

4. Neolithisation Processes in North Macedonia and the Struma Valley

The river valleys of the Struma and Mesta initially present themselves as the primary route of diffusion for the Neolithic northwards. While the source of the Mesta/Nestos lies in the Rila Mountains, and the river's passage from its mouth northwards ends as a cul-de-sac in the highlands between Rila and the western Rhodopes, the valley of the Struma presents a corridor open in a north-southerly direction. From the estuary of the Struma in the Thracian Sea to its source in the Vitosha Massif, this river valley provides a natural connection. Together with the course of the Iskar (also fed from the Vitosha but springing from further south in the Rila Mountains), these form the shortest route from the northern Aegean to the Danube. In addition to the SMAB zone which had spread particularly far northwards, the significance of the valley for cultures practising early agriculture and husbandry is thus also demonstrated by its geographical location (Fig. 63).

The Neolithic to Chalcolithic cultural trajectory of the Struma Valley, including the former Yugoslavian and Greek regions, was comprehensively studied by Stefan Čohadžiev (ČOHADŽIEV 2007). He divides the Early Neolithic ceramic trajectory into three developmental stages; these, in turn, are split into further subphases.

4.1. The Upper Struma Valley

Čohadžiev's first phase is presently only attested at the site of Kraynitsi on the northern edge of the Rila Mountains, in the northern section of the Struma Valley (ČOHADŽIEV, BAKAMSKA, NINOV 2007). Characteristic forms of Kraynitsi I, the horizon in question, are conical and half-round bowls, globular pots with straight rims or slightly projecting lips, and tall pots with constricted necks (ČOHADŽIEV

2007, fig. 5). The vessels stand on a simply flattened foot or a slightly raised pot stand (ČOHADŽIEV 2007, fig. 6). Pierced lugs applied to handles are attested (ČOHADŽIEV 2007, 90. – ČOHADŽIEV, BAKAMSKA, NINOV 2007, figs. 7/1; 11/11–12). The fine ceramics are coated with a light red slip which had been smoothed but not burnished. Solely plastic adornments such as fingernail impressions, incisions, or barbotine applications on the vessel body, relief decoration, and dimples on the edges of the lips are attested, while vessel painting, by means of contrast, is not (TCHOHADJIEV, BAKAMSKA 1990, figs. 10–11. – ČOHADŽIEV 2007, 97. – ČOHADŽIEV, BAKAMSKA, NINOV 2007, fig. 11/1–10). Čohadžiev primarily identifies typological parallels to Kraynitsi I in the material from Polyanitsa-Platoto and Divostin. The subsequent levels of Kraynitsi II and III both already belong to Čohadžiev's Phase II, of which white painting on a red-slipped background is characteristic (TCHOHADJIEV, BAKAMSKA 1990, figs. 13, 18–21, 23–24).

Within this phase, Čohadžiev further distinguishes between three subphases on the basis of painted motifs. For his Subphase IIa, he cites Nevestino and Vaksevo I–II. At Vaksevo I, extensive white painting, primarily representing triangular and floral motifs, may, in fact, be found, this being typical for the phase of Anzabegovo-Vršnik Ia according to Garašanin (ČOHADŽIEV 2001, figs. 26/2; 27). At Vaksevo II and Nevestino, zigzag lines, triangles filled with crosshatched lines, rows of dots, and the first spiraloid motifs appear, indicating a parallelisation with Anzabegovo-Vršnik Ib and Ic (ČOHADŽIEV 2001, figs. 21–45. – ČOHADŽIEV, GENADIEVA 1998, figs. 1–2). Following a considerable break in settlement, mound of Vaksevo was resettled during the late period of the Anzabegovo-Vršnik trajectory.

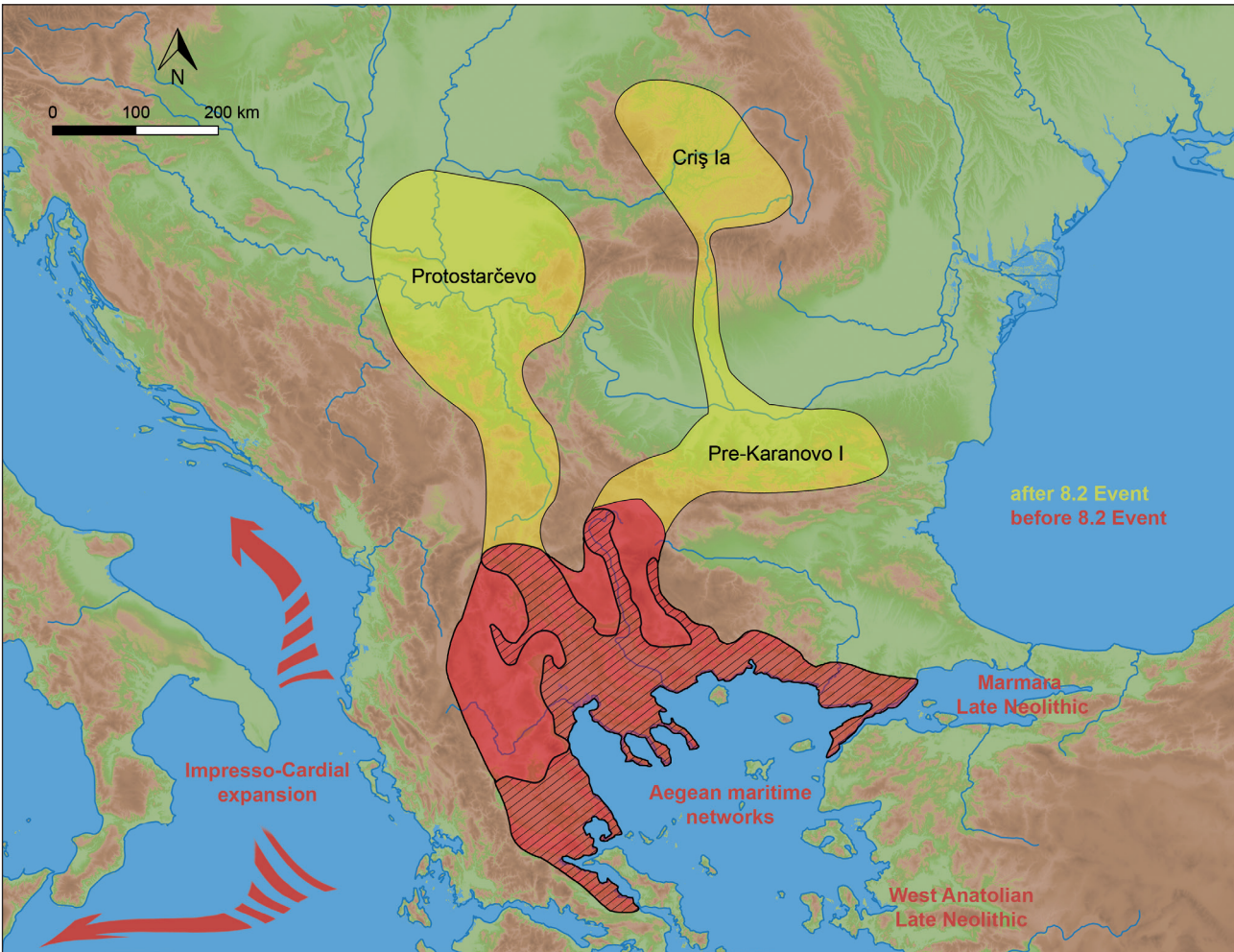


Fig. 63: Neolithisation of the Balkans via the sub-Mediterranean-Aegean vegetation zone during the 8.2 ka event (red). At the end of the first wave of Neolithisation after the 8.2 ka event (yellow), the Proto-Starčevo complex in the central Balkans and the pre-Karanovo I complex (Dzhulyunitsa/Koprivets) in northern Bulgaria and the Criș Ia complex are forming (R. Krauß).

Brown-on-red or brown-on-beige adorned vessels could be overwhelmingly found among the material of Vaksevo III (ČOHADŽIEV 2001, figs. 51–55). Wide spiral motifs predominate, some of these ending in ‘claws’, a leitmotif of Anzabegovo-Vršnik IV. A clear notion of Čohadžiev’s Phase IIb may be gained from the single-stratum settlement of Priboy (ČOHADŽIEV 1986). Here, vessels comprise globular or softly profiled forms with straight-sided or slightly projecting rims. In addition to simply flattened feet, tall, internally hollow vessel feet are preserved, which can also be tripartite. The scarce fragments of painted ceramics display overwhelmingly curvilinear net patterns with white paint. Fragments with dark or polychrome pottery also occur sporadically; the excavator Michail Čohadžiev is nevertheless uncertain whether these are unequivocally to be ascribed to the settlement (ČOHADŽIEV 1986, 44–46, fig. 9). Some

forms from the published material may be quite effortlessly integrated into Anzabegovo-Vršnik II according to Garašanin.

Decisive for structuring the form trajectory of the developed Early Neolithic was the stratigraphy of the settlement mound of Galabnik (PAVÚK, ČOHADŽIEV 1984. – PAVÚK, BAKAMSKA 2021). The site lies in a wide valley split between the foothills of the Vitosha Massif and the Konyavska Planina at the transition to the plain of Radomir in the middle Struma Valley. The excavations over the years 1980–1982 revealed four building horizons, the lowest of which could only be partially excavated on account of groundwater. In a preliminary publication, these stages were summarised as ranging from I to IV (PAVÚK, ČOHADŽIEV 1984), while the final publication works with the individual settlement strata, which are also confusingly designated with Roman

numerals from I to X (PAVÚK, BAKAMSKA 2021). In the following, I refer to the summary numbering of 1984.

At Galabnik, very well-preserved substructures of houses could be documented. These were post-and-beam structures, some of which still had floors made of wooden planks (PAVÚK, BAKAMSKA 2021, 38–66).

The lowest settlement layer Galabnik I yielded white painted ceramics with curvilinear net patterns as is typical for Čohadžiev's Phase IIb (PAVÚK, ČOCHADŽIEV 1984, figs. 5, 7). In Galabnik II, painting with red pigment on a red or light brown clay surface appears in addition to the continued white painting. Fragments are known which have complex spiral ornamentation, extended triangular motifs filled with stripes, and combined patterns of crosshatched bands (PAVÚK, ČOCHADŽIEV 1984, fig. 10). White painting is no longer attested for Galabnik III; in its place, painting with black and brown-black to red-brown pigment appears instead (PAVÚK, ČOCHADŽIEV 1984, 204). The painted motifs reflect the classical repertoire of the phase of Anzabegovo-Vršnik III with groups of parallel lines running vertically down the vessel body and large spiral ornamentations, in the arms of which hatched lines might periodically be encountered. Occurring additionally to these are the "clawed spirals" already indicating Anzabegovo-Vršnik IV (PAVÚK, ČOCHADŽIEV 1984, fig. 12/1). The find horizon of Galabnik IV then shows predominantly sculptural decorations (PAVÚK, BAKAMSKA 2021, figs. 99–100) which are to be connected with Karanovo II in Thrace and Ovcharovo-Gorata in northern Bulgaria. Following Čohadžiev's periodisation, Galabnik II features within his Phase IIIa, and Galabnik III to Phase IIIb. The dark-on-light painting serves as the criterion against which Phase II might be defined (ČOCHADŽIEV 2007, 100–101). All in all, the entire development from Proto-Starčevo to the end of the Starčevo culture can be seen within the tell of Galabnik.

Once again, the transition from pure white painting to dark-on-bright painting can be clearly grasped in Pernik (ČOCHADŽIEV 1983). The settlement was partially unearthed during a rescue excavation in the winter of 1975/76 by M. Čohadžiev, in the course of which he was able to identify four building horizons. The lowest horizon, only excavated in part, of Pernik 0 produced white, red, and black-painted pottery (ČOCHADŽIEV 1983, fig. 30). The painted motifs consist of thin and thick parallel lines and hatched triangles. Almost no typological difference can be discerned within Pernik 1, except that more material could be recovered on account of the larger exposed surface. In addition to the aforementioned motifs, curvilinear nets and large eye patterns are very distinctive (ČOCHADŽIEV 1983, figs. 28–29). St. Čohadžiev parallelised this horizon with Galabnik I in

his Phase IIc, although the dark painting demonstrably occurs prior to this (ČOCHADŽIEV 2007, 91, tab. 7). Essentially no alteration in the painted motifs may be noted between Pernik 2 and the earlier material (ČOCHADŽIEV 1983, figs. 25, 27). The completely reconstructable vessels evidence embossed forms with tapering necks, expansive bowls on segmented hollow feet, and carinated bowls on very high foot structures for the first time (ČOCHADŽIEV 1983, 22–23, 26). During Pernik 3, thin parallel lines forming stacked bands or extensive net patterns predominate among the painted motifs. In addition to red-on-light painting, white painting remains enduringly popular (ČOCHADŽIEV 1983, fig. 20). The completely preserved vessel forms include conical pots and pots with S-profiles, and very sharply profiled, expansive, carinated bowls with a hollow foot bearing chipped decorations (ČOCHADŽIEV 1983, fig. 19). St. Čohadžiev considers Pernik 2 and 3 to be parallel to Galabnik II and III. The form development corresponds to his own phases IIIa and IIIb (ČOCHADŽIEV 2007, 91 and tab. 7). Holger Schubert assumes a confusion of the material due to the precarious circumstances in which it was unearthed, although he proceeds from an incorrect stratigraphic sequence of the horizon (SCHUBERT 1999, 63–67). Nevertheless, the material seems remarkably heterogeneous, although individual forms such as the footed bowls adorned with parallel vertical lines may be associated with Garašanin's phase of Anzabegovo-Vršnik II without any great difficulty. What primarily seems problematic is the presence of white painted sherds in all horizons of Pernik, while the contemporaneous occurrence of white painting with dark-on-light painting is evidenced from multiple sites within the Struma Valley.

The site of Negovantsi near Radomir can help in clarifying the individual painting techniques during the developed Early Neolithic; here, St. Čohadžiev and Aneta Bakamska have identified two strata with white painted pottery and two further levels above these with dark painted examples (ČOCHADŽIEV 2007, 33–34). To judge from the previously published material, the stratigraphy extends from the phase with white curvilinear hatched motifs to that with clawed spirals realised with dark paint and hence from Anzabegovo-Vršnik II to IV (DIMITROV 1996, figs. 5–7. – ČOCHADŽIEV 2007, pls. 18–19).

The end of the Early Neolithic trajectory in the northern Struma Valley is marked by the earliest finds from the Late Neolithic mound at Sapareva Banya in the plain of Kremenik (VANDOVA 2000. – ČOCHADŽIEV 2007, 40–41, 92). Among the few finds presently published may be found the best parallels from the Struma Valley with the material from Ovcharovo-Gorata. Particularly noteworthy here are a channelled beaker on a raised foot (ČOCHADŽIEV 2007,

pl. 48/2), a handled cup, also channelled (ČOHADŽIEV 2007, pl. 48/3) and with a slight foot, and two cups with lugged handles (ČOHADŽIEV 2007, pl. 48/5–6).

4.2. The Middle Struma Valley

The preliminarily published settlement of Kovachevo in the district of Blagoevgrad is of considerable importance to the subdivision of the Early Neolithic pottery in the middle Struma Valley (PERNITCHEVA 1990. – LICHARDUS-ITTEN et al. 2002b). Four building phases, Ia to Id respectively, could be evidenced for the Early Neolithic. Characteristic of the earliest horizon of Ia within the ceramic material are bowls and pots with standing walls and slightly out-turned lips, and also tall, bulbous pots with necks and vertically pierced knobs on the vessel body. The vessels are only red to red-brown-slipped on the outside. A few pieces are also painted white. The proportion of painted pottery within the entire corpus nevertheless comprises no more than 3% (LICHARDUS-ITTEN et al. 2002b, 118). It is highly possible that such a relationship is equally applicable for other sites of the white painted Neolithic pottery. The overrepresentation of painted pottery within the excavation publications is solely the product of the preferential publication of decorated ceramics over the mass of unadorned material which rarely appears in illustrations. The excavators divided the painted ceramics into various stylistic groups from A to I (Figs. 64–71), which were successively replaced and sometimes overlapped for longer periods in the course of the settlement phases (Fig. 72).

Predominant at Kovachevo Ia are simple zigzag patterns, waved bands, and linear motifs accompanied by rows of dots (LICHARDUS-ITTEN et al. 2002b, pls. 17–18). The type spectrum of the subsequent phase cannot be fundamentally distinguished from the earlier pottery. The only novelties are some more sharply-profiled bowls tending towards carinated forms. Painting in white on a red- or red-brown-slipped background also continues to be commonplace. Nevertheless, the frequent motifs now are ladder bands and lattice-filled triangular motifs (LICHARDUS-ITTEN et al. 2002b, pl. 15). Painting in dark brown or red on a lighter-slipped background of the same colour now appears here (LICHARDUS-ITTEN et al. 2002b, pl. 16). The painted motifs of this technique are initially checkerboard patterns. Waved bands and linear motifs also continue to be found. Accordingly, Čohadžiev ascribes the material of Kovachevo Ia and Ib to his Phase IIa (ČOHADŽIEV 2001, 98–99). Curvilinear and spiraloid motifs appear among the white-on-red painted ceramics for the first time during Kovachevo Ic which is parallelised with Karanovo I (LICHARDUS-ITTEN et al. 2002b, pls. 13–14).

Generally, the application of white paint is more extensive than before. The type spectrum transforms so that the majority of vessels now stand on stand-rings markedly offset from the vessel body, where formerly only flattened stands or massive feet were common. Some of the pots now also display a cylindrical neck offset from the body. This corresponds to Čohadžiev's Phase IIb, to which the finds from Krainitsi II and III can also be assigned (ČOHADŽIEV 2001, 91). There may be further transformations within the type spectrum in Kovachevo Id. The previously slight outwards turn of the lips now develops into a definite S-profile. Some forms now display very tall cylindrical stands supporting equally tall vessels. These are bulbous beaker forms from the phases of Karanovo I and II. Nevertheless, proper tulip beakers do not occur in the Struma Valley (in marked contrast to this period's trajectory in Thrace). Continuing to be common is the white-on-red painting with hatched patterns, spiraloids, and linear motifs, which now often extends over the entire vessel body. On account of the still very much predominant white painting, the synchronisation of Kovachevo Id with Karanovo II, as suggested by Marion Lichardus-Itten (LICHARDUS-ITTEN et al. 2002b, fig. 3), is rather uncertain. However, Kovachevo Id may still have to be paralleled with Karanovo I because of the white painting. This is Phase IIc of the Early Neolithic according to Čohadžiev. Thereafter, painting is reported only seldom for Karanovo II, albeit with dark colours. Afterwards, far more frequently, the vessels are decorated plastically, sporting extensively overlying channels, incisions, and perforations. Considering the trajectory in North Macedonia, it would seem that the entire development in painting techniques at Kovachevo occurred within the phases of Anzabegovo-Vršnik Ic and II according to Garašanin. Kovachevo Ia may be parallelised with Anzabegovo-Vršnik Ic on account of the predominance of rows of dots and zigzag bands (LICHARDUS-ITTEN et al. 2002b, pls. 17–18). The net pattern characteristic of Anzabegovo-Vršnik II appears from Kovachevo Ib onwards. Notable, in turn, is the dark-on-light painting, with the difference that the proportion of white painting throughout the entire spectrum of the painted pottery hardly decreases at all, even by Phase Id at Kovachevo (LICHARDUS-ITTEN et al. 2002b, pls. 11–16). Conversely, the stage of Anzabegovo-Vršnik III with black painting and (most prominently) spiral motifs was not reached at Kovachevo. Surprisingly, Lichardus-Itten and colleagues were able to compare very convincingly some painted vessels from Kovachevo directly with forms from Hacilar (LICHARDUS-ITTEN et al. 2006, pl. 2. – see also BRAMI, HEYD 2011, fig. 13). A direct connection of the south-western Anatolian maritime region with

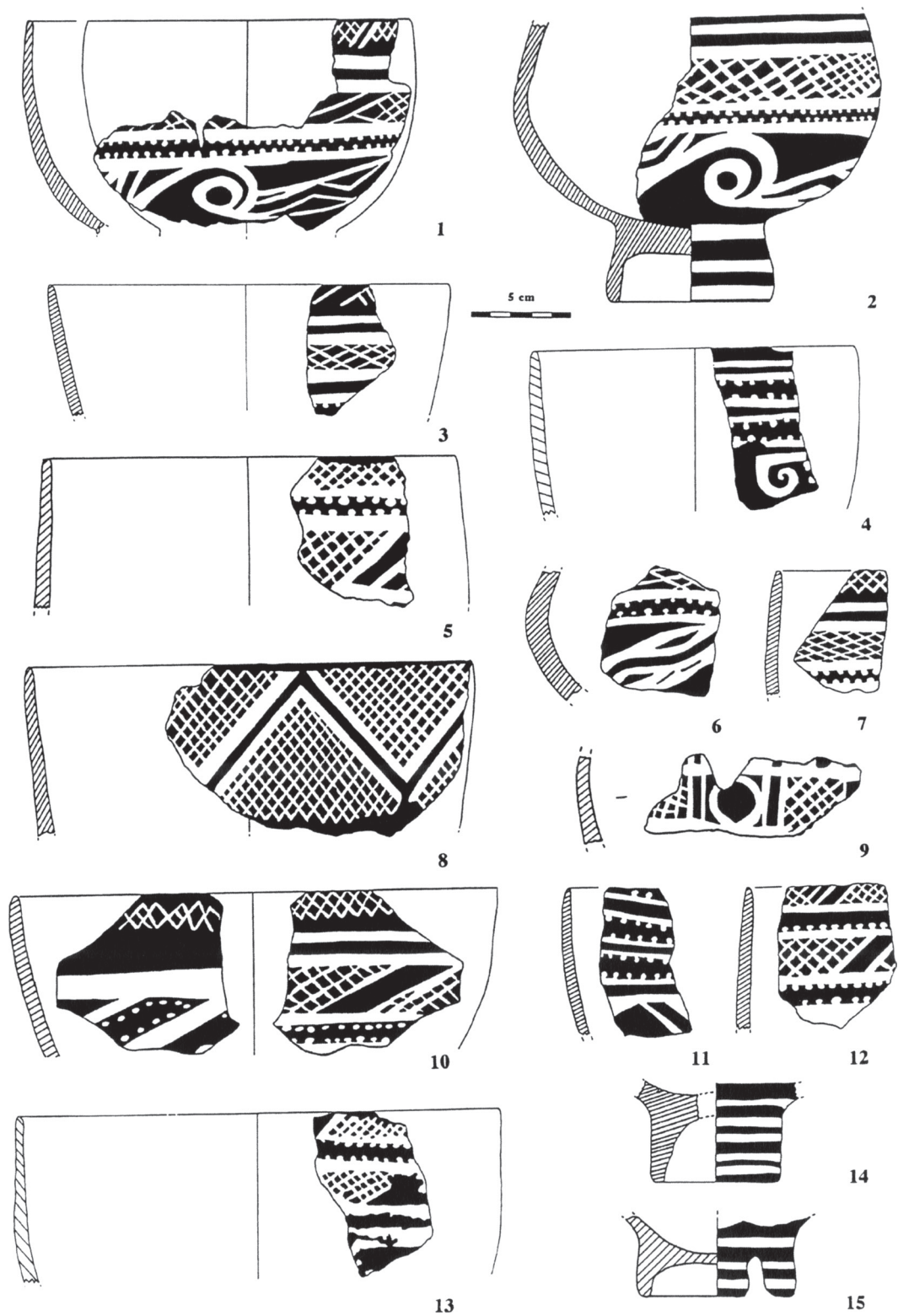


Fig. 64: Kovachevo. Stylistic group A of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 11).

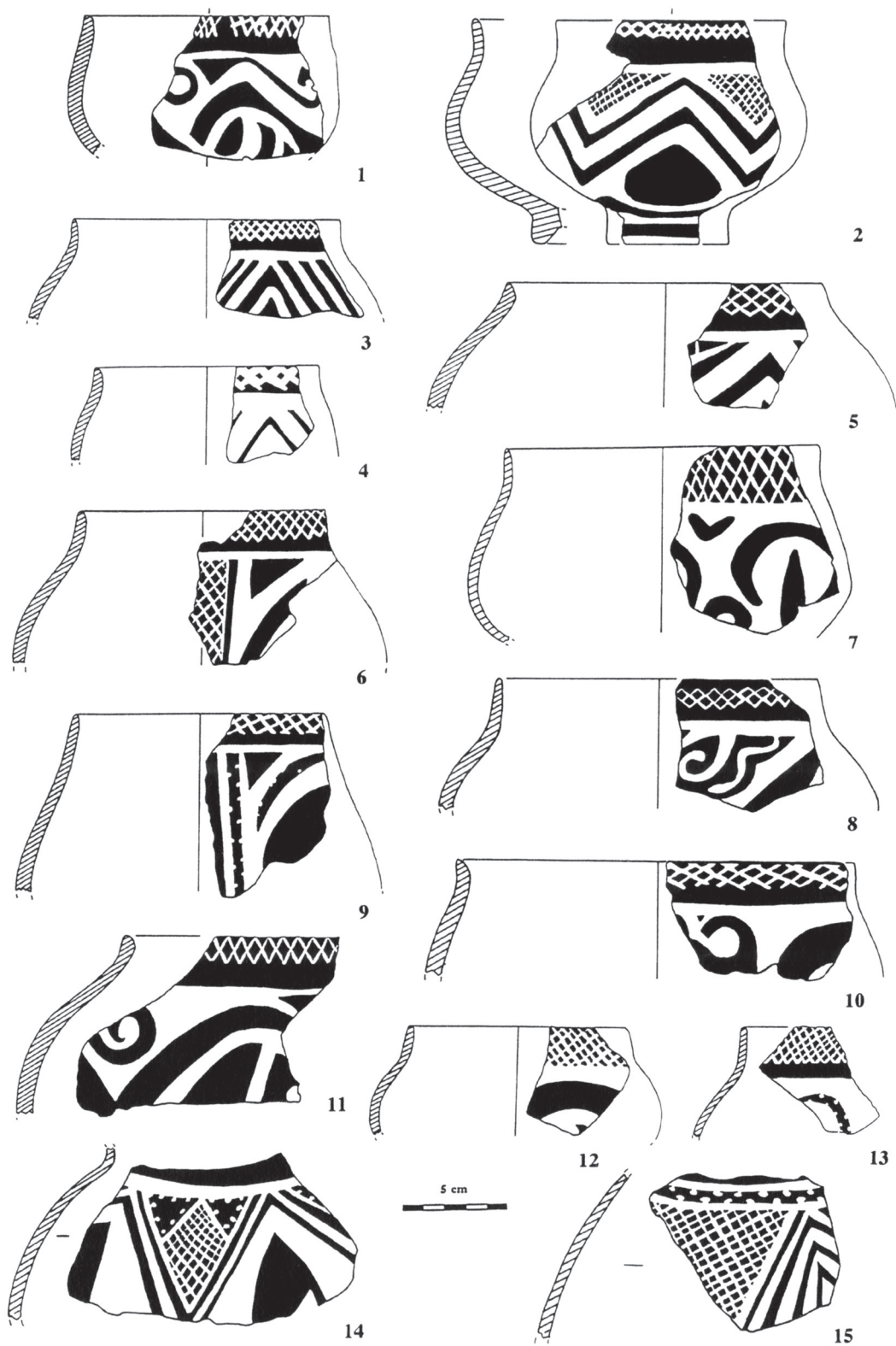


Fig. 65: Kovachevo. Stylistic group B of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 12).

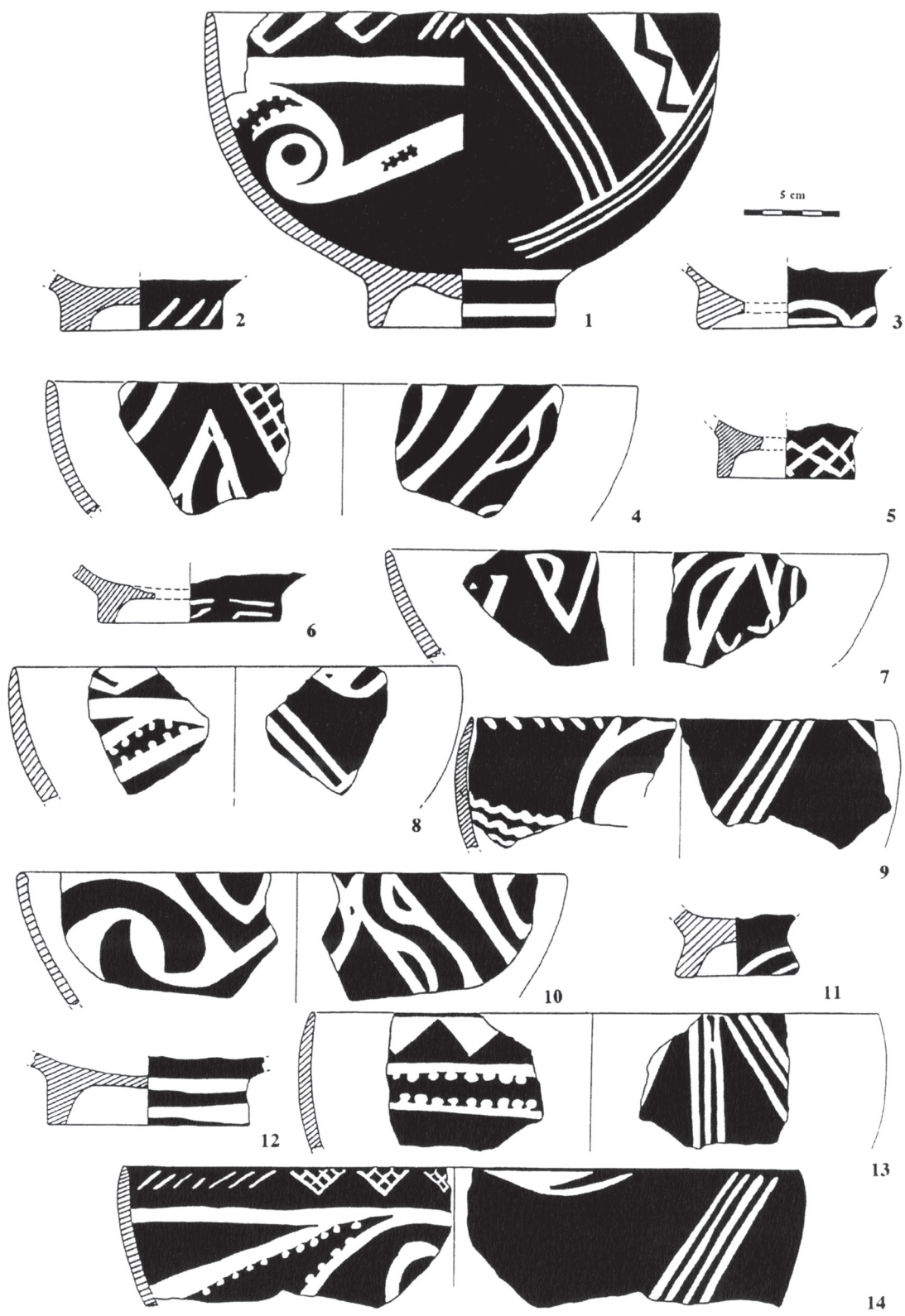


Fig. 66: Kovachevo. Stylistic group C of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 13).

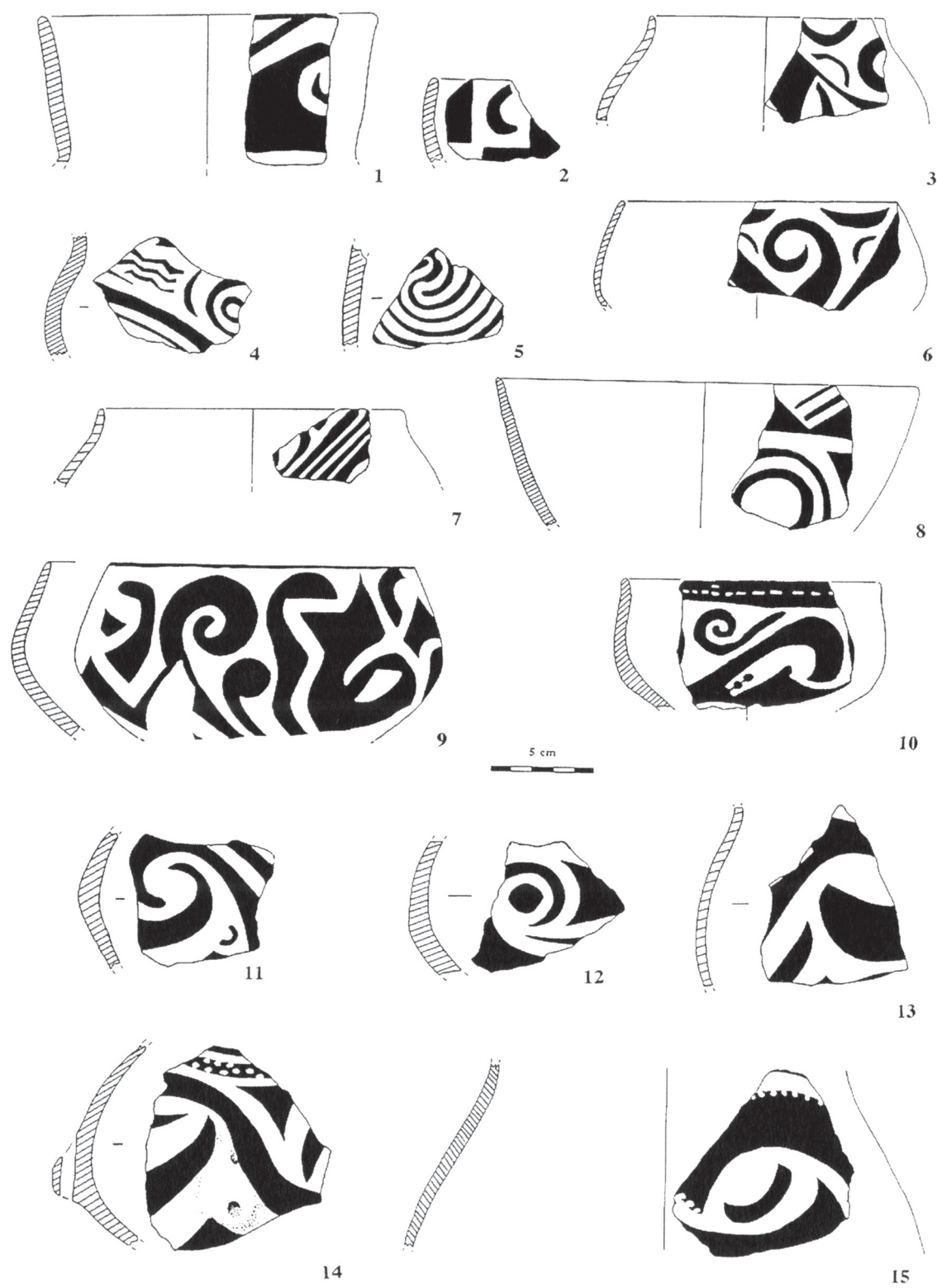


Fig. 67: Kovachevo. Stylistic group D of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 14).

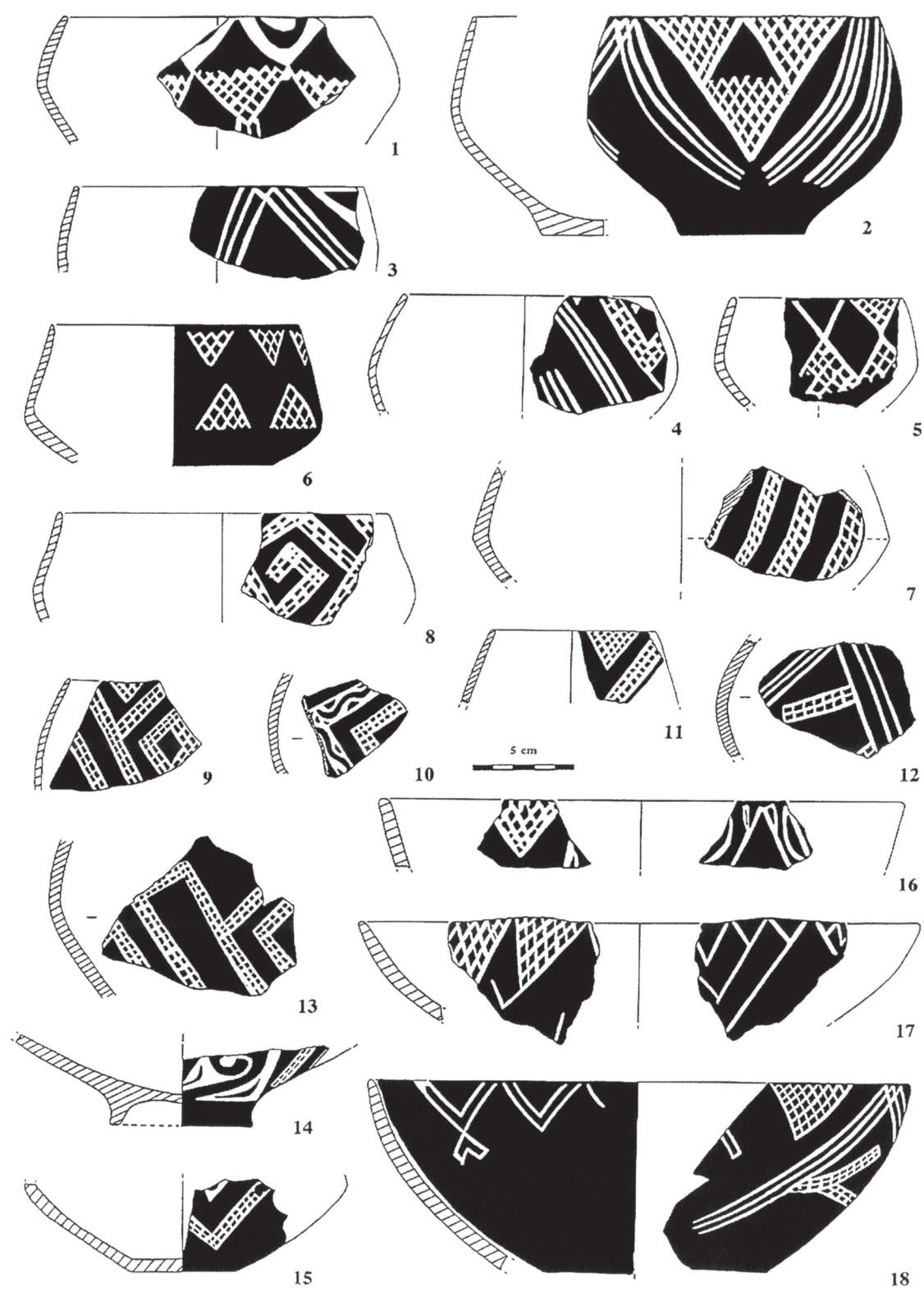


Fig. 68: Kovachevo. Stylistic groups E (16–18) and F (1–15) of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 15).

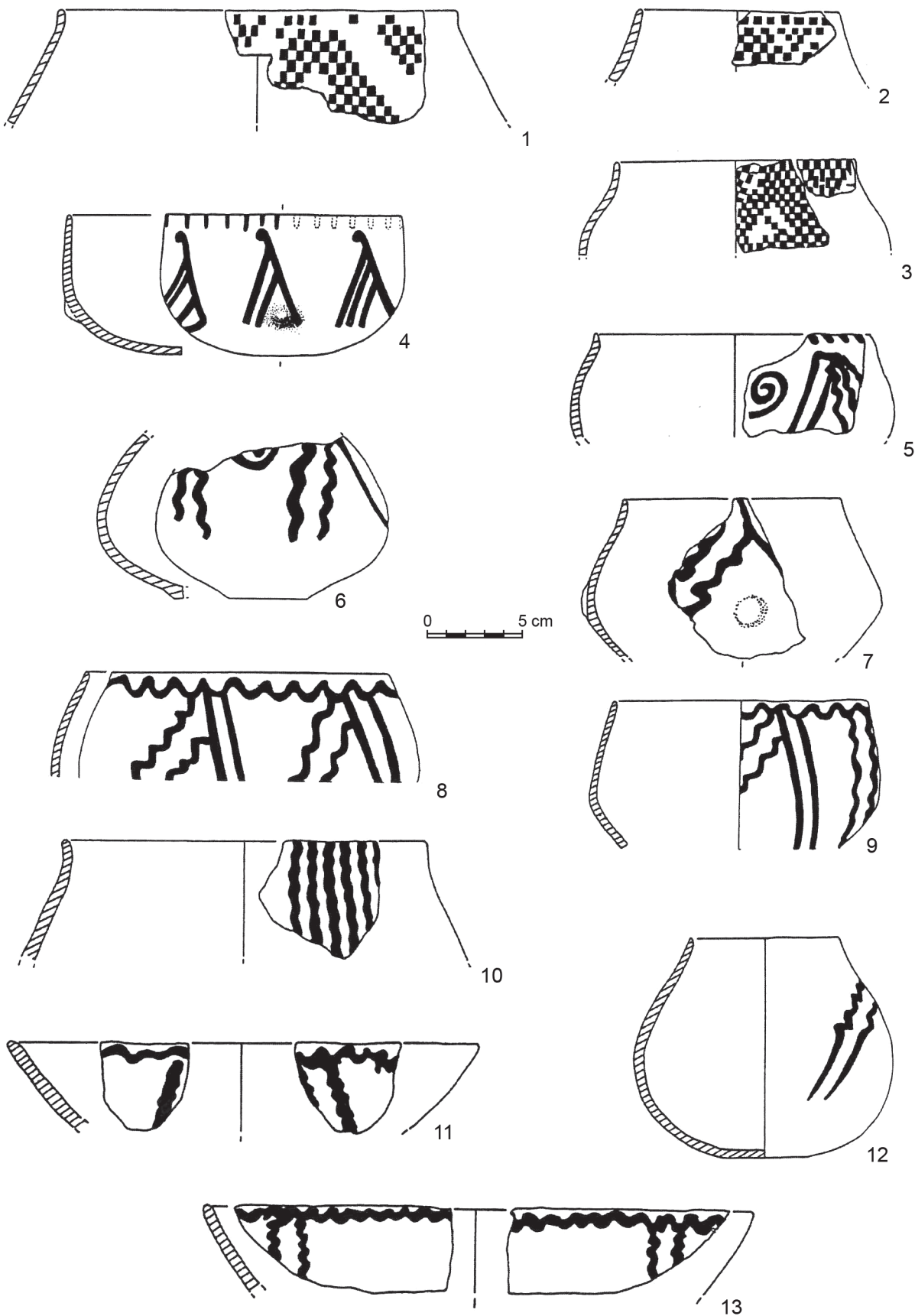


Fig. 69: Kovachevo. Stylistic group G of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 16).



Fig. 70: Kovachevo. Stylistic group H of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 17).

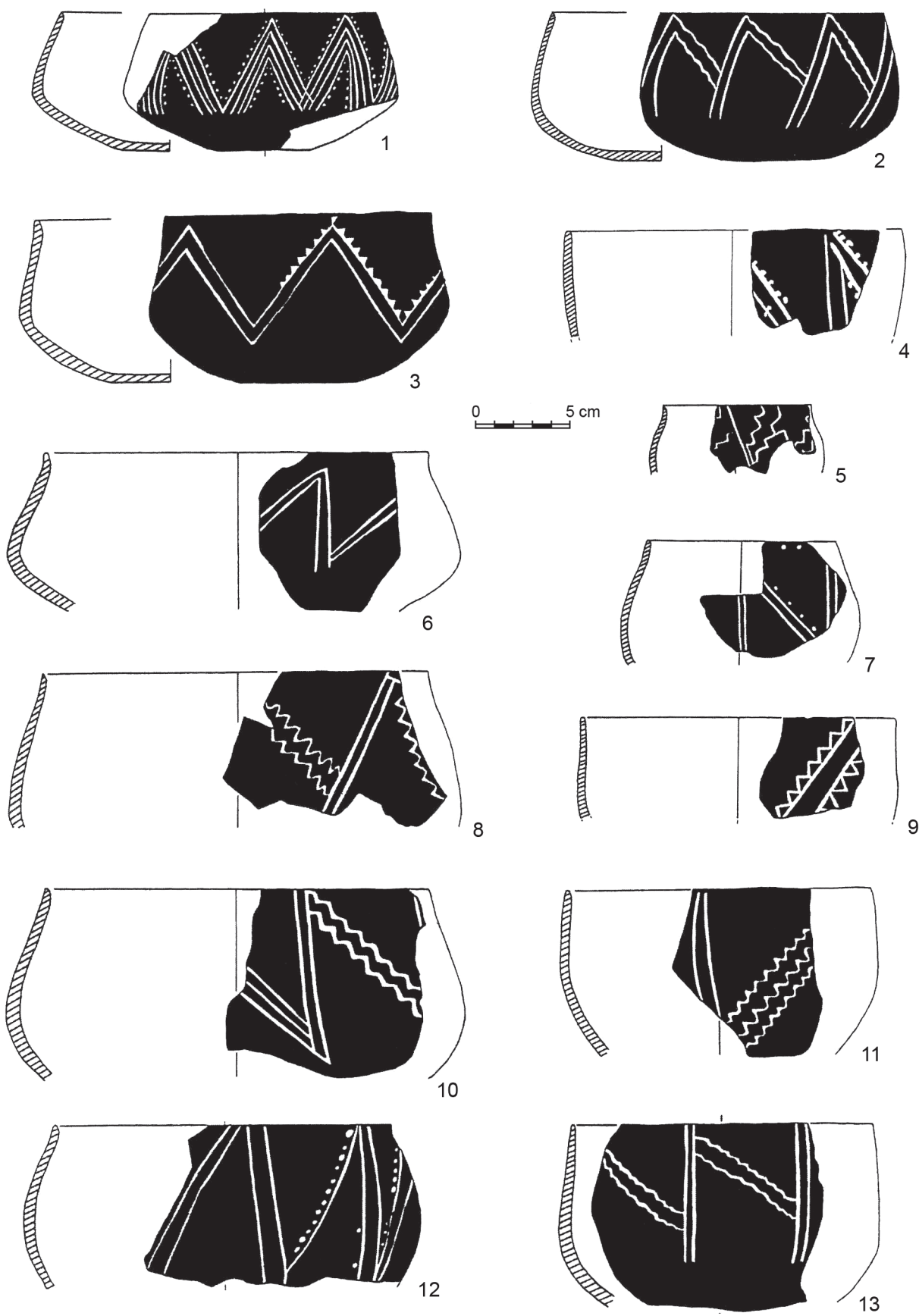


Fig. 71: Kovachevo. Stylistic group I of painted ceramics (after LICHARDUS-ITTEN et al. 2002, pl. 18).

	Stylistic groups of painting									
	I	H	G	F	E	D	C	B	A	
Kovachevo Id								●	●	Karanovo II
Kovachevo Ic						●	●	?		Karanovo I
Kovachevo Ib		?	●	●	●					
Kovachevo Ia	●	●								

Fig. 72: Kovachevo. Sequence of the stylistic groups of painted pottery within the settlement phases (after LICHARDUS-ITTEN et al. 2002, fig. 6).

the Struma Valley is thus demonstrated, this not requiring any transmission via central western Anatolia.

Relevant once more for the late development of the Early Neolithic are the lowest levels of the tells of Balgarchevo, settled well into the Early Chalcolithic (Maritsa culture). The results of the excavations have now been published (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011). Noticeable within the form spectrum of the level of Balgarchevo I (corresponding to the Early Neolithic) are numerous carinated bowls and bulbous vessels with narrow mouths (PERNIČEVA 2002, pls. 1–2. – PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, figs. 4.8–4.9, 4.12). The presence of wide clawed spirals painted with dark colours on a light-slipped background (PERNIČEVA 2002, pls. 3–4. – PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, fig. 4.40–4.42) permit a parallelisation with Anzabegovo-Vršnik IV. The excavators compare, in particular, the painted motifs of Balgarchevo I with Vaksevo III (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, 208), further confirming this parallelisation. Remarkably, however, individual white painted fragments could still be found (PERNIČEVA 2002, pl. 4/1, 4, 7); these serve as additional confirmation that white painting in the Struma Valley was markedly longer-lived than elsewhere within the Balkans. Very few plastic decorations, such as blossom motifs in relief, impressed cordons, characteristic channelled fragments, and perforated and incised motifs (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, fig. 4.25, 4.37–4.38) conversely permit a parallelisation of Balgarchevo I with the developed Early Neolithic in the eastern Balkans, namely Karanovo II, Dzhulyunitsa IV, and Ovcharovo-Gorata.

The subsequent settlement phase of Balgarchevo II cannot be cleanly divided from the earlier settlement within the entire excavation surface. In some cases, the buildings of the later excavation phase are built into those of the earlier

phase. For that reason, the excavators published a considerable amount of material which could belong to either of the settlement phases (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, fig. 4.42–4.47). The ceramics which might be safely ascribed to the phase of Balgarchevo II demonstrate an independent character, with numerous open carinated vessels, globular bowls with strap handles applied on the side of the body, and bowls and plates, some with corners extending into points (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, fig. 4.48–4.78). Many older forms also allowing a connection with Karanovo II may still be evidenced within this phase. The excavators associate Balgarchevo II with Sapareva Banya II and Vaksevo IV (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, 211), with this tantamount to a connection with Karanovo II/III. A few vessel fragments with decorative bands of perforated adornments and an entire series of cylindrical lids with precisely the same perforated decorations (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, fig. 4.66, 4.71) represent a superregional connection with the early Hamangia pottery in the Dobrudja. Predecessors to these specific adorned vessels may be identified in some jug-like vessels and the lid forms from Ovcharovo-Gorata. By means of contrast, the forms from Balgarchevo II are somewhat later.

The horizon of Balgarchevo I and the Early Neolithic finds from Sapareva Banya in the northern Struma Valley are equivalent to Phase IIIc in the periodisation of Čohadžiev and simultaneously mark the end of the Early Neolithic ceramic trajectory of the Struma Valley (ČOHADŽIEV 2007, 92–93 and tab. 7). In respect to the western Black Sea region’s trajectory, only a few correlations with the material from Ovcharovo-Gorata are evidenced (in addition to the aforementioned finds from Sapareva Banya). These pertain to the late phase of the Early Neolithic, should the carinated bowls and vessels with narrow necks from Balgarchevo (cf.

PERNIČEVA 2002, pls. 1/1, 4, 13; 2/8, 10, 12) be considered against types from Ovcharovo-Gorata. A further shared feature is presented by the channelled decoration on some vessels (cf. PERNIČEVA 2002, pl. 4/9, 12). It should also be noted, however, that the earlier phases of IIIa to IIIb are almost exclusively defined by means of painted pottery according to Čohadžiev, whereas entire vessel forms are only seldom considered.

4.3. The Lower Struma Valley with the Plains of Serres and Drama

In comparison to the adjoining regions in the north, hardly any Early Neolithic sites are known from the lower course of the River Struma/Strymon and its estuary. Merely a few fragments of white painted pottery are known from the Toumba of Serron (GRAMMENOS 1984), generally connected by Dimitrios Grammenos and Eva Alram-Stern with Karanovo I (GRAMMENOS 1984, 85. – ALRAM-STERN 1996b, 436), a dating further adopted by Čohadžiev (ČOHADŽIEV 2007, 53–54 and tab. 7). Chaido Koukouli Chryssanthaki, by means of contrast, ultimately considers the finds to be problematic (KOUKOULI CHRYSSANTHAKI 1996, 112–113).

The first secured finds are from the early Late Neolithic originating from the lowest level of the mound of Kryoneri at Amphipolis (MALAMIDOU 2007). These comprise black burnished and so-called black topped ceramics, first known within the Bulgarian portion of the Struma Valley from the period of Karanovo IV onwards (e.g. at Promachon-Topolnitsa [VAJSOV 2007]). The finds from the earliest deposits from the mound of Sitagroi (KEIGHLEY 1986) and Dikili Tash (COMMENGE-PELLERIN, TSIRTSONI 2004) are estimated to be similarly late in date. Inasmuch as the individual finds of sherds with white painting from Dikili Tash may be easily attributed to Late Neolithic wares (TREUIL 2004, pl. VI/1a–b), debate over their purported Early Neolithic age may finally be considered to be concluded (cf. ALRAM-STERN 1996b, 436. – COMMENGE-PELLERIN, TSIRTSONI 2004, 36–37).

4.4. The Neolithisation of the Struma Valley

On account of the absence of sites along the northern Aegean coastal area, the fact that the Struma Valley served as one of the main routes for the neolithisation of the Balkan region has only entered the scholarly sphere reasonably recently. This notion was first clearly articulated by Nikolov (NIKOLOV 1990). The notion of a primary dispersal of the neolithisation via the Struma Valley is nevertheless presently based solely upon the comparison of the ceramic types and their adornments. This idea is perhaps supplemented by the dispersal of Neolithic clay stamps, with this, in turn,

suggesting the connection of Pisidia with central western Anatolia and Thessaly, on the one hand, and with the large central Balkan river systems of the Strymon and Axios discharging into the northern Aegean, on the other (LICHTER 2011, fig. 1). Tellingly, the distribution of Neolithic clay stamps largely omits the Marmara region, once again indicating a barrier function for this region. A form comparison between Kovachevo and Hacilar even suggests direct contacts between Pisidia and the Struma Valley by way of central western Anatolia (LICHARDUS-ITTEN et al. 2006. – BRAMI, HEYD 2011, 183).

Particularly interesting, in turn, is the question as to which structural similarities stand out beyond the related ceramic technologies of the Struma Valley and the southern regions. Nevertheless, the problem of the methodological barrier between Bulgaria and the countries bordering to the south carries considerable weight here. Complicating matters still further is an absence of finds within the northern Aegean coastal zone, most likely due to a shift of the coastline and the heavy sedimentation of the Neolithic strand (LESPEZ et al. 2013). Diagnostic architectural contexts for the period of the earliest Neolithic in the Struma Valley come solely from Kovachevo. The Early Neolithic settlement features are heavily disturbed by erosion, the consequences of an earthquake, and later incursions (LICHARDUS-ITTEN et al. 2002b, 107–108). The freestanding houses possess an approximately quadratic foundation with wall lengths of 5 and 6 m respectively and floors of trampled clay. The upright walls consist of a wattle-and-post construction coated in clay (LICHARDUS-ITTEN et al. 2002b, 108–114 and figs. 5/2; 6/1–2). This manner of house building may be derived from the structures of central western Anatolia, although the characteristic stone foundations are completely absent within the Struma Valley. This can hardly have been due to a lack of accessibility as stone suitable for building material is abundantly present in the region. A particular trampled clay technology is preserved from developed Early Neolithic Kovachevo, described by the excavators as “béton de terre crue” (BTC) (LICHARDUS-ITTEN 2010, 11–15). This comprises a mixture of clay, burnt hut clay, charcoal pieces and carbonate that produces a particularly firm building material following hardening. A post house with multiple rooms is attested from Balgarchevo II (PERNICHEVA-PERETS, GRĘBSKA-KULOW, KULOV 2011, 71–82); this represents an independent type of Balkan-influenced house which, at the very least, cannot be derived from the south.

The discovery of some child skeletons within the settlement of Kovachevo (LICHARDUS-ITTEN et al. 2002b, 116 and pls. 9/1–2; 10/1) and the otherwise complete absence of burial grounds outside of the settlements indicate a funerary

ritual potentially similar to that of central western Anatolia. If nothing else, this might clearly be distinguished from that of the Marmara region as is known from its multiple burial fields.

The spectrum of the butchering waste from Kovachevo reflects an inventory that is typical for the Early Neolithic of the entire broader region with very high proportions of domesticates and low proportions of game. Sheep/goat constitute around 65% of the domestic animals, with domesticated pigs following at 21%. Tellingly, the animal bone specialist not only compares the inventory to that of neighbouring sites in the Balkans, but also to the inventories from the settlements of Nea Nikomedeia and Achilleion in Greek Macedonia and Thessaly respectively (LICHARDUS-ITTEN et al. 2002b, 126). A marked connection with the Aegean is displayed by finds of large marine bivalves such as *Glycimeris* and *Spondylus*, with these already appearing as a raw material in the production of jewellery within the Early Neolithic levels of Kovachevo (LICHARDUS-ITTEN et al. 2002b, 127–128).

The grist residue analyses from Kovachevo demonstrate, at the very least, the normal spectrum of Early Neolithic grain varieties such as einkorn, emmer, barley and durum wheat (LICHARDUS-ITTEN et al. 2002b, 127); this, however, provides support neither for nor against a connection with any of the southerly regions of the ancient Neolithic.

If the environment of the Struma Valley is examined, then it becomes evident that the diffusion of the Neolithic within the Balkans not only shifts from maritime communication to an overland route, but that ship navigation may generally no longer have been the preferred form of movement in the areas north of the Aegean. However, the speed of distribution must be estimated as being very swift, so that it cannot solely be captured by means of the resolution of ¹⁴C data. From a purely archaeological perspective, the neolithisation of the northern coastal region of the Aegean up to the Danube appears as a sudden process occurring without any great chronological depth at some point in the course of the 62nd century BCE. A palaeogenetic investigation of the domesticated bovines by Amelie Scheu was able to prove a doubly strong genetic proximity of the cattle from Kovachevo to Neolithic bovines from Iran in comparison to those from Koprivets on the Lower Danube (SCHEU 2012, 106). Not only were the local aurochs genetically uninvolved in the creation of the Neolithic domesticated bovines, but the latter were, in turn, evidently imported directly from the south-east. It stands to reason that the movement of these bovine herds into the Balkans might be connected to the immigration of specific human populations, as the speed of diffusion and quantities of cattle involved are both greater

than might be supposed for a transfer of the animals through networks of human groups with differing economic modes. If a pre-Neolithic population had lived within the region, then this played no demonstrable part within the transmission of Neolithic cultural elements into the Balkans. Only groups already fully versed in the Neolithic economic model and accompanying their herd animals can plausibly be considered to have been agents in the neolithisation of the Struma Valley.

4.5. The Vardar/Axios Region

Much akin to the Struma/Strymon, the river valley of the Vardar/Axios forms a natural passage from the Thermaic Gulf and the Macedonian Plain to far within the central Balkans. The SMAB zone is particularly pronounced here and encompasses not only the entire river valley including its eastern tributaries but also a good part of northern Pelagonia. The Vardar Valley thus lends itself well to being a route for the dispersal of the neolithisation from south to north. It is hardly surprising that numerous sites settled throughout the entire Early Neolithic period may be found there. The region displays an independent trajectory spilling into neighbouring regions without being significantly influenced by other cultural groups. The Macedonian Neolithic is also of significance to the understanding of the Neolithic form trajectory in the Struma Valley neighbouring to the east, as it is only there that a more comprehensive picture of the settlement processes at the beginning of neolithisation may be obtained.

From 1969 to 1970, Milutin Garašanin and Marija Gimbutas undertook sondage excavations on the mound of Anzabegovo (GIMBUTAS 1976). For some time, the only information initially available on the mound's stratigraphy originated from Gimbutas which was harshly criticised following its publication in a monograph (GIMBUTAS 1976) and must now be fundamentally re-evaluated according to Garašanin's conflicting evidence published afterwards (MILOJČIĆ 1978. – GARAŠANIN 1998). Nevertheless, the final publication of the Yugoslav excavation team is still pending, and this can now hardly be expected to occur considering the decease of almost all of its protagonists. Initially, a four-phase settlement stratigraphy was postulated by Gimbutas. According to her, the lowest level, Anza I, contained globular forms on simply flattened feet or only slightly raised pot stands and various key forms with an extensive red-brown or orange-brown slip. In addition, a few fine ceramic vessels are painted white. The painted motifs are realised over a broad surface; floral motifs and simple linear patterns predominate (GIMBUTAS 1976, figs. 23, 24, 48–49). Some coarse ware vessels

are extensively decorated with crude incisions (GIMBUTAS 1976, figs. 22, 47). The form spectrum of Gimbutas' phase of Anza II largely corresponds to that of the earlier material, albeit supplemented by S-profiled forms and high-set carinated bowls. In addition to the survival of examples of white painting, darker colours such as red or brown are now painted in greater quantities upon a light-slipped surface (GIMBUTAS 1976, figs. 57–58). Painted motifs continue to be applied over a wide surface but overwhelmingly form curvilinear patterns in contrast to the earlier material (GIMBUTAS 1976, fig. 59). Thereafter, the dark-on-light painting with vertical linear patterns becomes wholly characteristic of Anza III. According to Gimbutas, a final level with Vinča material follows during Anza IV (GIMBUTAS 1976, 119–155). Vladimir Miložić's fundamental criticism of the stratigraphy outlined related primarily to the uppermost Vinča layer, but ultimately brought the entire form trajectory as interpreted by Gimbutas into question (MILOŽIĆ 1978. – cf. also PARZINGER 1993, 69–70). While Schubert later principally confirmed the sequence presented by Gimbutas on the basis of his analysis of the painted motifs (SCHUBERT 1999, 51–54), Garašanin all but simultaneously published more precise information on the stratigraphy and form development at Anzabegovo which largely dismantled Gimbutas' system anew (GARAŠANIN 1998). Ultimately, the scheme of the early Starčevo trajectory (already put forward early on by Garašanin) is essentially based upon insights which he had gained from Anzabegovo (GARAŠANIN 1979, 124–129). The underlying system resulting from various stratigraphic observations at different sites has unfortunately never been published by him in any satisfactory manner.

In 1958, Draga and Milutin Garašanin had already begun excavating at the mound of Vršnik, not far from Anza (GARAŠANIN, GARAŠANIN 1958/1959. – GARAŠANIN, GARAŠANIN 1960/1961). While only a few sherds from these finds have been published in black and white photographs, these are sufficiently well described by the excavators that generally reliable information is presented. Nevertheless, the statements are difficult to verify due to the improvised manner of publication. Overwhelmingly predominant within Vršnik I is coarse pottery partially decorated with fingernail impressions and (more rarely) with barbotines. The vessel surface is coloured reddish to brown, and is obviously slipped. Some sherds are additionally painted with white pigment. The succeeding layer of Vršnik II demonstrates similar wares, although the impressed decoration decreases in frequency. A grey, very hard, and burnished ware with polishing traces reminiscent of channelling becomes predominant (GARAŠANIN, GARAŠANIN 1960/1961,



Fig. 73: Anzabegovo, phase Anzabegovo-Vršnik I. White-on-red painted ceramic (after SANEV 2004, pl. I; different scales: 1. h: 12 cm. – 2. h: 10.2 cm. – 3. h: 20 cm).

27). In terms of painting, the white painting gives way to a painting with black, linear motifs on a red background. During Vršnik III, an increase in grey wares over brown wares can be noted. The painted pottery continues to display linear-black patterns upon a red background; additionally, plastic decoration of the coarse wares is introduced. From what might be surmised from the excavators, coarse wares with crude surfaces grey or light brown in colour and a heavily fired and burnished fine pottery of black, brown and, less commonly, red or light colour are characteristic of Vršnik IV (GARAŠANIN, GARAŠANIN 1960/1961, 17–19). Quite evidently some wares are still slipped. Fingernail impressions and, more seldomly, barbotine applications occur among the coarse wares. Incised decorations attested from one vessel (described by the authors as excised adornments) are also worthy of note (GARAŠANIN, GARAŠANIN 1960/1961, 19). Some fragments of the fine ceramics were

painted in a curvilinear fashion with dark paint. Carinated vessels are also mentioned among the forms.

The development of forms at Anza and Vršnik was later paralleled by M. Garašanin, with the essential difference that he transposed Gimbutas' phases of Anza III and IV so that linear dark painting on a light background came to exist prior to dark-spiraloid painting (GARAŠANIN 1979, 87–98). Furthermore, Garašanin's phase of Anzabegovo-Vršnik IV certainly does not reflect Gimbutas' Anza IV, but instead forms an additional level with spiraloid dark painting. In turn, Dragiša Zdravkovski combines vessels from Garašanin's levels of II, III, and IV into a single Anzabegovo-Vršnik III phase. Analogously to Gimbutas, he considers Anzabegovo-Vršnik IV as characterised by Vinča material (ZDRAVKOVSKI 2006). It remains unclear within this apportioning of the find material which manner of painted pottery should then be diagnostic of Anzabegovo-Vršnik II.

According to Garašanin's final subdivision, the Anzabegovo-Vršnik trajectory is constituted as follows (GARAŠANIN 1998): he considers multi-coloured ceramic wares to be characteristic. A few of the sherds are painted with white paint on a red background (Fig. 73). Triangles and floral patterns predominate, while bands of meanders and zigzags occur less frequently. Barbotine and impressed adornments are also only seldom attested. During Phase Ib, step and 'eye' patterns appear, while floral patterns are no longer present. Starting with Phase Ic, grouped dots and zigzag bands are also to be found. A fundamental shift is to be noted from Phase II onwards, where white-on-light painting is gradually replaced by dark-on-light painted wares. Curvilinear net patterns now occur, and a broad channel can also be noted among the plastic forms of surface treatment. Moreover, extensive patterns formed of sharp-edged triangular incisions appear. Perennially common is barbotine adornment, with this now occurring more frequently than impressed decoration. In Phase III, a black ware emerges which was already attested in small numbers during Phase II. The dark-on-light painting technique preserves the curvilinear net patterns, and the first large spiral patterns are also introduced (Fig. 74). Phase IV, the conclusion of the trajectory, evidences 'clawed spirals' as a defining feature of the painted pottery. The coarse vessels might now very often be found with a finger-grooved barbotine.

While the entire trajectory is represented at Anzabegovo, the settlement of Vršnik only begins during Garašanin's Phase Ic (GARAŠANIN 1998, 37). Early material with linear white painting has also been identified at Govrlevo in the south-western suburbs of Skopje (ZDRAVKOVSKI 2006, fig. 1, above). At Rug Bair, the trajectory is initiated in Phase II with dark-on-light and (very rarely) with white-on-light



Fig. 74: Anzabegovo. Impressed and dark painted ceramic. – 1–2. Anzabegovo-Vršnik IIa. – 3. Anzabegovo-Vršnik III. – 4. Anzabegovo-Vršnik IV (after SANEV 2004, pl. III; different scales: 1. h: 12.7 cm. – 2. h: 16 cm. – 3. h: 37 cm. – 4. h: 14 cm).

painting (SANEV 1975. – GARAŠANIN 1998, 37). The late period of Phase IV with an extensive dark painting is further attested at Zelenikovo (GALOVIĆ 1964, 11–29. – GARAŠANIN, SPASOVSKA 1976). Originating from the Tumba Mađari in particular are complete forms of globular beakers on high stands with a dark linear painting and curvilinear net patterns (SANEV 1988, fig. 9. – SANEV 2004, pl. III. – SANEV 2006, fig. IIa–b. – ZDRAVKOVSKI 2006, figs. 4–7) as characteristic of Garašanin's Phase II. The excavations, resumed since 2002 under the direction of Zdravkovski and Elena Kanzurova, unearthed a settlement of at least three layers covering the entire timespan between Anzabegovo-Vršnik II–IV (KANZUROVA, ZDRAVKOVSKI 2011, 140–151).

In turn, the settlement in the field of Na Breg within the locality of Mlado Nagoričane is relevant to the late phases of the Anzabegovo-Vršnik complex. The site lies some few

kilometres north-east of Kumanovo on the road to Kriva Palanka. During excavations in 1986, Zdravkovski was able to identify four settlement horizons, only the lower two of which belong to the Neolithic (ZDRAVKOVSKI 1988). The earlier horizon, Na Breg I, evidences rounded forms, partially on raised hollow feet likened by the excavators to those from the Tumba Mađari (ZDRAVKOVSKI 1988, 46). Some sherds are red-slipped and painted on top with brown paint. The painted motifs are simple and linear, although combined with large spirals. A single fragment further evidences painting with white pigment (ZDRAVKOVSKI 1988, 59 [Nr. 99]). The coarse pottery is adorned with barbotines, impressions, incisions, plastic cordons or bosses, with these decoration types being reminiscent of the plastic ornaments known from Ovcharovo-Gorata (ZDRAVKOVSKI 1988, 55–58), without overestimating the similarities due to the highly fragmented sherds from Na Breg. The phase of Anzabegovo-Vršnik II appears to be attested here on grounds of the painted technique. A grey ware already present during Phase I becomes more prominent in the find spectrum of Na Breg II. Nevertheless, the vessel forms remain essentially the same. Salient is the high quality of the painted pottery, upon which so-called ‘clawed spirals’ may now also be found (ZDRAVKOVSKI 1988, 48), a defining feature of Anzabegovo-Vršnik IV for Garašanin.

The material of the cursorily published sites of Grnčarica, Tumba Stenče, and Kutline (KANZUROVA, ZDRAVKOVSKI 2011, 151–154) may be easily ascribed by means of the sequence of materials in the Tumba Mađari’s stratigraphy. Four bowls from Grnčarica (KANZUROVA, ZDRAVKOVSKI 2011, fig. 23) number among the earliest Neolithic material from the Vardar Valley and might, accordingly, be parallelised with Anzabegovo-Vršnik I. Two bowls from Kutline on raised pedestal, one of these with a vertical channel on its body (KANZUROVA, ZDRAVKOVSKI 2011, fig. 26), belong to the end of the Early Neolithic in the level of Anzabegovo-Vršnik IV or to the earliest Vinča. Another three vessels, also from Kutline, can be assigned to the same period (KANZUROVA, ZDRAVKOVSKI 2011, fig. 27).

It is only in recent years that finds of a Balkan style have been identified at the estuary of the Axios. A settlement of the Middle Neolithic (according to the Greek terminology) was excavated during 1992 and 1993 on land belonging to the international conference centre in the neighbourhood of the Thessaloniki Archaeological Museum (PAPPA 2007, 269–270). Some sherds with linear white painting on a red background may be associated with Garašanin’s level of Anzabegovo-Vršnik I (PAPPA 2007, fig. 29). The presence of a bowl painted with red, linear triangle patterns upon a cream-coloured background (PAPPA 2007, fig. 28) hints

instead at ties with the level of Anzabegovo-Vršnik II, so that a chronological ascription to the transition from Anzabegovo-Vršnik Ic to II might be supposed for the settlement in Thessaloniki.

By means of contrast, the best parallel in Pelagonia may be found in a sherd with a zigzag linear group in white paint on a red background from the settlement of Thermi (PAPPA 2007, fig. 22). The site lies somewhat south-east of Thessaloniki, and was investigated during the years 2000 to 2001 (PAPPA 2007, 263–268). Three settlement phases could be distinguished from the finds which dated to the end of the Early Neolithic and the early and late phases of the Late Neolithic (according to the Greek terminology). The aforementioned white painted sherds belong to the earliest find ensemble. Originating from the early and later phases of the Late Neolithic are black-burnished vessels and the fragment of a white vessel (PAPPA 2007, figs. 23–25) which permit a parallelisation with Garašanin’s phases of Anzabegovo-Vršnik II and III.

4.6. The Maritime Networks of the Aegean and the Neolithisation of the Vardar/Axios Region

Those few buildings of the Vardar zone which have been extensively unearthed exhibit a remarkably solid structure. The settlement plan of the Tumba Mađari displays quadrilateral constructions with surface areas of up to 80 m² (KANZUROVA, ZDRAVKOVSKI 2011, 140–141) (Fig. 75). In the houses’ interior may be found firmly installed circular and quadratic containers (KANZUROVA, ZDRAVKOVSKI 2011, figs. 11, 13), which are currently unique for the Early Neolithic in the Balkans (Fig. 76). These installations most likely hail from the south, and serve as a secure attestation for close contact between the Vardar zone and the Aegean, here certainly through the immediately neighbouring area of Greek Macedonia. Nea Nikomedeia and Servia (cf. PERLÈS 2001, fig. 9/1. – ALRAM-STERN 1996b, fig. 38) may have served as prototypes. Interestingly, the structures of Tumba Mađari do not offer much in the way of comparisons to their rough contemporaries in Thessaly, as the common building style there features mudbricks and often very specific pilasters in the structures’ interiors supporting the roof. Examples of this tradition in construction are presented by the settlements of Otzaki, Middle Neolithic Sesklo beyond the ‘acropolis’, and Achilleion (THEOCHARIS 1973, fig. 179. – GIMBUTAS, WINN, SHIMABUKU 1989, 32–68. – ALRAM-STERN 1996b, fig. 29). If the plan of Anza II is considered, then a direct seaborne connection with central western Anatolia would, once again, seem to exist. A stone foundation for the wattle-and-post wall constructed on top of it is preserved in one building from the settlement (GIMBUTAS

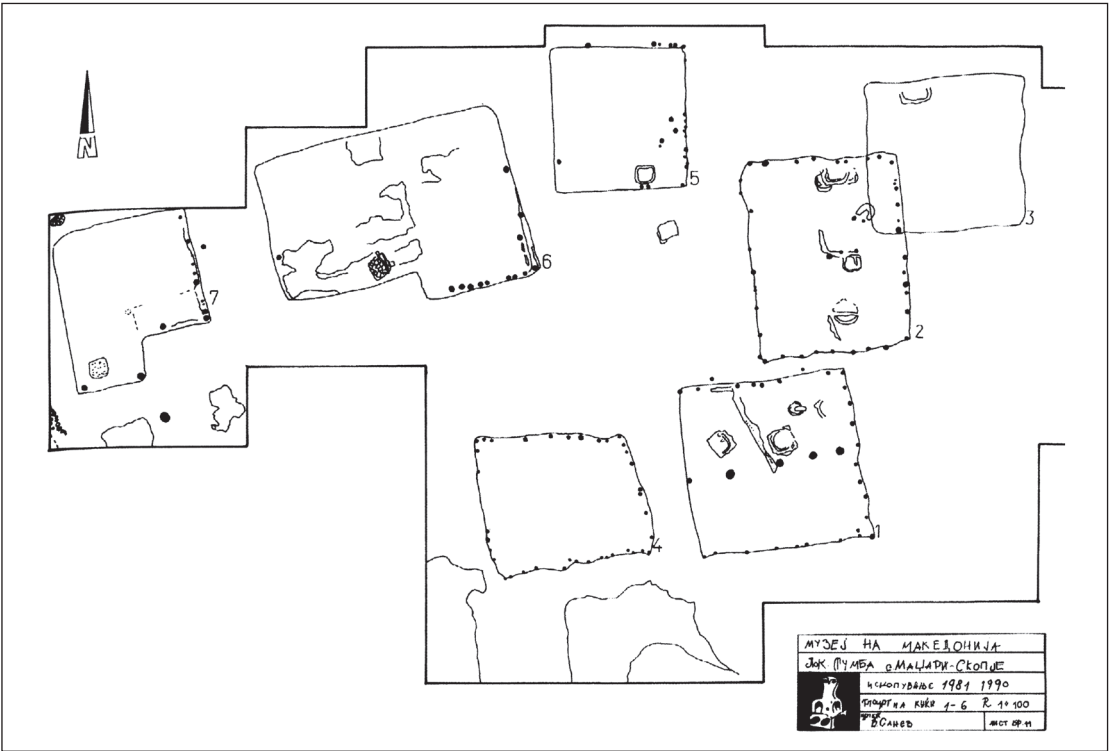


Fig. 75: Tumba Mađari. Ground plan of the settlement (after KANZUROVA, ZDRAVKOVSKI 2011, fig. 3).



Fig. 76: Tumba Mađari. Storage installations within an Early Neolithic house (after KANZUROVA, ZDRAVKOVSKI 2011, fig. 13).

1976, tab. 3); this is reminiscent of the solid structures found in central western Anatolia. Certainly, such an architectural form can hardly be derived from the region as this comprises the region's earliest building feature. Nevertheless, some elements typical of the maritime network of the Aegean are already no longer present on the upper course of the Vardar. For example, there are almost no obsidian tools evidenced there (cf. GIMBUTAS 1976, 257–282). The appearance of the grain and pulse species that are common to the entire Aegean-Balkan zone is hardly surprising, nor is the clear predominance of sheep/goat over cattle and swine among domesticated animals (GIMBUTAS 1976, 300–331). Further attesting to close contact with the maritime networks of the Aegean are, nevertheless, the numerous spondylus artefacts which might already be found in comparatively large numbers in the earliest settlement layers of Anza (GIMBUTAS 1976, 242–251). If the very convincing parallels in the painted ceramics of Sesklo and Hacilar already advanced by Fritz Schachermeyr are considered (SCHACHERMEYR 1976, 47–48. – BRAMI, HEYD 2011, fig. 3), then it is hardly unlikely that Thessaly served as a form of bridgehead for the neolithisation of the Axios/Vardar region from Pisidia. The architectural form rather indicates direct contacts with central western Anatolia. These references pointing in different directions could be associated with the character of the maritime network which may well have exerted influences into the Vardar zone from various differing Neolithic regions in the eastern Mediterranean.

4.7. Pelagonia

The Pelagonian Plain, neighbouring to the west, opens to the south, forming an environmental unit with the plain of Edessa, the southern border of which is only finally delineated by the Aliakmon. Beyond the high mountain ranges west of Bitola and Florina, the area is connected by means of gentle passes to the Albanian banks of Lake Prespa and Lake Ohrid and the plain of Korça. The course of the Aliakmon forms a natural communication route from the Aegean into the interior of the western Balkans. It is only with the mountains of the Albanides lying further west that this coherent cultural sphere is demarcated against the broad Albanian littoral of the Adriatic Sea. With foreknowledge of the cultural stratigraphy of the Vardar Valley, the development of the neolithisation process within Pelagonia and the regions of Lake Ohrid and Lake Prespa can be understood relatively well despite the poor state of the publication of the sites there.

Significant for the cultural trajectory in Pelagonia is, most prominently, the settlement stratigraphy of the Veluška Tumba near Porodin, south of Bitola, just prior to the

Greek border. The excavations from 1971 to 1972 over a relatively large surface area in the centre of the tell yielded four successive settlement horizons (SIMOSKA, SANEV 1975). During the description of finds from the individual levels, unfortunately, the board sigils were confused so that a good understanding of the form trajectory cannot be gained solely from the publication by Dragica Simoska and Vojislav Sanev. Bulbous, softly-profiled forms with extensive white painting are attested as being most prominently characteristic of the early phases of Anzabegovo-Vršnik (SIMOSKA, SANEV 1975, pls. IX–X. – ZDRAVKOVSKI 2006, fig. 1, below; 2). By means of contrast, the more profiled pots with narrow mouth or upright lips seem strange (SIMOSKA, SANEV 1975, pls. VII/1–3; VIII), and it would be highly desirable to learn how these forms relate to the remaining finds in terms of relative chronology; it might be inferred from the text that these already occur in the earliest level (SIMOSKA, SANEV 1975, 59). Also striking are globular vessels with rounded bases and a tall, thin neck with a slightly conical opening (SIMOSKA, SANEV 1975, pl. XIII). The white painting with parallel waved lines on some of these vessels here also indicates an early chronological ascription (SIMOSKA, SANEV 1975, pl. XVII/3–4). A parallelisation is therefore more possible with the earlier phases of Anzabegovo-Vršnik I and II.

Very similar material may be found upon the mound of Porodin, which is not particularly far away. Unfortunately, these finds also cannot be allocated to clear levels. While Miodrag Grbić and colleagues ascribe the material to a single level (GRBIĆ et al. 1960), Harald Hauptmann typologically divides the finds into earlier Starčevo material and a later level with Late Neolithic forms (HAUPTMANN 1967, 5). In terms of vessel types, bowls with angular breaks are present in addition to rounded forms. Nevertheless, white painting appears on both variants in the shape of small parallel W-lines; this points to Garašanin's phase of Anzabegovo-Vršnik I and, more precisely, to Subphase Ic. Also present (albeit more rarely) is pottery with dark painting which is hardly chronologically diagnostic. Akin to the Veluška Tumba, the carinated and sharply profiled forms at Porodin are remarkable, being entirely unknown during the Early Neolithic of the northern Balkans. By means of the Struma Valley (neighbouring to the east), a connection may be established stretching to the region of the Maritsa's estuary in Thrace, as pottery forms with similar breaks occur within the earliest material from Kovachevo and Hoca Çeşme alike. If it is possible to exclude a chronological difference with the earliest materials north of the Balkan Mountains, then this must pertain to a cultural distinction between north and south.

On the eastern side of the Pelagonian Plain, further Early Neolithic finds were made at the village of Topolčani in the

field of Čuka, initially by means of rescue excavations (KITANOSKI 1977) and later by means of regular investigations (KITANOSKI, SIMOSKA, TODORVIK 1978). Three settlement phases could be distinguished. The earliest phase of Čuka I displays softly profiled forms on simple flattened bases or only slightly offset stand-rings. Typical are globular bowls and pots and vessels with constricted necks. The surfaces are slipped with coloured clay, and the coarse pottery covered with barbotines. Among the sherds pictured within the first preliminary report are two pieces with the remains of white painting on a red background (KITANOSKI 1977, 36, nos. 33–34). Further fragments with white painting were later found within the regular excavations (KITANOSKI, SIMOSKA, TODORVIK 1978, figs. p. 14). Moreover, small studs on the vessel body, circumferential rows of pricks, and dimples on lips are all evidenced as decorative forms. From Phase II onwards, carinated forms appear while the earlier forms also continue to endure (KITANOSKI, SIMOSKA, TODORVIK 1978, figs. pp. 16, 18). In addition to a red-slipped conical bowl with white painting, a fragment with red-on-red painting, and another with dark paint on a red background were identified (KITANOSKI, SIMOSKA, TODORVIK 1978, 19). In Čuka III, S-profiled forms and vessels with cylindrical necks similar to the jars of type group K1 at Ovcharovo-Gorata were discovered. Here, painting yields entirely to the plastic decoration of vessels. As previously, barbotine applications on coarse vessels remain common. Alongside these may be found plastic applications in the form of blossoms, as previously known from Ovcharovo-Gorata (KITANOSKI, SIMOSKA, TODORVIK 1978, figs. pp. 20, 48). By means of the presence of white painting and the absence of dark painting at Čuka I, this phase may be ascribed to the level of Anzabegovo-Vršnik I according to Garašanin. Čuka II may be attributed to Anzabegovo-Vršnik II through the joint occurrence of white-on-red, red-on-red, and dark-on-red painting. The appearance of carinated forms can also be observed during this period, a phenomenon which cannot be stratigraphically assigned in either Veluška Tumba or Porodin. Čuka III still possibly occurs within the bounds of Anzabegovo-Vršnik II, although the absence of painted pottery renders any more precise parallelisation difficult. In superregional terms, the form spectrum and plastic decoration of the vessels could also indicate a connection with the horizon of Karanovo II and Ovcharovo-Gorata.

North of Prilep, the single-level settlement site of Radin Dol also belongs to this chronological horizon (KITANOSKI, SIMOSKA, TODORVIK 1987). Decisive for its parallelisation with Čuka III are S-profiled forms, and the appearance of cylindrically-necked vessels. The presence of a tall, hollow vessel foot (KITANOSKI, SIMOSKA, TODORVIK 1987,

pl. I, above right) also indicates a connection with the late Starčevo trajectory, on the one hand, or with the horizon of Karanovo II/Ovcharovo-Gorata, on the other. The decoration of the pottery there with dimples upon the vessel lips seems (much as in the Banat, see Chapter 8.7) not only to be characteristic of the earliest ceramics (KITANOSKI, SIMOSKA, TODORVIK 1987, pl. IV, above), but also evident well into the later Starčevo trajectory.

4.8. Eastern Albania

Comprehensive information about the Albanian regions is supplied in the summaries by Muzafer Korkuti and Petrika Lera (KORKUTI 1995, 32–58, 90–93 and LERA 2002). The sites of Podgorie, Vashtëmi, Barç, and Dunavec in the plain of Korça, and the settlement of Rajcë on the western bank of Lake Ohrid are closely linked with the Early Neolithic trajectory in the Macedonian sphere.

At the settlement of Podgorie, Lera and Frano Prendi initially published the collection finds from a later so-called Trench A. Later excavations by Prendi and Zhaneta Andrea in Trench B enabled a subdivision of the cultural deposits some 3.20 m in total depth into three levels. Characteristic of Podgorie Ia is red-slipped pottery with white painting, red painting on a white background, polychrome ceramics, and impression-decorated wares (KORKUTI 1995, pls. 6, 7, 8/1–6. – LERA 2002, pls. 3–4). Barbotine pottery first appears in Podgorie Ib. A decline in painting technology might ultimately be observed in Podgorie Ic. Detailed information is only available from Trench C, evidently located on the settlement's periphery, in view of the fact that Korkuti was only able to unearth two other Early Neolithic settlement levels, these corresponding to Podgorie Ia and Ib in Trench B. The ceramic spectrum comprises monochrome red-slipped, monochrome grey-black, and painted pottery respectively. The lattermost of these technologically corresponds to that of the red-slipped ware, and is adorned with white paint. More seldom found in this area is also pottery with red painting on a white background. A typological difference between the earlier and later material noticed by Korkuti is in the quality of the pottery, which is initially monochrome and glossy, and later only matt or slightly glossy. In terms of the painting, a strident white first occurs, replaced afterwards by matt paint. The plastic-adorned wares such as those with barbotines or impressions seem to increase in number in the later levels. A more precise subdivision of the materials, for example by means of painted motifs, was not undertaken. Pottery was painted in white with stair patterns, W and zig-zag motifs, and patterns characteristic of Garašanin's phase of Anzabegovo-Vršnik I (KORKUTI 1995, pls. 6–7). The few vessel forms published are bellied with slightly out-turned

lips and an only slightly offset stand-ring (LERA 2002, fig. 4/1; 4/3). According to the periodisation of Korkuti, the overlying level of Podgorie II belongs to the Middle Neolithic. The form spectrum now expands considerably. Different bowl and pot forms, lids, and different forms of handles (among these simple pierced lugs and tap-like grips) are attested (KORKUTI 1995, pl. 65. – LERA 2002, fig. 5). It is only in this stratum that distant connections with the horizon of Ovcharovo-Gorata may be evidenced, in light of which, the entire trajectory with the vessel painting of phases Podgorie Ia–c would seem to be older.

At the settlement of Vashtëmi, three Early Neolithic layers could also be distinguished, these yielding similar find material (KORKUTI 1995, 41–57). Here, a red-slipped pottery also predominates, of which some specimens display white painting. More rarely encountered is painting in a wine-red colour on a white or ochre-coloured background. Monochrome-grey-black ware is also encountered. The plastic decorations attested include impressed and incised adornments, barbotine, and rows of applied bosses and notched cordons (KORKUTI 1995, pls. XII–XV). The actual distribution of the aforementioned wares within the levels ascertained remains, nevertheless, obscure. Connections to Podgorie are demonstrated by the white painting. On the other hand, the intensified penchant for plastic decoration of the vessels would clearly prove Vashtëmi's survival beyond the close of Podgorie I.

Due to the red-slipped ceramics with white painting, Korkuti further associates the settlements of Barç and Rajcë with Podgorie I (KORKUTI 1995, 57–58, 90–91). Nevertheless, he notes the scarcity of the white painted ware: this is of no small significance for an archaeological exposure of some 228 m² in dimensions. This could possibly be understood as an indication of a somewhat later chronological ascription, although the published vessel forms are less than diagnostic in this regard (KORKUTI 1995, pl. 118).

The find horizon of Podgorie II is most prominently well attested in the centre of the Korça Plain at the site of Dunavec (KORKUTI 1995, 95–134). Two representative settlement phases could be distinguished at the site. The earliest phase of Dunavec I comprises two domestic horizons, the older of which evidently belongs to a settlement of pile-dwellings, the later one meanwhile yielding ground-level domiciles. The find material of both horizons was published together. In addition to rock hatchets in various stages of completion and use, the damp soil conditions also preserved bone, horn, and antler tools (KORKUTI 1995, pls. XXII–XXVI). The pottery from Dunavec I evidences bowls which had rounded, slightly carinated sides or were straight with conical sides, as well as bulbous pots with offset cylindrical or funnel-shaped edges,

flat basins, and vessel forms on tall cylindrical pot stands (KORKUTI 1995, pls. 32–39).

Also attested are bulbous vessels with offset cylindrical necks or conically tapering mouths. In terms of decoration, vertical or oblique channelling of the vessel body or the shoulders of pots may be evidenced, in addition to studied and impressed adornments on the break of carinated forms, zigzag lines, and fingernail impressions on coarse pots (KORKUTI 1995, pls. XXXI–XXXIII, XXXV, 32/7; 33/3, 5–10; 34; 38/8, 10). A few fragments are painted with linear patterns in a grey colour (KORKUTI 1995, pls. XXX–IV, 32/1–3; 33/4).

Dunavec II's upper bundle of levels can be divided into three residential horizons, defined according to their preserved structures. Once again, however, the find material originating from here was presented together. This describes a further development of the forms from Dunavec I. Among the earlier bowl forms that continue to survive may also be found bowls that have sweeping funnel rims. A stronger profiling of the forms is generally to be noted (KORKUTI 1995, pls. 43–47). In terms of vessel decoration, the typical double cordons further develop into a motif resembling a coffee bean. These may be found on the vessel body or at the break of carinated forms. This area can also be highlighted by means of impressions, simple knobs, warts, or plastic rings (KORKUTI 1995, pls. XXXVIII–XXXIX). The incised decoration is now very finely accomplished, and includes complex patterns of net-filled triangles (KORKUTI 1995, pl. XLI). Also commonplace are the expansive channelled decorations and the covering of vessels with barbotines (KORKUTI 1995, pls. XL, XLII–XLIII). Painting is now found in matt wine-red colour on a grey-greenish background, red-brown on a wine-red background, or in grey colour on a black background. The painting motifs are simple parallel line patterns combined with triangles painted in the open spandrels (KORKUTI 1995, pl. XLIV).

4.9. Summary of the Neolithisation of North Macedonia and Eastern Albania

It should hence have become evident that a comparable form spectrum emerges within the entire zone of the southern Balkan region during the developed Early Neolithic; this indicates more intensive contacts stretching from the western Balkans to the Black Sea over the course of the first half of the 6th millennium BCE. Admittedly, these contacts only develop after the neolithisation, and are based upon long distance communication between the individual groups. When the highly contoured landscape divided by the high mountains of (most prominently) the southern Balkan zone between the Albanian Alps (Prokletije), North Macedonia,

Rila, Pirin, the Rhodopes, and the Balkans is taken into consideration, then these contacts are quite astonishing.

From the 57th century BCE (at the very latest) onwards, a remarkable mobility within this region must ultimately be inferred, with this having developed entirely independently from the 'old' maritime networks of the Aegean. Initially, only the zone of the Vardar is affected by the primary neolithisation, together with Pelagonia via the plains of Aliakmon. The point of departure seems to be the SMAB zone encompassing the entire river valley. The area of the great Macedonian lakes further west seems, by means of contrast, only to have been neolithised at all during the first centuries of the 6th millennium BCE. Similar to the Struma Valley, the original impetus for neolithisation emerges from the maritime networks of the Aegean, and might still be charted with great clarity. In addition to the comparison of ceramics, important evidence of this is to be found in the architectural features from Anza II and from the Tumba Mađari, as well as the commonplace use of spondylus originating from the Aegean for jewellery manufacture.

As is also the case for the neighbouring valley of the Struma to the east, the question as to the transmitters of the Neolithic into the Vardar zone and Pelagonia must be addressed. It is scarcely conceivable that the first herds of sheep, goats, and cattle reached the interior without herds-men and solely by means of exchange. The appearance of a comprehensive Neolithic package encompassing cultivars, domesticated animals, and highly developed pottery and building techniques can only be explained by means of the immigration of a population group already operating entirely according to the Neolithic model. While this population must have arrived from overseas, it is remarkable how, in such a short space of time, the Neolithic, while now confined to land routes, was still able to travel down the narrow river valleys of the highlands. Any potential trace of a pre-Neolithic settlement of Greek Macedonia, North Macedonia, and eastern Albania remains, as yet, undetected, meaning that such settlement either never existed or (more likely) played almost no archaeologically tangible role in the primary expansion of the Neolithic into this region.