGE, H.C., and HARDING, L.
- 1940 *Lachish II. The Fosse Temple*, London.
- TUFNELL O.
- 1958 *Lachish IV. The Bronze Age*, London.
- VAUGHAN S. J.
- 1997 Late Cypriot Base Ring Ware: Studies in Raw Materials and Technology, 337–368, in: A. MIDDLETON and I. FREESTONE (eds.), *Recent Developments in Ceramic Petrology – British Museum Occasional Paper 81*, London.
- WRIGHT, G.E.
1961. The Archaeology of Palestine, 73–112, in: G.E. WRIGHT, *The Bible and the Ancient Near East*.
- YADIN, Y., AHARONI, Y., AMIRAN, R., DOTHAN, M., DUNAYEVSKI, E. and PERROT, J.
- 1960 *Hazor II: An Account of the Second Season of Excavations 1956*, Jerusalem.
- YADIN, Y., AHARONI Y., DOTHAN, T., DOTHAN, M., AMIRAN, R. and PERROT, J.
- 1961 *Hazor III–IV* (Plates), Jerusalem.
- YANNAI, E.
- 2000 A Late Bronze Age Tomb at Jatt, *Atiqot* 39:49–82.
- 2005 Late Bronze Age Pottery from Tombs 12 and 13 at Tell Jatt, Sharon Plain, *Atiqot* 49:13–30.
- YANNAI E. GORZALCZANY, A. and PEILSTÖKER, M.
- 2003 A Group of Vessels from the Syrian Coast Found in the Coastal Plain of Israel, *Levant* 35: 101–116.
- forthc. Narrow Base Dipper Juglets Imported from the Syrian-Lebanese Coast.