

Egypt and the Levant

**INTERRELATIONS FROM THE 4TH THROUGH THE EARLY
3RD MILLENNIUM BCE**

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3 The Relative Chronological Position of Egyptian Predynastic and Early Dynastic Tombs with Objects Imported from the Near East and the Nature of Interregional Contacts

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Introduction

Foreign objects found in Egyptian Predynastic and Early Dynastic tombs received much attention in the past, and have frequently been discussed during recent years (see, among others, Adams and Friedman 1992, Arakawa 1995, Braun and van den Brink 1998, Hartung 1994, Hennessy 1967, Kantor 1952, Kasper 1989, Talamon 1973). The discovery of a large quantity of Ummank pottery at cemetery L in Abydos (Hartung 1993, 1996; see however Petráň and Gertel, this volume) in tombs dating to the late Naqada II and early Naqada III period, or before the beginning of the First Dynasty, is of particular importance. Nevertheless, a number of problems concerning Egypt's relations with the Near East still remain. Among them are the relative chronology of these relations and a few elements concerning their nature, which will be discussed here.

The chronological framework used in this paper follows a revision (Hendrickx 1989) of Kaiser's *Upper chronology* (Kaiser 1957, 1990). The attribution of the individual tombs with foreign imports to particular chronological phases has been taken directly from this revision, the full details of which have not yet been published (see, however, Hendrickx 1996, 1999). A few tombs for which the funerary assemblage has never been published have been dated approximately by comparison with the Sequence Dates attributed by Petráň to these tombs (Petráň 1920, pl. 1-10). The most notable differences with Kaiser's original work are to be found in the late Naqada I-early Naqada II periods (Hendrickx 1996, fig. 3.1). There is no break in the material culture at the beginning of the historic period, and when no written information is available the archaeological evidence does not allow an individual tomb to be dated to the reign of a particular king. Therefore, the Naqada culture, as archaeologically defined, includes the First and Second Dynasties. The cemeteries of the Badari-Madi culture (Geboto and Mortensen 1988, Habachi and Kaiser 1985, Ryzhina and Seefelt 1990) have not been taken into consideration for this paper, because

their chronological position compared with the chronological sequence of the Naqada culture cannot be established with enough precision.

For the excavations carried out at the end of the nineteenth century or during the first decades of the twentieth, the identification of imports is in many cases very difficult, because the objects themselves can often no longer be located. It is also probable that a number of imported artifacts or materials were not recognized as such at the time. The problem is even more important because the cemeteries excavated in those days represent the large majority of published Predynastic and Early Dynastic tombs, and will certainly continue to do so for a long time.

The well-known decorated Predynastic objects, such as the Gebel el-Arak knife handle or the decorated palettes, which have often been used as evidence for Mesopotamian influence (see Boedinger 1974, Sieversen 1992), were, in reality, produced in Egypt, as is shown by the use of hippopotamus ivory for the knife handles and mudstone or gneiss for the palettes, which are most certainly native Egyptian raw materials. Although stylistic influences cannot be excluded, they are left out of the present discussion because their chronological relevance is very limited, not only because they would only show indirect relations with the Near East, but also because the archaeological context of most of these objects is unknown. Foreign influences have also been recognized on the stamp and cylinder seals (Boedinger 1974, Kantor 1952), but since in most cases it has remained unknown if they represent genuine imports or Egyptian imitations, they will not be discussed in detail either.

It is obvious that foreign pottery found in Egypt was probably not imported for the pottery itself, but for the contents, which unfortunately remain difficult to determine (see however Meloyent *et al.* 1993, Serpico and White 1996). Therefore, the most interesting source of information regarding Egypt's foreign relations are raw materials which do not occur naturally in Egypt, because they directly refer to the reasons for these contacts. Objects in obsidian, lapis lazuli, turquoise and silver play an

Kainer 1957, 1990		Hendricka 1989, 1990	
		no cylindrical jars	Naqada IIID
50 +	Stufe IIIc3	50 b-c, h-i	Naqada IIIC2
50 d	Stufe IIIc2	50 e-g	Naqada IIIC1
48 s, t + 49 d, f + 50 d	Stufe IIIb1	-	
48 s, t + 49 d, f	Stufe IIIb2	-	
47	Stufe IIIb1	47 i-j, 48 s + 49 d, g	Naqada IIIB
W 50 + W 51 a W 55 + W 56 g W 61 + W 62	Stufe IIIa2	W 55 + W 56 W 60 + W 61 We2	Naqada IIIA2
		W 49 + W 50 W 51 + W 56 a, g	Naqada IIIA1
W 41 + W 42 h W 47 g	Stufe IIIa1	-	
W 41 + W 41 h W 47 g	Stufe IIIa2	W 41 + W 42 W 43 b + W 47 a, g W 47 m	Naqada IIID2
W 24 + W 25	Stufe IId1	W 24 + W 25 W 27	Naqada IID1
W 1 + W 19	Stufe IIc	W 1 + W 19	Naqada IIC

Figure 3.1 Relative chronological periods at the Naqada culture as distinguished by Kainer 1957, 1990 and Hendricka 1989, 1990, determined by the types of Wavy Band pottery (after Petrie 1924, 1933).

important role in the discussion of Egypt's foreign relations. It is to be noted, however, that the Egyptian assemblages are very rich in all kinds of raw materials and that there certainly was no pressure for the import of raw materials on the economy and existence of Egypt in the fourth millennium BC. In this respect, it is important to mention that copper can be found in a few places in the Eastern Desert of Egypt (e.g. Casle and Pugh 1997, Casle and Soukassian 1989: 11–12) and that there is no reason at all to consider copper as an imported material as has often been done—especially because the Eastern Desert was very well known to the Egyptians from the beginning of Predynastic times onward (e.g. Debono 1991, Jongs 1998, Majer 1992, Resch 1964).

Obsidian

Obsidian sources are to be found in Armenia and Cappadocia in the Near East, as well as in Ethiopia and Yemen. Thebes (Central Sudan) and some Mediterranean islands. Owing to the geochemical peculiarities of the different sources, this glassy material has for a long time been recognized as reliable evidence for reconstructing prehistoric exchange patterns (cf. Williams-Froese 1995, with further references). Recently, analytical research has been carried out on 16 obsidian artefacts found in Pre- and Early Dynastic contexts at Hierakonpolis, the royal tombs from Abydos, Naqada and Qaw el-Kebir (Savoy et al. 2000). This study demonstrated all of these objects to originate from Ethiopian or Yemenite sources, and definitely not from Armenia or Cappadocia. The result, the presence of obsidian should no longer be considered as evidence for relations between Upper Egypt and the Near East. Consequently, this material will not be discussed here. However, it should be stressed that one cannot exclude that obsidian of different origins reached the Egyptian Nile Valley during the Predynastic period. This is particularly true for Lower Egyptian sites, such as Khosheh-Meleq, which yielded an important number of obsidian pieces (Schäffl 1926), and Tell el-David Souta (Schmidt 1989: 88, fig. 15). Ongoing analyses of additional objects will help to confirm or modify the preliminary conclusions of these investigations.

Turquoise

That Sinai was the source of turquoise is hardly a matter of discussion any longer. Turquoise has already been attested for the Fayumian (Gates-Thompson and Gardner 1934: 53), although it concerns only a surface find. This isolated occurrence, which is to be placed in the fifth millennium cal. BC, if indeed Fayumian, apparently bears no relation with the much more recent finds from Predynastic tombs. Turquoise has been considered as evidence for foreign relations of the Badarian culture (Pérog 1986, Lichardus 1989). However, the identification of turquoise with the naked eye proves to be particularly difficult. Experiments have shown that confusion may easily arise with garnet objects, which are well attested from the Badarian onward. It is hardly a surprise that the identification of turquoise from Badarian tombs is highly debatable. Actually, in each of the 13 examples known

from the Badari district, there are problems (Table 3.1). Either the identification is questionable, suggested by the excavators themselves, or the chronological position of the tomb in which it was found is uncertain, or the turquoise comes from the fill of a disturbed tomb. Furthermore, the excavators sometimes seem to contradict themselves when the description of the tomb is compared to the tomb register and the bead typology. Lucas and Harris (1962: 208, n. 1), referring to information supplied by Brantton, state that 'the material, originally classed doubtfully as turquoise, has now been definitely identified as turquoise'. However, a few of the objects from Brantton's excavations are preserved in the British Museum, where Andersson (1981) identified two of them as glazed steatite, while the third one she was able to locate was indeed turquoise. It came from the fill of a disturbed tomb (cf. Table 3.1). The beads from tomb S493, preserved in the Petrie Museum, have been identified as steatite (Adams, pers. comm.). Finkersaad (1984) considered the technique which produced glazed steatite beads (common in Badarian graves) to originate from southern Mesopotamia. However, the existence of numerous steatite sources in the Eastern Desert (the Porter and Karlshausen 1992: 140–1), and the skillful mastery of firing techniques attested by the unequalled quality of the Badarian pottery, make it most probable that the technique of glazed steatite was invented independently in the Nile Valley and the Near East.

Turquoise has not been found in tombs dating to the Naqada I and early Naqada II period (Table 3.2), and therefore an interruption in the import of turquoise would have to be supposed, if it did already occur during the Badarian. However, the material development of the Badarian and early Naqada culture shows no sign of any event which could have been the cause for such an interruption.

Considering all of this, the oldest unquestionable occurrence of turquoise is to be moved to the Naqada III period (Table 3.2). It is certainly not to be excluded that the corpus of Predynastic tombs containing turquoise is also hampered by erroneous identifications of the blue stone, as was the case with the Badarian pieces. This is exemplified by two tombs at Naqada 1289 and B 501, for which Baumgartel (1970) mentions the presence of turquoise. In both cases it proved to be glazed steatite (Pérog 1989: 208, n. 1695–1696). Nevertheless, the evidence gathered in Table 3.2 clearly shows the occurrence of turquoise at various sites during Naqada III–IV, while its presence during the Naqada III period seems strictly limited to the elite tombs at Abydos and Hierakonpolis.

Finally, it is to be noted that the occurrence of turquoise in Egyptian tombs does not necessarily imply contacts with the Levant. Indeed, turquoise is found in the western part of the Sinai, especially in the area of Maghara and Serabit el-Khadim. Egyptians could easily have procured the material without contact with even the southernmost part of Palestine. During the 1970s Israeli archaeologists excavated a turquoise mining and processing site attributed to a Ghassulian group (Ben Arieh 1980). Since turquoise artefacts are almost completely absent from the Chalcolithic sites in the southern Levant, Ben Arieh (1980: 59, 61) suggested that the exploitation of the stone was intended primarily for exportation to Egypt. However, an exclusively Chalcolithic date for the site appears highly disputable. The published fragments of

Table 3.1 Turquoise in Badarian context

Tomb	Objects	Comments
Badari 3466	beads	Brannon and Canon-Thompson 1928, pl. I, 66 k, 28. "turquoise" (the bead are not mentioned in the tomb inventory, ibid. pl. 3)
Badari 3467	beads, very light green pebble	Brannon and Canon-Thompson 1928, pl. I, 66 k, 13. "turquoise" (Andrews 1981: 23–24, n. 63 "turquoise" (The pebble came from the top of the tomb) Brannon and Canon-Thompson 1928: 7)
Badari 3468	rafting, scraps of pottery, beads	Brannon and Canon-Thompson 1928, pl. I, 66 k, 1. "turquoise" (The pebble is not mentioned in the tomb inventory, ibid. pl. 3) (not in the description of the tomb, ibid. 7)
Badari 3469	rafting, BB 61 k, BB 24 k, beads, Red Sea shells	Brannon and Canon-Thompson 1928, pl. X, 175 c, 39. "turquoise"
Badari 3497	rafting, BB 12 k, BB 24 k, beads, Red Sea shells, ivory pumice	Brannon and Canon-Thompson 1928, pl. X, 175 c, 39. "turquoise"
Badari 3498	raft, BB 24 k, 59 k, 9 k, beads, Nile faience, pebbles, 13 thin flakes, ivory, faience, bone, quartz	Brannon and Canon-Thompson 1928, later "turquoise" (pl. X, 175 B, 15, 18, c, 12, 17. pl. I, 66 k, 13) and "turquoise" (p. 1, 196 k, 30 B, 30). The last one is not mentioned in the tomb inventory, pl. 3 (ibid. c. 1, 3499. Statuette (Barbara Adams 1985, 100)
Badari 3497	Red Sea shell	Brannon and Canon-Thompson 1928, later "turquoise" (pl. 1, 30 k, 10) and "turquoise" (pl. I, 66 k, 18). The beads are not mentioned in the tomb inventory, ibid. pl. 3)
Badari 3499	rafting, BB 11 k, beads	Brannon and Canon-Thompson 1928, 12. "green glazed steatite" (response? pl. X, 175 B, 15. "turquoise"
Badari 3498	rafting, beads, Red Sea shell, quartz	Brannon and Canon-Thompson 1928, 12. "green glazed steatite" (response? pl. 1, 30 k, 10. "turquoise"
Badari 3499	rafting, beads, ivory, quartz	Brannon and Canon-Thompson 1928, pl. X, 175 B, 15. "turquoise" (Andrews 1981: 24, n. 61. "glazed steatite"
Badari 3538	BB 11 k, beads, Red Sea shells, pebbles, 13 thin ivory case and discs	Brannon and Canon-Thompson 1928, pl. I, 136 k, 20. "turquoise"
Badari 3540	beads, Red Sea shells	Brannon and Canon-Thompson 1928, pl. 1, 136 k, 16 k, 14. "turquoise" (Andrews 1981: 19, n. 1. "glazed steatite"
Metrino 3094	PR 14 P, shards, Red Sea shell	Brannon 1948, pl. IX, "turquoise". Not mentioned in description of tomb, ibid. 87

Note: BP = light copper brown; BB = Black lipped red; FS = polished red; Sk = Smooth brown; RB = Rough brown

pottery are generally very small and no entire shapes of vessels could be reconstructed. Among the shapes represented are bowls and hemispherical jars, which might just as well be Early Bronze in date. The lithics comprised numerous Canaanite blades, characteristic for the Early Bronze Age, and particularly for EB I (Rosen 1985). Furthermore, some sherds of an Egyptian hard clay cylinder jar, presumably similar to Petrie's W 38 (cf. Ben Ariél 1980, fig. 7, 14–15; pl. 19, 1–2) also point to a date around Naqada IIA2, contemporary with EB I.

Lapis lazuli

Lapis lazuli occurs more often in Predynastic and Early Dynastic tombs than turquoise, but even considering the impact of looting, its presence remains exceptional when compared to the thousands of tombs which have been

excavated (Table 3.3). Although its foreign origin has been questioned by several authors (Clark and Harris 1982: 349; Neef 1984: 31; Nibley 1998; Vercoff 1992: 59), the very specific geological conditions required for the formation of lapis lazuli are not found in Egypt (Hayes 1997: 80). The nearest sources for lapis lazuli are in Badakhsan in north-eastern Afghanistan, about 4000 km from Egypt. Therefore, lapis lazuli appears secure evidence for long-distance contacts between Egypt and the East.

The chronological and geographical distribution of lapis lazuli shows a sudden and "massive" appearance during the Naqada III period (Table 3.3). Only one or two tombs containing lapis lazuli artifacts are to be dated earlier than TB 1858 at Naqada, which dates to the Naqada II period, and probably also tomb B 75 at Abydos. It seems nevertheless reasonable to consider Naqada III as the moment from which lapis lazuli was systematically imported. Furthermore, from the beginning it appears to

Table 3.2 Tumuli in Predynastic and Early Dynastic Egypt adapted with additions after Grayson (1992)

Site	Tomb	Period	Bibliography
Abydos	U-254	Naqada IIIA-IIIb	Dreyer <i>et al.</i> 1998: 82
Mastara	256	Naqada Ib	Branton 1937: 155
Mastagedda	183	Naqada Ib	Branton 1948: 71
Abidos	U-30	Naqada Ib	Frankfort 1936: 214
Naqada	196	Naqada Ib	Baumgartel 1970: 88
Naqada	836	Naqada Ib-c?	Petrie 1929: 44
Giza	80	Naqada IIA-IB (Sp. 47-63)	Petrie 1912: 22
Giza	80	Naqada IIA-IB (66-93)	Petrie 1912: 22
Narcel-Deir	7501	Naqada IB-IIIc2	Nasr 1953: 219
Abidos	U-142	Naqada IIIc-IIIc2	Dreyer <i>et al.</i> 1996: 18
Abidos	U-153	Naqada IIIc1-IIIc2	Dreyer <i>et al.</i> 1996: 27
Abidos	U-154	Naqada IIIc1-IIIc2	Dreyer <i>et al.</i> 1996: 28
Abidos	U-159	Naqada IIIc1-IIIc2	Dreyer <i>et al.</i> 1996: 28
Abydos	U-200	Naqada IIIc?	Dreyer 1993: 27
Abidos	U-210	Naqada IIIc2	Dreyer <i>et al.</i> 1996: 28
Abidos	U-243	Naqada IIIc2	Dreyer <i>et al.</i> 2000: 55
Abu el-Meleq	32108	Naqada IIIc2	Scharf 1926: 142
Abidos	U-267	Naqada IIIc3	Dreyer <i>et al.</i> 1996: 83
Abidos	U-303	Naqada IIIc3	Dreyer <i>et al.</i> 1996: 92
Abidos	U-3	Naqada IB-A	Dreyer <i>et al.</i> 1996: 26
Abidos	U-9	Naqada IB-A	Dreyer 1993: 34
Abidos	U-30	Naqada IB-A	Dreyer <i>et al.</i> 1996: 27
Abidos	U-36	Naqada IB-A	Dreyer <i>et al.</i> 1996: 28
Abidos	U-38	Naqada IB-A	Dreyer <i>et al.</i> 1996: 28
Abidos	U-399	Naqada IB-A	Dreyer <i>et al.</i> 1996: 29
Mastara	5108	Naqada IB-IIIA (Sp. 47-58)	Branton 1937: 155
Hierakonpolis (k-6)	11	Naqada IB-A2	Adams and Friedman 1992: 142
Melut	205	Naqada IB-A2	Dunrobert 1933: 155
Naqada	396	Naqada IB-IIA3	Baumgartel 1970: xvii
Abidos	U-39	Naqada IIA-c1	Dreyer <i>et al.</i> 1998: 93
Abidos	U-4	Naqada IIB	Dreyer 1993: 32
Abidos	U-5	Naqada IIA-IIIb	Dreyer <i>et al.</i> 1996: 32
Abidos	U-6	Naqada IIA-IIIb	Dreyer <i>et al.</i> 1996: 26
Abidos	U-7	Naqada IIB (U-399)	Petrie 1901: 17
Mastara	3201	unstrat. – predynastic	Branton 1938: pl. 155
Qau	125	unstrat.	Branton and Canon-Thompson 1928: xlv
Qau	125	unstrat.	Branton and Canon-Thompson 1928: xlv
Paqueria (a)	1681	unstrat.	Branton and Canon-Thompson 1928: xlv
Atad (a)	5	undated	Petrie and Mace 1901: 27
Kilburya-south	P 82	undated	Lankar 1929: 102
Kilburya-south	P 133	undated	Lankar 1929: 102

Table 3.3 Lapis lazuli in Predynastic and Early Dynastic tombs (adapted with additions after Bayley 1997)

Site	Tomb	Period	Bibliography
Nagada	1858	Nagada IV	Berningauel 1930: 18
Aradysa	B 75	Nagada V (BA) – Na 360–121	Petrie 1920: 46
Gerzeh	151	Nagada III	Petrie 1912: 16
Maharr	2645	Nagada III	Brunton 1948: pl. vii
Maharr	2661	Nagada III (Ch)	Brunton 1948: pl. vii
Maharr	3005	Nagada III	Brunton 1948: pl. ix
Maharr	3126	Nagada III	Brunton 1948: pl. ix
Maharr	1134	Nagada IV	Brunton 1948: pl. ix
Maharr	5112	Nagada IV	Brunton 1948: pl. ix
Maharr	5137	Nagada IV	Brunton 1948: pl. ix
Mastagedda	1759	Nagada IV	Brunton 1948: pl. xxx
Mastagedda	1831	Nagada IV	Brunton 1948: pl. xxx
Bacari	3750	Nagada IV	Brunton and Caton-Thompson 1928: xxxii
Bacari	3752	Nagada IV (Ch)	Brunton and Caton-Thompson 1928: xxxii
Bacari	3850	Nagada IV	Brunton and Caton-Thompson 1928: xxxii
Hammamya	7313	Nagada IV	Brunton and Caton-Thompson 1928: pl. xxx
Hammamya	7356	Nagada IV	Brunton and Caton-Thompson 1928: p. xxx
Nag el-Dekh	7290	Nagada IV	Lythgoe and Dunham 1965: 168
Nag el-Dekh	7324	Nagada IV (HDD)	Lythgoe and Dunham 1965: 179
Nag el-Dekh	7338	Nagada IV	Lythgoe and Dunham 1965: 202
Nag el-Dekh	7342	Nagada IV (Ch)	Lythgoe and Dunham 1965: 207
Nag el-Dekh	7531	Nagada IV	Lythgoe and Dunham 1965: 227
Nag el-Dekh	7461	Nagada IV (Ch)	Lythgoe and Dunham 1965: 236
Nag el-Dekh	7527	Nagada IV (Ch)	Lythgoe and Dunham 1965: 343
Nag el-Dekh	7538	Nagada IV (HDD)	Lythgoe and Dunham 1965: 353
Nag el-Dekh	7540	Nagada IV (Ch)	Lythgoe and Dunham 1965: 359
Nag el-Dekh	7546	Nagada IV (Ch)	Lythgoe and Dunham 1965: 362
Maharra	137	Nagada IV	Aschmann and Lisch 1917: 22
el-Amra	209	Nagada IV	Melvert and Mace 1902: 19
el-Amra	2118	Nagada IV	Melvert and Mace 1902: 19
el-Amra	2119	Nagada IV	Melvert and Mace 1902: 18
el-Amra	140	Nagada IV	Melvert and Mace 1902: 22
Nagada	822	Nagada IV	Petrie and Quibell 1898: 27
Nagada	75	Nagada IV	Berningauel 1930: 18v
Nagada	836	Nagada IV (Ch)	Petrie and Quibell 1898: 21
Maharra	3067	Nagada HDD	Brunton 1948: pl. ix
Bacari	3827	Nagada HDD	Brunton and Caton-Thompson 1928: xxxiii

Table 3.3 (continued)

Site	Tomb	Period	Bibliography
Barden	3602	Nagada IIIc1	Brunton and Caton-Thompson 1928: xxxv
Barden	3604	Nagada IIIc1	Brunton and Caton-Thompson 1928: xxxv
Barden	3809	Nagada IIIc-IIId1	Brunton and Caton-Thompson 1928: xxxv
Nagada	367	Nagada IIIc-IIId1c2	Baumgartel 1970: xxi
el-Amra	362	Nagada IIIc2	Melzer and Mace 1962: 20
el-Amra	3709	Nagada IIIc2	Melzer and Mace 1962: 22
el-Amra	3230	Nagada IIIc2	Melzer and Mace 1962: 23
Nagada	380	Nagada IIIc1	Petrie and Quibb 1896: 19
Marshall Abu Omer	36	Nagada IIIc2	Kroeper and Wildung 1994: 152
Maragedet	11737	Nagada IIIc2	Brunton 1937: 75, xxi
Abidos	L7	Nagada IIIc2	Melzer and Mace 1962: 19
Abidos	F169	Nagada IIIc2	Melzer and Mace 1962: 16
Abidos	L133	Nagada IIIc2	Dreyer <i>et al.</i> 1996: 17
el-Amra	F17	Nagada IIIc2	Melzer and Mace 1962: 21
el-Amra	F104	Nagada IIIc2	Melzer and Mace 1962: 21
Khat Bani el-Gemil	19	Nagada IIIc2	Bersier 1930: 128
Hierakonpolis	1629	Nagada IIIc2c3	Brunton and Caton-Thompson 1928: pl. xxx
Hierakonpolis	1800	Nagada IIIc2c3	Brunton and Caton-Thompson 1928: pl. xxx
Abadiya	R323	Nagada IIIc2-IIIId1	Petrie and Mace 1961: 34
Marshall Abu Omer (2)	699	Nagada IIIc-IIId2	Kroeper and Wildung 1994: 103
Marshall Abu Omer	A15	Nagada IIIc-IIId2 (MAU1)	Kroeper and Wildung 2006: 23
Marshall Abu Omer	A13	Nagada IIIc-IIId2 (MAU1)	Kroeper and Wildung 2006: 23
Hierakonpolis	1779	Nagada IIIc-IIId2c3	Brunton and Caton-Thompson 1928: pl. xxxi
Nagada	1217	Nagada IIIc-IIId2 (N128-39)	Engel 1993: n. 2064
Gerza	80	Nagada IIIId-IIId2 (SD 58-63)	Petrie 1912: 22
Qaw el-Kebir	102	Nagada IIIc-IIId2	Brunton and Caton-Thompson 1928: pl. xxx
Qaw el-Kebir	103	Nagada IIIc-IIId2	Brunton and Caton-Thompson 1928: pl. xxx
Qaw el-Kebir	140	Nagada IIIc-IIId2	Brunton and Caton-Thompson 1928: pl. xxx
Kubariya south	30-2	Nagada IIIc3	Tucker 1919: 102
Nagada	624	Nagada IIIId1	Baumgartel 1970: pl. lxxi
Abidos	L196	Nagada IIIId2	Dreyer <i>et al.</i> 1996: 28
Gerza	147	Nagada IIIId-IIIId2 (SD 57-63)	Petrie 1912: 22
Abidos	102	Nagada IIIId2	Dreyer 1996: 28
Hierakonpolis (H5)	11	Nagada IIIId2	Arnold and Fine 1992: 140
Kubariya south	2313	Nagada IIIId2	Tucker 1919: 102
Gerza	55	Nagada IIIId-IIIId2 (SD 65-73)	Petrie 1912: 22
Abusir el-Meleq	22302	Nagada IIIId-IIIId2c3	Schäfer 1926: 123

Table 3.4 Silver objects in Predynastic and Early Dynastic tombs (after Prag 1978, with additions).

Site	Tomb	Period	Bibliography
Maadi-500	1547	Nagada III	Avner and Pea, 1911: 18
Nagada	1547	Nagada III	Baumgardt 1935: 7
Nagada	1547	Nagada III	Payne 1987: 182
Nagada	1257	Nagada III	Payne 1987: 186
Nagada	1776	Nagada IIIA1	Petrie and Quibell 1896: 15
Mostafesida	1546	Nagada IIIA1	Branson 1937: 89
el-Amra	c. 250	Nagada IIIA1	Meher and Maki 1932: 1, 3
el-Amra	c. 255	Nagada IIIA1	Meher and Maki 1932: 24
Hierakonpolis III-5	11	Nagada IIIB2	Adams 1996: 13
Maadi-1	5201	undated (proto-dynastic)	Branson 1938: 25
Gebelein-7a-1	---	undated	Quibell 1905: vol. IV: 186
Nagada	1674	undated	Petrie and Quibell 1896: 15
Nagada	1766	undated	Petrie 1921: 35
Nagada	---	undated	Petrie and Quibell 1896: 46
Ballas	---	undated	Baumgardt 1935: 8

be distributed all over Upper Egypt (also and hence to become less frequent from the beginning of Nagada II), when a concentration in the elite cemeteries of Hierakonpolis, Abydos and the Memphis region can be observed. The relative scarcity may be explained by the heavy looting which took place in these elite tombs, rather than by a diminishing import. The latest occurrence of lapis lazuli dates to the time of Qa'a. The absence of lapis lazuli during the Second and Third Dynasties may possibly reflect the laxity in the procurement of the stone observed on contemporary Near Eastern sites, as a result of political circumstances during the Mesopotamian Early Dynastic I period (Kraay 1997: 93–4; Branson 1968; Magiszewski 1982: 62). However, the limited archaeological evidence for the Second and Third Dynasties should also be taken into consideration.

With regard to the catalog of tombs containing turquoise and lapis lazuli, it is remarkable that the large Early Dynastic mastabas at Saqqara are represented only once, considering the importance of these tombs, second only to the royal tombs at Abydos; this absence can only be explained through the heavy looting of the Saqqara mastabas.

Silver and lead

Silver has in the past been regarded as a sure import (Lucas and Harris 1962: 245–53), but more recent research proved that part of the Egyptian silver is native (Gale and Stos-Gale 1981). The remaining silver, with a low gold content, might have been obtained from foreign galena ore (Gale 1981). However, this is questioned by Hassan and Hassan (1981) who consider the possibility of Egyptian galena being the source of

Predynastic silver. Unfortunately most of the very few silver items known for Predynastic and Early Dynastic Egypt (Table 3.4) have not been analyzed. It is not likely that many analyses will be carried out in the future either because the present whereabouts of some of the objects is unknown. Most of the identifications as silver have been made a long time ago, and should be checked. Two well-analyzed objects (Gale and Stos-Gale 1981: 115) represent both types in silver. A lid of a storage jar from Nagada tomb 1257, dated to Nagada III, is made of the second type in galena silver and might therefore have been imported. However, the source of this silver cannot be determined.

Finally a hawk rattle, from the Nagada IIC tomb 721 at Nagada, was first described as made of lead (Petrie and Quibell 1896: 18) and was also considered to be of silver (Prag 1978), but finally found to be of lead as originally supposed (Gale and Stos-Gale 1981: 115; Payne 1987: 14 n. 10). The lead, with a very high silver content, is considered by Gale and Stos-Gale not to come from Egypt; this, however, was contradicted by Hassan and Hassan (1981). Anyhow, considering the very exceptional occurrence of lead artifacts in the Near East of the fourth millennium, nothing definitive could be said about its provenience.

Chalcolithic pottery

Desalegn raw materials, imported pottery, has also been found in Predynastic and Early Dynastic tombs. The earliest find known at present comes from the Badarian tomb 569 at Qara el-Kebir, where a globular jar with four lug handles of non-Egyptian type and ingotia has been found (Branson and Carter-Humphson 1938: 3, pl. xvi.7, xxvii). The Badarian date of this jar has been questioned by

Baumgartel 1995: 21), who suggests that the material of the disturbed tomb 569 may have been mixed with that of the equally disturbed proto-synoptic tomb 569a. However, not only was the principal stem apparently found in contact with the arm of the skeleton (which, admittedly, was not in its original position) (Bruston and Eaton-Thompson 1928: 3), but also it finds no parallels among the Canaanite Early Bronze IB or Early Bronze II pottery. Recently, the Chakoff-Ha date of the jar and its provenience from northern Canaan have been demonstrated most convincingly by Friedman (1988a).

Early Bronze I pottery

For the Canaanite EB I storage jars found in Egyptian tombs (Table 3.5), a few broadly defined types can be recognized. Only the jar from tomb 3131 at Mariut, dated generally Naqada IC, is different, both in its shape and the very early date of the tomb in which it was found. The attribution to the Naqada IC period is open for discussion because of the presence among the grave goods of a jar of Petrie's type R 81, which is very characteristic of the Naqada IIC period. On the other hand, there are also a few Black Impressed vessels that point to an earlier date. The excavator already suggested, without further details, a foreign origin for the jar under discussion (Bruston 1928: 19). There are no obvious Canaanite parallels, although related shapes can be found among the Canaanite pottery from Tomb L. j. The problem posed by this jar cannot be answered at present.

Among the EB I storage jars, the most numerous are broad jars with wavy handles (cf. Kroeber 1989: 409, fig. 2), generally accepted to represent the oldest examples of the WavyHandled pottery which will become so important for the study of the relative chronology of the Naqada culture. Some of these jars combine both wavy handles and ledge handles. They have been found on different sites all over Egypt from Naqada IC onwards. Apparently, from the very beginning when the Egyptians started to imitate the Canaanite prototypes, they developed stiffer and slimmer types, which must represent adaptations to their own requirements. Therefore the difference between Canaanite imports and locally made WavyHandled jars becomes obvious by their shape as early as the Naqada IC. For the Naqada IIIA1-A2 period, Canaanite vessels almost exclusively come from Abydos (Table 3.5); jars of a similar shape, but without the wavy handles, occur with ledge handles and with a combination of ledge and loop handles (Kroeber 1989: 410-1, fig. 3-4). Their presence seems to be restricted to Naqada IC-III. Finally, ledge handles without handles occur only from Naqada IIIA1 onwards. The latter are particularly numerous in Tomb L. j at Abydos. For all the above mentioned types, Canaanite parallels can be found (Amiran 1969: pl. 18, 7-8; Spencer 1968; Jorast 1993 with further references; Vekicij 1995).

Before the Naqada IIIA1 period, the number of these jars remains very limited. There never occurs more than one example in a tomb. This picture changes radically during the Naqada IC period, where the enormous amount of Canaanite pottery from Tomb G, is especially remarkable.

EB I jars found in Egypt are generally considered to

have contained principally wine and, to a far more limited extent, vegetable oils. Figs have also been found, but these were probably only used for sweetening wine (McCormu *et al.* 1997: 10). Tomb G at Abydos may have contained a total volume of some 4500 liters of wine stored in Canaanite vessels (ibid.: 11). On the other hand, the absence of Egyptian jars that can be identified with certainty as wine jars during the Naqada IIIA1-III A2 period allows us to suggest that wine was not yet produced in Egypt itself at that time (cf. page 70).

Besides the storage jars, there are a few other types of Canaanite imports (Table 3.6, for illustrations, see Kroeber 1989: 412-13, fig. 5-10). Although it cannot be established with certainty for each one of them that they were actually produced outside Egypt, this is however certainly so for the jug from Gerza, for which perfect parallels have been found on several EB I sites (Helms 1987: 23, fig. 19.1-6). Equally imported are the loop-handled jugs found in the elite tombs at Qusid (Williams 1988: 28-30), which represent the southernmost find of EB I pottery (see also Gophna and van den Brink 1995 volume). The Qusid tombs are difficult to integrate in the relative chronological framework used here. From the Egyptian pottery they contained, the tombs can only roughly be dated to Naqada IIIA2-III C2. However, considering the Naqada IIIA2 date of the jug from Thekopolis Hk 6, tomb H, which although incompletely preserved is a close parallel for the Qusid jugs, it may be accepted that the Qusid tombs imitate the Naqada III C period, and hence the First Dynasty. A few very large loop-handled cups made from Nile silt with a large amount of vegetal temper (Petrie 1921: pl. LI, type L 100, and which are thus locally produced in Egypt) may have been influenced indirectly by Canaanite pottery, with Lower Egypt as the go-between (van der Wal 1993: 32). This opinion, however, has been rejected by Tominovic (1993: 41-3), who looks for direct influence from Canaan. The cups have all been found at living sites and it is therefore impossible to integrate them in the relative dating sequence used here.

With the exception of the storage jars and the loop-handled jugs, all of the EB I pottery types found in Egypt served for various domestic functions and not for storage and transport. This probably also explains why the majority of the types and examples have been found at Warihar Abu Omar, where the occasional presence of Canaanites can be expected. But even on this site, the occurrence of imported vessels is occasional, at least if we accept the first inventory assemblage to reflect daily life.

The Canaanite origin of 'Smersed bowls' (Prima 1921: pl. XV, F 5) also seems ascertained (Kantor 1992: 33; Tominovic 1993: 47-8), although probably only the example from Mostagedda is a genuine import, the others being Egyptian imitations. Unfortunately only one of these bowls can be dated. It seems nevertheless highly probable that they should be placed in Naqada IC-III.

Three spouted vessels found at Minshat Abu Omar are certain Canaanite imports, but they apparently have no relation with the spouted vessels belonging to Petrie's Forcé class, which are still to be discussed (page 70). Both the shape of the jars themselves and the type of the spouts differ considerably and the Minshat Abu Omar examples are more recent than those from Upper Egypt.

Finally, a double jar from tomb 87 at Gerza (Petrie

Table 3.5 Early Bronze I storage jars in Predynastic tombs

Site	Tomb	Number	Period	Bibliography
Matruh	1131	1	Nagada II, c1	Bruston 1942: 16, no. 32
el-Amra	25	1	Nagada II	McLver and Mace 1902: 22
el-Amra	2160	1	Nagada II	McLver and Mace 1902: 20
Nagada	1246	1	Nagada II	Hammarsted 1930: xxxvi
Nagada	1258	1	Nagada I	Payne 1993: n. 1686
Amman	1362	1	Nagada III	Mead and Myers 1937: pl. xxv
Nagada	—	1	Nagada III ² –570–600	Payne 1993: 1, 1987
el-Amra	F 223	1	Nagada IIIA	McLver and Mace 1902: 24
Nierakoupe	98	1	Nagada III–III ²	Adams 1974: 101 Friedman pers. comm.
Minkhat Abu Omar	799	1	Nagada III–III ² (MAA 1.1)	Nagata 1983: 411, fig. 4a Kroeper and Weidung 2005: 1
Minkhat Abu Omar	846	—	Nagada III–III ² (MAA 1.1)	Kroeper 1989: 110, Fig. 43 Kroeper and Weidung 2005: 139
Mersinat Abu Omar	316	1	Nagada III–III ² (MAA 1.1)	Kroeper and Weidung 2005: 80
Abydos	U 133	1	Nagada IIIA–III ²	Dreyer <i>et al.</i> 1996: 17
Abydos	U 501	1	Nagada IIIA–III ²	Dreyer <i>et al.</i> 1996: 92
Abydos	U 111	1	Nagada III ²	Dreyer <i>et al.</i> 1996: 17
Abusir el-Meleq	H 62	1	Nagada III ² –IIIA	Scharff 1926: 11, 93, 45
Abydos	U 6	30	Nagada IIIA1	Dreyer <i>et al.</i> 1996: 26
Abydos	U 7	700	Nagada IIIA ¹	Nagata 1993: 49–56
Abydos	U 6	6	Nagada IIIA ¹	Dreyer <i>et al.</i> 1996: 27
Abydos	U 8	1	Nagada IIIA1	Dreyer <i>et al.</i> 1996: 23
Abydos	U 999	1	Nagada IIIA1	Dreyer <i>et al.</i> 1996: 29
Abydos	U 5	2	Nagada IIIA2	Dreyer 1990: 57
Abusir el-Meleq	U 37	1	Nagada IIIA2–III ²	Scharff 1926: 11, 92, 8
Abydos	U 36	1	Nagada III	Dreyer <i>et al.</i> 1996: 24
Abydos	U 4	1	Nagada III	Dreyer <i>et al.</i> 1996: 23
Abydos	U 9	1	Nagada III	Dreyer 1990: 11, 216
Abydos	U 95	3	Nagada II	Dreyer <i>et al.</i> 1996: 34
Abydos	U 97	1	Nagada II	Dreyer <i>et al.</i> 1996: 25
Tarkhan	—	1	Nagada IIIA2–III ²	Yeserlich 1995
Giza	165	—	Nagada III–IIIA ¹ –570–45–7.21	Perrie 1912: pl. 31
Giza	51	1	Nagada III–IIIA ¹ –570–57–64	Perrie 1912: pl. 31
Abydos	—	—	Nagada III	Amélineau 1896: pl. xxxviii
Abydos	—	—	undated	Quirke 1905: 3, 1165–2, 7
Abydos	—	—	undated	Quirke 1905: 3, 1166–5

1912: pl. XI, F 46–9) cannot be dated, but according to the ware description must primarily represent a genuine import. The suggestion by Kantor (1942: 185, 205) that Predynastic double vases in general would show foreign influence is hardly acceptable, because the Egyptian exam-

ples are clearly derived from frequently occurring Nagadan shapes (see also Fattamam 1993: 50–61). Also, the shape evolution of the double vases follows that of vessels belonging to Perrie's Red Polished and Decorated and is therefore strongly linked with the Egyptian pottery tradition.

Table 3.6 Various types of EB I pottery

Site	Tomb	Number	Period	Bibliography
<i>Large decorated types</i>				
Giza	80	1	Naqada IIC-IIIb (ME 47-73)	Petrie 1912, vol. I, p. 150
Berakampolis (Hk-1)	11	1	Naqada IIAC	Adams and Friedman 1992, vol. II, fig. 15
Qusid	1.9	1	Naqada IIAC-IIIb	Williams 1986, 102
Qusid	1.19	1	Naqada IIAC-IIIb	Williams 1986, 102
Qusid	1.21	0	Naqada IIAC-IIIb	Williams 1986, 100
<i>Medium decorated</i>				
Atasut el-Meleh	725	1	Naqada IIAC	Schaff 1926, Pl. 21, fig. 3
Atasut el-Meleh	1650	-	undated	Branson 1937, pl. xxxv, 15
Naqada	1395	1	undated	Baumgartel 1939, pl. XI
Naqada	7	-	undated	Petrie and Quibell 1899, pl. xxx, 150
<i>Decorated</i>				
Giza	82	1	Naqada IIC-IIIb (ME 50-70)	Petrie 1912, p. xv, Pl. 10
<i>Small decorated with long leg handles</i>				
Berakampolis	106	1	Naqada IIC	Adams 1990b, fig. 1.4
Atasut el-Meleh	1.719	1	Naqada IIC-IIIb (?)	Branson 1937, xxx, xxxvi
Minshat Abu Omar	231	1	Naqada IIC-IIIb (MAU I)	Krieger and Whitting 1991, 136
Atasut el-Meleh	1019	1	Naqada IIAC	Schaff 1926, 24, Pl. 1, 150
Naqada	7	-	undated	Petrie and Quibell 1899, xxx, 150
<i>Small undec.</i>				
Minshat Abu Omar	242	1	Naqada IIC (MAU I)	Krieger and Whitting 1991, 136
Minshat Abu Omar	303	1	Naqada IIC (MAU I)	Krieger and Whitting 1991, 124
Minshat Abu Omar	307	1	Naqada IIC (MAU I)	Krieger and Whitting 1991, 125
<i>Other</i>				
Minshat Abu Omar	267	1	Naqada IIC-IIIb (MAU I)	Krieger 1989, 316, fig. 82; Krieger and Whitting 2000, 10, Pl. 1
<i>Asq</i>				
Minshat Abu Omar	3.3	1	Naqada IIC (MAU I)	Krieger and Whitting 1991, 115
<i>Unadorned</i>				
Berakampolis			Naqada IIC-IIIb	Friedman 1999, 1

Mesopotamian influence?

A number of Predynastic pottery types and decorative patterns have been suggested to show Mesopotamian influence. Baumgartel (1935, 52-102) recognized extensive Mesopotamian influence for nearly all of the Decorated Predynastic pottery. This, however, is no longer accepted. The large majority of motives which Baumgartel recognized for both regions consist of rather simple geometrical patterns, most of which appear to be stylized renderings for water, mountains, or plants. Also, men-

tions of basketry patterns, very frequent in Petrie's White-Cross Lined class, occur in both regions. These are 'rather universal' themes, developed independently in various regions, and they can, for example, also be found on Mesopotamian and Chinese pottery. Also, there is not a single example known of Decorated pottery imported from Mesopotamia to Egypt or vice versa.

For a few pottery types, the possible Mesopotamian influence should be considered a little bit more in detail. Among them are the pots with triangular lug handles belonging to Petrie's Decorated class (Petrie 1921, pl.

XXXIV, XXXV, D 45 h.s., 1.50; D 50 h.s., 1.51 m.; D 52, D 59 c.p.s.), dating mainly to Naqada IIIA1–2. These pots are locally made in Egypt from marl clay and their decoration shows the typical motives of the Naqada IIIA1–2 period, but the type of handles also occurs for Ubaid and Uruk pottery from Mesopotamia (Amiran 1992: 427–8). These handles also occur on late Uruk pottery from Palestine and northern Syria. Although highly disputable, a Mesopotamian influence, albeit indirect, cannot be excluded completely (Amiran 1992; Kantor 1992: 14). Similar influence has also been recognized in spouted vessels (Petrie 1921, p. XVIII, F 58 a–c), the few well-dated examples of which occur from Naqada IIIc onwards. Although these jars are produced in Egypt from Nile silt, and despite the fact that the shapes of these vessels are most frequent among the Red-Polished pottery (Petrie 1921: pl. XI–XII), a Mesopotamian origin for the bent spout has been suggested (Amiran 1992: 427; Baumgartel 1955, 91–3; Kantor 1992, 14), though never widely accepted (Kroeper 1989, 412–16; Fummdik 1993, 19–50). It is noted that that spoons are not common to Predynastic Egyptian pottery, but the function of these vessels for washing hands (and at the same time as a symbol for the elite way of living) is well known for the Early Dynastic period and the Old Kingdom (Hendricks 1994, 88 with further references). For all these reasons, it seems most probable that spouted vessels, which all-in-all are not a spectacular nor complex invention, were developed independently in Mesopotamia and Egypt (contra Kantor 1992, 14). In a similar manner, the suggested relation for four-handled pots (Kantor 1992, 176), which was already doubted by Baumgartel (1955, 94), can also be related.

In conclusion, the Mesopotamian influence on Egyptian pottery manufacture appears highly disputable.

Early Bronze II pottery

Early Bronze II pottery found in Egypt (Tables 4.7–4.9) consists almost exclusively of elongated flasks, generally with one large loop handle, but they also occur with two small loop handles and without handles at all (L. Kantor 1992, fig. 10–14; Kroeper 1989, 418, fig. 11). They have originally been designated 'Abydos Ware,' a term no longer appropriate, not only because this pottery has been manufactured in Canaan and not in Abydos, but also because it is not a uniform fabric. Three different ware groups have been distinguished, namely Red-Polished Ware, Light-Faced Painted Ware and Metallic Ware (Hennessy and Miller 1961; Kantor 1992, 18). The majority of the Early Bronze II jars most probably belong to the Metallic Ware produced in the Upper Jordan Valley and adjacent regions (Greenberg and Porat 1996; Porat and Adams 1996: 102). The Light-Faced Painted Ware (Table 3.8) were probably manufactured in Lower Galilee, perhaps in the vicinity of Lake Sinitet (Porat and Adams 1996: 104). As for the Red-Polished Ware, this is a heterogeneous group that may have been produced at different places in middle and southern Canaan. The earliest EB II jars found in Egypt date to the reign of Djer and, as far as known at present, they hardly occur in Egypt after the First Dynasty, which confirms the view already expressed

a long time ago by Hennessey (1967). Besides one actual find from Helwan, EB II jars are also occasionally depicted in Second Dynasty stelae from Saqqara and Helwan (Gard 1957: pl. XXV, XXX; Smith 1958: p. 14). They are more frequently depicted in Old Kingdom mastabas (Baker 1934, 90–1). The production of this type of jar continues throughout the EB II and EB III periods, and it is therefore to be supposed that the near complete absence in Egypt after the First Dynasty is at least partially due to our limited archaeological knowledge of the Second Dynasty (cf. Kantor 1992, 20).

Among the contents of the EB II jars were certainly vegetable oils, which may have come from southern Lebanon (Serikis and White 1996). They could have been used in food preparation or for cosmetic purposes. This is corroborated by the relatively small volume of the jars. Also, four-handled jars of the shape discussed here, although made of stone, will be used during the Old Kingdom as ceterminaria for different types of cosmetics (Baker 1934, 7–82), and they are also represented in the Old Kingdom mastabas as oil jars (Baker 1934, 90–4). Wine, which was certainly imported during the EB I as mentioned above, was produced locally in Egypt from the Early Dynastic period onwards (McGovern *et al.* 1997, 7–8). Although the exact moment for the introduction of vine culture is difficult to define, it seems logical to situate it between Naqada IIIA1, the time of tomb L-1 at Abydos and the beginning of the Early Dynastic period. The large jars with rope decoration (Petrie 1938, 1949, 1954, 1958, types 81–2, 16–12; Petrie 1958: pl. XXII–XXIII, types 76a–c) manufactured in Egypt are generally considered to have been used exclusively as wine jars, which has been disputed, but for which confirmation has been found recently (Köhler 1996, 51–4). In a few cases, the function as wine jar has been confirmed through the find of grape pips (Köhler 1996: 7; Köhler 1996, 52). The earliest jars of this type are attested for the Naqada IIIA1 period, which consequently could represent the introduction of large-scale viticulture in Egypt. This is confirmed by the *in situ* find of grape pips in the tomb of Iry-Hor (Köhler 1996, 52). However, the majority of the examples date to the Naqada IIIA1–IIA2 period. The production of wine in Egypt itself and, as a consequence, the diminishing importance of imported wine, might well explain why large EB II storage jars (Table 3.9), which can be supposed to have contained wine during Naqada I, II, IIA1–IIA2, are far less numerous than the related EB IIB jars during the Naqada IIIA1–IIA2 period.

It is remarkable that no EB II jars have been found in Upper Egypt, with the notable exception of the royal tombs at Abydos. Nearly all of the other jars have been found in the Memphis area, in elite tombs such as the early Dynastic mastabas at Saqqara or in tombs that are directly linked with the elite, such as the cemetery at Saqqara west (cf. Kaher 1985). Another observation is that although the Saqqara tombs yielded an important number of Canaanite imports, the variety in shapes may have been larger for the royal tombs at Abydos.

One last EB II import from Canaan is a remarkable zoomorphic vessel found in grave 2275 at Wari-sha, Abu Omari, dated by the excavators to the First Dynasty (Kozlowski *et al.* 1996, cover).

Table 3.7 Early Bronze II sites including Metalliferous Ware in Egyptian Early Dynastic periods

Site	Tomb	Number	Period	Bibliography
Ami Rasah	569	1	Naqada III.1	Klasens 1961c: 56-9
Anyfus	0	6	Naqada III.1 (Irene)	Verpue and White 1996; Prest and Adams 1996
Naqada	S 3301	24	Naqada III.1 (Irene)	Emery 1951: 68-71
Turkulan	1064	1	Naqada III.2 (Irene)	Petrie 1911: xv-4 xxviii-7
Abu Rasah	1	2	Naqada III.1 (Irene)	Montet 1948: 162
Abu Rasah	M 19	2	Naqada III.2 (Irene)	Klasens 1961: 111-13
Abu Rasah	M 20	2	Naqada III.2 (Irene)	Klasens 1961: 111-13
Abu Rasah	M 21	1	Naqada III.2 (Irene)	Klasens 1961: 111-13
Abu Rasah	M 22	1	Naqada III.2 (Irene)	Klasens 1961: 111-13
Abu Rasah	M 23	1	Naqada III.2 (Irene)	Klasens 1961: 111-13
Abu Rasah	M 25	2	Naqada III.2 (Irene)	Klasens 1961: 111-13
Naqada	S 3336	3	Naqada III.1-III.2 (Irene)	Emery 1949: 81
Naqada	S 3335	3	Naqada III.2 (Irene)	Emery 1948: 50, pl. 26-7
Naqada	S 3366	55	Naqada III.2 (Irene)	Emery 1948: 51-6
Naqada	S 3307	20	Naqada III.2 (Irene)	Emery 1956: 85-6
Naqada-west	17	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	33	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	40	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	15	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	28	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	197	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	198	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	225	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	226	1	Naqada III.2 (Irene)	Macdonald 1940
Naqada-west	229	1	Naqada III.2 (Irene)	Macdonald 1940
Heliwan	170-254	1	Naqada III.2	Saad 1951: pl. XI.3, B
Tell Ba'ajin-Awad	1	1	Naqada III.2	van den Brink 1988: fig. 15
Tell Ba'ajin-Awad	1	2	Naqada III.2	van den Brink 1989: pl. 21-31
Tellin	737	3	Naqada III.2-3	Petrie <i>et al.</i> 1923: pl. 16
Abadias	0	23	Naqada III.2-Irene/Eden	Kasson 1992: 11-29; Prest and Adams 1996
Abadias	1	1	Naqada III.1-III.2	Amelinckx 1899: pl. 1
Naqada	S 3500	3	Naqada III.1 (Gaza)	Emery 1958: 101-6
Naqada	S 3505	14	Naqada III.1 (Gaza)	Emery 1956: 15-18
Abadias	0	1	Naqada III.1 (Gaza)	Ziegler 1997
Marshat Abu Omar	1	1	Naqada III.1 (MAO 3)	Kasson 1989: 417, fig. 1-6
Marshat Abu Omar	1	1	Naqada III.1 (MAO 3)	Kasson 1989: 417, fig. 1-6
Marshat Abu Omar	1	1	Naqada III.1 (MAO 3)	Kasson 1989: 417, fig. 1-6
Heliwan	41, 113	2	Naqada III.1-2	Köhler 1998
Heliwan	41-119	1	Naqada III.1 (2nd dynasty)	Saad 1957: pl. xviii-19
Heliwan	1	---	undated	Saad 1951: pl. lxxv-23
Heliwan	1	---	undated	Saad 1951: pl. lxxv-21

Table 3.8 Early Bronze I Light-Faced Painted jars in Egyptian Early Dynastic tombs

Site	Tomb	Number	Period	Bibliography
Nasqada West	42	1	Nasqada III 2 (Open)	MacGinnally 1960
Nasqada West	222	1	Nasqada III 2 (Open)	MacGinnally 1960
Abusir	T	8-1	Nasqada III 2 (Open)	Petrie 1921 pl. lxv Petrie 1922 pl. vii Schaff 1933 p. 333
Abusir	99-1	1	Nasqada III 2 (Open)	Barnet 1978 Pl. 27 Mortensen 1998, n. 3
Abusir	L	1	Nasqada III 2 (Open/Marked)	Petrie 1921 pl. lxv Petrie 1922 pl. vii Schaff 1933 p. 330-3
Abusir	Z	2	Nasqada III 2 (III)	Amelinckx 1899 pl. ii, vii
Abusir	Q	5	Nasqada III 2 (Open)	Engel 1907, 269-70, 144 Schaff 1933 p. 330-33
Nasqada	S 3135	1	Nasqada III 2 (Open)	Finney 1949 fig. 68
Nasqada	?	1	Nasqada III 2-III 3	Finney 1961 pl. 11

Table 3.9 Early Bronze II Light-Faced Painted jars in Egyptian Early Dynastic tombs

Site	Tomb	Number	Period	Bibliography
Abusir	O	3	Nasqada III 2 (Open)	Schaff and White 1909
Abusir	159	1	Nasqada III 2 (Open)	Petrie 1925 pl. 147
Nasqada	S 3506	1	Nasqada III 2 (Open)	Finney 1949 Pl. 11
Abusir	...	1	Nasqada III 2 (Open)	Petrie 1925 pl. 140
Abusir	Q	5-6	Nasqada III 2 (Open)	Engel 1907, 269-70, 143

Discussion

For the Badarian period, which is probably earlier than the period between 4400 and 4000 cal. bc. agreed for certain, only one imported vessel can be identified, while the presence of turquoise most probably is to be denied. This indicates that contacts between Upper Egypt and the Levant must have been very exceptional and of marginal importance only. Indeed, it is highly questionable if any direct contact at all was ever established at that time (contra Abdelkawi 1995: 23; Kaplan 1979; Mark 1998: 12; Rice 1990: 27-8; Tcherniac 1989, 1996). It is far more logical to consider the few possible imports as a result of Badarian contacts with the Nile Delta, where we know that extensive contact with the Ghassulian culture existed and migration has probably been attested at Buto (Fahmy, this volume). There is not the slightest indication during the Badarian period for relations with Mesopotamia, either direct or indirect.

Little if anything seems to have changed during the subsequent Naqada I and early Naqada II period. The very few imported goods known point again to very sporadic contacts only (cf. also Hartman 1998).

A radically different picture emerges from the Naqada IIC period to be dated about 3500 bc., when both

imported raw materials and pottery from Syria and the southern Levant make their appearance on sites all over Upper Egypt. Although the list of objects appears to be rather long, and despite the extensive looting of tombs which took place already in antiquity, it should be stressed that the actual number of imported goods remains low compared to the number of tombs excavated. The imported objects have mainly been found in richly endowed tombs, although there are a few exceptions. With regards to daily life, the economic relevance of the imports is of course, very limited. None of them served basic subsistence purposes. Their number is far too limited also to consider the development of a particular social class solely associated with the procurement of exotic goods. Their primary importance must have been as indicators of social status. Therefore, the available information concerning foreign goods for the Naqada IIc IIP period, about 3500-3400 cal. bc., can be related to the increasing importance of hierarchies at various Upper Egyptian sites (cf. Bard 1994). It is indeed during this period that an important process of social stratification took place, with the development of local elites, and probably almost simultaneously the appearance of territorial entities, which will grow into proto-kingdoms (Kemp 1989: 3). At the end of the Naqada II period, the paintings from the decorated tomb at Hierakonpolis (conveniently called

1993), which dates to Naqada III, clearly indicate that this elite was not only based on economic grounds, but also manifested itself in a religious and political manner. Foreign goods may well have been part of the expression of political power.

How these goods reached Egypt is still a matter of discussion. Regarding the contacts with the southern Levant, there seems to be enough evidence to accept a land route. It is certainly of importance to note that the earliest tombs at Mushat Abu Omar may already date to Naqada III (cf. Kaiser 1987). Both the location of Mushat Abu Omar in the eastern Nile Delta on the road to Sinai, and the number of imports found there, clearly indicate its importance for Egyptian relations with southern Palestine. Furthermore, the foreign goods are dispersed all along the Egyptian Nile Valley, which might also indicate a route overland to the Delta and subsequently by the river to Upper Egypt.

The Mesopotamian influence recognized in iconographic details of late decorated palettes, carved wares, and cylinder seals does not contradict this chronological framework. Indeed, despite the fact that the provenience of most of these objects is unknown, they are generally considered to date to the early Naqada III period. However, recent evidence from Abydos (Breyer *et al.* 1998: 98–100) indicates that at least a number of them should already be dated to late Naqada II. Only a few stamp- and cylinder seals have been found in tombs of Predynastic Egypt. They date to the Naqada II–III period (Naqada 1863 = Naqada III; 171, Naqada III; 7501 = Naqada III; Medinet 79, 1, 150 = Naqada III; 3161, Mamur 3639 = Naqada III; Naqad 661 7304 = Naqada III; 2). The earliest example of a Mesopotamian motif is the 'master of the animals' from the Naqada III decorated tomb at Hierakonpolis (Gardner 1993: 43, fig. 9). For the same period, Mesopotamian influence has been suggested for some types of pottery, although this seems highly unlikely. Nevertheless, if contacts with Mesopotamia did exist, they did not predate the Naqada III period.

A Mesopotamian connection could, of course, imply contacts over a far larger distance than those with Canaan, and a sea route has often been suggested (e.g. Adams 1992; Marx 1996; Rice 1999). Although the wadi Hammar was already well known to the Egyptians from the beginning of the Predynastic period (e.g. Detsch 1951), and Red Sea shells frequently occur in Badarian tombs (Bai-Yosef Mayer, this volume; Brunton and Clifton-Thompson 1928: 27, 38), this certainly does not automatically imply contact by sea with the Near East. Considering the very limited evidence for Mesopotamian imports, the eventual contacts need not necessarily have been direct. Indeed, if such contacts existed, it should seriously be considered that the southern Levant acted as intermediary between Mesopotamia and Egypt. For all of these reasons, reconstruction of far-reaching Predynastic trading routes (even sea) such as recently presented by Marx (1996) is not supported by the available data.

During the Naqada IIIA–IIIB period imported objects only occur very rarely at the Upper Egyptian sites where they were absent previously, with the notable exception of the elite tombs at Abydos and probably also at Hierakonpolis. Nearly all of the EB I storage jars have been found at Abydos. The Naqada IIIA tomb U-j, which

slightly predates Tomb I, (Breyer *et al.* 1996: 23–6, 29), contained about 30 vessels imported from Canaan – that is a larger number than all of the imported vessels known for the whole of Egypt up to that moment. The estimate of 200 imported vessels from Tomb U-j itself clearly indicate that the contact with at least Canaan had entered a new dimension. On the other hand, the importance of the wine vessels from Tomb I should not be exaggerated. As mentioned before, they contained about 4500 litres of wine, which obviously is a very large quantity, but this only represents the production of a vineyard of about one hectare for a present-day high class wine, and even less for a low quality wine. The maintenance of such a vineyard, even without modern equipment, can easily be done as a side job for a single person. Hence, furthermore, the vessels from tomb U-j came from different regions in Canaan. It is therefore not obligatory to presume the existence of organized wine production in Canaan designated for export to Egypt. In a basic article, Finkelstein and Gophna (1993) demonstrated the strong increase of sites in the highlands of Palestine during the EB I period. They suggest that the increasing importance of horticulture, for which the region is very well suited, was the main reason for this. The mass production in wine and olive oil would have been the ultimate goal. The importance of the highlands starts from the very beginning of EB I, before the Egyptian presence in southern Canaan, and this agricultural specialization is regarded as 'one of the main factors in the rise of the EB complex societies' (ibid.: 13). This development obviously opened the possibility for wine and olive oil to be exported to Egypt. It indeed the growing demand in Egypt for Palestinian products stimulated this development and in the end even became predominant, as is suggested by Finkelstein and Gophna (ibid.: 13, 14). It deserves, however, further confirmation, both for the quantitative importance of the export to Egypt and for the interregional economic structure in Palestine itself.

Nevertheless, a large amount of goods was imported into Egypt during the Naqada IIIA–IIIB period, but apparently for the benefit of the very top of the elite only. Regional centers must have developed by this time, with Abydos and Hierakonpolis as the two predominant ones. The absence of imported goods from other cemeteries, e.g. in the Badari district, could very well be considered as evidence for early regional kingdoms that have taken control over sites which previously had their own independent elite. For as far as we know at present from the archaeological record, Abydos must have played a key role in this process.

The large number of imported vessels can no longer be accounted for by occasional or non-professional contacts with Canaan. On the other hand, the fact that the finds are limited to the tombs of the early rulers at Abydos indicates that these contacts were not a matter of individual free initiative, but were controlled by these early rulers themselves. It is however of great importance to note that for this period a permanent Egyptian presence in Canaan has not been attested. The exact nature of the relations between Egypt and Canaan is not yet clear. It is to be accepted that, for example, Mushat Abu Omar must have played its role as transit place. From the inscribed labels found at tomb U-j, it has been suggested that the Abydos

ulers already had a strong influence on the Delta (Dreyer 1995). However, it remains unclear if this influence would have extended into southern Canaan in order to get hold of the revenues of the region. If not, state-organized trade is to be accepted from the Egyptian side. In that case, the products brought to Canaan by the Egyptians will most probably have been the same as those which will be discussed for the period to follow.

Unfortunately, very little evidence concerning foreign imports is available for the transition period Naqada IIIb–IIIc, where the Dynasty 0 rulers, by then in Nazlet, are to be situated and also for the Aha, first king of the First Dynasty. Their tombs at Abydos have been extremely disturbed and it is only from the time of the Aha that the first large *masaba* (S 3357) at Saqqara is known, which was almost disturbed and yielded no imported objects.

On the other hand, it is for this period, and especially for the reign of Narmer, that an impressive amount of documents has been found in southern Israel. Although the nature of this strong Egyptian presence is still disputed, it is most obvious that the contacts with the southern Levant had enormously increased. Also, there can hardly be any doubt that from the Egyptian side these contacts were state controlled, as is clearly shown by the Egyptian post at Tel Besor (Gophna 1995). One of the most important questions is whether a *temu* should be considered to represent some kind of *temu*. Even the state economy, which will also be very characteristic for the Old Kingdom economy, the possibility for free trade on an individual basis can be excluded. It is not clear whether the Egyptians brought something in exchange for the goods they exported from southern Canaan. Their military power would certainly have allowed them to dominate the region and take whatever they would like. Among the Egyptian objects found in the region are mainly objects used in daily life, such as bread molds and bowls, which are anyhow locally made, and only refer to the Egyptian influence on the way of living. At present, it cannot be confirmed beyond doubt that Egyptians actually settled themselves permanently in southern Canaan, although this seems likely (e.g., Ben-Tor 1991; Ward 1991). This implies that some of the goods which were gathered, for example, Tel Besor, may have been redistributed to Egyptian settlers. The seal impressions from Tel Besor may reflect such activity. On the other hand, they may also have been used for sealing and other administrative purposes concerning goods to be exported to Egypt. In this respect, it is interesting to notice that the sealings were originally considered to have been attached to bags (Schäferman 1978), which, however, has been questioned by van der Brink (1993), who considers at least some of them to have been used for the sealing of jars.

With regard to the possibility of goods brought in exchange to Canaan by the Egyptians, a few observations can be made. Among the Egyptian pottery found in Israel are quite a number of small vessels with narrow openings (Andelkovic 1995, fig. 2a, 4.1, 4.8–9, 10, 11.3–5, 12.4–8, 11–12, 15.3–6, 16.1–8, 19.1, 3.7–11, 17, 20.7, 13–14) as well as cylindrical jars (Andelkovic 1995, fig. 1, 1.8, 12–15, 9.1–4, 15.1–11, 18.8, 19.15–16). The first group belongs mainly to Petrie's types L 58 and Petrie (1921, pl. 1) and his proto-dynastic types 86–88 (Petrie 1953, pl. XXX–XXXV), dating mainly to Naqada IIIa2–IIIc3.

The cylindrical jars were used, at least in the Hezelsicks (1994: 82–4 with further references) and this might also have been the case for the small jars, although this is not their normal function in Egyptian daily life (ibid.: 87). Furthermore, among the imported objects from Egypt, there are several neckties and small stone jars, both also used for amulets (ibid.: 151–2, Yarnet 1953, volume 1). It is possible indeed that the Egyptians brought back to Canaan amulets which were, at least partially, produced from vegetable oil that was originally exported from the same area. If so, this would be one of the oldest examples of a most typical characteristic of colonization, where raw materials are exported from the colony and the products of a superior technology imported. A rough consideration of the number of these vessels is certainly not sufficient to be considered as proof for exchange on an equal basis. On the other hand, if the Egyptians brought agricultural products such as grain, it will be extremely difficult to find archaeological testimony for this. The same is also true for gold, which has also been supposed a possible import from Egypt. In this respect, it is to be noted that the suggested Egyptian provenience of the gold rings found in Chavot-tan context at Nahal Qamar (Aschuler and Tsuk 1996) is only based on guesswork.

All in all, the Egyptians may well have brought a number of things in exchange, but as the dominance of Egypt over southern Canaan is generally accepted during Dynasty 0 and at least the beginning of the First Dynasty (e.g., Ben-Tor 1991; Gophna 1992), it is more unlikely that during this period trade on an equal basis existed.

An exception is to be made for the procurement of lapis lazuli, which could not be taken directly from southern Canaan, but which has to come from northern Afghanistan, far from the Egyptian sphere of influence. From the north-eastern Afghan mountains, through the Haman patent and the Zagros highlands, to the Mesopotamian alluvium, several intermediate sites yielding unworked lapis lazuli fragments and/or processing activities allow us to reconstruct the routes followed by the precious stone (Gard 1997 with further references). During its middle V–VI phase, the southern Mesopotamian Uruk culture established a series of colonies in northern Mesopotamia, notably on the Upper Euphrates (Algar 1993 with further references). Unworked lumps of lapis lazuli have been found at Tell Arpachiyah (Gard 1979: 29–30), an Uruk administrative and religious center in that region, situated about 200 km from the Mediterranean coast. These Uruk urban settlements in northern Syria therefore appear as a potential intermediary between Mesopotamia and Egypt. Some questions, however, remain regarding the chronological correspondence between the Predynastic and Uruk sequences. Most of the Uruk materials are dated to the end of Uruk IV. According to Bealman *et al.* (1992: 63), Uruk IV would be contemporary with Naqada IIIc. If we accept this correlation, the introduction of lapis lazuli would correspond to the later phase of the Uruk culture, which would no longer exist during Naqada III. There are no substantial reasons that different ways were used for the procurement of lapis lazuli during that period. However, a recent revision of the Mesopotamian chronology (Roaf *et al.* 1993) established that the Uruk expansion lasted much longer than previously thought (see Strommenger 1980: 65), spanning

over at least 400 years. Jebel Aruda would be dated to about 4000 (or 'Late Chalcolithic'), thus being contemporaneous with the transition Naqada III.1–III.2. If the foundation of the colonies is to be situated about four centuries earlier, these dates could roughly match the time period when lapis lazuli is attested in Egypt.

Direct contacts between Egypt and the Tinnis colonies have been suggested by Vander Way following the discovery of some terracotta disks (Torstén) and a complete hemispherical pot of the Buto-Madi and Naqadian levels at Tell el-Bazini/Buto. These objects have been interpreted (Moorey 1990, Petje 1997, van der Way 1987, 1992) as evidence for the existence in that part of the western Delta of some wall-mosaics characteristic of Tinnis monumental architecture. However, Falters and Köhler (1996: 98–9), and this volume, convincingly rejected this reconstruction.

Evidence is lacking for a land route for lapis lazuli has so far not been attested with certainty at Chalulithic or EB I–II sites in the southern Levant. Some lapis lazuli beads were recovered in the Nahal Mezerim cave (Kau, Adon 1980, 1990), but the stratigraphic position of these examples is uncertain, as the excavators state, they could belong to the much later Bar Kokkaba period occupation of the cave. The only further information available is the possible presence of lapis lazuli in an EB I A context at Bab el-H-Dara (Schach and Rast 1989: 310), which, however, because of the location of Bab el-H-Dara does not seem a likely indication for a land route to Egypt.

The occurrence of lapis lazuli objects in Minshat Abu Omar is to be noted. The location of this site places it on the land route from southern Palestine on, given the apparent absence of contacts between the Tinnis colonies and the southern Levant, as illustrated by the absence of lapis lazuli in this region, one should also consider the possibility of a maritime route down the Syrian coast to the eastern border of the Delta, then entering Egypt as a branch of the Nile near Minshat Abu Omar. Such a route would avoid the perilous east-west crossing of the Nile Delta postulated by van der Way (1993) in order to reach a western port such as Buto.

Early Bronze II pottery occurs first during the reign of Djer, but considering the lack of information for the preceding reigns, this does not necessarily imply that Djer's reign was contemporaneous with the start of EB II, which could also have taken place a few generations earlier. From the archaeological point of view the beginning of Naqada III.1 and of EB II can be considered contemporaneous.

During Naqada III.1–III.2 imported objects have been found only at Abydos, and at a number of sites in the Memphite region. They are completely absent from other Upper Egyptian sites, even Hierakonpolis. This clearly illustrates the shift of the Egyptian capital to Memphis, which certainly had taken place by the time of Hor-Aha when the first large mastaba for one of the highest officials was built at Saqqara. As a result the old Upper Egyptian sites are becoming more and more of marginal importance, except for Abydos which continues to be used as the traditional royal burial place. When compared to Dynasty II, the number of imports found in non-royal elite tombs is remarkable, and may be proof of the growing importance of administration and, therefore, of the royal court.

It should, however, be noted that the absence for this period of non-royal elite tombs from the archaeological record at Abydos does not necessarily imply that they never existed, especially if one considers how heavily the Abydos cemeteries have been disturbed in the past. Nevertheless, the amount of imported goods in the mastabas of the highest officials at Saqqara clearly is an additional illustration of their importance.

During the First Dynasty there is no evidence at all for contacts with Mesopotamia, either direct or indirect, except for the presence of lapis lazuli, which, however, could also have been obtained through the southern Levant—as already mentioned.

With regard to the EB II imports, the nature of the Egyptian relations with Canaan should be considered once more here. The archaeological material seems to indicate that the Egyptian presence in southern Canaan had become far less important during the First Dynasty than it was immediately before. Narmer is the last king positively identified in inscriptions found in Canaan (van den Brink 1995: 202). The Egyptian outposts in southern Israel and along the northern Syrian coast had certainly been abandoned by the end of the First Dynasty, but probably this happened earlier. The change of the Egyptian–Canaanite relations apparently took place at the very beginning of the EB II period, i.e. during the reigns of the first kings of the First Dynasty (e.g. Beck-Friis 1991: 8, Brandl 1992, Giophina 1992, Petje 1992: 135). This has been explained through the growing strength of the Canaanite cities, eventually in combination with internal problems in Egypt (Giophina 1987). An alternative idea is that the improvements in shipping and navigation released the Egyptians from dependence on southern Palestine for contacts with Syria and Lebanon (Giophina, Marcus this volume, van der Way 1993: 69–70). An additional element for this theory could be the loss of interest in the import of wine from southern Canaan from the moment when the Egyptians developed their own viticulture. During the First Dynasty, the imported pottery seems to have contained primarily vegetal oils and resins, which probably came mainly from southern Lebanon. This at least seems to be indicated by the diminishing volume of the EB II pottery designated for oil, compared to the EB I imports, which would mainly have contained wine. The available analyses of the contents of the vessels also supports this interpretation, although there are still too few analyses to allow definitive conclusions.

Finally, we would like to make a remark concerning the word 'trade' that has been used so frequently when the relations between Egypt and Canaan are discussed. In our present-day world, the word is easily considered to imply both private initiative and the principle of profit. This is certainly not the case for the relationship between Egypt and Canaan as it has been described, perhaps in a colonialist manner, in the present paper. The nature of the relationship certainly changed over time (Hartung 1988), but the idea of 'trade' is especially questionable during the late EB I period, when Egypt considered southern Canaan. On the contrary, even the idea of trade as an exchange of goods with equal value, however this might have been expressed in the late fourth millennium, can hardly be kept without objections. Once again, lapis lazuli is to be mentioned as the most probable

product to have been 'imported' because it comes from a region located far beyond the Egyptian sphere of influence.

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List of Abbreviations

ANEP	<i>Annales du Service des Antiquités de l'Égypte</i>
ASOR	<i>Bulletin of the American Schools of Oriental Research</i>
ASAE of USA	<i>American School of Archaeology in Egypt and Egypt Research Association</i>
DE	<i>Deutsches Museum, Ägypten</i>
EFEO	<i>Égypte Française, l'Institut Français d'Archéologie</i>
EFJ	<i>Egypt Exploration Journal</i>
JEA	<i>Journal of Egyptian Archaeology</i>
JNES	<i>Journal of Near Eastern Studies</i>
MDOG	<i>Mitteilungen des Deutschen Archäologischen Instituts, Ägyptische Abteilung</i>
MDAO	<i>Mitteilungen des Deutschen Archäologischen Instituts, Ägyptische Abteilung</i>
ZAS	<i>Zeitschrift für Ägyptische Sprache und Altertumskunde</i>

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