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EARLY SLAVS' PRODUCTION AND SUBSISTENCE ACTIVITIES CASE STUDY – THE AREA OF THE UPPER TISZA RIVER BASIN (CA. SECOND HALF OF THE 6TH CENTURY – FIRST HALF OF THE 7TH CENTURY AD)

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Abstract: The geographic area broadly corresponding to the Upper Basin of Tisa delineates the north-eastern extremity of the Carpathian Basin, which has given the evolutions taking place there over time specific characteristics. Regardless of the historical period, this area has been a connecting space between the regions north of the Carpathian Mountains and territories situated in the direction of the Superior Danube, but mostly the entire Tisa Plain and the Transylvanian Basin towards the south-east. There are many settlements that can be dated roughly to the second half of the 6th century and the first half of the 7th century, alongside some funerary discoveries. However, there are few sites that were investigated extensively, at least according to current publication records. The inventories of the dwellings and of the few reported graves are lacking in diversity as handmade pottery is the norm. The current examination offers indirect proof of the agricultural activities and the domestic crafts that were undertaken there at the time, which were potentially connected to a certain degree of specialization in tool and iron utensil production, and the manufacturing of the raw matter this required. A simple, autarchic economic model can be reconstructed from the data as there are few indications of external contacts – thus, a model similar to the one commonly attributed to the Slavs of that period.

Keywords: *Specific artifacts, structures with economic or mixed functions, soil working, animal husbandry, household production.*

GEOGRAPHICAL BACKGROUND

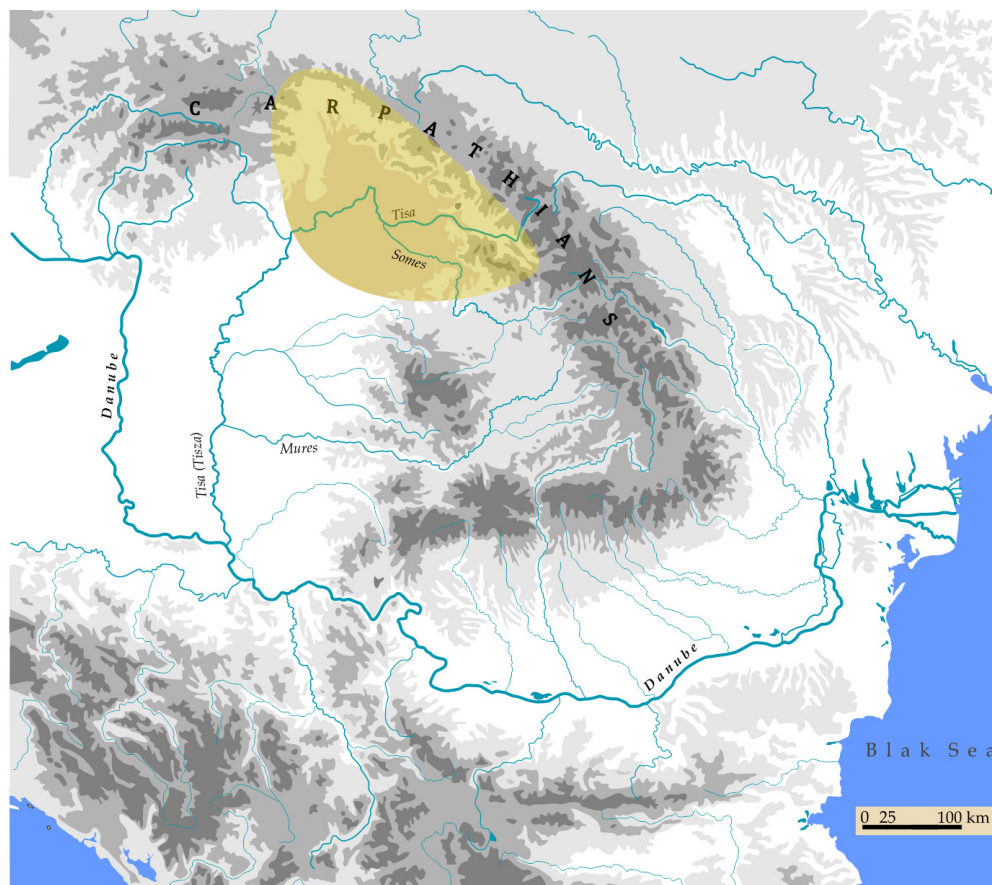
The upper Tisza region is located on the north-eastern periphery of the Carpathian (Carpathian – Danubian) Basin, an area currently divided by the frontiers of four modern states. A very precise geographic delimitation is not possible, however, this territory was centred on the upper segment of the Tisza River and its tributaries, being bordered by the north-eastern bent of the Carpathians.¹ The local landscape characteristics and the diversity of the

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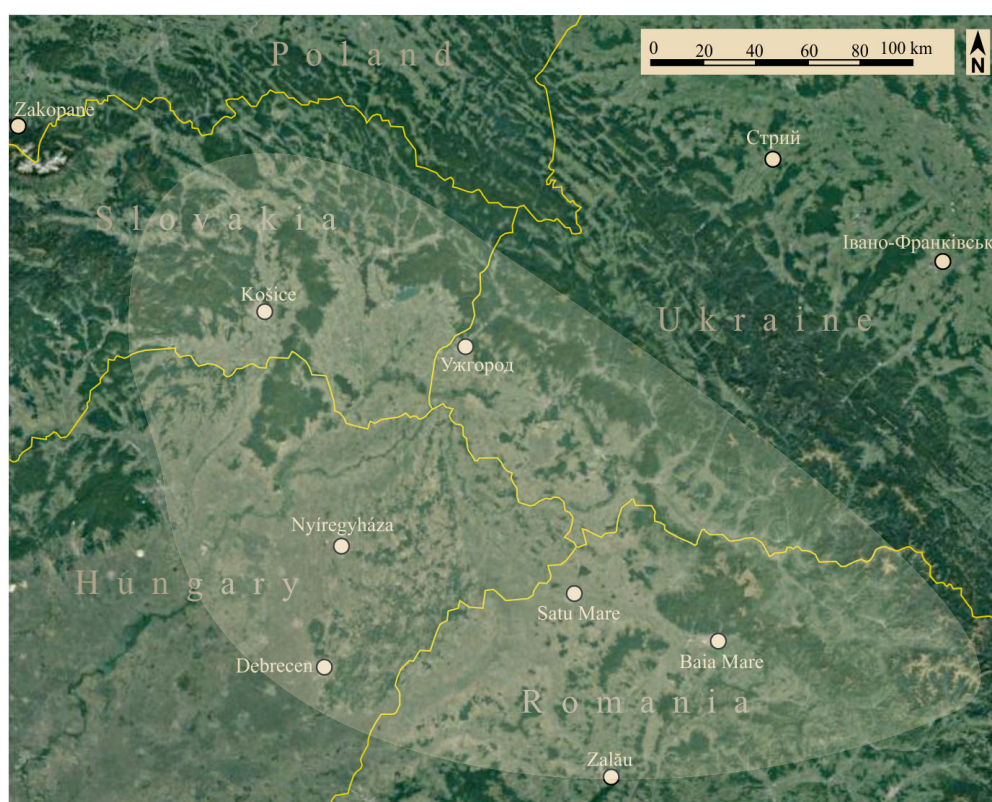
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¹ While precise estimates cannot be produced, this area is thought to span roughly 35,000 square kilometers. Of course, the areas corresponding to the alpine or pre-alpine relief, for which the habitation evidence is missing, need to be subtracted from this estimate.



A



B

Fig. 1. The Upper Tisza Basin indicated in the wider area of the Carpatho–Danubian Basin. Draws attention to its position in relation to the north-eastern Carpathians and the passers-by that cross this segment of the mountains (A). The same geographical area of the Upper Tisza today intersected by the borders of several states; more important cities are also indicated (B — processing of an image taken from Google Earth).

natural conditions in general allow the identification of a series of micro-regions, but in essence this is a unitary territory whose surface is relatively evenly covered by mountains, hills, plains and, in the past, several marshes in lowland areas (Figs. 1 and 2).

Regarding the delimitation of the territory which would correspond to the upper Tisza Basin, most archaeologists have taken into consideration, although rarely in an explicit manner, south-eastern Slovakia (centred on the upper basins of the Bodrog and Hernád rivers), Zakarpattia region in Ukraine, Szabolcs-Szatmár-Bereg County and the north-eastern part of the Borsod-Abaúj-Zemplén County in north-eastern Hungary, and the northwestern part of Romania (with Satu Mare and Maramureş Counties, in large part Sălaj County, as well as the northern area of Bihor County). Irrespective of the historical period, numerous common elements can be noted in the evolution of the habitat, a situation which was actually determined by the role of this territory in connection with the regions from the northern and north-eastern vicinity of the Carpathians through the Veretsky, Laborec or Dukla passes, to mention only the most important ones.

The position of the territory in north-western Romania has meant that, to this day, its role has been that of a transit area between the northern segment of the upper Tisza basin (and further away to the west, the regions northward the Danube's bent) and the Transylvanian Basin, or to the southwest, in the direction of the middle and lower Tisza.

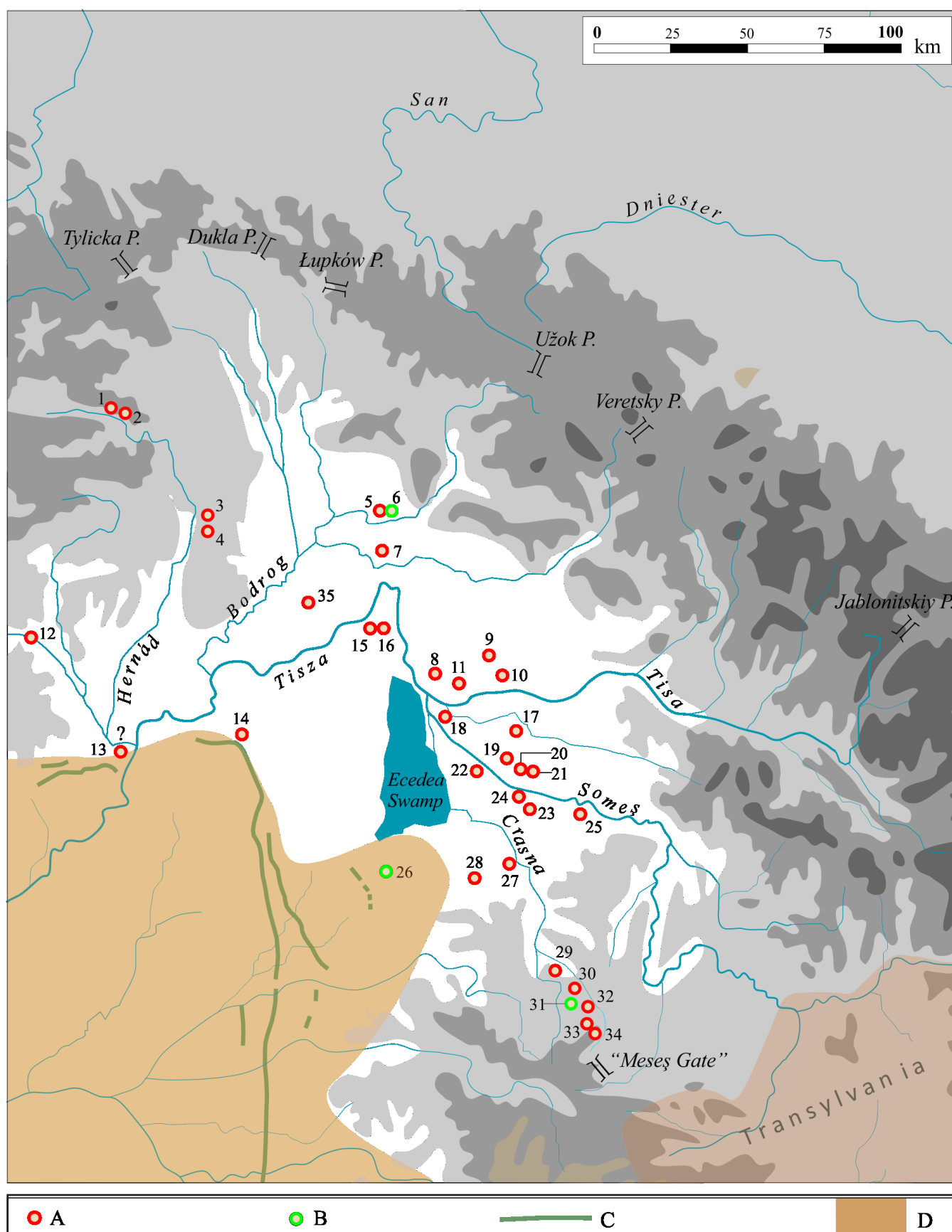


Fig. 2. Sites that can relate to the presence of Early Slavs in the area of the Upper Tisza (about the middle third of the 6th century – the first half of the 7th century). A—Settlements. B—Flat cremation burials. C—The so-called ‘Sarmatian walls’. D—The territory included in the Gepid Kingdom, and in the next period in the Avar Khaganate. **1:** Spišský Štvrtok–Pod Šibeničnou horou (SK, okres Spišská Nová Ves: KUCEROVA/SOJAK/KUSNIEROVA/FECKO 2012, 19–22). **2:** Iľašovce–Za hostincom (SK, okres Spišská Nová Ves: KUCEROVA/SOJAK/KUSNIEROVA/FECKO 2012, 22–23). **3:** Nižná Myšľa–Alamenev (SK, okr. Košice-okolie: FUSEK/OLEXA/ZABOJNIK 2010). **4:** Ždaňa–Vyšné pole (okr. Košice-okolie: FUSEK/OLEXA/ZABOJNIK 2010, 338 fig. 1, 350–351, 352 fig. 16, 355). **5, 6:** Uzhhorod–Halaho (UA, Zakarpats'ka

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One micro-region which frequently experienced a distinct evolution over time includes a part of the Nir plain (in Hungarian, Nyírség), then the Ér and Carei plains which were partially isolated to the north and east from the remaining territory by the former Ecedea marsh and the marshy area on the lower courses of the Someș and Crasna river valleys. Its connections were mainly oriented to the west and south-west² even in the 5th – 6th centuries (note that only this territory was included into the Gepid Kingdom and later into the Avar Qaganate).

The relatively wide Zalău valley (through which the eponymous depression is opening towards the Crasna valley), whose floodplain is scattered even today with salty soils and marshy areas, stands out due to the high density of settlements that can be dated to the second half of the 6th century – first half of the 7th century. The small basin in which the modern Zalău is located has very good connections with the Someș and Sălaj valleys, and also towards the Transylvanian Basin through the so-called Meseș Gate.

The intensification of habitation determined substantial landscape changes, for example the forests and marshes occupied wider areas in the past. Cyclical changes in climate have occurred over time. Regarding the 1st millennium AD, a European trend is indicated, even if certain regional differences were observed. A warm and dry period lasting until the end of the 4th century was followed by an interval of lower annual temperatures and a changing rainfall regime until around 600. Gradual climate rewarming was indicated for the 7th – 9th centuries, but with shorter cooling periods and again a variable rainfall regime.³

² E.g., NÉMETI 1996, 457 and GINDELE 2010, 9, 90, 94, 99.

³ For instance: McCORMICK *et alii* 2012; VADAS/RÁCZ 2013, 204–207; POSCHLOD 2015, 205–211; PREISER-KAPPELLER 2018. Recent investigations point to a period of sharp cooling between about AD 536–660, driven primarily by large-scale volcanic eruptions, and among the effects generated would have been the migration of the Slavs (BÜNTGEN

According to an estimate, towards the beginning of the 1st millennium AD forests covered more than 70% of the surface of the Carpathian Basin, and around the year 1000 the forested surface would have been around 30–40 percent.⁴ However, the forests didn't form a continuous, impenetrable mass, as certain areas were naturally cleared and at the same time the extension of habitation through deforestation began much earlier than the second half of the 1st millennium AD. For example, the intensity of habitation in the Bronze Age and Roman times is remarkable, occupying, according to the available evidence, all of the geographic units and landscape forms in this territory, with the exception of the alpine zone. In comparison with previous periods, the forested areas probably expanded gradually during the 5th – first half of the 7th centuries, at least in certain regions, but the human habitat expanded from the second half of the 7th century onwards, according to the spatial distribution of archaeological discoveries.⁵

Before the successive regularization of water courses (initiated in the latter part of the 18th century and intensified in the second half of the following century), wetlands, with marshes and floodplains, represented an important component of the landscape of the entire Tisa Plain.⁶ In the geographical area of current interest, the Ecedea Swamp should be noted. Today it is completely dried up, but in the past it was one of the largest areas permanently covered

et alii 2016). Information about the evolution of the climate in the north-western part of Romania in FEURDEAN 2005, FEURDEAN *et alii* 2007, and FEURDEAN *et alii* 2008.

⁴ FRISNYÁK 2000, 84. Before the successive deforestations, starting with the medieval period, two-thirds of the entire area of the Tisa Plain would have belonged to the forest (LÁSZLÓFFY 1982, 164).

⁵ Deforestation probably intensified in the 8th – 9th centuries (GYÖRFFY/ZÓLYOMI 1996, 16, 22).

⁶ LÁSZLÓFFY 1982, 168–180, 183–235. In relation to the Maramureș Basin, a geographical subunit in northwestern Romania (closer to the pre- and alpine territory), changes in the natural environment and human habitat are examined in RUSTOIU 2019.

with water.⁷ In the immediate vicinity of the settlements discovered in the surroundings of the city of Satu Mare, the Ecedea Swamp was united with the rambling courses of the rivers Someș and Crasna. Terraces of the old watercourses and higher portions of land, resembling islands and easily recognizable today, were consistently the most suitable for habitation. Although the economic potential of wetlands has not been stable, they can usually be considered among the most productive biological ecosystems. They also supply additional resources, important for the subsistence of the communities (e.g., fish and crustaceans, waterfowls, but also bog iron and reeds).⁸ The floodplains were also consistently used for cattle grazing. Settlements located on the fringes of floodplains supported and boosted agriculture in general, and over time caused landscape change.⁹

Regarding the period in question, there are no data about the exploitation of mineral resources (salt, copper or gold). The claim that the copper ores from north-western Romania were already exploited in the Late Avar period¹⁰ is not credibly supported. Although evidence is missing, the case of the rich salt sources from the Maramureș depression could be different.¹¹

EVIDENCE OF THE ARTIFACTS

Quern-stones and other stone objects. One fragment of a quern-stone, most probably the upper handstone, was found in front of the oven from hut 12 at Zalău-Farkasdomb (Fig. 3/1–2; diameter around 40 cm). Other fragments, without indicating the precise shape of the piece, come from the fill of structure 51 at Lazuri-Lubi-tag (Fig. 3/3), in which they may have been accidentally included, as they belonged either to the Latène habitation or to the Roman one.¹² A possible quern-stone fragment also comes from the Kisvárdá-Aldi settlement.¹³ The piece from Zalău was made of dacite (a volcanic rock of the granite-diorite group), most probably originating from the Moigrad area (Sălaj County), not far from the settlement, at about 10 km southward in a beeline. The fragments from Lazuri are made

of tuff, also a rock that is present in the relative vicinity (Oaș-Gutâi Mountains). The fragment from Kisvárdá was made of pyroxenic andesite, which is present in the Tokaj Mountains but also in the other volcanic mountains in the vicinity.

There is an older list of similar discoveries from a wider territory in western and north-western Romania, but the majority of examples cannot be precisely dated due to the unknown contexts of discovery.¹⁴ From this point of view, the quern-stones of the Latène period are more definitive findings,¹⁵ alongside others that have analogies amongst the finds from the Roman provincial environment or the one of the period succeeding the 7th – 8th centuries. In general, the attempts to establish a fixed typo-chronology of the quern-stones were less convincing, and the same can be said about the tentative to identify an evolution towards the quern-stones with a flattened shape, and at the same time, some regional differences were noted in their morphology and structure.¹⁶ At least some forms remained unmodified from antiquity to the medieval period and even close to the modern period.¹⁷

According to at least one opinion, such quern-stones appear in the early Slavic environment in the 6th century in the context of some influences coming from the Danubian areas and the northern Pontic region, as the finds included by R. S. Minasian in group I are dated to the 6th – 7th century.¹⁸ In this case, probably without exception, the two components have the shape of a flattened cylinder and this identification is confirmed, for example, by the finds from the settlements at Roztoky and Březno.¹⁹ There is a local analogy for the semi-spherical shape of the piece from Zalău, coming from the early medieval settlement at Biharea (7th – 8th century, or even slightly later).²⁰

With reference to central-eastern and eastern Europe, quern-stones are scarce in settlements of the second half of the 6th century and the first half of the 7th century, irrespective of their shape, and their number increased only in the following period.²¹ Apparently, archaeological evidence could contradict even the literary sources mentioning the intensity of grains cultivation during this period, but it might be presumed that such installations were less numerous in every community, as they were difficult to make and suitable stone sources were not always readily available.

Three more-or-less carefully carved stones, displaying traces of wear, come from hut 8 at Lazuri-Lubi tag. Two were made of hard volcanic rock, one being found on the oven's clay block (Fig. 3/7) and the other inside the oven (Fig. 3/6),

⁷ BEREY 1908; FARKAS/NÉMETH 1978; KARÁCSONYI 1994–1995, 197, 210–218; SZÜCSNÉ-MURGULY 2006.

⁸ DINNIN/VAN DE NOORT 1999; VAN DE NOORT 2000.

⁹ FRISNYÁK 2000, 83; CSÜLLÖG/FRISNYÁK/TAMÁS 2014.

¹⁰ HOREDT 1987, 26.

¹¹ One list of salt deposits and springs from the modern Maramureș District in KACSÓ 2011, vol. I, 83. Regarding this region, the “industrial salt exploitation” was frequently presumed as beginning in prehistory and continuing in the Roman and early medieval periods, but the earliest reliable information comes from the 14th century. See KACSÓ 2006 and KACSÓ 2011, vol. I, 422–423, 447–454 (with a comprehensive bibliography on this subject). There is also a contrasting opinion which is only based on the comparison with the very spectacular results of the investigations carried out in northern Transylvania, on the Someșul Mare valley, which unearthed a complicated assemblage of timber installations and the corresponding tools. The radiocarbon dating of these discoveries points to the interval between ca. 3200 BC and AD 800. See for example CAVRUC/HARDING 2012, mostly p. 190–200 and CAVRUC *et alii* 2013. For salt exploitation in the Ukrainian Pre-Carpathians since prehistory, see VAKULENKO 2010, 270–280.

¹² STANCIU 2011, 277–278, with references to illustration. The item from the Zalău settlement was found on the floor of the dwelling, in front of the oven, and was reused in its construction. The fragments of hut 51 from Lazuri were found in its filling.

¹³ SAMU 2012, 146

¹⁴ DUMITRAȘCU 1986.

¹⁵ See also KOTIGOROSHKO 1995, 271 Fig. 47/1–13.

¹⁶ LEUBE 2009, 42.

¹⁷ PARCZEWSKI 1993, 81.

¹⁸ MINASIAN 1978, 103–104, 104 Fig. 1, 109–110.

¹⁹ KUNA/PROFANTOVÁ 2005, 590 Fig. 340, 591 Fig. 34; PLEINEROVÁ 2000, 290 Pl. 22, 291 Pl. 23.

²⁰ DUMITRAȘCU 1994, 184, Pl. CIII/11. Other analogies in LEUBE 2009, 42 Fig. 32/2–4, which cannot be dated, but might be earlier. For quern-stones from early medieval settlements in north-western Romania (second half of the 7th century – 9th/10th century) see STANCIU 2016, 242–243, with Fig. 203.

²¹ MINASIAN 1978, 110; MUSTEAȚĂ 2005, 58; CURTA 2001a, 276–277 note 57; POSTICĂ 2007, 153; GORBANENKO/PASHKEVICH 2010, 236–241.

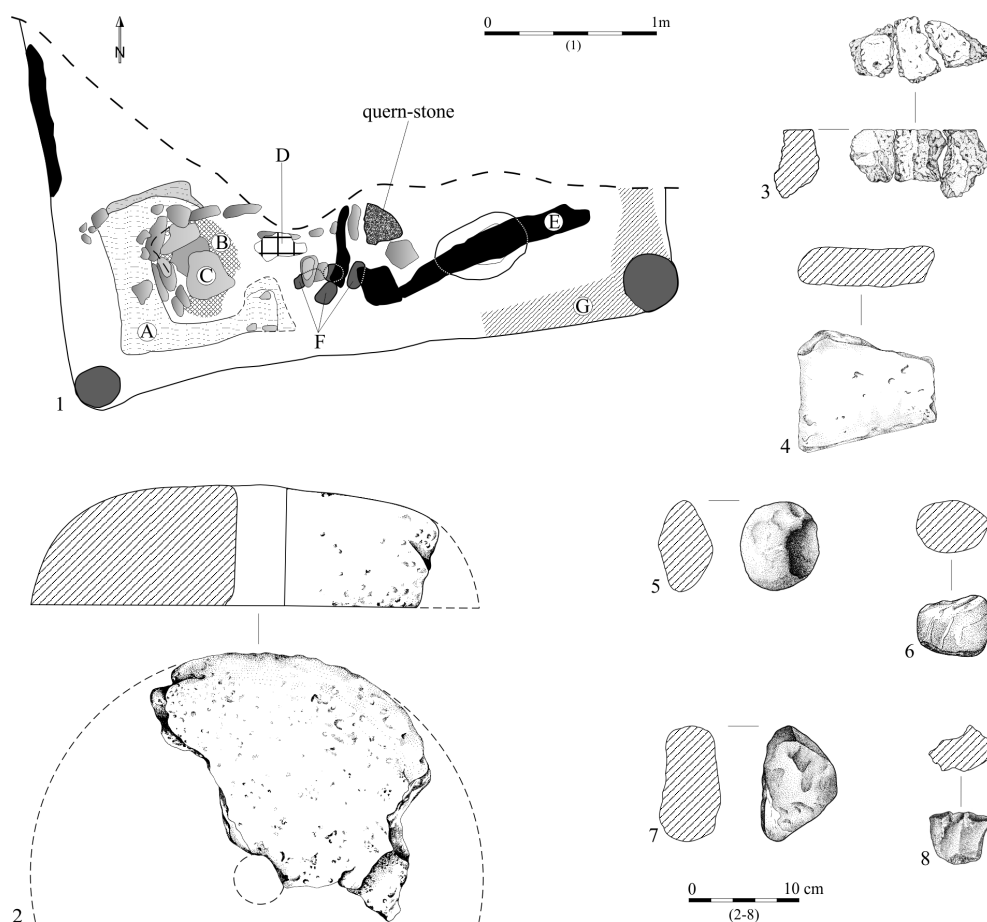


Fig. 3. Quern-stones (2–3) and other stone objects (4–9). Zalău–Farkas domb/Dealul lupului, feature 12 (1) and the piece of a quern-stone discovered in front of the oven (2). Lazuri–Lubi tag, huts 8 (5–7) and 51 (3–4). After STANCIU 2011. A — the clay block in which the oven cavity was hollowed out. B — hearth (the burnt clay from the base of the oven). C — stones with traces of burning. D — burnt earth. E — charred wood. F — post holes inside the dwelling. G — the imprint of the wooden walls.

both displaying traces of burning. The third piece (coming from the dwelling's fill) is a pebble stone that also displays strong wear traces (Fig. 3/5). Although frequently ignored, such objects could have been used as pestles, for example to crush salt, vegetables or roots.²² Sometimes the ovens' fill contained fragments of flat stones, usually showing slight traces of carving, but their explanation remains unclear. Another stone object (sandstone) from structure 51 at Lazuri was most probably used as a polisher, maybe for leather working, as the uniformly worn active surface seems to suggest (Fig. 3/4).²³

One lump of reddish flint without traces of carving comes from grave 4 of the Zalău–Dromet S.A. 2 cemetery, being discovered next to the base of the broken urn (Fig. 3/8). Although it might have been accidentally included into the grave's fill (there is a prehistoric habitation on the same location), sometimes such flint stones were found together

with fire steels in early medieval cremation graves.²⁴

The communities in the area of the Upper Tisza procured the raw material necessary for the manufacture of these indispensable tools (mainly rotary quern-stones) from the flysch belt of the North-Eastern Carpathians.²⁵ The exploitation of a natural resource, located at greater or lesser distances from settlements (between about 40–60 km) is indicated in this way; eventually, we could even assume the existence of people specialized in identifying the raw material and processing it.²⁶

Roasting trays ('pražnica').²⁷ This type of ceramic containers or devices, usually having a rectangular shape with rounded corners, are interpreted as annexes of the stone or clay ovens, being fitted above them and used for grains drying (also fruits or vegetables), or even for preserving them for a shorter period (Fig. 4/12).²⁸ These fired clay "containers" accumulated heat well, being very effective when they are replacing the vault of clay or stone ovens. As they heated less above the oven, they would not have been suitable for baking, a function they could perform when mounted above open hearths. The use of such devices for roasting cereal grains could be indicated by the

²⁴ KUNA/PROFANTOVÁ 2005, 206.

²⁵ SAMU 2012, 146, 186–201 Appendix 15.2.

²⁶ GORBANENKO/PASHKEVICH 2010, 240–241.

²⁷ In the Romanian archaeological literature at large, it is worth noting the variety of names under which this appears; in relation to their functionality, they have often been explained as „portable hearths” or even „portable clay ovens”. For a discussion in this regard, with references to bibliography, see GHENESCU 2002, 77–78, 81 and STANCIU 2016, 114–115, with note 384. Without going into details, it is worth emphasizing the observation that in some settlements in the Wallachian Plain (southern Romania, on the lower Danube) these larger trays were found in their original position, i.e. above the clay or stone ovens, as a constituent part of them (for instance DOLINESCU-FERCHE 1995, 163–176, with references to illustration). For all the issues related to these early medieval roasting trays and especially regarding the discoveries of this kind in Romania, see GHENESCU 2002 and STANCIU 2016, 114–121. Such rectangular-shaped trays discovered in the Pacin settlement in northeastern Hungary were called “clay pans” (“agyagtepsi” in Hungarian); see PINTÉR-NAGY/WOLF 2017, 144 and PINTÉR-NAGY 2018, 495 (Fig. 4/9–11).

²⁸ HERRMANN 1986, 272; PARCZEWSKI 1993, 69; KRAUSS/JEUTE 1998, 514–514; GHENESCU 2002, 81; SZMONIEWSKI/LITYŃSKA-ZAJĄC 2005; HEROLD 2006, 10; LISOWSKA 2022.

²² KUNA/PROFANTOVÁ 2005, 204; LEUBE 2009, 45; GORBANENKO/PASHKEVICH 2010, 232–233.

²³ The early medieval settlements in northwestern Romania (second half of the 7th century – 9th/10th century) provide examples not only for whetstones but also for such stone tools, sometimes even carefully shaped (STANCIU 2016, 254 Fig. 213).

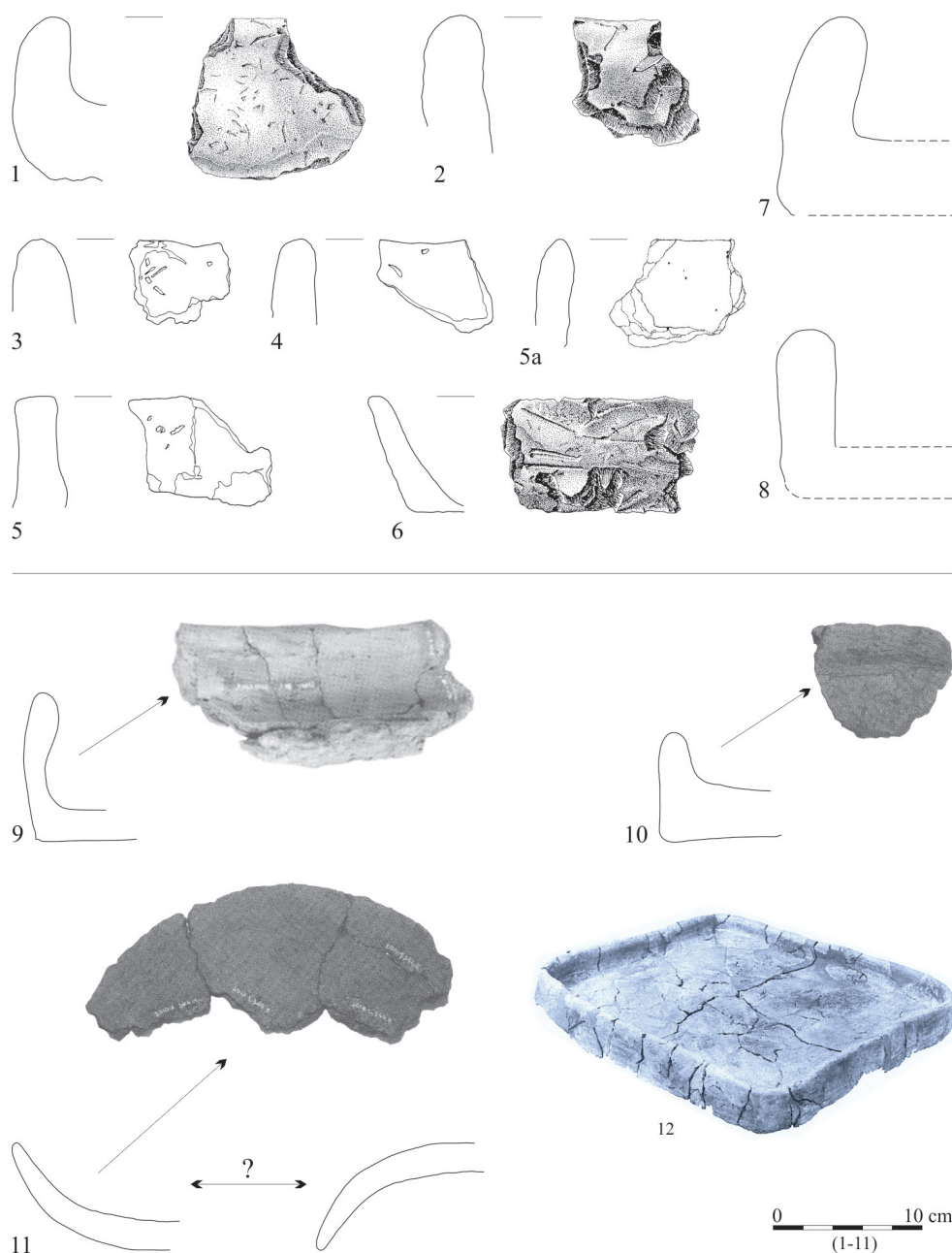


Fig. 4. Clay roasting trays. 1–8, dated to the late 6th century and the first third or half of the 7th century. 9–10, the same chronological setting was assumed, but more likely they belong to the next stage – second half of the 7th c. – first half of the 8th c. 12, rectangular roasting tray from Klučov (Bohemia), 8th–9th c. (random sizes, source: BERANOVÁ 1980). 1–5, 6, Lazuri–Lubi tag, hut 1a (source: STANCIU 2011). 5a, Garbolc (source: SAMU 2012). 7, Nižná Myšľa, features 1 (source: FUSEK 1994). 8, Blažice–Poloha Dorina, feature 4 (source: FUSEK 1994). 9–11, Pácin–Szenna-domb, S28 and S344 (10–11), S28 (9) (source: PINTÉR-NAGY 2018).

older Slavic term *prga* (*pražmo*), which refers to roasted but not fully baked cereal grains or to certain culinary specialties obtained on their basis.²⁹

Fragments of trays appeared in two contexts which were initially dated to the Roman Imperial period – *Barbaricum* (Nižná Myšľa in Slovakia and Wólka Łasiecka in

²⁹ All these observations at PLETESKI 2008, 126, 142. It should be mentioned that in the settlement of Badon–Doaște (in the north-west of Romania) many fragments of a circular tray were found in clear connection with a simple hearth, this one positioned in a pit with smaller dimensions (Fig. 5/6; see STANCIU/BĂCUEȚ-CRIȘAN 2018, 364, 381 Fig. 8/4–5).

Poland), but this chronological identification was later contested.³⁰ A dwelling from the Dulceanca I settlement (Wallachian Plain in Romania), whose oven was fitted with one such device, was also dated to the Roman period.³¹ Again, this chronological identification could be questioned, as mostly the habitation of the 6th century is encountered on this site.³²

Relating to the period and geographical area of interest here, some fragments were found in hut 1a from Lazuri–Lubi-tag, some inside the oven (Fig. 4/1–6).³³ In

³⁰ FUSEK 1994, 78; PARCZEWSKI 1993, 69.

³¹ DOLINESCU-FERCHE 1974, 30–39, 34 Fig. 13.

³² STANCIU 2011, 149–150.

³³ The tray has a height of 10.5 cm, while the walls' thickness is of 3.7 cm on average and that of the base is of 5 cm. The device was carelessly made (one result being the uneven profile), probably on the spot above the oven. The fabric is coarse and crumbly, containing chaff, and was poorly fired. Traces of straws and grains are visible both on the surface and in the cross-section (STANCIU 2011, 259–260, 333–334, 643 Pl. 33/1–2.3–5). From the same hut were recorded (this feature was researched in 1977 by Gh. Lazin, the documentation not being preserved) fragments of a tray more likely circular in shape, with a diameter of approximately 30 cm, with the same technological characteristics as roasting tray now in discussion (Fig. 5/6, see STANCIU 2011, 333, 643 Pl. 33/4). Another fragment seems to have belonged to another copy (very fragile in consistency), as the profile has a distinct shape, which would mean that one of the trays was not fixed above the oven (Fig. 4/5, see STANCIU 2011, 643 Pl. 33/6). It seems to be a curious situation, but

several parallels can be pointed out (especially from the 8th–10th centuries) that indicate the presence in the same dwelling of several trays, usually two, often one being circular or oval in shape. For a comment in this sense, with references to the bibliography, see STANCIU 2016, 119–121. The latter could be explained as possible precedents for those *podnica/ponica*, used for baking bread or pita, with ethnographic parallels noted especially from north-eastern and central Bulgaria (KRAUSS/JEUTE 1998, 513; see also PLETESKI 2008, 142). Regarding some settlements from the 6th–7th centuries, it is worth mentioning that from Radovanu (Wallachian Plain), from two dwellings there, fragments of three rectangular trays and one of a relatively circular shape (40 × 60 cm and height of 8 cm) have been reported (COMȘA 1975a, 336, 337 Fig. 1). See Fig. 5/4–5. A fragment of such trays, circular or oval in shape, was also reported from the Badon–Doaște settlement, in northwestern Romania (STANCIU/BĂCUEȚ-CRIȘAN 2018, 381 Fig. 8/5) – see Fig. 5/6.

connection to some contexts belonging to the phase II (positioned in the first half of the 7th century) two examples were reported from western Slovakia (Nitra–Mikov dvor, features 169 and 199),³⁴ and two other fragments comes from the eastern part of Slovakia, namely from the Upper Tisza region (Nižná Myšľa–Moľva and Blažice–Poloha Dorina; Fig. 4/7–8).³⁵

Without doubt, the discoveries from the south of the Carpathians in Romania are considered to be the oldest (6th century); some examples in Fig. 5/1–3.³⁶ Such trays are also present eastward the Carpathians in the second half of the 6th century – 7th century, sometimes being found on the dwelling's floor, so they were sometimes identified as portable hearths, in spite of the fact that their fragility wouldn't allow frequent handling.³⁷

On the other hand, there is no evidence of their use in Poland during the early phase and they only appeared in this region in the 8th – 9th century.³⁸ A similar situation seems to characterise Bohemia, Moravia and eastern Germany.³⁹ At the earliest from the second half of the 7th century, but more certainly from the following century, these roasting trays, together with clay pans and baking bells, spread throughout Central and Eastern Europe, with a maximum intensity of their presence in 8th – 9th centuries.⁴⁰

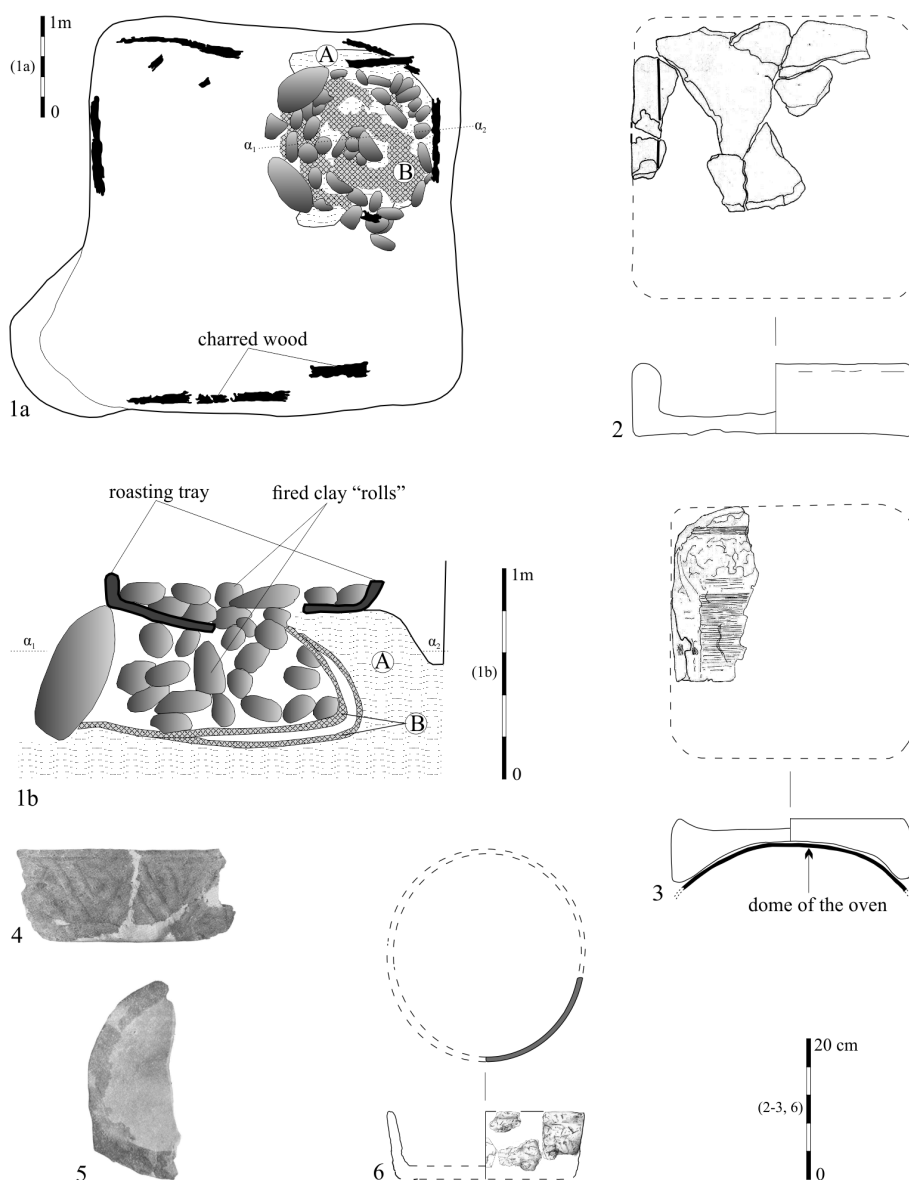


Fig. 5. 1a–1b, Dulceanca II (second half of the 6th c.), hut no. 1 and section through the oven used during two phases (graphic processing after DOLINESCU-FERCHE 1974). 2, Dulceanca I (second half of the 6th c.), roasting tray found on top of the oven in hut no. 2 (source: DOLINESCU-FERCHE 1974). 3, Dulceanca I (most probably the second half of the 6th c. and not the 3rd c.), roasting tray found on top of the vault of the oven in the 'Dacian' hut no. III (source: DOLINESCU-FERCHE 1974). 4, Radovanu–Pe Neguleasă (second half of the 6th c. – 7th c.), hut B, rectangular trays ('hearth'), decorated, found in connection with the clay oven of the house (source: COMȘA 1975). Oval or circular 'hearths' (trays): Radovanu–Pe Neguleasă, hut A (5) (source: COMȘA 1975), and Badon–Doaște (late 6th c. – first third or half of the 7th c.), feature 17 (6) (source: STANCIU/BĂCUEȚ-CRIȘAN 2018). 4, 5, random sizes. A – the sterile soil and the clay block in which the oven cavity was dug. B – base (hearth) and walls of the oven (burnt clay).

Clay pans.⁴¹ The function of the clay pans – in the

7th century, as can be understood from the publications (PINTÉR-NAGY/WOLF 2017 and PINTÉR-NAGY 2018). It is very likely that there was also an earlier habitation there that could be dated in this way (the so-called "Lazuri-Pișcolt horizon"), but some of the 41 researched dwellings, together with other structures, were positioned in the 8th – 9th centuries and even later, in the Arpadian period (PINTÉR-NAGY/WOLF 2017).

⁴¹ Circular ceramic pans, with smaller sizes and made without the help of the potter's wheel, they have short walls and usually their bottoms are narrowed, aspect accentuated even by the name of this clay vessel. For instance, HERRMANN 1986, FUSEK 1991, 309–310, and SZIMONOVA 2008, 134–135 and Fig. 8. For more recent and important contributions see CURTA 2016, CURTA 2017, and VIDA 2016, 391–394. An examination in

³⁴ FUSEK 1994, 353 Pl. XXXIX/10, 356 Pl. XLII/3.

³⁵ FUSEK 1994, 360 Pl. XLVI/4.

³⁶ PARCZEWSKI 1993, 69; FUSEK 1994, 78. For instance, the trays are very common in the Dulceanca II settlement (DOLINESCU-FERCHE 1986, 123–124 (house 1), 130 Fig. 24/19, 124 (houses 3, 8, 10), 128 (houses 13–15, 17–19), 132).

³⁷ For instance, MITREA 2001, 50–51, 396 Fig. 135/2, 59–60, 396 Fig. 135/1. According to an older observation, south and east of the Carpathians roasting trays appeared in association with clay pans, and these would have been used in the Early Slavic period only by the eastern and southern Slavs, later spreading over an extensive area. See HERRMANN 1986, 267.

³⁸ PARCZEWSKI 1993, 60, 69.

³⁹ PARCZEWSKI 1993, 69.

⁴⁰ I will only mention the example of the early medieval settlements in northwestern Romania, which in this respect is representative of the entire area of the Upper Tisza. See STANCIU 2016, 107–121 and STANCIU 2017. However, in the settlement of Pácín–Szenna-domb (north-eastern Hungary, region of Bodroghöz), rectangular or circular trays were reported together with clay pans proper, originating from huts dated in the 6th – 7th centuries, more precisely in the late 6th century and the first half of the

Upper Tisza region identifiable in more certain terms only from the end of the 6th century and the beginning of the following century⁴² – can be also presumed in connection to baking flat loaves or millet bread.⁴³ Without exception, they display strong traces of secondary burning on the base,⁴⁴ although ultimately, they could have also fulfilled other secondary functions, as lids or eventually as plates (Fig. 6).⁴⁵

The north-eastern origin of this form was contested,⁴⁶ its appearance being ascribed to the 6th century even on the territory of Romania or in general in the Lower Danube region, in earlier contexts that preceded the Slavic arrival.⁴⁷

connection with the early medieval clay pans in the north-western part of Romania, north-east Hungary, and the neighborhoods to see SAMU 2012, 144–146, STANCIU 2016, 107–114, and STANCIU 2017. Clay pans have been used for a long time, in different environments and geographical areas. Examples, with the same explanation for their functionality: Northern France, Middle Neolithic (GASCÓ 2002, 292 and Fig. 2); Germany, Neolithic (MOHS 2004, 15); Hallstatt period (VIDA 2016, 397 Fig. 6/3–4 and Fig. 7/6–7); medieval period (VIDA 2016, 407 Fig. 22/7, 408 Fig. 25/3–5, and 409 Fig. 26/4–6). Other references can be found at MOHS 2004, 14–15. Examples of “clay pans” from the 6th – 7th centuries that were sometimes used as plates: CURTA 2016, 153–154.

⁴² In relation to the few clay pans to be found for this earlier period (late 6th century and first third or half of the 7th century) in the settlements in north-western Romania see STANCIU 2011, 202, 204 Fig. 81/type 21. Northeast Hungary: Sajózentpéte–Vasúti őrház (SAMU 2017, 169 Pl. 5) and Garbolc (SAMU 2012, 145, 292–296 pls. 27–31 – many specimens are reported from here). The earlier dating of some structures where clay pans appeared remains unclear in the case of the Pácín–Szenna-domb settlement (see note 40). I am not aware of clay pans from the eastern Slovak settlements (Upper Tisza region) reported so far, only from the western part of the country, sometimes being dated there in the 6th century, but mostly during the 7th century (FUSEK 1994, 342 Pl. XXVIII/3, 353 Pl. XXXIX/12.14, 355 Pl. XLI/10, 359 Pl. XLV/4, 370 Pl. LVI/7, 375 Pl. LXI/6–7, 376 Pl. LXII/13). This aspect remains unclear in relation to the settlements in the Ciscarpathian area of Ukraine.

⁴³ Even if indirectly, the presence of these clay pans would indicate the cultivation of millet and wheat, according to some information from literary sources, they have also often been explained as indicators for Slavic migration (referrals in CURTA 2001a, 295, with note 74). According to one opinion, these clay pans were used in the early Slavic environment for baking leavened bread or *pita* (VIDA 2016, 391). But for this purpose, a closed environment would have been mandatory, i.e. heat below and above, just like in ovens (HERRMANN 1986, 270; KRAUSS/JEUTE 1998, 515; GHENESCU 2002, 81 note 6). However, ethnographic parallels would indicate this possibility, two overlapping clay pans being used (VIDA 2016, 391). The use of lids for clay pans would not make sense when they were used inside vaulted ovens, as the heat would also come from above, emanating from the walls of the kiln (PLETERSKEI 2008, 142). In many settlements of the Avar Qaganate dating from the second half of the 7th century clay pans were found together with baking bells, sometimes even in the same dwelling, therefore it was assumed that these clay pans were used in complementarity with baking bells, as a support of the latter, for baking bread but also preparing other foods, such as meat (VIDA 2016, 369–370, 391). See also ERDÉLYI/SZIMONOVA 1985, 387. Regarding this discussion, see the example of early medieval settlements in northwestern Romania (second half of the 7th century – 9th/10th centuries) in STANCIU 2017, 156–157, 166 Fig. 12.

⁴⁴ A confirmation not only for those clay pans known from northwest Romania at TEODOR E. S. 2001, 225.

⁴⁵ TEODOR E. S. 2000, 326; VIDA 2016, 391. See also VÁŇA 1958, 240–241.

⁴⁶ CURTA 2001a, 295–296, 297 Fig. 72 and CURTA 2016, 154–156, 172. The arguments invoked contest the connection between Slavic clay pans from the 6th century and earlier vessels of this kind or similar, such as those from the Kiev culture (3rd – 4th centuries AD), a possibility that must be taken into consideration. It should be noted that the late phase of Kiev culture covers the first half of the 5th century (TERPILOVSKII 2004, 128).

⁴⁷ CURTA 2001, 296–297, 297 Fig. 72; CURTA 2006, 255–256, 256 Fig. 72; PALIGA/TEODOR 2009, 154 (without examples). According to an estimate and regarding the 6th – 7th centuries, the regions where clay pans were most

However, resembling some ceramic disks (with a vaguely moulded rim) and frequently displaying the proper pan shape, they are commonly present in settlements of the Zarubintsy and Kiev cultures, or in the contact areas between the Kiev and Chernyakhov cultures, being then perpetuated within the pottery of the subsequent period (starting from the second half of the 5th century) from the same regions.⁴⁸ It was assumed that in the settlement of Kodyn clay pans were used even in the early phase (5th century),⁴⁹ but are scarcely present in contexts which were dated to the 6th century, and more numerous in the subsequent phase.⁵⁰ Similarly to the situation from the Upper Tisza area, these pans are only sporadically encountered in Polish assemblages of the 6th century – first half of the 7th century (contexts dated to the phase I, and also later dated),⁵¹ as in Slovakia, where most of the finds were identified in contexts ascribed to the phases II–III (7th – 8th century).⁵² According to an older examination, during the 6th – 7th centuries, they are concentrated in the region between the middle Dnieper and the lower Danube, then in the north-western Balkans, without playing a significant role in the daily life of the western Slavs.⁵³

In the 8th – 9th centuries the area where these clay pans were used was even more extensive.⁵⁴ Their origin is disputed by archaeologists interested in this theme, especially when they are understood as a ‘symbol’ of the early Slavs, who would have brought this ceramic form from an original homeland. But, as has been seen, such vessels, presumably used for the same purpose, may be reported from different places and periods, by different populations. Within the Carpathian Basin clay pans seem to have been used to an increasing extent after the first third or half of the 7th century and concomitant with the increasingly frequent use of baking bells. This aspect can be an important indicator

intensively used were located east of the Carpathians, in today’s territory of Romania and the Republic of Moldova (CURTA 2016, 230 Fig. 1).

⁴⁸ FUSEK 2004, 173 (with a distribution map that significantly modifies the one of Pl. Curta); TERPILOVSKII 2004, for example 143 Fig. 5/9–13, 187 Fig. 49/17–18, 217 Fig. 79/14–15; CURTA 2001a, 295, with bibliographical references. Their use as lids is possible (CURTA 2001a, 295). On the other hand, examples of the 6th – 7th century, even from settlements in the area of the Upper Tisza, are quasi-identical to those “disks” having a vaguely moulded rim (examples in Fig. 6/5–9). Thus, taking over from Curta’s interpretation, some finds from the 6th – 7th century should be similarly identified as lids (they are usually identified as pans for baking flatbread). Other comments in STANCIU 2016, 107, with note 356.

⁴⁹ RUSANOVA/TIMOSHCHUK 1984, 75 Pl. 17/11, 80 Pl. 26/7–8, 83 Pl. 32/10.

⁵⁰ RUSANOVA/TIMOSHCHUK 1984, 73 Pl. 13/7, 75 Pl. 16/13, 76 Pl. 19/4.

⁵¹ PARCZEWSKI 1993, 185 Pl. XI/15, 192 Pl. XVIII/9, 197 Pl. XXIII/6, 203 Pl. XXIX/10.

⁵² FUSEK 1994, 334 Pl. XX/12, 342 Pl. XXVIII/3, 353 Pl. XXXIX/12.14 etc.

⁵³ HERRMANN 1986, 267, 271 Fig. 1.

⁵⁴ Especially VIDA 2016, 392–394, 393, with map 9. See also HOREDŤ 1978, 64 Fig. 4, 66; SMILENKO/IURENKO 1990, 286; STANCIU 2011, 221; CURTA 2016, 157. But clay pans continued to be used for a long time, as archaeological or ethnographic data indicate (VIDA 2016, 385–389). Perhaps the best example comes from Eastern Transylvania (Deda, in today’s Mureş County), namely a rural workshop with seasonal production and products intended for a local market, including clay pans identical to those of the early medieval period; a slow wheel variant was used, but primarily as a rotating support. This modest production was sustained towards the end of the 19th century and into the first third of the 20th century. See DIACONESCU 2011; with other comments in STANCIU 2016, 107, with note 358, 108 Fig. 75, 136 Fig. 92, 138–139.

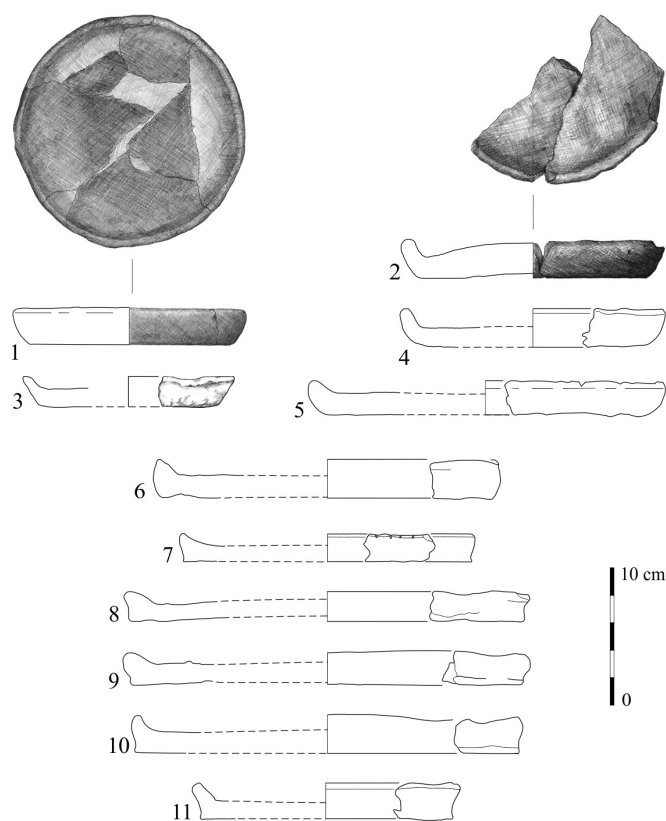


Fig. 6. Clay pans found in settlements in the Upper Tisza region (1–5, 11) and in the western part of Slovakia (6–10). As has been argued, the chronological positions are partly different: contexts with proposed dating to the 6th c. (or from the end of the 5th century) and into the 7th century – Western Slovakia, and late 6th c. and the first third or half of the 7th c., in the case of the Upper Tisza area. 1–2, Sajószentpéter–Vasúti őrház (source: SAMU 2017). 3, Badon-Doaște, feature no. 2 (source: STANCIU/BĂCUEȚ-CRIȘAN 2018). Lazuri–Lubi tag, huts 1a (5) and 52 (4, 7, 11) (source: STANCIU 2011). 6, 8, 9, Nitra–Mikov dvor, features 199 (6, 8) and 233 (9) (source: FUSEK 1994). 10, Šurany–Vysoký breh, feature 8 (source: FUSEK 1994).

for a culinary tradition with origins in the Mediterranean world – Southeast European, as a very serious examination shows us.⁵⁵

The so-called “clay breadcakes”.⁵⁶ It was already noted that, unlike the clay “rolls” which appear in north-western Romania only in connection with the clay ovens,⁵⁷ the clay “breadcakes” are associated with both the clay and the stone ovens. From the beginning this observation suggests that the latter have a distinct role, as they were discovered, almost without exception, in connection with the fire installations inside the dwellings, mostly on the clay block or the stone oven (Fig. 7/III). There are other settlements similar to the one from Lazuri–Lubi-tag in north-western Romania, for example at Dulceanca in the Wallachian Plain, Gropșani in southern Oltenia or Grodzisko

Dolne in the upper Vistula region, in which the “breadcakes” are commonly found in the dwellings’ inventories.⁵⁸

It is difficult, if not impossible, to identify their particular practical function in connection with the oven’s structure.⁵⁹ Fragments or even complete examples were very rarely found in the insulation layer under the daubing of the repaired hearths of the ovens.⁶⁰ These objects are small (most of them have a diameter of 7–9 cm) and their circular shape is not particularly suitable for any practical function; they were usually carefully modelled and rarely one side displays certain signs, often the same sign being repeated on different items (the example of the “cruciform” sign in Fig. 8/1–11). It might be presumed that they could have been arranged above the oven to create a decorative pattern (as ‘oven ornaments’). Some of them were found in the original position in huts 11 at Lazuri–Lubi-tag and 25 at Zalău-Bul. M. Viteazul, in the first case being arranged on the clay block, behind the upper opening of the oven,⁶¹ while in the second case four complete examples were placed on the north-western corner of the stone oven and two others on the north-eastern one (Fig. 9/1).⁶²

Objects made of fired clay, resembling or identical to the “breadcakes” of the 6th – 7th centuries, were identified in the regions to the south and east of the Carpathians in prehistory and also in the period succeeding the Early Slavic one, being usually considered clay imitations of bread, which were related to some magical – religious beliefs and practices.⁶³ Moreover, similar “breadcakes” were discovered in a few funerary contexts or in connections with cult-related structures.⁶⁴

⁵⁸ STANCIU 2011, 268 Fig. 148, with references to the bibliography.

⁵⁹ This explanation was suggested by Suzana Dolinescu-Ferche (1995, 172–173). It has been presumed that the clay “breadcakes” or similar objects made of stone which were sometimes discovered in prehistoric settlements were used for cooking, including heating and boiling liquids (in clay vessels or containers made of other materials). Ethnographic analogies confirm this kind of function. See DIETRICH 2010, 33, 37 (Annex 2), 40 Pl. 2. However, the indoor ovens of the 6th – 7th centuries were perfectly suitable for cooking.

⁶⁰ An example: spherical clay “breadcakes” were purposefully arranged in two superposed layers on the oven’s hearth in hut 17 at Dulceanca IV (DOLINESCU-FERCHE 1995, 172, 173 Fig. 9).

⁶¹ STANCIU 2011, 338 (oven 1), 658 Pl. 48/1, 659 Pl. 49/4–6.

⁶² STANCIU 2011, 383, 762 Pl. 151/1, 763 Pl. 152.

⁶³ SÂRBU 1993; STAMATI 2000, 363–364; STANCIU 2011, 301–308; STANCIU 2012. Some authors identified them as “toy-breads” (MONGAIT 1955, 128; CHIȘVASI-COMȘA 1958; ȘTEFAN *et alii* 1967, 328–329; TEODOR 1984, 35), while other interpretations brought into discussion a different perspective, related to some ludic – ritual practices (?) (STAMATI 2000, 372–374). However, these objects have a stereotypical and unattractive shape, and are far too numerous inside each dwelling. Furthermore, their connection with the fire installation is certain (why people would keep toys on the oven?) and the occasional incised signs make no sense in the case of toys. One possible comparison can be made with different clay figurines (animals, humans and others) from the prehistoric or early medieval period, but they cannot be toys because were discovered in graves and ritual pits which were sometimes dug under the oven or in other parts of the dwelling (SÂRBU 1993; TENTIUC 1996–1997).

⁶⁴ One large construction from Lepesovka, on the northern limit of the Chernyakhov culture (3rd – 4th century), identified as a sanctuary, was delimited on the outside by a row of hearths and several “breadcakes” were found on and around them (TIHANOVA 1963; VINOKUR 1972, 118). One burial belonging to the Chernyakhov culture, discovered at Pereyaslav Khmel’nyts’kyi (middle Dnieper region), contains one such object (VINOKUR 1972, 118–119). At Suemcy (Zhitomir region), 12 clay

⁵⁵ VIDA 2016, the conclusion on the pages 389–392; CURTA 2017.

⁵⁶ STANCIU 1998; BIALEKOVÁ 1999; STAMATI 2000; STANCIU 2001; STANCIU 2011, 261–269; STANCIU 2012; SAMU 2012, 119–144; NIKOLIĆ 2021.

⁵⁷ In relation to these clay rolls, see STANCIU 1998 and STANCIU 2011, 260–266. Probably their main function was to accumulate and radiate heat (CONSTANTINIU/PANAIT 1963, 84; DOLINESCU-FERCHE 1974, 94).

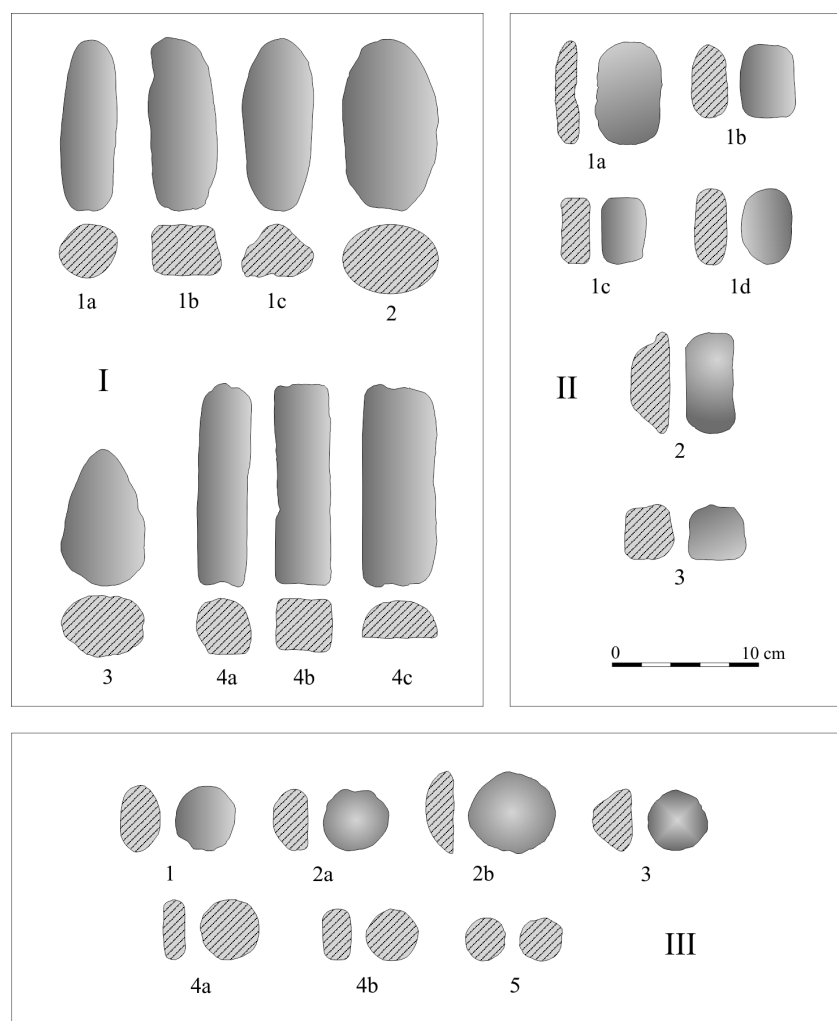


Fig. 7. “Clay rolls” (I) and “breadcakes” (III), a possible morphological classification, previously proposed, after STANCIU 2011. The problem is with the classification of items from group II.

The hypothesis of representing real bread or breadcakes made of clay is supported by a difficult to contradict argument. Aside from the morphological similarity, there are numerous situations in which identical signs appear on both types of materials.⁶⁵ The interpretation of the clay “breadcakes” as symbolic objects (objectifying magical – ritual beliefs and practices) is supported by the frequently mentioned observation regarding the perceived connection between the bread dough (flat bread, kolach) and the clay from which vessels and other objects are modelled, which characterise different communities and periods. Ultimately, the two materials can be defined as spiritual

“breadcakes” were arranged around one ceramic vessel containing cremated human bones (dated to the 6th – 7th or 8th – 9th centuries) (after PARCZEWSKI 1993, 84 note 1). Other “breadcakes” were found in connection with the dwellings and also “near burials” at Teterevka I (also Zhitomir region), some displaying an incised cross-like sign, similarly to some examples from Lazuri; Iurie Stamati drew attention to this discovery (STAMATI 2000, 365, with reference to the bibliography). Two “breadcakes” displaying one cross enclosed in a circle on one side were discovered together with domestic animal bones, ceramic fragments and amulets in the early medieval fortification at Echimăuți (Republic of Moldova) in connection with a structure identified as a pagan cult place (the referral appears in CHIȘVASI-COMȘA 1958, 425).

⁶⁵ STAMATI 2000, 368, 393 Fig. 15.

shelters in relation to the human body.⁶⁶ The relationship between these “breadcakes” and the fire installation has to be mentioned again, the oven having a key position within the assemblage of pagan customs and beliefs, and even the corner in which it was located was invested with magical meanings.⁶⁷ Lastly, the majority of those who were interested in these apparently small and irrelevant objects underlined the possible symbolic meanings in mantic activities, magical – religious practices directly related to the symbolic role of the real bread, domestic or funerary rituals.⁶⁸

The most interesting pieces are those on which different signs were incised, usually before firing, as they were repeated on several examples frequently coming from different archaeological sites. Amongst the entire assemblage of finds from north-western Romania, the clay “breadcakes” displaying these signs represent a relatively reduced percentage, of slightly more than 9% (17 examples of the total number of 180).⁶⁹ It is difficult to explain why only a small percentage of “breadcakes” display such signs; they might have played more-or-less different roles. Anyway, their eventual use as cult-related objects involved in a system of magical – religious beliefs and practices can be only explained in connection with their resemblance of the proper bread, as “simulacra of offerings or offerings of simulacra” and also as a ritual sacrifice.⁷⁰

⁶⁶ For example, GHINOIU 1992; STAMATI 2000, 368–369; MESNIL/POPOVA 2002a, 250.

⁶⁷ For example, ŠALKOVSKÝ 2001, 93, 105–106 and STAMATI 2000, 366–367.

⁶⁸ MONGAIT 1955, 128; VINOKUR 1969; VINOKUR 1972; RUSANOVA 1976, 50; GAVRITUKHIN 1993, 103; ZAKOŚCIELNA/GURBA 1993, 14; STAMATI 2000; STANCIU 2012. Three of the pieces from Lazuri were found in the same dwelling (19), two come from hut 11 and one each from huts 8 and 20. In the case of hut 11, three other pieces display different signs. This distribution pattern suggests the concentration of the “breadcakes” with signs in certain dwellings and sometimes the preference for a particular sign is evident, for example in the case of the cross drawn on three pieces from hut 19 and two pieces from hut 11 (Fig. 8/1–5).

⁶⁹ One group includes the items displaying an incised cross-like sign, or an X-shaped one (which can be ultimately seen as a *crux decussata*) if the piece is examined from a different position (they have a circular shape) See Fig. 8/1–6. The closest precedents of the “breadcakes” from the second half of the 6th century and the first half of the 7th century, on which this sign is appearing, were identified in the environment of the Chernyakhov culture, albeit some earlier examples from the second half of the 1st millennium BC are known from the Thracian environment southward the Danube. Amongst the latter, two examples come from a burial discovered at Kabyle-Yambol (Bulgaria), as part, together with other pieces, of the so-called “magical kit” (SÂRBU 1993, 140 no. 10, 175 Fig. 20). An interesting “magical kit” discovered in the Zimnicea necropolis (on the Danube, in southern Romania, with burials from the 4th–2nd centuries BC) also contained “breadcakes”, including two items with cruciform signs (GANCIU/MÂNDESCU 2014). In general, for the various marks appearing on these clay breadcakes, with references to illustration and bibliography, see STANCIU 2011, 302–306 and STANCIU 2012, 260–265.

⁷⁰ VĂDUVA 1992. Medieval sources from the Slavic world frequently

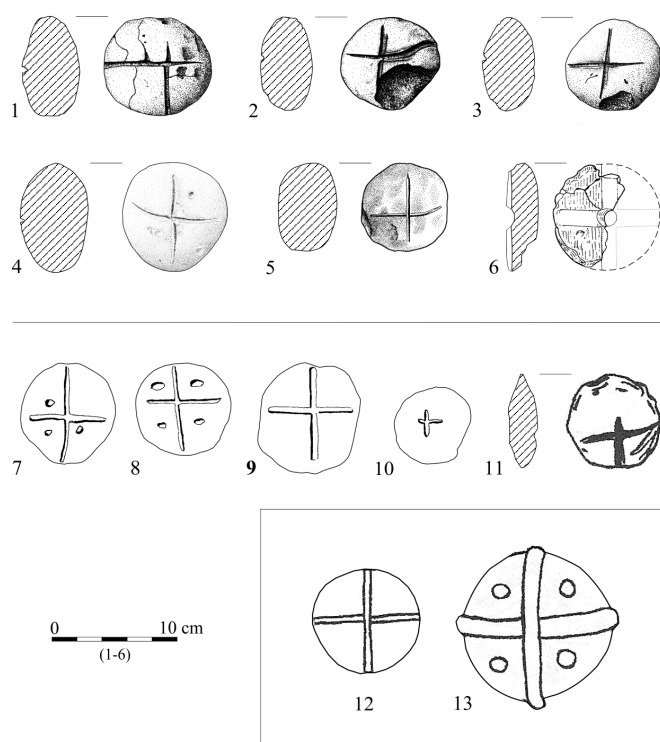


Fig. 8. Clay “breadcakes” on which signs appear, in the case of this example a cruciform sign (not necessarily related to this Christian symbol): the second half of the 6th century and the first half of the 7th century (1–6); with a proposed chronological framework for the 10th – 12th centuries (7–11). Real dough breads, with a symbolic role, ethnographic parallels (12–13). Lazuri-Lubi tag, huts 19 (1–3), 8 (5), and 20 (4) (source: STANCIU 2011). 6, Dulceanca IV (source: DOLINESCU-FERCHE 1992). 7–10, Dinogetia-Bisercuța-Garvăn (source: ȘTEFAN *et alii* 1967). 11, Hansca (source: STAMATI 2000). 12–13, after STAMATI 2000. 7–13 with random sizes, but the proportions amongst the items have been preserved.

With the help of clay “breadcakes” placed on the oven as substitutes of the real ones, someone could request the support of the divinity to acquire the real, edible bread through sympathetic magic.⁷¹ The X-shaped or cross-like sign appears on some of the real kolaches (incised or made with two strips of dough), being explained within the community as a symbol of the Christian cross, but it could be related to the meaning of the ancient multiplication symbol.⁷² Along the same lines, the clay “breadcakes” displaying several similar signs have to be taken into consideration. The oven itself had to receive something in exchange for the baked bread, as an offering for the benevolence of some supernatural forces, perhaps an ancient deity of the fire.⁷³

mention the magical bread as a funerary offering, hinting at ancient pagan practices (BRÜCKNER 1923, 190–191; NIEDERLE 1926, 131; VĂDUVA 1996, 72; MESNIL/POPOVA 2002b). There is an entire series of magical – religious practices of the Slavic and Romanian traditional civilizations, still perceptible today, in which the bread or the kolache (the Romanian *colac* is a Slavic word) play an important role (VĂDUVA 1996, 68; MESNIL/POPOVA 1997, 298–314, 322–328; MESNIL/POPOVA 2002b, 114). Some kolaches are made for the living, with meanings related to the community, while others are made for the deceased, as they are important entities in the relationships established with the supernatural or the ancestors (VĂDUVA 1996, 68).

⁷¹ STAMATI 2000, 369.

⁷² VĂDUVA 1996, 72.

⁷³ VĂDUVA 1996, 65; STAMATI 2000, 367.

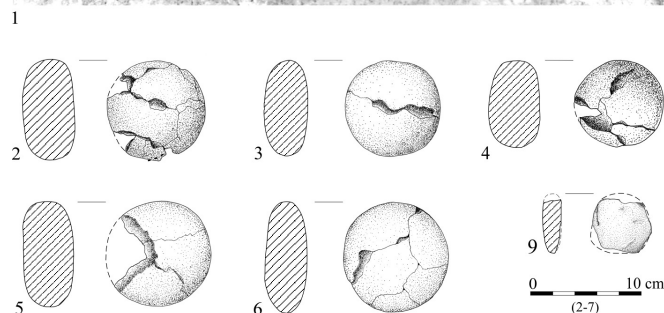


Fig. 9. Hut 25 from the settlement of Zalău-Mihai Viteazul Blvd., with proposed dating for the end of the 6th century and the beginning of the 7th century. Some clay “breadcakes” found in situ, in connection with the stone oven, on its north-west corner (1/A) and on the north-east, also fallen on the floor, near the south-west corner (1/B). Some examples are illustrated for the approximately 36–40 clay “breadcakes” found in connection with the oven or in its immediate vicinity.

Storage vessels. The shape and capacity of these vessels, their fabric characteristics as well,⁷⁴ and even some details of finishing or the traces of secondary burning on their lower half, mainly on the base, are elements which could suggest their functions. Given the lack of estimations regarding their capacity (volume), in the settlement of Lazuri-Lubi tag the vessels were also grouped according to their height,⁷⁵ which is a relative criterion, because sometimes lower vessels could have a larger capacity in comparison with the taller but slender ones. Also, not too large vessels could be used for shorter-term storage of other foods, such as dairy products.

The storage vessels were separated due to their much larger dimensions compared to the usual vessels in the settlements, first of all, standing out through the very great height (Fig. 11/1–5). The function of some very large vessels as storage containers is certain, the two complete examples from hut 15 at Zalău-Mihai Viteazul Blvd., which have a height of over 70 cm, being illustrative (Fig. 11/3–4).⁷⁶ As another example from hut 18 at Lazuri-Lubi tag, with a reconstructed height of 48.6 cm and a form that is nearly identical to one of the vessels from hut 15 at Zalău, is indicating, sometimes they were placed in the immediate

⁷⁴ From this point of view, the vessels now discussed do not differ in any way from the rest of the pottery. There are also no morphological differences.

⁷⁵ STANCIU 2011, 257 Fig. 141, 259 tab. 7.

⁷⁶ STANCIU 2011, 743 Pl. 132/1, 744 Pl. 133/1.

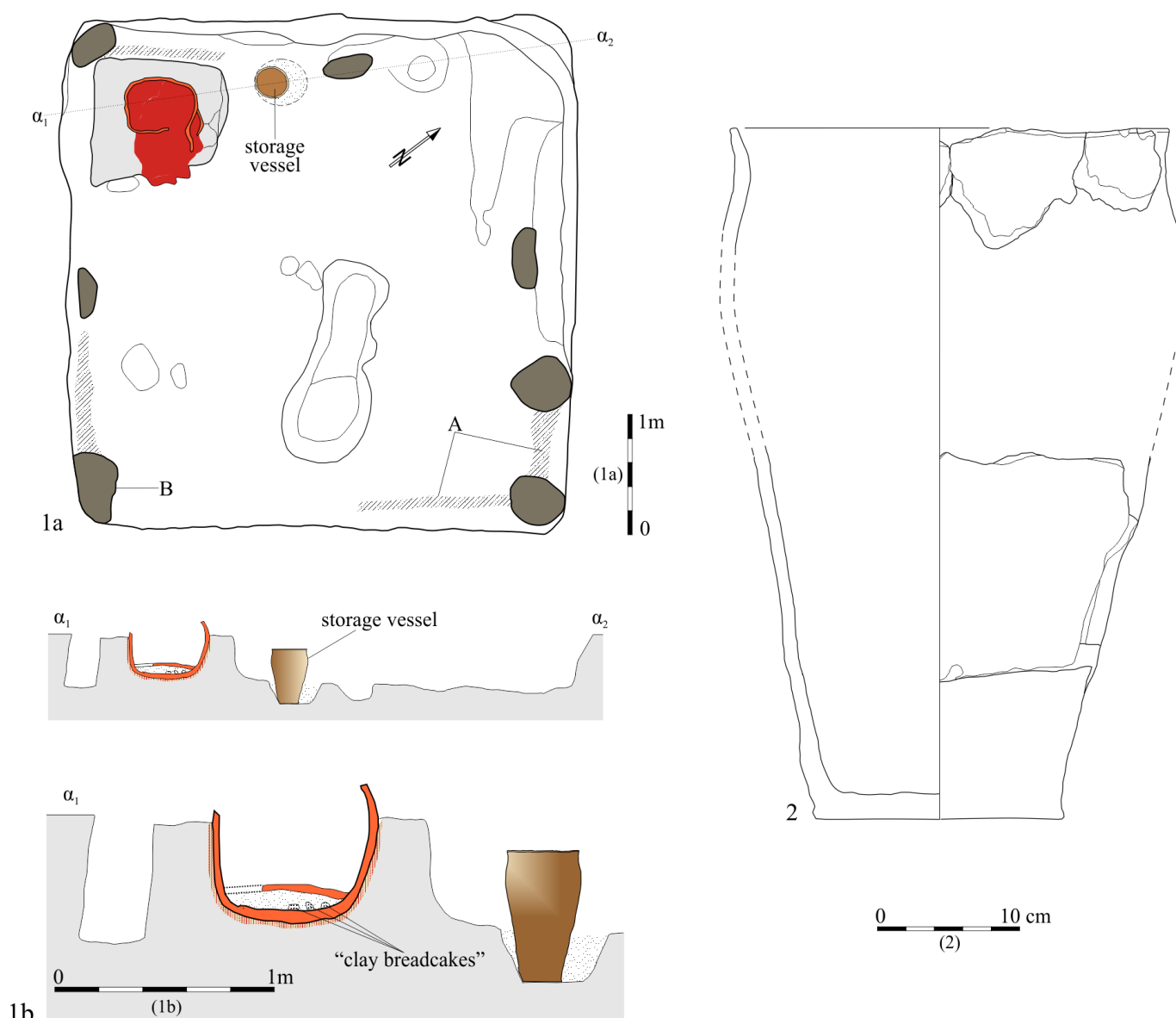


Fig. 10. Hut no. 18 from the settlement of Lazuri-Lubi tag, with a storage vessel fixed next to the oven. A — imprint of the base of the wooden walls. B — postholes.

vicinity of the oven, with the base buried into a pit dug into the floor to maintain their stability (Figs. 10 and 11/4).⁷⁷ More or less deep pits located in the immediate vicinity of the oven were identified in some other dwellings, on the side towards the dwelling's interior, whose function can be hardly explained in a different way.⁷⁸

Sometimes the storage vessels were not so high, as the container discovered in its initial position, slightly sunken into the floor next to the hearth of hut 51 from Lazuri, seems

to suggest (Fig. 11/15). The certain or presumed presence (upper parts or bases that indicate a larger than average diameter) of some vessels identified as storage containers for daily supplies (cereals, flour, or drinking water)⁷⁹ can be noted in 11 dwellings in the north-western part of Romania, the majority of them having two vessels each, and sometimes even more (4), for example in hut 1a from Lazuri.⁸⁰

Fired clay spindle-whorls. Although clay spindle whorls are commonly found during this period, the opinion stating that they are widespread in the early Slavic

⁷⁷ STANCIU 2011, 676–677 pls. 66–67, 680 Pl. 70/2. Another example is that of hut 51 from the settlement of Lazuri, with a smaller vessel found in its original position, i.e. the light one sunk with its base in the floor, next to a simple hearth (Fig. 11/15). See STANCIU 2011, 354, 718 Pl. 108/1–1a).

⁷⁸ Lazuri, hut 19, with pits 65a and eventually e (one storage vessel was presumed in the inventory of the dwelling); hut 25 from Zalău-Mihai Viteazul Blvd., with pits b and c (two storage vessels were presumed). Regardless of their size, vessels positioned next to ovens, slightly sunken into the floor, are several times reported in the Roztoky (Bohemia) settlement, with reference also to Rashkiv II/III (on the Upper Dniester, in Ukraine). See KUNA/PROFANTOVÁ 2005, 111–112.

⁷⁹ The positioning of these containers near the oven could suggest that there was water in them, also needed to put out accidental fires. Prevention of such accidents was necessary, as concrete situations sometimes indicate. A shorter wall, built of plaited and plastered reeds, was erected near the ovens, as sometimes evidenced by small post holes in the floor, arranged linearly, as in the Zalău-Mihai Viteazul Blvd. settlement (STANCIU 2011, 735 Pl. 124/1, 762 Pl. 151/1). However, there are examples that in more certain terms indicate the storage of some amount of grain in such vessels, necessary for daily consumption (GORBANENKO 2017, 468–469).

⁸⁰ STANCIU 2011, 257–258, 457–458 Appendix 9.

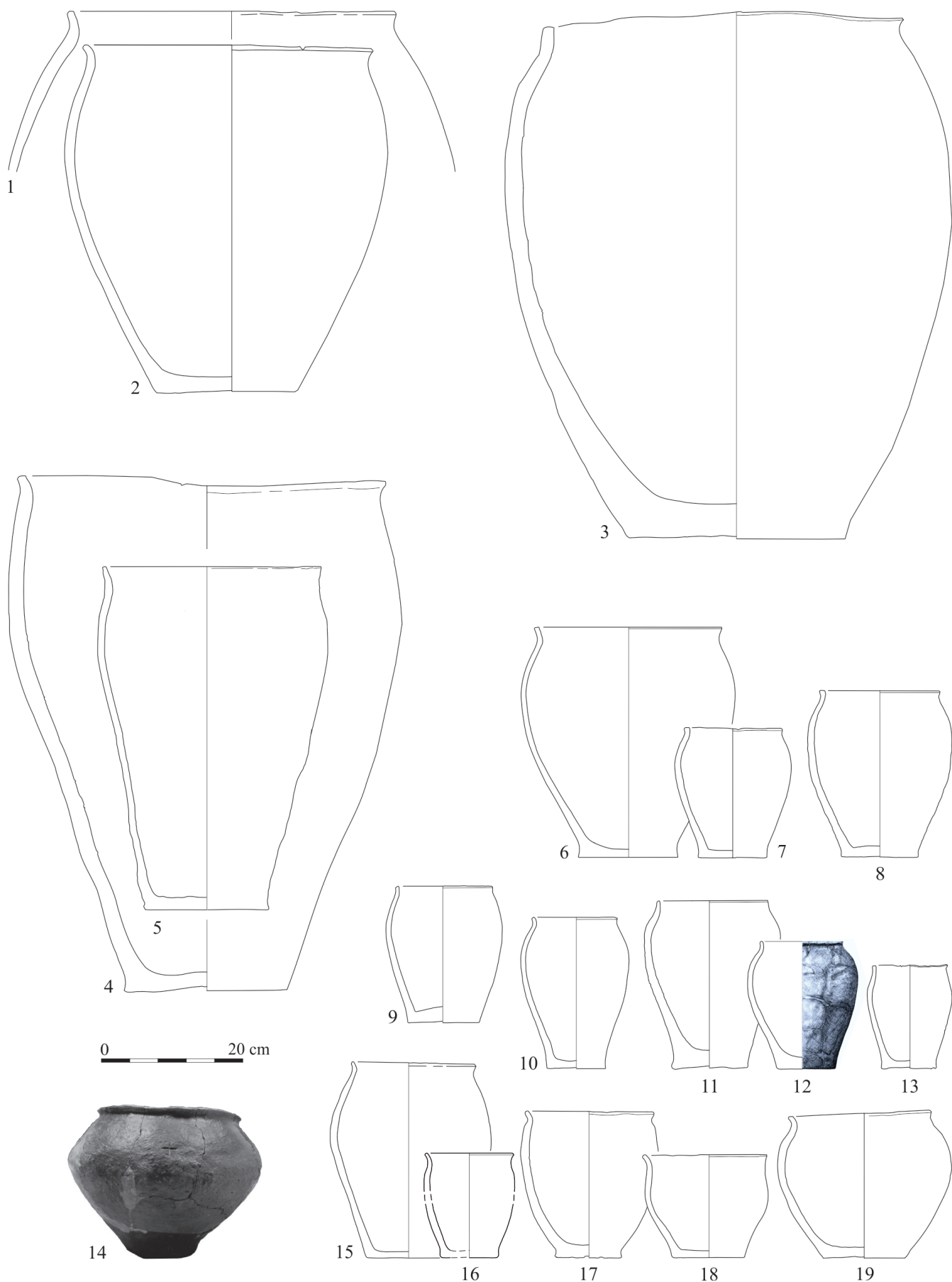


Fig. 11. Storage vessels (1–5), a comparison with the usual sizes of clay vessels in the settlements (6–19). Lazuri–Lubi tag, features 1a (1–2), 8 (6), 14 (13), 17 (11), 18 (5), 51 (9–10, 15) (source: STANCIU 2011). Zalău– Mihai Viteazul Blvd., features 5 (7), 13 (18), 15 (3–4), 18 (17), 19 (19), 25 (8) (source: STANCIU 2011). 12, Sajószentpéter–Vasúti őrház, feature 268 (source: SAMU 2012). 14, Badon–Doaște, feature 2 (source: STANCIU/BĂCUEȚ-CRIȘAN 2018). 16, Kisvárda–TV-torony (source: ISTVÁNOVITS 2001). Handmade pottery.

settlements, similar to those from the Upper Tisza region⁸¹ seems less founded.⁸² For example, only 20 examples were known from Poland,⁸³ while 18 pieces come from the Roztoky settlement, in which a large number of dwellings was investigated.⁸⁴ Similarly, the apparent abundance of finds in the settlement at Davideni (in Moldavia, second half of the 5th century – 7th century) is misleading since 39 examples come from 74 dwellings.⁸⁵ Some spindle whorls might have been made of wood, so they were not preserved⁸⁶ whereas older clay pieces could have been reused in the new households (they are usually very well fired). Although a spinning specialisation of certain families within the community may be presumed, the presence of spindle whorls only in some dwellings is still a weak argument.

To present now only the example of the area in northwestern Romania, seven such artifacts come from the better-researched settlements there, and without exception were found in the fill of the sunken huts; all spindle whorls were carefully handmade (Fig. 12/2–8).⁸⁷ In two cases the clay contains temper consisting of fine sand or finely crushed pottery. They have a compact fabric and are well fired. The diameter oscillates between 2.6 cm and 4 cm, while the height is of 1.2–4 cm. With a single exception (Fig. 12/8, one small, light piece which may have been also used as bead or pendant), the examples from north-western Romania can be morphologically ascribed to the three variants of the Parczewski 1 type, including spindle whorls with a general bi-conical shape, the differences being provided by certain cross-section details (Fig. 12/1).⁸⁸ They are amongst the most frequent ones in the early Slavic environment, but generally have a wider spatial and chronological distribution.⁸⁹ It has been correctly presumed that the lighter ones were used for wool spinning, while the heavier pieces were used to spin flax and hemp.⁹⁰ The size of clay spindle-whorls, respectively their weight, and perhaps their shape, are important aspects in the case of these artefacts. The measurements suggest that even in each dwelling various fibers could be spun (processed), especially when paired with other complementary tools. Such an economic concern, associated with other “domestic

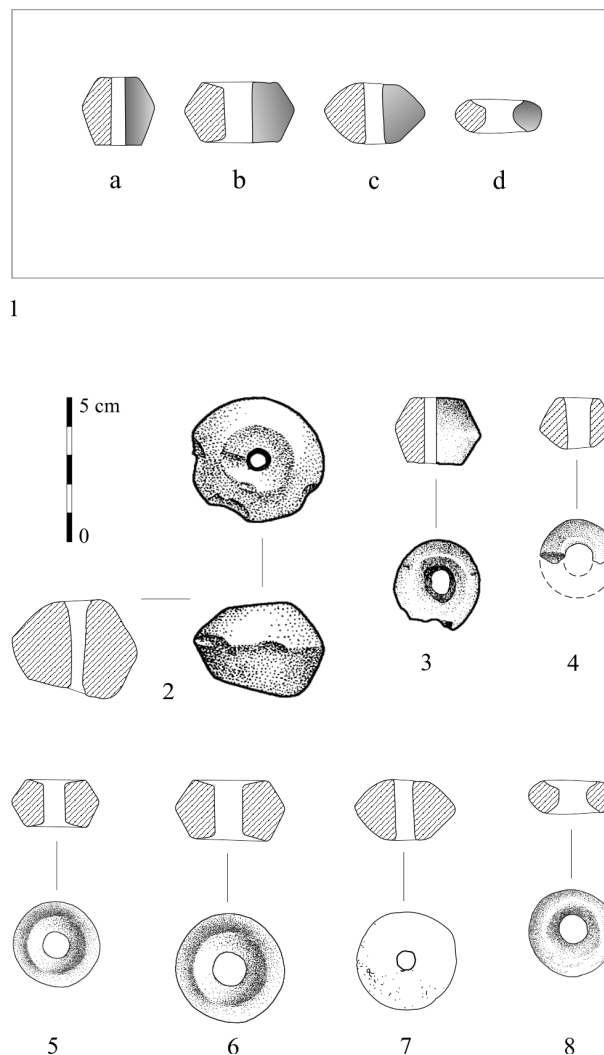


Fig. 12. Fired clay spindle-whorls in the settlements of northwestern Romania. A morphological classification, quasi-identical to that of PARCZEWSKI 1993, 79 fig. 22 (1). Lazuri-Lubi tag, huts 1a (2), 11 (2), 18 (5, 8), and 20 (4, 6). 7, Zalău-Mihai Viteazul Blvd., hut 28. Source: STANCIU 2011.

multicrafting” activities supported within a community could even indicate the integration of distinct households or some of them into a socio-economic ensemble, open to intra- and extra-community exchanges.⁹¹

Fired clay weights for the vertical loom. The examples that can be reconstructed are scarce, but they allow the classification of loom weights in three variants: truncated cone (a); conical (b); ellipsoid (c) (Fig. 13/A). As the reconstructed pieces indicate, their length varies between 11 and 14.5 cm. With a single exception, whose fabric contains imprints of some plant stalks, probably accidentally included, the clay is clean. Most of the loom weights were carefully modelled, but were usually poorly fired, making them less durable.

Again with the example of the settlements in northwestern Romania, the largest number of finds (14)

⁸¹ PARCZEWSKI 1993, 78.

⁸² KRÜGER 1967, 72.

⁸³ PARCZEWSKI 1993, 78–82.

⁸⁴ KUNA/PROFANTOVÁ 2005, 179. Eight specimens reported from all settlements in Slovakia dated during the 6th – 7th centuries (FUSEK 1994, 338 Pl. XXIV/14, 361 Pl. XLVII/11–12, 365 Pl. LI/19–20, 366 Pl. LII/3, 368 Pl. LIV/18, 370 Pl. LVI/13).

⁸⁵ MITREA 2001, 330–334 figs. 69–73; 335 Fig. 74/3.

⁸⁶ TEODOR 1996, 50.

⁸⁷ STANCIU 2011, 273–274. Only one from the settlement at Zalău-Mihai Viteazul Blvd. (investigated were 19 sunken huts) and all others from Lazuri-Lubi-tag (14 huts are known), with two examples in huts 18 and 20 each. One of them, displaying traces of a shiny black slip, is Roman and either accidentally reached hut 18 or it was reused (Fig. 12/6). Regarding the other settlements in the Upper Tisza region, only one clay spindle-whorl was reported from the Kiszárda-Aldi settlement (SAMU 2012, 82). Without excluding other possible explanations, we can believe that such artifacts are related to the structures from which they were collected or come from their immediate vicinity.

⁸⁸ PARCZEWSKI 1993, 79, with Fig. 22. In relation to the early medieval spindle whorls, the complex and rigorous analysis of the material from Břeclav-Pohansko should be noted (BŘEZINOVÁ/PŘICHYSTALOVÁ 2014, 170–191).

⁸⁹ PARCZEWSKI 1993, 79; CORMAN 1998, 60.

⁹⁰ KUNA/PROFANTOVÁ 2005, 180; LEUBE 2009, 53.

⁹¹ For this explanation, see CARPENTER/FEINMAN/NICHOLAS 2012. But with reference to a space far removed from the one of interest here and a distinct model of organization).

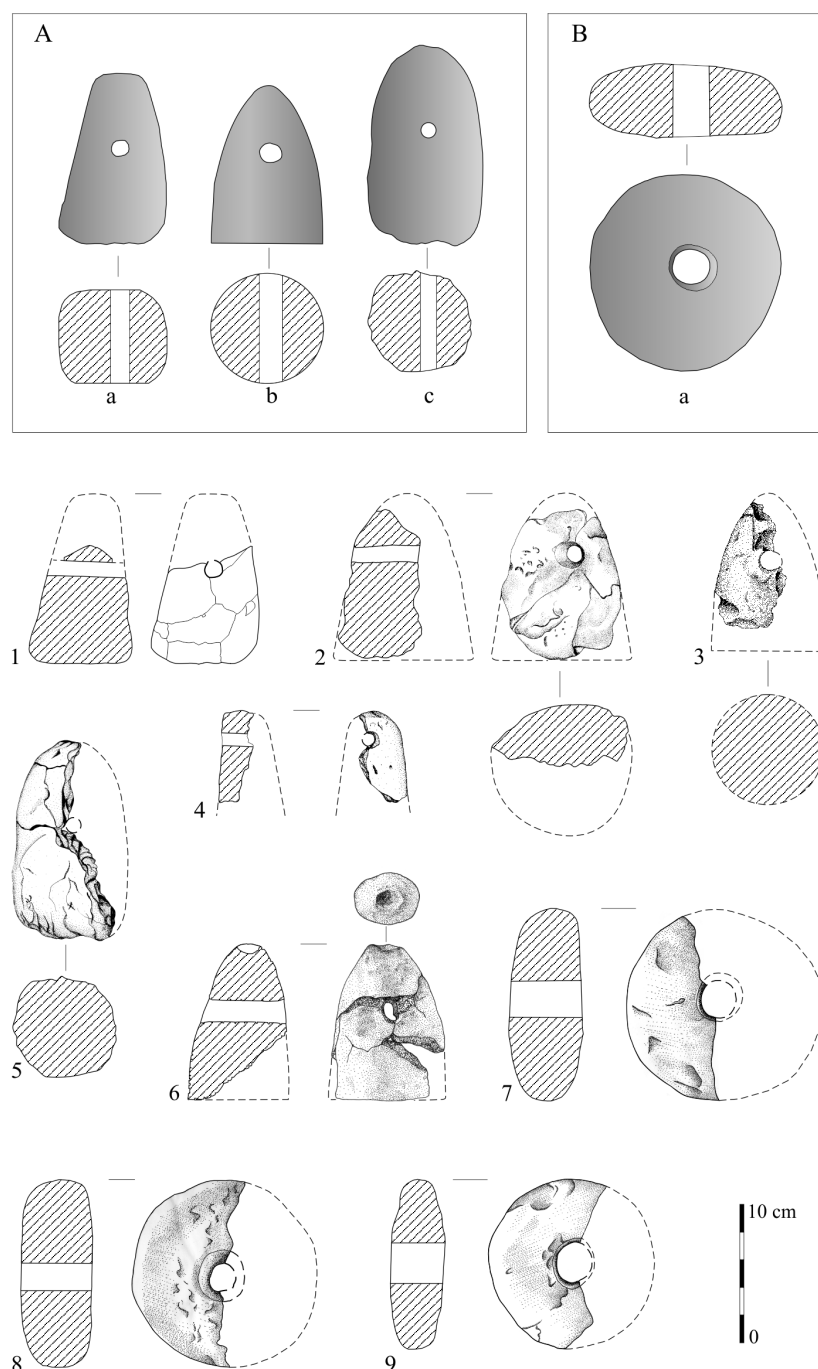


Fig. 13. Fired clay weights, a morphological classification (A, B) and examples. Lazuri-Lubi tag, huts 14 (1), 26 (3), and 51 (2, 4–5). 6, Zalău-Mihai Viteazul Blvd., hut 21 (6). 7–9, Lazuri-Nagy Béla rét/Râtul lui Béla (source: STANCIU 2011).

comes from the Lazuri-Lubi tag settlement. Only two loom weights appeared in the dwellings from Zalău-Mihai Viteazul Blvd. (a weight better preserved in Fig. 13/6).⁹² Three of the five dwellings from Lazuri in which such artefacts were found contain two (huts 14 and 52) or three examples each (hut 51, which surely had a larger number, but many fragments were not identified properly). Very probably even

⁹² STANCIU 2011, 274–276. Lazuri-Lubi tag: 662 Pl. 52/8 (hut 11), 666 Pl. 56/2–3 (hut 14), 699 Pl. 89/9 (hut 20), 709 Pl. 99/14 (hut 26), 720 Pl. 110/3–5 (“hut” 51), 721 Pl. 111/4–5 (hut 52), 725 Pl. 115/10–14 (hut 52). Zalău-M. Viteazul Blvd.: 755 Pl. 144/10.16 (huts 19 and 20) (STANCIU 2011). In fact, these are all the artifacts of this kind reported so far from the Upper Tisza area.

more weights, broken in several fragments, were scattered alongside fragmentary clay “rolls” and “breadcakes” on the stepping layer (structure 56), at less than 4 m away to the north-west of the structure 51, which was presumably identified as a weaving workshop, or it could be a multifunctional structure. None of the dwellings from Lazuri contains a large number of loom weights associated with several spindle whorls, and only in hut 20 one weight was found together with two whorls. All three types of weights appeared in structure 51 from Lazuri.

The variants A.a and A.b are equally present (5 example each), while a single piece belongs to the type A.c. The shape of the first two types, very suitable for this function, explains their widespread spatial and temporal distribution (Fig. 13/A).⁹³ However, they are rarely identified in settlements similar to those from north-western Romania. For example, analogies of the variant A.a are only known from the Davideni settlement eastward the Carpathians.⁹⁴ More numerous parallels come from the Late Roman Imperial and the beginning of the Migration periods.⁹⁵ In the environment of the Early Slavic settlements, the presence of the variant A.b weights, which were very probably part of a vertical loom, is attested in the site 18 at Kraków-Nowa Huta, in a dwelling in which a few complete pieces were found together with many fragments arranged in a row along one side of the structure.⁹⁶ Similar loom weights were used in the Gepid environment in the 6th century, before its last third, with some of them coming from very relevant contexts.⁹⁷ Those belonging to the variant A.c seem to be less common, but they have analogies in the same areas during the 6th – 7th centuries.⁹⁸

⁹³ For example, all these variants can be found in the Early Imperial Roman period settlement at Slepotece, East Bohemia (JÍLEK *et alii* 2013, 67–85, 259–263 pls. 70–74). With forms adapted to function, these variants can be traced back to at least the Early Bronze Age (MAUEL 2009, for instance p. 75 Fig. 27).

⁹⁴ MITREA 2001, 335 Fig. 74/4.7.

⁹⁵ For example, DOLINESCU-FERCHE 1974, 25 Fig. 6/3, 32 Fig. 11/5, 53 Fig. 38/1; PARCZEWSKI 1993, 80; PALADE 2004, 266 Fig. 10/17, 274 Fig. 14/6, 283 Fig. 19/1, 304 Fig. 28/1, 311 Fig. 30/4.9.14–16; KUNA/PROFANTOVÁ 2005, 182. Also in north-western Romania, see GINDELE/ISTVÁNOVITS 2009, 283 Pl. 25/5, 414 Pl. 156/6, 463 Pl. 205/2.

⁹⁶ HACHULSKA-LEDWOS 1986, 20, 130 Pl. II/2; PARCZEWSKI 1993, 80. On the other hand, the analogies are scarce, for instance BARAN 1988, 18 Fig. 10/10 and TEODOR 1984, 105 Fig. 26/4.

⁹⁷ HOREDT 1979, 93 Fig. 41, 98 Fig. 42, 105 Fig. 48/12–14, 111 Fig. 54/19–24; CSEH 1991, 158 Fig. 1, 208 Pl. II/1–2, 219 Pl. XIII, 220 Pl. XIV/1. In the vicinity of settlements in north-western Romania, such clay weights are frequent in the settlement of Carei, located on the northeastern periphery of the Gepid environment from the 6th century (GINDELE 2020, 68, 169 Pl. 26/2, 171 Pl. 28/8, 182 Pl. 39/11–12).

⁹⁸ BÂRZU 1994–95, 293 Fig. 19/11; PLEINEROVÁ 2000, 166, 117 Fig. 81/15; MITREA 2001, 335 Fig. 74/6.

In general clay loom weights are less numerous or are even absent from the early Slavic settlements, even when a large number of structures was investigated.⁹⁹ This pattern may be explained by their poor firing and subsequent fragility. Two or three examples were found in three of the dwellings from Lazuri-Lubi tag (albeit some small fragments usually identified as clay “rolls” could have belonged to some loom weights), so they might indicate the presence of some looms in these constructions. Aside from other data, this presumption is more reliable in the case of structure 51 (Fig. 23); the fragments of clay “rolls”, clay “breadcakes” and weights deposited on the stepping layer in its close vicinity (structure 56) being perhaps related to the activities which were carried out inside.

Fired clay fishing net weights (?). This function was sometimes presumed for the pieces shaped as a perforated disk,¹⁰⁰ which in north-western Romania are only attested in the settlement at Lazuri-Nagy Béla rét, albeit without a certain connection with the local early Slavic habitation (Fig. 13/B.a and 7–9).¹⁰¹ These objects have a diameter of 7–14 cm and a thickness of 4–5 cm, being carefully modelled and well fired.

Analogies of the 6th century and the first half of the 7th century are present to the north and north-west,¹⁰² the ‘prototype’ being presumed to be amongst some pieces of the Late Roman and Early Migration periods which were mostly found westward the Oder and identified as loom weights, a function that can be also taken into consideration in the case of later dated artefacts.¹⁰³ Similar objects are known in the settlements at Dulceanca (in southern Romania, close to the lower Danube), contemporaneous with those from north-western Romania, although the dating of the latter remains questionable.¹⁰⁴

Whetstones. Five artefacts of this kind have been reported from the Kisvárdá-Aldi settlement¹⁰⁵ and ten examples come from the north-western part of Romania – seven from the settlement at Lazuri-Lubi-tag and three from the one at Zaláu-Mihai Viteazul Blvd. (Fig. 14).¹⁰⁶ More

than one example in the same context was found in three cases: three items in hut 11 at Lazuri, two in hut 23 from the same settlement, also two items in feature 3 from Kisvárdá. About of whetstones discovered at Lazuri and Zaláu, half of these objects were found in connection with the oven, on the clay block in which the oven cavity was hollowed out or near the base on the floor, or even inside the fire installation.

With two exceptions whetstones from northwestern Romania were made of sandstone.¹⁰⁷ One example from hut 11 at Lazuri was probably made of basalt (Fig. 14/8). Another

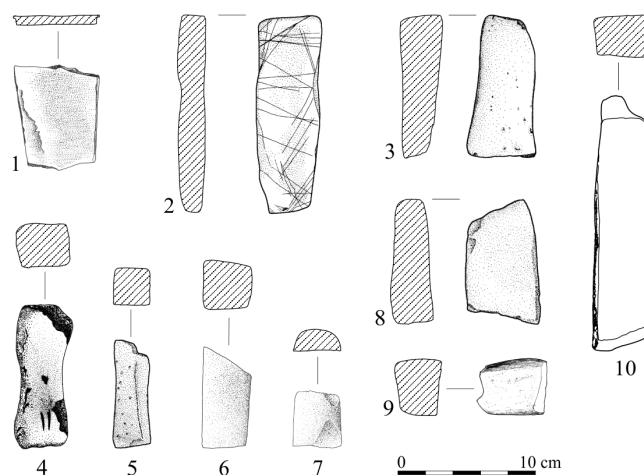


Fig. 14. Whetstones, examples from the settlements in northwestern Romania. Lazuri-Lubi tag, huts 11 (2–3, 8), 19 (7), 20 (6), and 23 (1, 4). Zaláu-Mihai Viteazul Blvd., huts 12 (9), 19 (5), and 28 (10). Source: STANCIU 2011.

piece from Lazuri (hut 23) was made of slate, with one side and the edges polished and shiny (it is partially preserved, the ends are missing). In relation to the latter, due to its fine material and thinness, it is justified to assume that this whetstone was used to finish smaller metal objects, possibly jewelry or certain clothing accessories (Fig. 14/1).¹⁰⁸ The majority of them show wear traces, frequently on all sides, and sometimes the central area is thinned (Fig. 14/4–5). From the morphological point of view, some wider pieces have a rectangular cross-section, while the narrower ones have a relatively square cross-section.

The whetstones are common tools during the Early Medieval period and not only. Indirectly, they indicate the presence of iron tools and weapons in a larger number than what is known, as in general the metal inventory is scarce in the early Slavic settlements.¹⁰⁹

⁹⁹ PARCZEWSKI 1993, 80. For example, their absence from the Dessau-Mosigkau settlement was noted, see KRÜGER 1967, 97.

¹⁰⁰ PARCZEWSKI 1993, 80–81.

¹⁰¹ STANCIU 2011, 276, 791 Pl. 180/7–9. It is known from there and a settlement from the 8th – 9th centuries (STANCIU 2016, 284 no. 68, with bibliographical references). Explained as weights for the vertical loom, such artefacts are reported from the early medieval sites, sometimes in secure connection with vertical looms: HAIÖ ZIMMERMANN 1982; PLEINEROVÁ 1999; BŘEZINOVÁ/PŘICHYSTALOVÁ 2014, 183 Fig. 16/25–30, 191–199, 194 Fig. 17/1–16; BŘEZINOVÁ 1997, 140 figs. 20–21; GROSS 2006. A brief examination of the few circular clay weights from the 6th – 7th centuries in KUNA/PROFANTOVÁ 2005, 182, with Fig. 75.

¹⁰² PARCZEWSKI 1993, 81 and KUNA/PROFANTOVÁ 2005, 182.

¹⁰³ PARCZEWSKI 1993, 81; LEUBE 2009, 51–52, 51 Fig. 39/5.

¹⁰⁴ DOLINESCU-FERCHE 1974, 32, Fig. 11/4; DOLINESCU-FERCHE 1986, 49 Fig. 22/11. Pit C from the Dulceanca IV settlement was literally filled up with disk-shaped pieces, proper clay „rolls” and “breadcakes”. See DOLINESCU-FERCHE 1992, 132 Fig. 4/3, 133, 151 Fig. 20.

¹⁰⁵ SAMU 2012, 146, 285 Pl. 20/6–9.

¹⁰⁶ STANCIU 2011, 276–277. Whetstones are not too numerous even in the settlements in other regions, with the same dating and attributed to the early Slavs. For instance: PARCZEWSKI 1993, 81; FUSEK 1994, 80; KUNA/

PROFANTOVÁ 2005, 204–206; SAMU 2012, 146.

¹⁰⁷ Note also valid for the specimens from the Kisvárdá-Aldi settlement (SAMU 2012, 146).

¹⁰⁸ Hut 23 was destroyed by fire and partially rebuilt on the same place – hut 20 (Fig. 22). A clay mold was found in the oven of hut 20, at its base (Fig. 15/1a–1b); from the filling of this hut also comes a whetstone made of very fine sandstone (Fig. 14/6). For these observations see STANCIU 2011, 348–350, 351–353. It is not excluded that a possible workshop (or a structure in which this activity was also supported) was rebuilt in the same place. Further details to be seen (*Artefacts related to metallurgical activities*).

¹⁰⁹ KUNA/PROFANTOVÁ 2005, 204.

Fire steels. Fire has always been important in the life of different communities, regardless of the period, and the utensils used to start it had to be close at hand. As for the period examined here, we must refer to “flint and steel”, also called a fire striker. Fire steels are not known from the inventory of some dwellings (perhaps they were not preserved), but we must always take into account the symbolism of these artifacts, a possible explanation for their presence in the graves.

Two fire steels come from the Pișcolt cemetery (northwest Romania), one being found in grave 18 (Fig. 15/6), while the other probably comes from a destroyed burial (Fig. 15/5).¹¹⁰ Similar objects are known from other cremation graves of the 6th – 7th century or even slightly later. They also appear in southern Moravian inhumation graves of the second half of the 5th century, in the Frankish and Alamanni ones of the 6th – 7th century, and also in some funerary contexts of the Early Avar environment; it was sometimes considered that their origin should be sought in the east.¹¹¹ In other situations, they were used as chronological markers of the first half of the 6th century.¹¹² Earlier analogies (from Germanic burials of the second half or the last third of the 5th century) and also later ones, like those from late Germanic or Avar graves, suggest that a narrower dating based solely on these objects is impossible. These simple fire steels, with less evolved ends, were used over a longer period of time in different cultural environments, and most of the finds could be dated to the 6th century.

It can be presumed that the examples from north-western Romania are mostly dated to the second half of the 6th century or the first half of the 7th century, similar to those from Moravia, Slovakia, the Avar burials or the settlements from the southern Carpathian area of Romania. More likely, like a hook buckle found in the grave 21 at Pișcolt, these fire steels indicate certain connections between the horizon of settlements from the lower Someș Basin and the Early Avar Qaganate, and even more so as the Pișcolt cemetery is located on the border between the two cultural environments.

Artefacts related to metallurgical activities. Two objects can be included in this category, both discovered in the settlement at Lazuri-Lubi-tag: one clay mould from hut 20 (Fig. 15/1a–b) and one clay spoon very probably used to pour smelted metal (ladle), which was found in hut 1a (Fig. 15/2).¹¹³ The mould (only one valve) was found on the oven’s clay block amongst fragments of clay “rolls” and “breadcakes”. It was clearly meant to cast a sphere with a diameter of 3 mm, most probably made of bronze, possibly to be used as a pendant soldered on an earring.¹¹⁴ If this

was the intention of the craftsman, then the bead may have been part of a simplified variant of the earrings with a grape-shaped pendant due to its small size,¹¹⁵ the type being used throughout the entire Avar period.¹¹⁶ Hut 20 from Lazuri was included in a supposed phase IIb (the latest of the settlement’s entire existence),¹¹⁷ and the presence of this mould more likely suggests an attempt to emulate the fashion of the Early Avar Qaganate through local (?) production.

During the 6th – 7th centuries one such production is quite well attested in the territories presumably colonised by the Slavs through the presence of moulds, crucibles and clay smelting spoons, and sometimes other specialised tools and waste, frequently in the same settlement.¹¹⁸ It has to be noted that the majority of the moulds come from the east and south-east of the Carpathians (on the territory of today’s Romania, but not only) during this period, regardless of whether they are the result of local technological practices or of the activity of some mobile craftsmen.¹¹⁹ This spatial distribution of the discoveries suggests the importance for these territories of the contacts with the early Byzantine environment of the Lower Danube, indicated by several prototypes of different ornaments and accessories produced in *Barbaricum*.¹²⁰

The other artefact, an oval shaped clay ladle with a lateral spout, was most likely used for pouring smelted metal, bronze or, maybe, silver (Fig. 15/2).¹²¹ Although the residue was not analysed, the spoon shows traces of secondary burning inside. The object was discovered in the fill of hut 1a, close to the floor level. Almost without exception, these instruments are made of clay and they are mostly present to the north-east, east and south-east of the Carpathians, in the same regions where moulds also appear;

might suggest that it was unfinished. On the other hand, although other moulds for independent beads are known (for instance, AULIH 1972, 75 Pl. XIV/5), it would have been simpler and more efficient to cast the bead together with the earring, like in the case of the stone mould from Szege-Bilisics (BÁLINT 1989, 164 Fig. 76/1). However, other examples of this type (nearly all of them made of stone) can be mentioned – they were used to cast simultaneously several beads of the same size as the one on the mould from Lazuri, sometimes alongside other pieces, albeit some were not used for earrings. For example: TEODORESCU 1972, 83 Fig. 5/4; RUSANOVA 1973, 82 Pl. 30/8; TEODOR 1984, 99 Fig. 20/3; GAVRITUKHIN 2005, 416 Fig. 9/26–30; MĂGUREANU/CIUPERCĂ 2007, 313 Fig. 5, 314 Fig. 6, 318 Fig. 10, catalogue nos. 9–10.

¹¹⁵ They usually have one to four adjoining beads, frequently forming a pyramid. The simplest variant has a single bead and is frequently found in cemeteries of the 7th – 8th centuries, although it was presumed that in certain cases other beads were accidentally lost (ČILINSKÁ 1975, 75).

¹¹⁶ For instance, ČILINSKÁ 1975, 65 Fig. 1 (type VII), 75–76 and BÖHME 1965, 4.

¹¹⁷ With some arguments in the direction of the first third of the 7th century (STANCIU 2011, 282–301).

¹¹⁸ SZMONIEWSKI 2005a; SZMONIEWSKI 2005b; CIUPERCĂ/MĂGUREANU 2009; TEODOR 2005.

¹¹⁹ An up-to-date record of the discoveries from the Romanian territory and in general from the Middle Danube area (stone or clay molds, tools and workshops) in TĂNASE 2020, 20–106.

¹²⁰ For instance: TEODOR 2005; CIUPERCĂ/MĂGUREANU 2009, 153, 157 Fig. 1; SZMONIEWSKI 2010; TĂNASE 2020, 200–209, with references to the bibliography.

¹²¹ TEODOR 1996, 31, 135 Fig. 21; SZMONIEWSKI 2005; JELÍNKOVÁ/ŠREIN/ŠTASTNÝ 2012; TĂNASE 2020, 188–189. However, I do not know of a more precise parallel for the cup shape of the Lazuri spoon.

¹¹⁰ NÉMETI 1983, 139–140 no. 4, Fig. 8/5–6.9–12 and Fig. 10/3–4.6–7; STANCIU 2011, 278.

¹¹¹ STANCIU 2011, 278, with references to bibliography.

¹¹² SZYKULSKY 1991, 88–89.

¹¹³ STANCIU 2011, 334, 349, with references to illustration; TĂNASE 2020, 318–319, 41 Fig. 4/1–2. Many crucible fragments were reported in relation to feature 58 (without fire installation) from the Kiszárda–Aldi settlement (SAMU 2012, 79).

¹¹⁴ For instance, TEODOR 1984, 50. However, the mould seems curious, as the extremity of the vent (sprue) through which the smelted metal was poured in does not touch the corresponding cavity of the bead’s body, which

sometimes these two categories of artefacts were found together (or associated with other specific artifacts) in the same settlements.¹²²

One fragment of an iron bloom comes from the fill of hut 8 at Lazuri (Fig. 15/3), while a small fragment of iron slag was found in hut 18 of the same settlement, on the floor in front of the oven's clay block (Fig. 15/4). It would be rather preposterous to presume that bloomery or forging activities were carried out locally only on the basis of these finds, as the two fragments could have been accidentally included into the fill in the same way as the relatively numerous ceramic fragments mostly belonging to the Roman or La Tène periods. Eventually, this explanation could be also valid for a fragment of a finished piece (having an uncertain function) or of a small iron bar or ingot found in hut 20 at Zalău-Mihai Viteazul Blvd., close to the oven (Fig. 15/10).

In an area with a specific long-term geological evolution also marked by swampy terrain, the main resource of raw material was contained in the alluvial sediments, offered mainly in the form of bog iron.¹²³ In the 3rd – 1st centuries BC, archaeological information indicates for the Sub-Carpathian region of Ukraine (Zakarpatska oblast), respectively a micro-zone marked by the northwestern slope of the Novoho Klynova mountain and the entire valley of the river Botar – a tributary on the left side of the Tisza, a real center of metallurgical production, with settlements specialized in obtaining iron and processing it. In the same microregion it is proven that iron was obtained from bog iron in the Roman period, but for the 5th – 7th centuries there is no convincing evidence.¹²⁴ No smelting furnaces are known from the area of the Upper Tisza, but such installations were used in the Roman period.¹²⁵

Double-sided composite horn combs – safer imports than local production. One nearly complete comb comes from a presumed context (“pit” a) from the settlement at Zalău-Mihai Viteazul Blvd., which superposed a structure of the Late Roman Imperial period (Fig. 15/7). Another fragment was found in a layer in the close vicinity of huts 20-21-22 (from the period of interest here) from the same settlement (Fig. 15/8). Moreover, the aforementioned “pit” a is located at around 7 m away to the south-west from hut 13, dated to the first third or half of the 7th century. One half-finished plaque (made of deer antler) was found in the culture layer of the aforementioned settlement, so not in a datable context (Fig. 15/9).¹²⁶ These artefacts were not found

together, also their connection to the settlement attributed to early Slavic habitation there remains debatable, as they could indicate the final stage of the settlement that existed in the Late Imperial Roman period.

Such combs, decorated or not, were used over a longer period in the Carpathian Basin beginning with the second half or the last third of the 4th century¹²⁷ and up to the 7th century (or even slightly later), with an almost unchanged shape. The maximum frequency, sustained by a local production, characterise the region eastward the middle Tisza, Transylvania and western and north-western Romania during the existence of the Gepid Kingdom (last third of the 5th century – first two thirds of the 6th century).¹²⁸ Not far from the settlement of Zalău-Mihai Viteazul Blvd., the discoveries from Carei-Bobald,¹²⁹ Biharea, and Oradea-Salca¹³⁰ convincingly attests to the existence of a local production in the Gepid environment.

Although more recent analyses are missing, it seems that in the territory inhabited by the early Slavs most of the combs are concentrated in (central) Bohemia and Moravia.¹³¹ In these regions most of the combs have a single row of teeth and the handle resembles an elongated triangle, the prototypes coming from the Langobardic environment. Their presence is the result of the Slavic – Langobardic contacts, and they were sometimes used as evidence for the narrower dating of the contexts from which they come to the interval delimited by the arrival of the Slavs and the departure of the Langobardi (AD 567/68), thus in the first half of the 6th century,¹³² and eventually up to the end of the century.¹³³

Aside from that, slightly more consistent seems to be the presence of the double-sided composite combs in the north-eastern vicinity of the Carpathian Basin (more

which is either a half-finished object or waste (MATEI/STANCIU 2000, 99, 414 Pl. 233/1).

¹²⁷ Even in the late Roman provincial environment from Pannonia their manufacturing is only attested from the end of the 4th century onward (BÍRÓ 2002, 60).

¹²⁸ KISS 1992, 53, 105 map 10; BÓNA/NAGY 2002, 95–98; TÓTH 2006, 74–75; MASEK 2016, 106–114. To refer to a geographical area neighboring to the one here examined, it must be noted that these combs frequently appear in the graves of women and men in the Gepid Kingdom (for instance, BÓNA/NAGY 2002, 95–98). In general, the combs are not specific to the Avar Qaganate during the following period, and the cemeteries in which they were more commonly discovered in association with other artefacts were ascribed to a late Germanic presence (KISS 1992, 53).

¹²⁹ POP 2019-2020.

¹³⁰ DUMITRAȘCU 1982, DUMITRAȘCU 1985 (Biharea). BULZAN/GHEMIȘ/FAZECAȘ 2001, 167 (Oradea-Salca).

¹³¹ PARCZEWSKI 1993, 83; KUNA/PROFANTOVÁ 2005, 196–197; SZMONIEWSKI 2016, 49. With a slightly later dating, the north-western Slavic territory has to be also added (DULINICZ 2006, 153–156).

¹³² For instance, KUNA/PROFANTOVÁ 2005, 196–197.

¹³³ FUSEK 2008, 652. However, the evidence regarding the appearance of a local production hampers the ability to date them more precisely, and it was presumed that they were used until the beginning of the 7th century (KUNA/PROFANTOVÁ 2005, 197). A similar situation is in Transylvania, as one such comb was found in the Bratei 1 settlement, in a dwelling dated to the second half of the 6th century – beginning of the 7th century. See BÂRZU 1994–1995, 258, 291 Fig. 6, with a similar dating to the middle of the 6th century – middle of the 7th century. Same dating was also proposed for a comb with a single row of teeth discovered in the settlement at Poian (SZÉKELY 1992, 268 Fig. 17/5) or for two pieces with two rows of teeth found in a dwelling of the Bratei 2 settlement (ZAHARIA 1994–1995, 351 Fig. 15/13–17, 355 Fig. 19/12–13).

¹²² PROFANTOVÁ 2009, 315 Fig. 5; TÂNASE 2020, 44 Fig. 6/5, 48 Fig. 8, 56 Fig. 13/3, 59 Fig. 15, 77 Fig. 28/2, 78 Fig. 29/1.

¹²³ CZAJLIK 2020, especially the pages 247–248.

¹²⁴ BALAHURI/BIDZILYA/PENYAK 1978, 53–66, 76–100; ČERKUN 1995; KOTIGOROSHKO 1995, 70–71, 117–118.

¹²⁵ In the vicinity of the Lazuri sites (20 km to the southeast), 52 such furnaces were discovered, dated to the 2nd – 3rd centuries AD, and the raw material used would have been bog iron, i.e. limonite existing in the former swampy areas there (GINDELE 2015). Field identification of these production sites is difficult, as they were usually located near the raw material resource, at greater or lesser distances from settlements. From these furnaces, little remains and mostly slag remained, and often these were scattered by successive agricultural works, soil erosion or other causes.

¹²⁶ These artifacts are described and commented on in STANCIU 2011, 280–281. Also, without dating, another cylindrical fragment of deer antler,

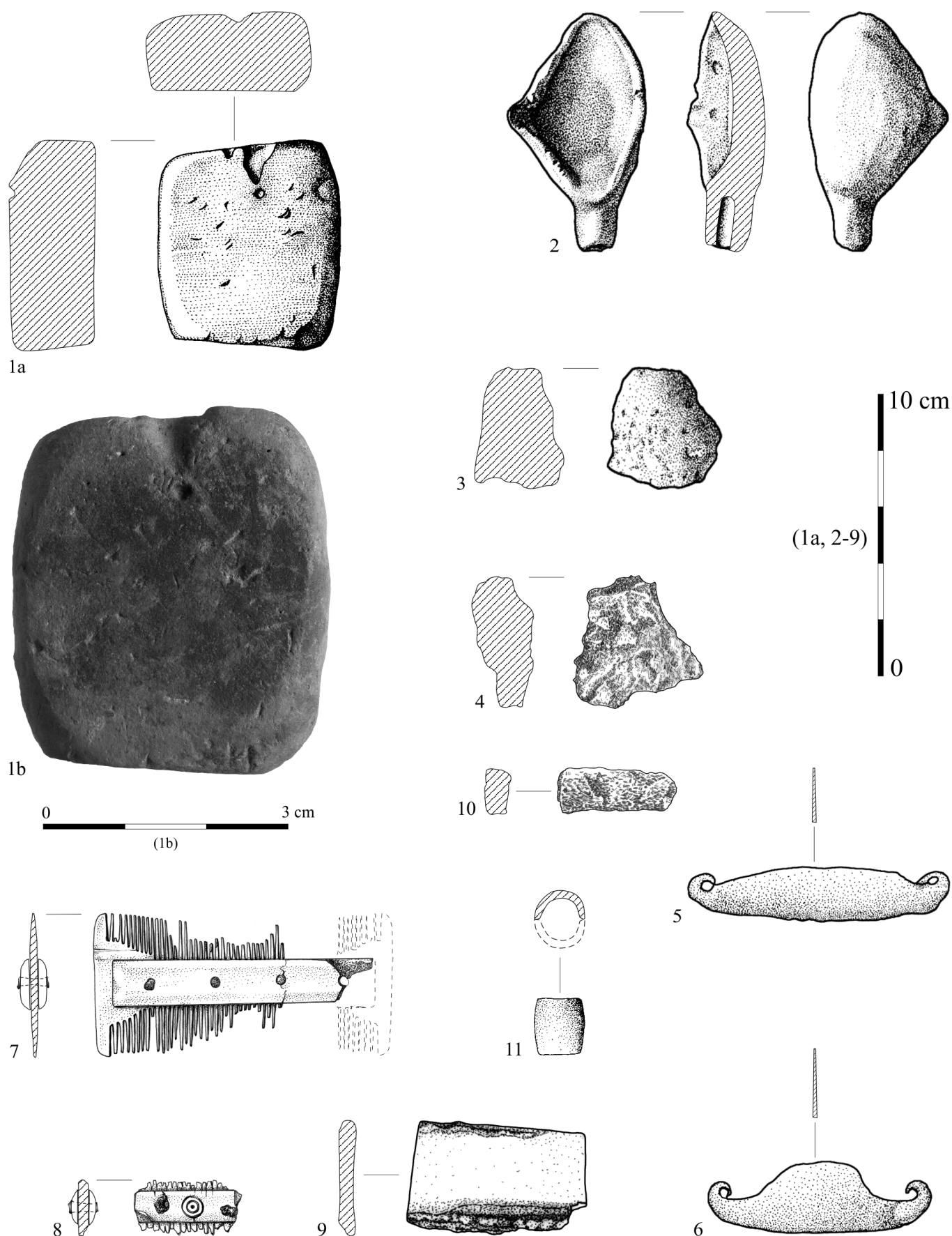


Fig. 15. Burnt clay mould (1a–1b) and spoon / clay ladle? (2). Pieces of iron bloom (3) and slag (4). Fire steels (5–6). Antler combs (7–8), antler plate being processed (9), and tubular object made of bone (11). Finished object, iron bar or ingot? (10). Lazuri-Lubi tag, huts 1a (2), 8 (3), 18 (4), 20 (1a–b), and 23 (11). Pișcolt-Homokos domb/Nisipărie, cremation grave no. 18 (6) and specimen found on the ground level corresponding to the cemetery (5). 10, Zalău- Mihai Viteazul Blvd., hut 20. Source: STANCIU 2011.

precisely in the northern part of Moldova), a pattern mainly supported by examples discovered in the settlement at Davideni, where some of them were dated to the second half of the 5th century – first half of the 6th century and others to the second half of the 6th century – 7th century.¹³⁴ The paucity of such artefacts in settlements from the Wallachian Plain, Walachia in general and Oltenia is curious.¹³⁵ If a certain reaction to the Gepid fashion, with influences from Transylvania, and which was perhaps followed even by the local production at the beginning of the Avar Qaganate, can be presumed in the case of the combs from the closer north-eastern vicinity of the Carpathian Basin, a large percentage of the known metal artifacts from this region indicates some connections with the south.

The settlement from Zalău-Mihai Viteazul Blvd., in which the two combs were found (if we accept their connection with early Slavic habitation there), is located in the possible contact area with the Gepid habitation from the south and west, but there are no clear data able to support their dating to a period before the last third of the 6th century, albeit this hypothesis cannot be completely excluded. Evidence of a local production is lacking, so the explanation that the Slavs borrowed such combs from the environments they came into contact with in Central Europe is reasonable.¹³⁶

One tubular artefact made of bone was found in hut 23 at Lazuri-Lubi-tag, close to the floor level (Fig. 15/11).¹³⁷ However, none of these objects seems to have been mass-produced, and their careful finishing and small dimensions could indicate their use as ornaments worn as pendants (?).¹³⁸ Unlike combs, the processing of such objects was not too complicated, therefore we might think that they were mostly local products.

Making clay vessels. Undoubtedly, the various burnt clay vessels, but also containers made of organic materials that have rarely been preserved, had a very important role in the daily life of human communities everywhere. As is commonly believed, during the period in which the Slavs

settled in the new territories, they would have produced and used only almost exclusively handmade, undecorated vessels (Fig. 16).¹³⁹ The wheel-made pottery, and more so the one modelled on the fast wheel, was not a common element of the material culture specific to the early Slavic society of the 6th century. If the series of settlements dated to the middle and the second half of the 5th century, like those on the middle Dniester and upper Prut in which some contexts containing vessels made on the fast wheel are present (a ceramic category directly related to the characteristics of the pottery production of the Late Roman Imperial or Early Migration periods), can be certainly ascribed to the Slavs (?), then it can be considered that they got in contact in this region with another population who produced higher quality pottery using a technology which the Slavs were unable to take over at that date and which would disappear towards the end of the 5th century and the beginning of the 6th century.¹⁴⁰

The pottery modelled on the fast wheel which was scarcely found into the early Slavs attributed contexts from Central Europe was related to the contacts with the late Germanic horizon of the migration period or with the hybrid Germanic – Romanic environment of the same period, the finds being used for an earlier dating (late 5th century – first half of the 6th century).¹⁴¹ In the upper Tisza River basin, the pottery modelled on the fast wheel, or possibly made in this way, is scarcely encountered and in a reduced number – we can say they are ‘exotic presences; can be only noted in two dwellings from northwest Romania: Lazuri-Lubi-tag (Fig. 18/3–4), and another fragment from the top of a pot was found in a dwelling from Zalău-Mihai Viteazul Blvd. (Fig. 18/2).¹⁴²

¹³⁴ MITREA 2001, 145, 338 Fig. 77/1–3.5–8, 339 Fig. 78/1, 340 Fig. 79; TEODOR 1978, 167 Fig. 8/5; TEODOR 1996, 142 Fig. 28/7; CORMAN 1998, 247 Fig. 55/2.4–5.

¹³⁵ Interestingly, a fragmentary example comes from the Belciug settlement (Prahova County), close to the south-eastern bent of the Carpathians, in a region which could have had connections both with Transylvania and with the area eastward the Carpathians. One bronze tweezers, which is frequently found in Gepid burials from Transylvania, comes from the same settlement. See FRÂNCULEASA/ŞERBAN/NEGREA/DUMITRAŞCU 2011, 199–200, 216 Pl. XI/1.5.

¹³⁶ CNOTLIWY 1997, 366.

¹³⁷ STANCIU 2011, 281, 702 Pl. 92/10. An accidental presence in this context is less probable since the hut's pit was filled upon a fire. The object resembles a small barrel and has a length of 1.9 cm and a diameter of 1.7 cm; it was carefully polished and has rounded edges. The artefact can be compared with the tubular objects discovered in horse burials from some cemeteries, like those at Zamárdi-Rétiföldek or Bratei 3 (Early Avar period), which were part of the harness (BÁRDOS/GARAM 2009, 185 – grave 1406, 365 Pl. 162 – grave 1406/19; BÂRZU 2010, 130 – type 19d, 284 Pl. 6/G. 19/4; 285 Pl. 7.G. 27.7). One tubular piece from the Selishte settlement (Republic of Moldova) is also different from the one from Lazuri due to its moulded ends (CORMAN 1998, 249 Fig. 57/8).

¹³⁸ Made of bone or horn, decorated or not, such pieces (cylindrical or conical in shape) have been found in settlements or graves from the 7th – 12th centuries, and despite various proposals their usefulness remains questionable. See FUSEK 2016.

¹³⁹ RUSANOVA 1976, 21–40; RUSANOVA 1978; ZEMAN 1976, 220; TEODOR 1978, 42; RUSANOVA/TIMOSHCHUK 1984, 16–17, 27–28; BARAN/PRIKHODNYUK 1990, 231–238; PARCZEWSKI 1993, 26–65; FUSEK 1994, 305; DULINICZ 2006, 65–76; STANCIU 2011, 171–245. Long ago this pottery was classified as „Prague” or „Prague-Korchak type” and frequently explained as a decisive sign for the presence of the early Slavs. However, from several points of view, there are reasons to criticize this concept and the content attributed to it. See CURTA 2001a, 285–294, CURTA 2001b, and CURTA 2001c.

¹⁴⁰ For instance, BARAN/PRIKHODNYUK 1990, 231, 236. Concerning the 5th century, respectively the region of the Upper Prut and that of the Middle Dniester and supposed links with cultural environments from the Late Roman and Early Migration periods, to see: BARAN 1978, 16; VAKULENKO/PRIKHODNYUK 1984, 65–67, 71, 74; RUSANOVA/TIMOSHCHUK 1984, 16–28. However, it is difficult to accept that some communities adopted this kind of developed ceramic production at this date, and then abandoned it shortly afterward to return to an exclusive use of handmade pottery.

¹⁴¹ PARCZEWSKI 1993, 66; FUSEK 2008, 652. There is a distinct situation on a significant area of the Romanian territory during the 6th century and in a part of the 7th century, the case of Transylvania. In the contact areas with the Roman – Byzantine Empire (the region southward the Carpathians and in central-southern Moldavia) and in the areas earlier included into the Gepid Kingdom, then in the Early Avar Qaganate (Transylvania, the west and partly the north-western part of Romania) the pottery made on the fast wheel is found even on sites in which the handmade vessels predominate. In relation to the extra-Carpathian regions of Romania, to see PALIGA/TEODOR 2009, 132–145. With regard to Transylvania see STANCIU 2013, 342–360.

¹⁴² A normal situation, in the settlements in which the habitation of the 6th – 7th centuries superpose the one of the Roman period, the filling of the more recent dwellings also contains many earlier dated fragments, which were modelled on the fast wheel. Their separation is rarely difficult, the case of those included in STANCIU 2011, 253 Fig. 138/6–7, 759 Pl. 148/8

One reconstructed jar made of a fabric containing quite fine sand, well fired albeit less uniformly, comes from hut 1a at Lazuri (brown with grey spots; see Fig. 18/1).¹⁴³ Regarding the quality of the modelling, fabric and firing, the vessel in question is different from the pottery modelled on the fast wheel which belongs to this horizon, so this is certainly the result of a workshop production, regardless of the type of wheel used for its manufacturing. Other vessels having a nearly similar shape appear amongst the pottery modelled on the fast wheel from Transylvania, Walachia and even Moldavia.¹⁴⁴ Due to its shape, fabric, firing and colour, the vessel from Lazuri can be compared

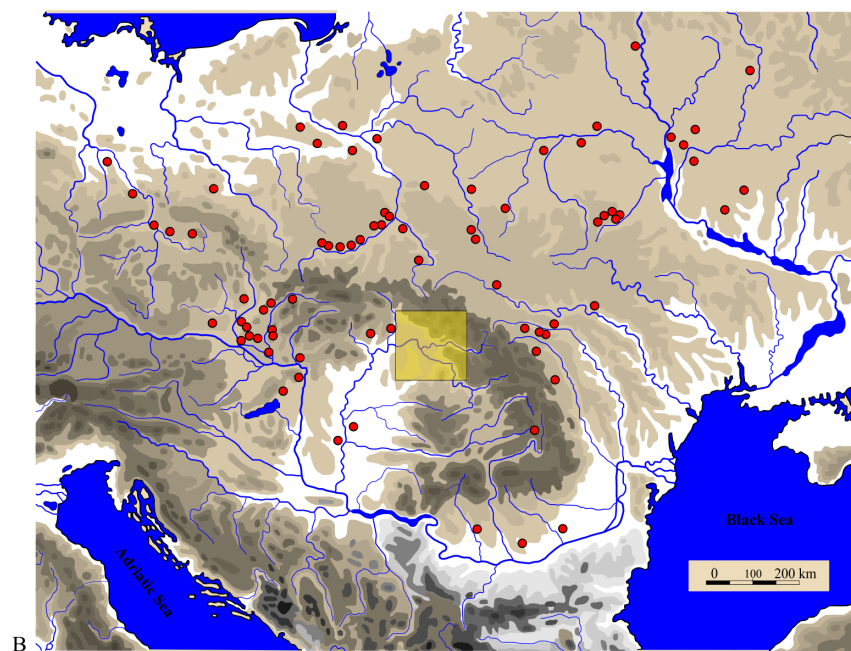
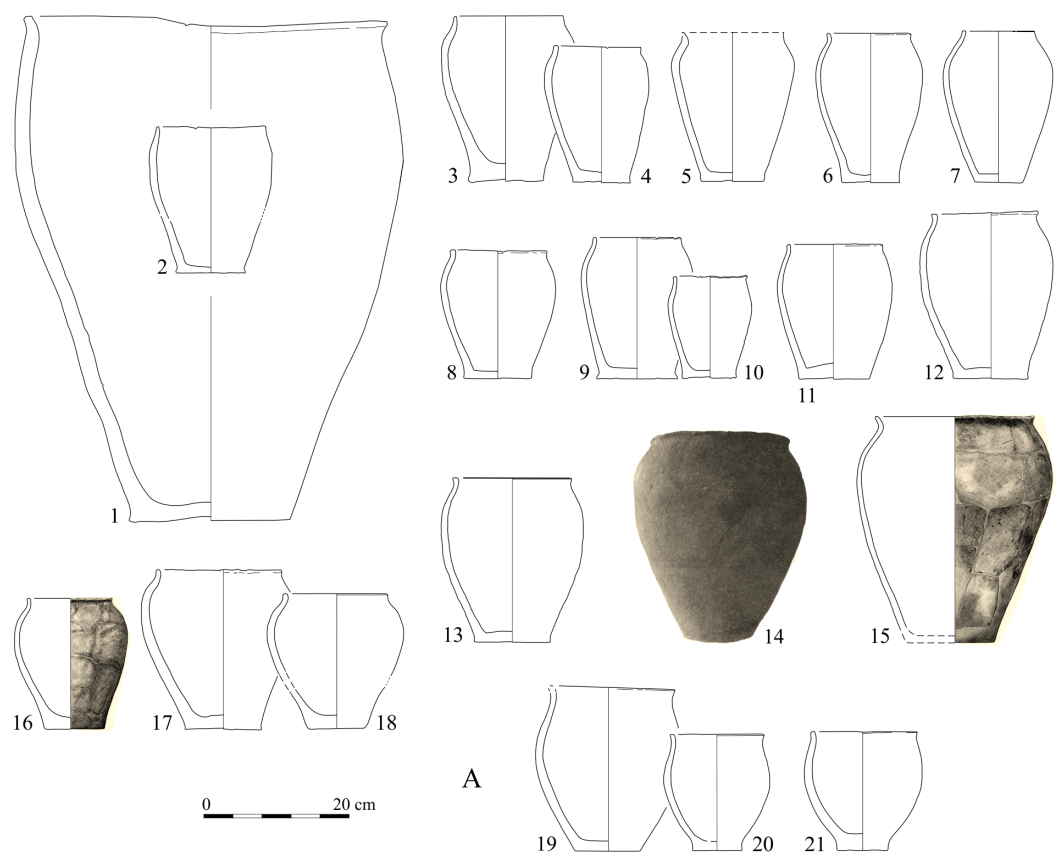


Fig. 16. A — examples of hand-made pottery from the Upper Tisa area whose parallels can be found in “Prague” / “Prague-Korchak” pottery (1–18) and “tulip-shaped” vessels, these common in the environment of the Bantserovshchyna-Tushemlya culture (or Tushemlya-Kolochyn group) of the Upper Dnieper region and Belarus (19–21). Northwest Romania: Lazuri-Lubi tag (3–4, 6, 10–11, 20–21); Zalău-Mihai Viteazul Blvd. (1–2, 8–9, 12–13); Culciu Mare-Zöldmező (18); Pişcolt-Nisipărie (17); Zalău-DROMET 2 (5). Source: STANCIU 2011. Northeast Hungary: 15–16, Sároszentpeter-Vasúti őrház (source: SAMU 2017). Eastern Slovakia: 14, Spišský Štvrtok-Pod Šibeničnou horou (source: KUCEROVA/SOJAK/KUSNIEROVA/FECKO 2012). 7, 19, Ciscarpathian Ukraine: Uzhhorod-Halaho (source: PENYAK 1980). B — the horizontal distribution of analogies for the whole vessels (handmade) from the Upper Tisa area, according to the classification proposed in STANCIU 2011, 173–229 (with various distribution maps and references to the places of discovery and bibliography). The yellow colored square delimits the region of the upper basin of the Tisa River.

(Zalău-Mihai Viteazul Blvd.), and 790 Pl. 179/5–6 (Lazuri-Râtul lui Béla). More likely they illustrate in the mentioned sites the habitation from the Roman or the Early Migrations periods.

¹⁴³ STANCIU 2011, 333 (hut no. 1a), 642 Pl. 32/6–6a. The vessel has an ovoid body, with a well-defined neck and a tall, strongly reverted rim that has an inside groove probably supporting the lid. The waved surface is not visible inside, and only some facets and striations can be noted, resembling the description of some vessels from the third phase of the Bratei 2 settlement (Transylvania), dated to the late 7th century (ZAHARIA 1994–1995, 324, 327), or a ceramic category modelled on the so-called “slowed wheel”, which was manual but had a higher speed, according to V. Teodorescu, and was used in Walachia between the last third of the 6th century and the end of the 7th century (TEODORESCU 1964, 489, 494–495).

¹⁴⁴ ZAHARIA 1994–1995, 346 Fig. 10/14, 349 Fig. 13/2; DOLINESCU-FERCHE 1984, Fig. 10/2; TEODOR 1984, 111 Fig. 32/1.

with the type IIA/e₁ of T. Vida (pottery made on the slow wheel), which illustrates a ceramic group specific to the eastern Pannonia in the late 6th century – first half of the 7th century (for instance, Fig. 18/5).¹⁴⁵ Another important observation: it is considered that these vessels can be compared, due to their shape and other characteristics with the pottery modelled on the fast wheel of the Early and Middle Avar period, which they imitate, being present precisely in the region in which important production centres are known during the Early Avar period, whose output was based on the use of fast wheel.¹⁴⁶ Fragments from the base and upper part of a jar modelled in the same way, using a fabric that resembles the one of the vessel from hut 1a, which was decorated with horizontal strips consisting of parallel lines, was found on the floor in hut 19 from the same settlement, next to the base of the clay block in which the oven was carved, so their relationship with this dwelling cannot be doubted (Fig. 18/3–4).¹⁴⁷

Nevertheless, the few examples of such vessels from north-western Romania are imports, albeit their origin is problematic. Before the Avar intervention in the Carpathian Basin, thus slightly after the middle of the 6th century, the lower Someş Basin (the north-eastern extremity of Hungary and the north-western part of Romania) were directly connected with the north-eastern periphery of the Gepid Kingdom.¹⁴⁸ Regardless of the beginning of Slavic habitation in this area immediately before or after the dissolution of the Gepid power structure, the theoretical possibility of the contacts between these two environments has to be taken into consideration, but these connections were weak, according to the available evidence (eventually the pottery in question, or the bone combs from the settlement at Zalău-Mihai Viteazul Blvd.). The vessel from hut 1a at Lazuri belongs to a context dated to the second half of the 6th century, while hut 19, from which two other fragments originate, was dated to the end of the 6th century – beginning of the 7th century.¹⁴⁹ As a consequence, the origin of these imports should be sought in those nearby regions in which such pottery was used and produced during the mentioned period. Thus, the entire region of the Middle Tisa or the Transylvanian Basin can be taken into consideration, both areas being at that date included into the Early Avar Qaganate. The vessel from Lazuri, which could have possibly been made on the slow or “slowed” wheel in the last instance, cannot be ascribed to the pottery commonly encountered in the earlier Gepid

environment, which was characterised by an accentuated moulding of the rim, the thin walls and the deeper grooves on the internal, and sometimes external, surface. More convincing is the comparison with the aforementioned type IIA/e₁ of T. Vida and with the material mentioned in central – south-eastern Transylvania (Bratei 2 settlement), the analogies being dated, according to T. Vida, to the end of the 6th century and the first half of the 7th century.

It would be interesting to see whether the pottery of this period, modelled on the fast wheel of a more or less fine fabric, and mostly the cooking ware having a sandy fabric, like the one identified southward the Romanian Carpathians and in Transylvania (and scarcely in Moldavia), and in the Early Avar Qaganate, has similar or different characteristics. Anyway, aside from the early Slavic environment, this ceramic category illustrates the adoption or perpetuation of some advanced technological elements and the existence of a local production in different cultural environments up to a certain part of the 7th century. In terms of the geographical area and the period we are interested in, there is now no evidence for the existence of a possible local production of fast wheel pottery, which continued the technological traditions of the Roman or Late Antique periods. However, the few examples already mentioned indicate tenuous contacts with more or less neighbouring communities, which at that time produced or used such pottery.¹⁵⁰

For the changes produced in the late 6th century and during the first half of the 7th century, an important clue is illustrated by the beginning of the process of receiving pottery made with the help of the slow wheel (vessels with specific decoration), ceramics which in the following period it became a veritable emblem of the early medieval environment over large areas. The tendency to more or less skilfully imitate the decoration (made with a comb-like tool) of the pottery modelled on the slow wheel was noted in only three cases (Fig. 17/23–25).¹⁵¹ The decoration on the upper part of the vessel found in hut 52 from Lazuri (Fig. 17/25) resembles the so-called “cassette ornament” which, according to Gabriel Fusek, is already present on the handmade pottery from Slovakia in the second half of the 6th century,¹⁵²

¹⁴⁵ VIDA 1999, 109.

¹⁴⁶ VIDA 1999, 107–109, 108 Fig. 35, 248–249, catalogue no. 382–383, Pl. 45/1–2.

¹⁴⁷ STANCIU 2011, 347, 689 Pl. 79/2–3. One fragment from the upper part of a vessel was found in the settlement from Zalău-Mihai Viteazul Blvd. (hut 18), in the filling of hut 18, between 58–65 cm deep from the current surface. Its very well fired fabric contains sand and gravel. The grey vessel is decorated slightly above the shoulder with a simple horizontal line, whereas the inside surface displays deep grooves resulting from the rapid spinning of the wheel (Fig. 18/2; see STANCIU 2011, 377, 750 Pl. 139/1). It is possible that it is from the Roman period, arrived by chance in the filling of this dwelling.

¹⁴⁸ The possible extension of the dating of the cemetery from Carei-Kozárd during a part of the Early Avar period was suggested, but this is still uncertain (STANCIU/IERCOŞAN 2003).

¹⁴⁹ STANCIU 2011, 282–301.

¹⁵⁰ Pottery kilns from nearby areas, but datable to the Gepid period, before the intervention of the Avars. Hungary: Törökszentmiklós (Cseh 1990); Transylvania: Sebeş-Valea Janului (RUSTOIU/TOTOIANU 2005, 469–471, 477 Fig. 2, 478–482 figs. 3–7).

¹⁵¹ The adoption of this decoration on the handmade pottery, which was generally used during the Early Medieval period on the on wheel-made vessels happened in the contact areas with the Late Antiquity pottery. This might have happened earlier in the lower Danube region, according to one opinion, probably in the 6th century (PARCZEWSKI 1993, 60), but other regions should be also taken into consideration (MACHÁČEK 1997, 354–358; LADSTÄTTER 2000, 162–163; STANCIU 2021). One eloquent example, in which the decoration of the wheelmade pottery (workshop production) was copied, in PALIGA/TEODOR 2009, 147 Fig. 24. Such a decoration appears in identical forms on vessels modeled on the slow wheel (with morphology and fabric comparable to early medieval pottery) from the Tisza Plain and even Transylvania, belonging to a horizon datable to the late 4th century and the first half of the 5th century. For instance, MASEK 2012, 51, 55, TRIFUNOVICH 2017, and KAPCSOS/MÁRGINEAN 2020, 191–192.

¹⁵² FUSEK 1994, 306. On another handmade vessel from a context from Murska Sobota–Nova table (Slovenia), dated to the first half of the 7th century (GUŠTIN/TIEFENGRABER 2002, 50 Fig. 7/3). An association of decorative elements resembling the one on the fragment found at Lazuri

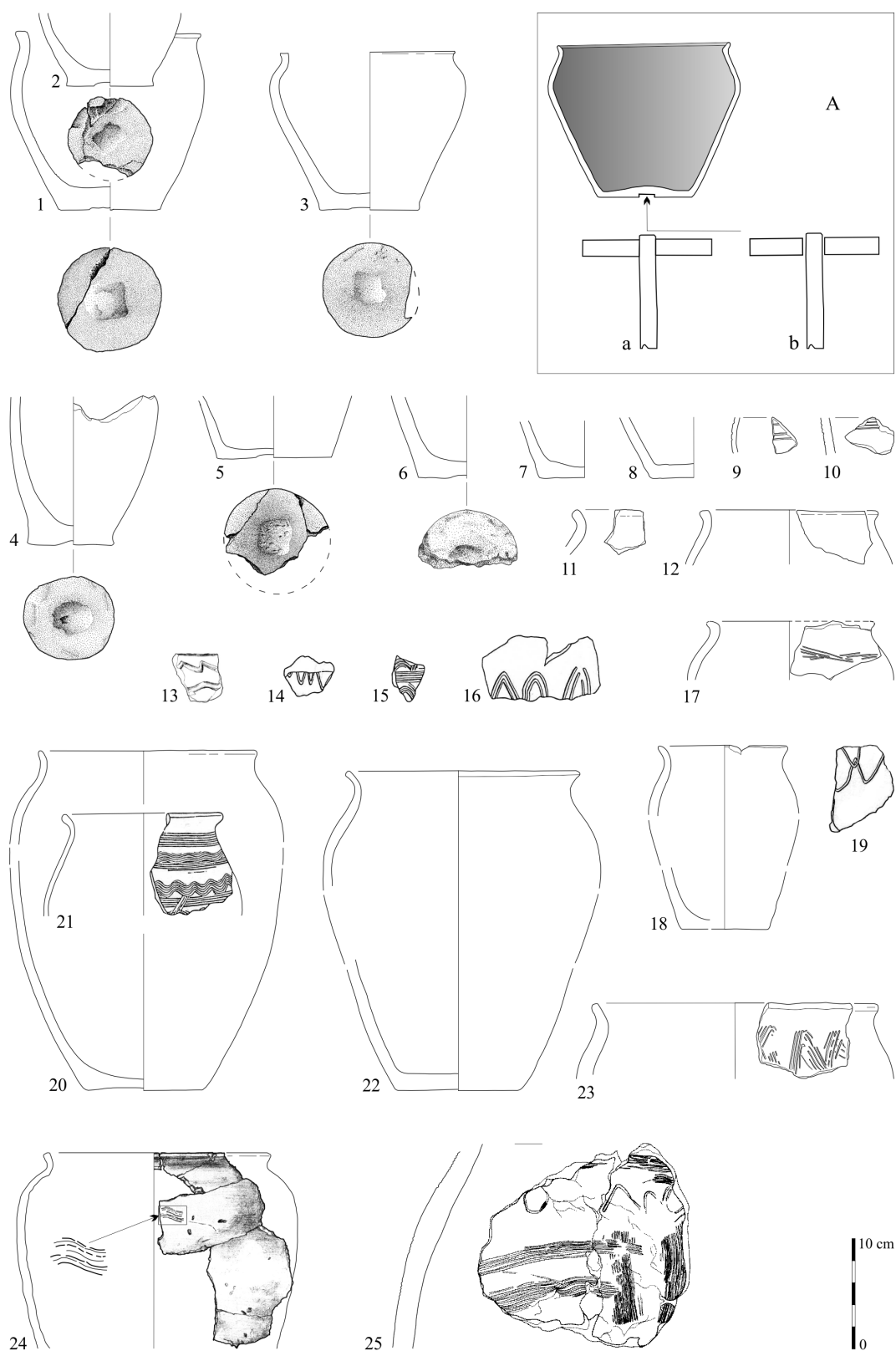


Fig. 17. Handmade pottery, decorated (16, 19, 23–25) and made on a slow wheel, with or without decoration (1–15, 17–18, 20–22), in this case often being visible on the bottom of the vessels the imprint of raised spindle of wheel. Settlements in the north-western part of Romania, dating earlier in an alleged regional phase IIb, positioned towards the end of the 6th century and in the first third or half of the 7th century: Zalău–Mihai Viteazul Blvd. (1–8, 12); Lazuri–Lubi tag (9–11, 25); Zalău–Valea Mății (17) (source: STANCIU 2011); Tășnad–Sere (24) (source: STANCIU/VIRAG 2013). Settlements in the northeastern part of Hungary, more certain dating in the latter part of the 6th century and the first third or half of the 7th century: Sajószentpéter–Vasúti őrház (13) (source: SAMU 2012). Settlements located in the southwestern part of Slovakia, material dating from the second half of the 6th century and the first half of the 7th century: Nitra–Mikov dvor (14–16, 18, 20–22); Siladice–Bodoš I (19) (source: FUSEK 1994). A — Manufacture of vessels, with visible trace of the raised axis of the potter's wheel (easy graphic processing after KEMPKE 2001).

but is more commonly encountered on wheel-made vessels of the following period.¹⁵³ The handmade comb-decorated pottery and also the majority of the fragments only bearing simple lines come from contexts which in northern Romania were ascribed to the more recent phase IIb, for which the positioning in the first third of the 7th century was proposed.¹⁵⁴

In comparison with the handmade vessels which were more carefully modelled and finished, the identification of the examples illustrating the pottery modelled on the slow wheel (it should in this case be a kind of *tournette*) raises some problems. Sometimes the vessels were initially handmade and were then finished on the wheel, especially their upper part, but traces of this action can be hardly identified. If there were such cases amongst the analysed material, they remained un-identified. Most probably the use of this hybrid technique indicates the phase corresponding to the adoption of the pottery wheel, when the craftsman was less familiarised with it.

In the case of the two complete vessels (bowls) and the fragments of the

comes from a context belonging to the latest local phase III from Roztoky (KUNA/PROFANTOVÁ 2005, 507 Fig. 258/1).

¹⁵³ GUTJAHR 2002, 148 Fig. 1, 149–150.

¹⁵⁴ STANCIU 2011, 288–298.

lower part of other vessels (one of them is surely a jar), there are shallow cavities mainly having a rectangular and rarely a circular shape on the external surface of the base, corresponding to its centre. Almost without exception, they were considered to be related to the technology that implies the use of a simple (operated by hand) wheel, being produced by the raised axis of the device.¹⁵⁵ The comb-made decoration, commonly encountered on the early medieval pottery, is rarely present, this observation being also supported by the complete vessels that are undecorated (Fig. 17/1.3.18.20.22).

About the northwestern area of Romania, amongst the entire analysed assemblage (complete vessels, fragments

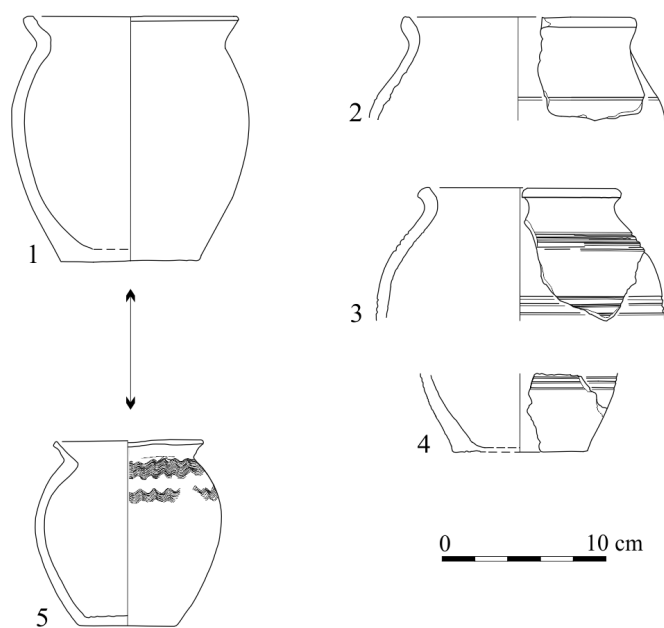


Fig. 18. Pottery modelled on the fast wheel (2–4) and on the so-called ‘slowed wheel’ (1, 5), this a supposed intermediary form between the fast and the slow wheel (after Teodorescu 1964). Lazuri-Lubi tag, huts 1a (1) and 19 (3–4). Zalău-Blvd. Mihai Viteazul 104–106, hut 18 (2). Source: Stanciu 2011. 5, Budakalász–Dunapart, grave 855, vessel thrown at the slow-wheel, type IIa/e1 (source: Vida 1999).

¹⁵⁵ FRIESINGER 1971–1974, 36. The opinion of R. Pittioni is also cited, that these imprints are not a technological element, being created after the vessel’s modelling. The majority of the specialists support the opposite opinion, for example: GUTHNICK 1988, 98–99 (cavities of 1–4 cm); SZYMANSKI 1967, 344; COMŞA 1973a, 170; MAJ 1990, 25; DAIM 1994, 36; CEC 1994, 59. However, it has to be noted that the well-known manual wheels, like those from Deda (Romania) or Herbignac-Landieu (France), are lacking a raised axis (GODEA 1982, 35–36 figs. 19–20). There are fewer analogies for the rectangular cavities (in general having larger dimensions in comparison with those from north-western Romania), and it has been considered that these vessels were handmade (FUSEK 1994, 359 Pl. XLV/10; PARCZEWSKI 1993, 200 Pl. XXVI/16; PODGÓRSKA-CZOPEK 1991, 35 Pl. I/1; RUSANOVA/TIMOSHCHUK 1984, 76 Pl. 19/2, 83 Pl. 33/4), but some analogies surely modelled on the slow wheel can be also provided (KRASKOVSKÁ 1972, 153 Pl. 50/5; DOSTÁL 1975, pls. XXV/7, LXVI/4–5; STAŇA 1994, 271 Fig. 6/6, in this case with a polygonal imprint). Similar cavities are also known on the pottery from the Central European *Barbaricum* (Roman Imperial period), and the modelling on the slow wheel or on another rotating device was presumed in these cases (GEISLER 1984). The wheel’s axis could have had a circular cross-section, but the protruding segment that secured the disk had a rectangular cross-section, offering an increased stability of the vessel during the modelling process.

of the upper part and bases, decorated fragments), including 592 ceramic pieces, only 14 certainly illustrate the pottery modelled on the slow wheel, representing only 2.36%. Most of these finds are concentrated in the settlement from Zalău-Mihai Viteazul Blvd. (4.08% of the assemblage from this site), while only three examples come from the settlement at Lazuri-Lubi-tag, representing slightly over 1%.¹⁵⁶ Aside from the chronological relevance, the scarcity of the decoration and the reduced percentage of this ceramic category within the entire assemblage can be explained only in relation to the early stage of the adoption of the pottery wheel in the early Slavic environment from the Upper Tisza region. This is just the beginning of a lengthy process through which the workshop production gradually replaced the domestic manufacturing of the ceramic vessels. This phenomenon already appeared in north-western Romania not later than the first third of the 7th century.¹⁵⁷

According to a reasonable estimate, the spread of pottery made with the (slow) wheel occurred in the Slavic environment during the 7th–8th centuries.¹⁵⁸ The initiation of a more or less organized production would have had place in the case of Central Europe during the interval delimited from the end of the 6th century and the middle of the 7th century, but the opinions expressed do not always coincide.¹⁵⁹ The late antique origins of the early medieval slow-wheel pottery have always been indicated, regardless of whether the references are to the central-southeastern area of the Alps Mountains (i.e. south-central part of present-day Austria, northeastern Italy and Slovenia), or to the regions of Middle or Lower Danube.¹⁶⁰ The changes produced in the field of pottery production during the last third of the 6th century and the first third or half of the 7th century, i.e. immediately after the installation of the Avars in the Carpathian Basin, are more difficult to specify.

Structures with economic or mixed functions, other domestic features inside the settlements. The structures that must have had an exclusively economic role include, in the first instance, the outdoor (isolated) domestic clay ovens, which are less numerous. Regarding the area of interest here, such ovens were reported only from the now known settlements in north-western Romania, namely

¹⁵⁶ STANCIU 2011, 246–247.

¹⁵⁷ STANCIU/BADER 2003, 134–135.

¹⁵⁸ VARADZIN 2010, 19.

¹⁵⁹ About the area of interest here, is the case of today’s Slovakia: such vessels would be missing in the 6th century (BIALEKOVÁ 1962, 148 and ZÁBOJNÍK 1988, 432), but after a further examination of the pottery there, slow-wheeled and comb-decorated vessels were already in use in the second half of the 6th century, at the latest towards the end this century and the beginning of the 7th century (FUSEK 1992, 294 and FUSEK 1994, 306). It is unlikely that wheel-shaped pottery (slow wheel) predates the 7th century in the Ukrainian region of the Upper Tisa (Zakarpatt’ia), where the full spread of this technological category would have occurred only in the second half of 9th century; hand-made vessels being the most numerous until the turn of the 8th/9th centuries (KOTIGOROSHKO 1977, 97 and FYLYPCHUK 2008, 95–96).

¹⁶⁰ Applied to the Carpathian Basin and neighboring areas, more recently an examination about the early medieval pottery made on the slow wheel, technological aspects, precedents and the period when it began to spread, in STANCIU 2021.

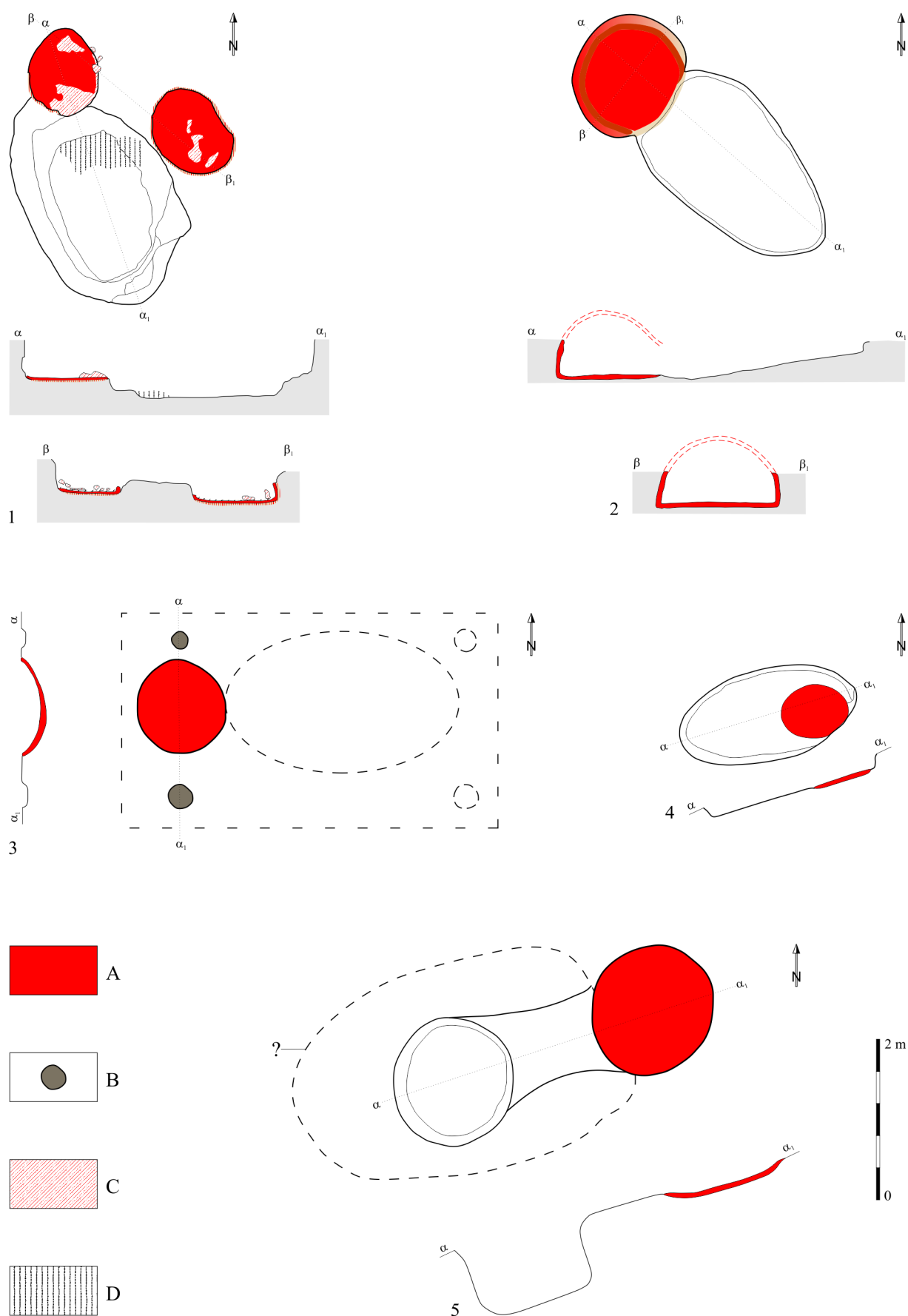


Fig. 19. Outdoor domestic clay ovens (it is possible that example no. 4 indicate a simple hearth, used at the bottom of a pit, and in connection with which many fragments of an oval roasting tray was found). Lazuri-Lubi tag, feature 18 (source: STANCIU 2011). 2, Zalău-Mihai Viteazul Blvd., feature 01 (source: STANCIU 2011). Badon-Doaște, features 26 (3), 17 (4), and 22 (5) (source: STANCIU/BĂCUEȚ-CRIȘAN 2018). A — oven hearth (oven base). B — posthole. C — debris fallen from the walls and vault of the oven. D — charred wood debris and ash. 1.

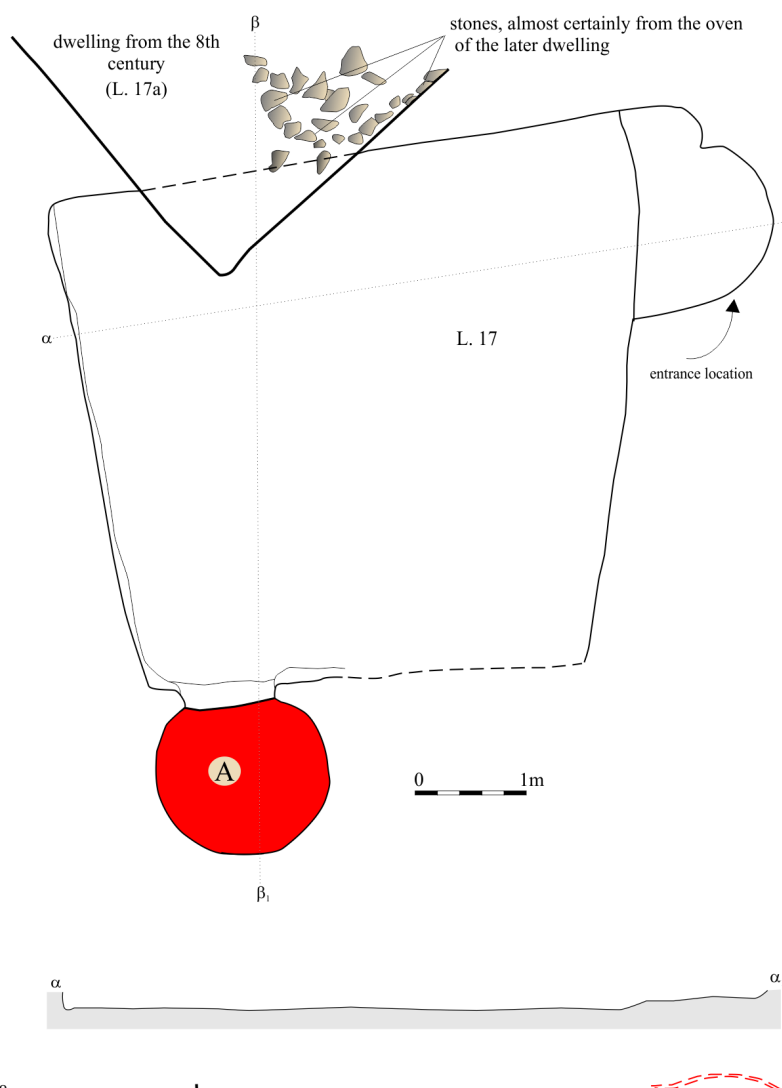


Fig. 20. Zalău– Mihai Viteazul Blvd., structure no. 17, from the beginning provided only with an oven hollowed in one of the walls. A — oven hearth (its base).

Lazuri–Lubi tag, Zalău–Mihai Viteazul Blvd., Tășnad–Sere, and Badon–Doaște.¹⁶¹

The oven from the Zalău settlement was located slightly outside the perimeter of the habitation, to the south-east, at a distance of 13–16 m away from the nearest dwellings (Fig. 19/2).¹⁶² For the oven from Lazuri, the planimetry of the settlement indicates the same slightly eccentric position, as it was located at about 8 m away from the nearby dwellings.¹⁶³ Traces of a protective roofs were rarely found, although they would have been necessary to protect against excessive humidity during rain.¹⁶⁴

¹⁶¹ STANCIU 2011, 343, 375–376, 675 Pl. 65/1, 747 Pl. 136/1–2 (Lazuri and Zalău); STANCIU/VIRAG 2013 (Tășnad). Two such ovens were reported from the Badon–Doaște settlement (STANCIU/BĂCUEȚ-CRIȘAN 2018, 361–363, 381 Fig. 8/1.4, 384 Fig. 11).

¹⁶² STANCIU 2011, 116 Fig. 21.

¹⁶³ STANCIU 2011, 115 Fig. 20.

¹⁶⁴ For the purposes of this explanation, the example of structure no. 26 from the Badon settlement, in connection with which it was possible to identify only two postholes (Fig. 19/3). The stoking pits of these ovens have an oval shape, with an area of about 3.6 m² and 3.1 m² respectively – a nearly similar value – and a depth of 70–80 cm from the ancient stepping layer. The pit from Lazuri served two ovens (it is impossible to say whether they were

Similar ovens are relatively scarce in settlements of the Prague culture, but as a distinct structure they are known in the Carpathian Basin at least from the Roman period and until the Late Medieval period.¹⁶⁵ The function of these ovens can be rarely certainly identified, being probably used mainly for baking bread, but also for drying cereals or smoking meat.¹⁶⁶

Several installations of this kind, without the intermediary grate but sometimes having exhaust vents, are known in the Romanian territory southward the Carpathians, being surely used for pottery firing (wheelmade and handmade vessels were found in two cases).¹⁶⁷ Kilns which were primarily used for pottery firing are not mentioned in the 6th – 7th century in the Slavic environment from eastern or central Europe, so it has been presumed that the vessels were fired on an open fire.¹⁶⁸ However, ceramic firing in ovens carved out of the structures' walls is mentioned in these regions during the Early Medieval period, as fragments of unfired vessels were sometimes found inside them.¹⁶⁹

The oven from Zalău–M. Viteazul Blvd. covers a large surface and its vault was probably unusually tall in comparison with those of the ovens carved out of the dwellings' walls, so it might have been used not only for bread baking, but also for pottery firing. Since the first attempt to produce pottery on the slow wheel (or as a test) was noted in the settlements from Lazuri–Lubi-tag and the already mentioned settlement from Zalău as the beginning of a specialised production, one may also take into consideration the need to set up particular structures (in which the vessels were eventually even modelled) including larger ovens in which the pottery was fired. As already presumed, the ovens carved out of the

used concurrently), the hearths having slightly different depths and being raised above the floor. On the basis of the preserved height of the oven from Zalău, of 40 cm, the maximum estimated height of the vault could have been of 70–80 cm. The base area of the two ovens from Lazuri is of 0.8 m² and 0.75 m² respectively, while that of the one at Zalău is of 1.6 m². An isolated open-air oven (feature 50a) was identified on the southern limit of the investigated area from the settlement at Lazuri–Lubi-tag, having the hearth above the stepping layer or slightly sunken and the walls built of clay (only a small height toward the base was preserved), eventually consolidated with fragments of clay "rolls" (STANCIU 2011, 356–357, 726 Pl. 116/15). The layout of this oven, perhaps built on a wicker structure, is basically similar to that of the oven from dwelling 17 (last phase) of the same settlement, but in this case, it was raised above the clay block of the initial oven (STANCIU 2011, 342, 668 Pl. 58).

¹⁶⁵ ŠALKOVSKÝ 2001, 123; FUSEK/ZÁBOJNÍK 2010, 166–167.

¹⁶⁶ For instance, RUTTKAY 2002, 276.

¹⁶⁷ Radovanu (DOLINESCU-FERCHE 1984, 129 Fig. 5/1); Dulceanca I (DOLINESCU-FERCHE 1969); Bucharest–Sf. Ioan cel Nou St. (TEODORESCU 1972, 75, 76 Fig. 1); București–Dămăroaia (ROSETTI 1934, 212).

¹⁶⁸ ŠALKOVSKÝ 2001, 123; KOBLYŇSKI/SZYMAŃSKI 2005, 63–64; FUSEK/ZÁBOJNÍK 2010, 166–167.

¹⁶⁹ MAHOMEDOV/SMILENKO 1990, 399.

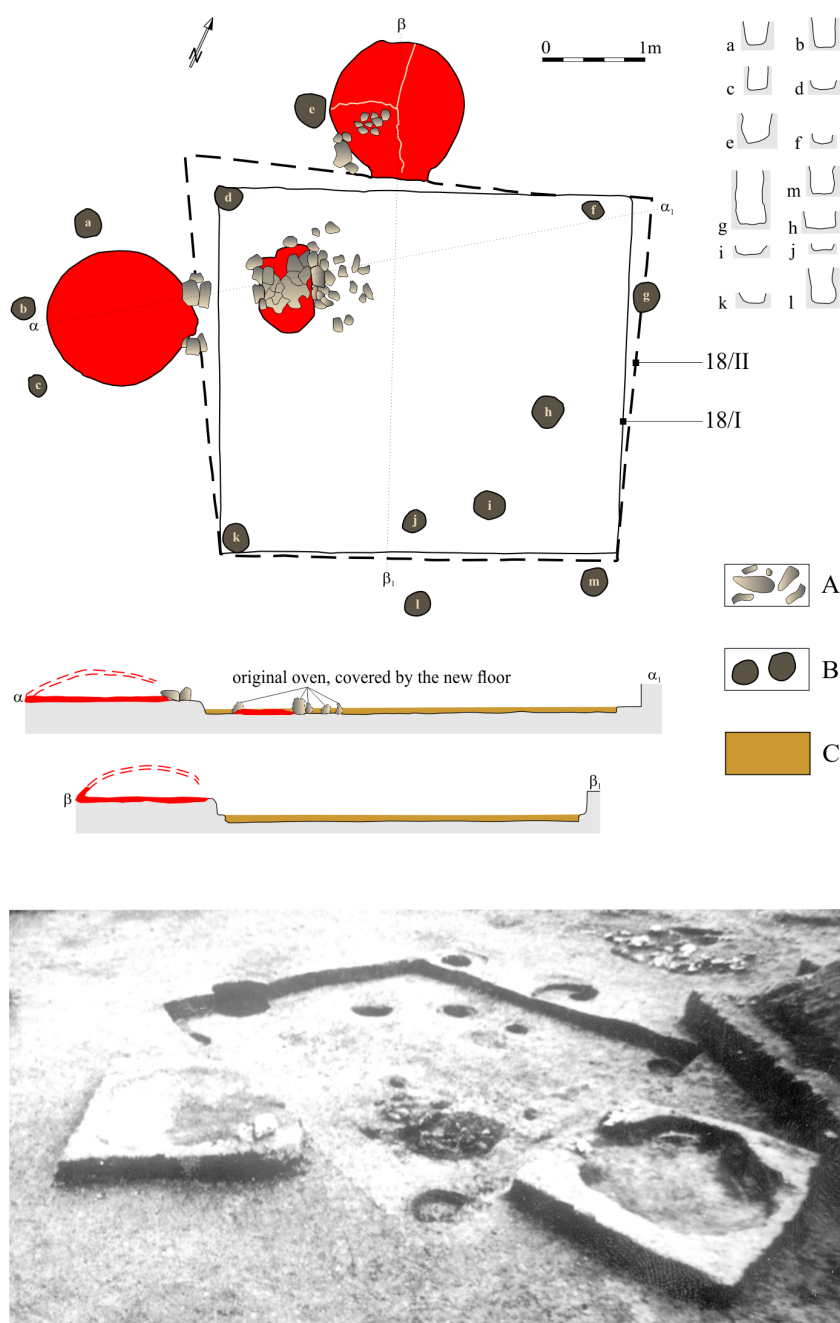


Fig. 21. Zalău–Mihai Viteazul Blvd., dwelling no. 18 (I), repaired and then more likely used as a structure with an economic or mixed role (II). Light graphic processing after STANCIU 2011 (photo by Alexandru V. Matei, County Museum of History and Art, Zalău). A — stones. B — postholes. C — rammed clay, which indicates the floor of the new construction and which covered the oven inside the dwelling 18 (I).

dwelling's walls or even the indoor ones might have also been used for pottery firing (mostly small vessels), especially when they have larger dimensions, albeit for a domestic production which was sporadic and unorganized.¹⁷⁰

Moreover, a series of domestic crafts were practiced inside the dwellings, like spinning, weaving, or wood and bone carving, although these are not always visible archaeologically. The use of some of the ovens carved out of the walls, or of the main fire installations set up in the dwelling's corner, also for metal smelting and processing

might be also taken into consideration.¹⁷¹ In several cases different tools, which were certainly used in these activities, were found in structures considered to be dwellings.¹⁷²

A structure whose primary function must have been related to manufacturing was discovered in the settlement from Lazuri-Lubi-tag (sunken building 51). A series of details differentiate this 'hut' from the settlement's dwellings, including the planimetry having an elongated trapezoidal shape with rounded corners and the indoor fire installation consisting of a hearth set up on a low base (Fig. 23/1a–b.2). An oven, whose hearth was once repaired, was carved out of the southern walls of the structure. Unusually, the indoor hearth was located on the western edge of an oval pit which contained many small fragments of clay "rolls", probably also coming from some loom weights. Regarding this pit, the most plausible explanation is that it allowed better access to the hearth as a working place for one standing individual who performed repetitive operations (the distance between the pit's bottom and the hearth's level is of nearly 80 cm). Several pits (a, h and i) were located in the southern third, in front of the wall into which the oven was cut out, of which some are shallow, more likely resembling the cavities created by the intensive erosion of the floor. Slightly deeper is pit g, which is joined to the south-eastern corner of the dwelling by the "pits" h and i, having a nearly rectangular shape. The interpretation of these cavities as traces of a vertical loom, whose working area was eventually the pit g, is uncertain, but several fragments of loom weights, some of them partially reconstructed, were discovered precisely in this part of the dwelling, on the floor or in the filling of these cavities (Fig. 23/3–6). Taking also into consideration the area occupied by the timber walls along the entire perimeter of the structure, it is less likely that a reasonably-sized resting (sleeping) space would have existed inside, so the exclusively economic function of this structure seems to

¹⁷¹ TEODOR 1996, 30. A clay mould and, even more importantly, a few bits of melted bronze were found in one of the isolated ovens from the settlement at Lozna, Moldavia (TEODOR 2011, 36).

¹⁷² For example, dwelling 36 from Bernashivka, containing 64 stone moulds (Vinokur 1998) or a pit-house from the settlement at Bucharest–Str. Soldat Ghivan Nicolae, containing one mould, type moulds for earrings, one clay spoon, tools and waste (TEODORESCU 1972, 77). See also TEODOR 2001, 45. However, in the absence of other more reliable indications (for example the association of some artifacts like those mentioned with scraps of molten metal) it is not certain that metallurgical activities were practiced inside such constructions.

¹⁷⁰ TEODOR 1996, 54 and TENTIUC 1996, 107.

be certain, although the nature of these activities cannot be properly identified.

There are several reasons to believe that also sunken building 23 (partially cut by pit-house 20) from the same settlement at Lazuri was a workshop (Fig. 22). First and foremost, the structure seems to lack an indoor oven. In comparison with the building's dimensions, the oven carved out of the north-eastern wall, with a surface of 1.45 m², is very large. One side of a bivalve mould was discovered next to the clay block in hut 20, but it might have come from the scattered filling of structure 23 (Fig. 22). Ultimately, all these observations support the possible interpretation of structure 23 as a workshop in which metal, more probably bronze, was smelted and processed. Perhaps pit-house 20 was in fact the reconstruction of the same workshop (destroyed by a powerful fire) partially on the same spot, an argument for this explanation being the presence of the hearth bordered by daubed wicker inside the new construction, an exception among the proper dwellings from Lazuri.

In one situation (the second phase of pit-house 18 from the settlement at Zalău-M. Viteazul Blvd.) the changing of the dwelling's function can be observed (Fig. 21).¹⁷³ The partially deteriorated dwelling was turned into a structure with an economic or mixed function, in which at least one person could live, with the exception of the cold season. A layer of clayish soil was laid on top of the floor of the initial dwelling, also covering the remains of the indoor stone oven. A new construction was then set up on the slightly extended surface, reusing the pre-existing timber structure. The new structure more likely resembled a shed and included two ovens carved out of the walls, which were probably protected by a light roof connected with the base of the main roof. Given the lack of details, it is more likely that the two ovens were used for baking bread and flatbread, for cooking in general and eventually also for pottery firing. Some other domestic activities were carried out inside this construction, in which supplies were also stored. Sometimes this kind of structures having mixed functions were conceived and built right from the beginning, for example sunken building 17 from the same settlement at Zalău, which had only a hollow oven in one of the walls (Fig. 20)

From the Kisvárdá-Aldi settlement, partially sunken structures without fire installations have been reported, whose economic functions are recognized, but their specification remains obscure or questionable, the collected inventories not being of much help; it is assumed that, on a case-by-case basis, they could be storage spaces or spaces where certain activities were carried out.¹⁷⁴

Only as a hypothesis, two smaller pits from the settlement at Lazuri could belong to this habitation, one being shallower and having a circular shape, and another slightly deeper and having an elongated oval shape, with the lower half horizontally carved out, suggesting that it was more likely used for clay extraction.¹⁷⁵ A few such pits

also in the Kisvárdá-Aldi settlement.¹⁷⁶ Unless the storage pits (containing mainly cereals), but also waste pits (?), were located somewhere in the proximity of the settlements, in un-investigated areas, then the extreme rarity and eventually even their absence inside these settlements from the Upper Tisza region could have been determined by the characteristics of the humid soil resulting from the higher level of the water table, so the storage practices could have been different.¹⁷⁷

A compact deposit consisting of fragments of clay fired clay "rolls", clay "breadcakes" and loom weights was identified on the ancient stepping layer, on a reduced area (1.14 × 0.80 m) from the settlement at Lazuri (feature 56).¹⁷⁸ This is more likely a careful depositing of these remains, although the possible laying out of the soil could also be taken into consideration, perhaps for a small granary (from which nothing else was identified?), whose base was insulated in this way. In other geographical areas sometime huts included pits that were used like "cellarages", probably for storing grain in particular.¹⁷⁹

The rarity of domestic annexes, properly identified irrespective of their function, seems to be specific to the early Slavic settlements.¹⁸⁰ In general, it is credible that they were built above ground or they were too shallow in the ground, which makes the identification of their planimetry quite difficult,¹⁸¹ as it is already known that in certain cases they were grouped in a particular area of the settlement.¹⁸² Cattle stables or independent structures, for example barns, are not certainly attested.¹⁸³ At the same time, the commonly tight grouping of the dwellings (which excludes the possibility of building annexes next to them) supports the presumption that households (farmsteads) reciprocally delimited and owned by a single family were absent in the early Slavic environment, a situation that points to the lifestyle of some communities having less differentiated economic and social structures.¹⁸⁴

Food sources

Soil working. It is commonly thought that cereal cultivation was an important, if not fundamental, activity in the economy of the early Slavic communities. This presumption was mainly supported by linguistic arguments (ancient agricultural terminology in Slavic languages)¹⁸⁵ and

¹⁷³ STANCIU 2011, 376–377, 749 Pl. 138.

¹⁷⁴ SAMU 2012, 75 (feature 46), 83–84 (features 16 and 16/01), 84 (feature 11), 84–86, with references to illustration.

¹⁷⁵ STANCIU 2011, 726 Pl. 116/12.14.

¹⁷⁶ SAMU 2012, 76 (feature 47), 76–77 (feature 57), 82 (feature 1), with references to illustration.

¹⁷⁷ Storage pits (usually deeper than the ones under discussion) are also relatively few in the Roztoky settlement (in Bohemia), with 122 investigated dwellings and only 35 such pits, especially if we take into account the fact that the habitation there evolved during several chronological phases. Most of the storage pits were grouped in the northern part of the site. See KUNA/PROFANTOVÁ 2005, 117–118.

¹⁷⁸ STANCIU 2011, 638–639 Pl. 29/1, 725 Pl. 115/9.

¹⁷⁹ KUNA/PROFANTOVÁ 2005, 114;

¹⁸⁰ For instance, DONAT 1980, 74–75, 77 and BARAN 1990, 224–225.

¹⁸¹ DONAT 1980, 126. In the settlements of the 6th–7th century, above ground structures without fire installations were frequently identified southward the Carpathians in Romania. See DOLINESCU-FERCHE 1984, 126.

¹⁸² RUSANOVA 1976, 48–49.

¹⁸³ DONAT 1980, 74, 80.

¹⁸⁴ For example, DONAT 1980, 126, 130 and ŠALKOVSKÝ 2001, 120.

¹⁸⁵ E.g. NIEDERLE 1926, 184–199 and PRONK/PRONK-TIETHOFF 2018.

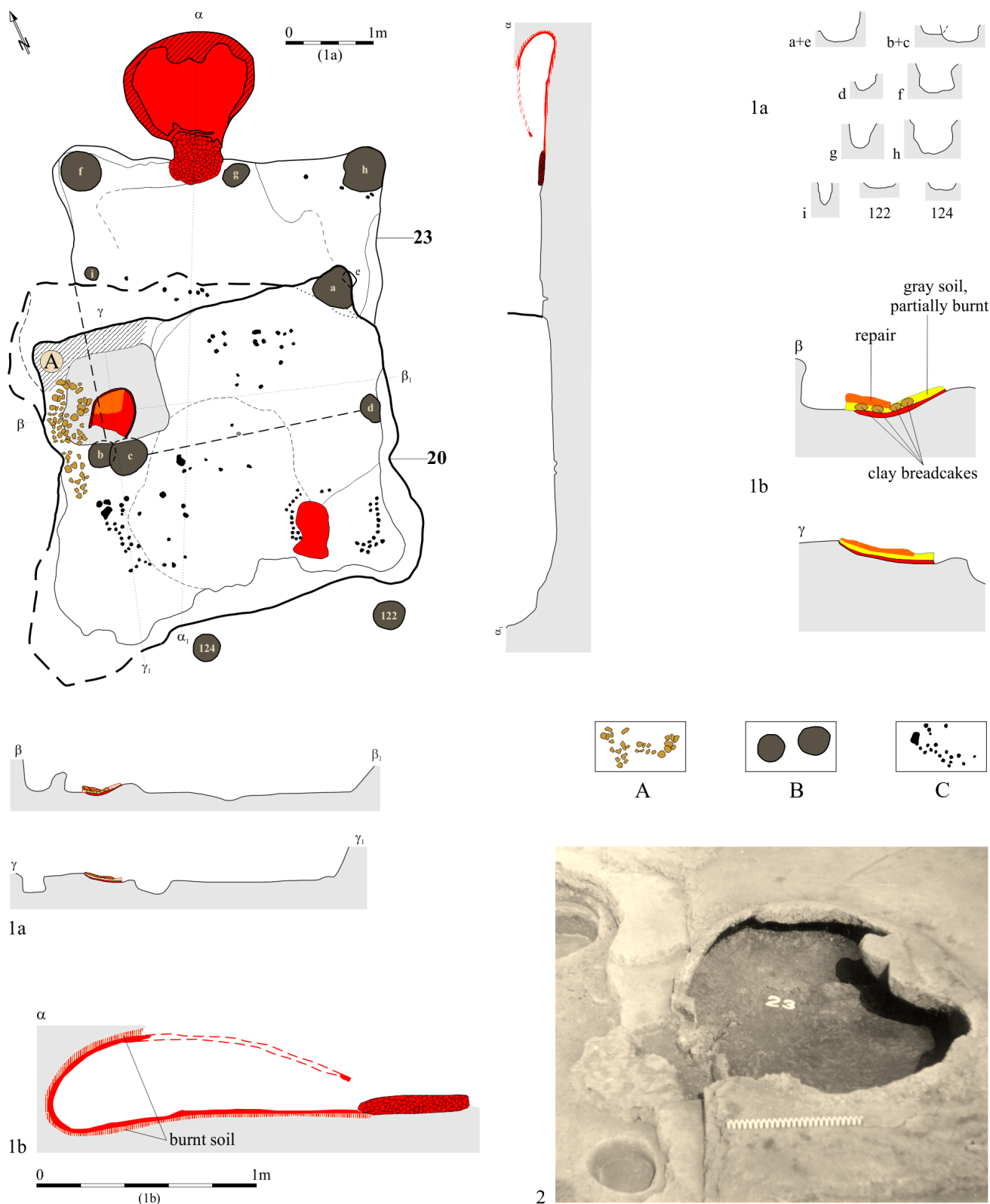


Fig. 22. Structure no. 23 from the settlement at Lazuri-Lubi tag, intersected by dwelling no. 20 (2 — carved oven in the northeast wall). A clay mould comes from dwelling 20. Light graphic processing after STANCIU 2011. A — clay “breadcakes” and “rolls”. B — postholes. C — stake-holes.

the information provided by some written sources of the 6th – 7th centuries.¹⁸⁶

¹⁸⁶ For example, briefly presented in PARCZEWSKI 1993, 108–109. Extensive agriculture and exhaustion of the soil determining the communities’ mobility (GORBANENKO/PASHKEVICH 2010, 91–92, 266–267; CURTA 2019, 420–423). An explanation that was contradicted

These sources reference a Slavic population (*Slaveni*) that lived in the northern vicinity of the Inferior Danube regarding the settlements in the southern Carpathian area of Romania. That is, the frequent moving of the settlements – these, as usual, with a very thin or non-existent layer of culture – would be due to the political instability in the region. Also, the assumption that the economy of the local population was mainly based on cattle breeding, and intensive grazing could cause a change in the location of settlements (PALIGA/TEODOR 2009, 124–125).

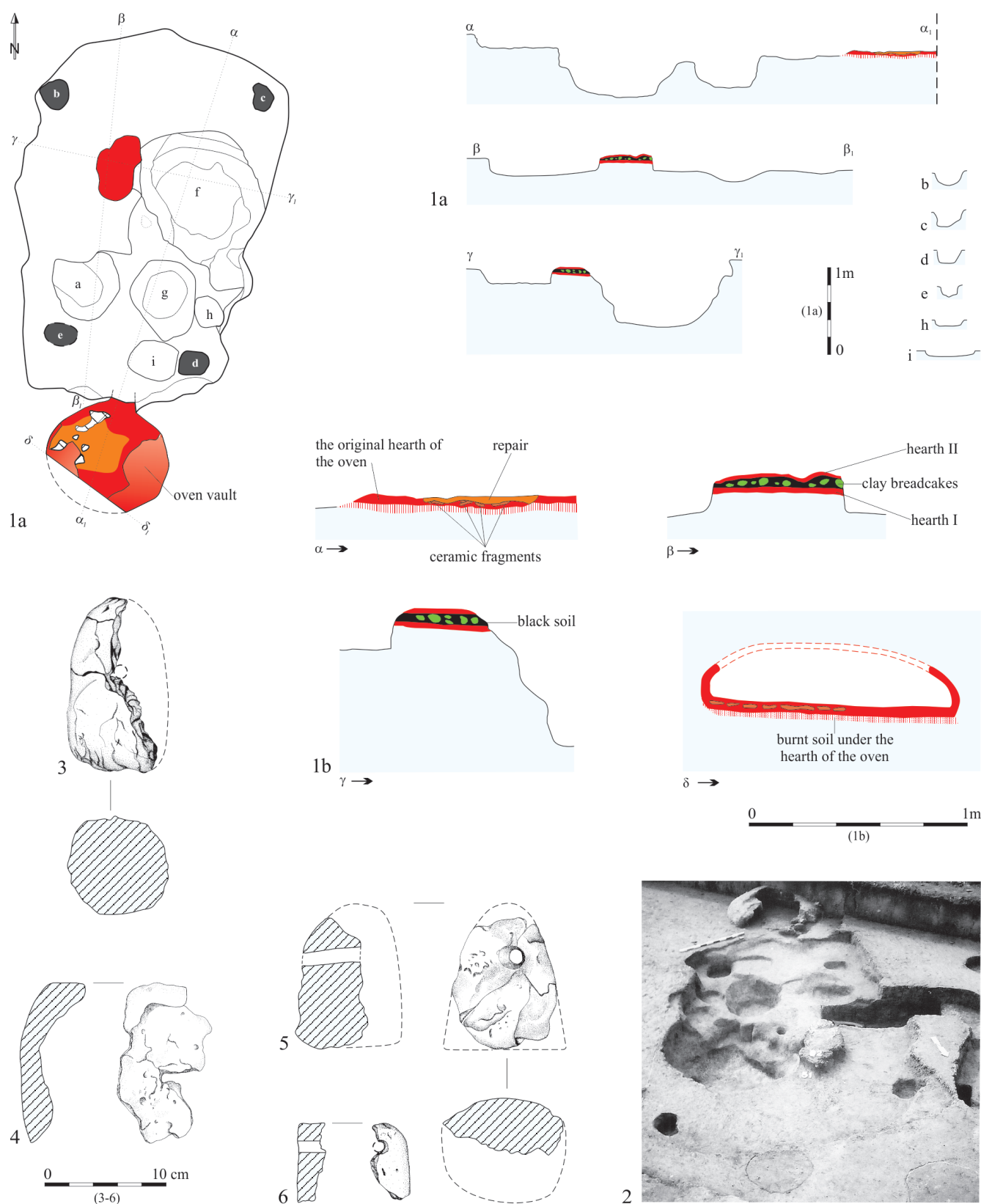


Fig. 23. Structure no. 51 from the settlement at Lazuri-Lubi tag (1a–b, 2), in connection with which many fragments of clay weights for the vertical loom were found (3–6). Light graphic processing after STANCIU 2011.

during the 6th – 7th centuries,¹⁸⁷ but there are too few

¹⁸⁷ For instance, COMŞA 1973b, COMŞA 1975b, and TEODOR 1994. However, it is an interpretation that has been criticized. To be seen CURTA 2001a, with the conclusion "... the Slavs were an invention of the sixth century.", "... the Slavene ethnicity is likely to have been an invention of

archaeological indicators for this important economic activity in the settlements that can be dated to this period. It is unclear

Byzantine authors..." (p. 335 and 344). Also, the same Florin Curta (1994) has a remarkable critical examination of the changing positions from which the theme was debated in Romanian archaeological historiography and literature.

whether iron tools, necessary for soil cultivation, were used,¹⁸⁸ and there are fewer storage pits, similarly to the Upper Tisa region and other places.¹⁸⁹

In general, in the settlements under discussion (6th – 7th centuries) there are sporadic findings of iron objects and agricultural artefacts. The repurposing of such objects¹⁹⁰ cannot fully account for this extreme scarcity, more so since in the previous period and especially in the Chernyakhov culture, the situation was different. This situation was also different in the next stage (8th – 9th/10th centuries), when agricultural progress is indisputable.¹⁹¹ We should not forget that plows built entirely out of wood, which can only ensure superficial plowing, and other soil working tools that have been used for a long time, until the Middle Ages, were not preserved most of the time.¹⁹²

The floodplains of rivers could be easily cultivated using these tools and fertilized by mud accumulation. These tools could also be used for slash-and-burn agriculture.¹⁹³ Bordering towards the north-east the slopes of the Carpathian Mountains, the region of the Upper Tisa Basin was always wooded, and the micro-toponymy indicates, at least for the region of the Ukrainian Carpathians, the predominance of names connected to the logging and burning of forests.¹⁹⁴ In connection to a part of the Someș Plain (north-western Romania), pollen and coal samples collected from the Gutâi Mountains indicate intensified human influences on the forest environment during 500–1500 AD. During this period, the use of fire for deforestation has been demonstrated, and it has been suggested that the terrain was subsequently

used for grazing.¹⁹⁵ So far, data are scarce, but the results of another paleo-ecological study found converging evidence of this practice in the 4th – 9/10th centuries.¹⁹⁶

Certain artefact types provide indirect evidence of cereal cultivation and consumption (in flour or groats): rotary hand mills (rarely found in the area under discussion); roasting trays and clay pans (few and present at the earliest at the end of the 6th century or the beginning of the next century and widely found in the second half of the 7th century); storage vessels (appear to be more numerous, at least in some dwellings); potentially the so-called “clay breadcakes”, if they are interpreted as small reproductions of real bread. Rarely, in the Lazuri–Lubi tag settlement traces of seeds and stems, possibly from cereals, have been observed.¹⁹⁷

It is less clear whether in the 6th century and the first half of the 7th century millet was preponderantly cultivated (apparently being also preferred in the environment of the Kiev culture) or common wheat (“bread wheat”), as sometimes the latter species was liked in certain regions from the 6th century onward.¹⁹⁸ Although seed findings are not numerous, millet was identified as the primary cereal cultivated in the environment of the Prague culture in Ukraine or other regions, but differences were noted between settlements.¹⁹⁹ The consumption of leguminous plants (peas, lentils, bitter vetch) has been attested, as well as the presence of hemp in some settlements.²⁰⁰ Finally, a clarification is necessary: the obligatory relationship between the preference for the cultivation and consumption of millet with the ancient Slavs and their territories of origin or which they colonized, should be viewed with more circumspection.²⁰¹

Animal husbandry. For now at least, the osteological material is somewhat better known only from the settlement at Lazuri–Lubi tag, although animal bones make up a small part of the inventories collected from the dwellings there (no animal bones were found in four of the 16 investigated dwellings).²⁰² Those found in the dwelling’s fill together with

¹⁸⁸ COMȘA 1975b, 178, 182. Ploughs are missing from sites of the 6th century, see CURTA 2001a, 276–277 note 57. One coulter in the settlement at Groșani–Gura Gurgotei: POPILIAN/NICA 1998, 125, 174 Fig. 22/12. In the 6th and early 7th centuries the ploughs are similar to the Roman ones, albeit they were a rarity in the early Slavic environment (BERANOVÁ 1980, 378). The perfected plow was an acquisition from the Roman civilization, initially taken over in the Germanic environment from the Danube and the Rhine, and thanks to them it first reached the Western Slavs, then the Eastern ones (NIEDERLE 1926, 190).

¹⁸⁹ PALIGA/TEODOR 2009, 124–125. But grains could have been stored in other ways.

¹⁹⁰ For instance, KUNA/PROFANTOVÁ 2005, 183. Probably the difficult acquiring of raw materials and the rather complicated technology required to obtain iron, determined a particular attitude towards the iron objects, which were used for a longer period and were recycled. Although at a great distance and in other circumstances, for example, after the collapse of the Roman economic model in Britannia, in a more turbulent period (5th – 6th centuries) and especially in the eastern part of the former Roman province, the recycling of objects made of iron or non-ferrous metals is certified (FLEMING 2012). We must not forget that whetstones were also found in the settlements in the Upper Tisza area, or they were used for sharpening iron blades.

¹⁹¹ The example of Ukraine in GORBANENKO/PASHKEVICH 2010. Only four ploughshares have been reported from there for the middle third of the 1st millennium AD, namely the Penkovka and Prague cultures (GORBANENKO/PASHKEVICH 2010, 104, 106 with Fig. 4/3). According to the hypothesis of these authors, climate cooling and diminished rainfall after the middle of the 1st millennium AD lead to a reduction in wheat crops, and consequently, to a significantly lower number of iron tools compared to the previous period as they are necessary to cultivate this grain that requires a more laborious processing of the soil (p.199).

¹⁹² VOGT 1976, 206–212, 215–216; BRATHER 2008, 166–167; GORBANENKO/PASHKEVICH 2010, 118–119, 125 with Fig. 4.10.

¹⁹³ For instance, BRATHER 2008, 171 and GORBANENKO/PASHKEVICH 2010, 261–264.

¹⁹⁴ SOKIL-KLEPAR 2015.

¹⁹⁵ FEURDEAN/ASTALOȘ 2005. The first signs of cereal cultivation refer only to the middle of the 1st millennium AD, but it is unlikely that this specification really indicates the situation of the entire plain in the vicinity of the Gutâi Mountains.

¹⁹⁶ GRINDEAN *et alii* 2015, 123.

¹⁹⁷ STANCIU 2011, 701 Pl. 91/5–5a. I only specify the examples of settlements in Romania, with storage pits that contained millet or millet mixed with rye (TEODOR 1978, 18 and DOLINESCU-FERCHE 1984, 139).

¹⁹⁸ BERANOVÁ 1980, 378; PARCZEWSKI 1993, 109; SZMONIEWSKI 2016, 35. In the sense of a general assessment, millet is indeed indicated as the main cereal grown in the Kiev culture environment, but regional differences have been noted (GORBANENKO/PASHKEVICH 2010, 140–141, 143, 174–175, 193–195). Millet is a cereal with high nutritional potential and was cultivated for a long time not only in the Slavic environment; its cultivation did not require deep plowing and a wide range of soils could be used, including wetlands, it was also drought resistant and the growing season was short (e.g. GORBANENKO/PASHKEVICH 2010, 194).

¹⁹⁹ GORBANENKO/PASHKEVICH 2010, 155, 186, 198–199 figs. 6/18 and 6/19; GORBANENKO 2017; SZMONIEWSKI 2016, 35–36; PLEINEROVÁ 2000, 230 tab. 10 (feature 212), 231; FUSEK 1994, 144.

²⁰⁰ GORBANENKO/PASHKEVICH 2010, 200; SZMONIEWSKI 2016, 36; GORBANENKO 2017, 471.

²⁰¹ SZMONIEWSKI 2016, 35–36.

²⁰² STANCIU 2011, 310–312. Details in COSMA/GUDEA 2002, 60–79 and STANC 2009, 187–188. A few poorly preserved animal bones in the settlement from Kisvárd–Aldi. In this case, cattle were similarly

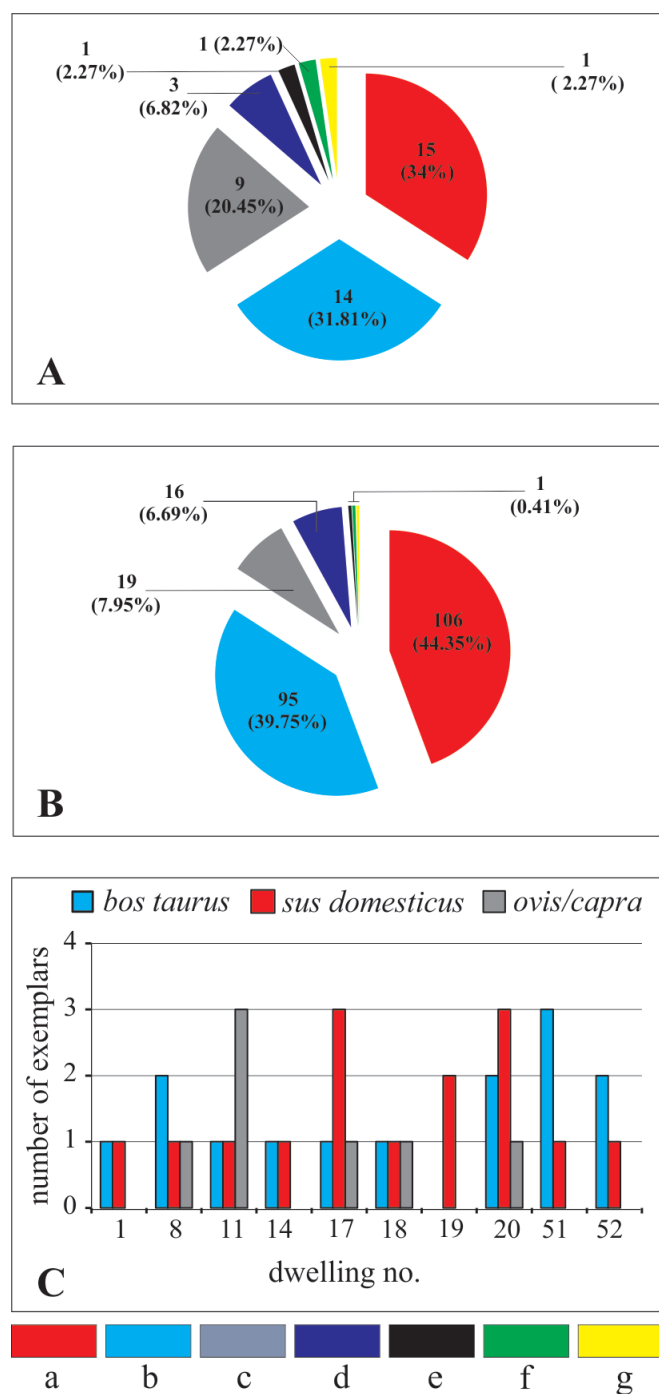


Fig. 24. The settlement from Lazuri-Lubi tag. Examination of the osteological material and an estimate of the distribution of animal species. A — by the estimated number of exemplars. B — by the number of bone fragments. C — the supposed association in dwellings of the main species of domestic animals. As an estimate, the number of individuals and the corresponding percentage are indicated. Animal species: *sus domesticus* (a); *bos taurus* (b); *ovis / capra* (c); *sus scrofa* (d); *equus caballus* (e); *gallus domesticus* (f); *capreolus capreolus* (g).

prehistoric or Roman ceramic fragments were excluded, as their connection with the structures of the second half of the 6th century and the early 7th century is less certain. However,

preponderant, followed by pigs, with no sheep or goat bones. Similarly, horse bones were found, as well as wild animal bones (wild boar, deer, birds). See SAMU 2012, 184.

most of them appeared in connection with the indoor fire installations and ovens' fill or above the clay block, frequently displaying burnt traces. Lastly, their connection with the dwellings from which they were recovered could be questioned since it is difficult to explain why bones of several species and individuals were placed in or on the oven during the abandonment of the dwelling. This situation could have been caused by the gradual filling of the pits over time, at different dates, as domestic refuse might have been deposited, but this kind of evidence was rarely noted.

The settlement from Lazuri was partially investigated, but the repetition of the same patterns in the dwellings from which the osteological material was recovered very probably indicates a situation which is valid across the entire site. Cattle predominate in some dwellings and pork in others; one hut (19) contains only pork bones, while ovicaprines predominate only in hut 11. Irrespective of the method of quantification (based on the number of estimated individuals or on the number of bone fragments), the results are almost identical (Fig. 24). Before everything else, the analyses indicate the reduced role of wild animals (wild boar, roe deer and eventually also *cervus elaphus*²⁰³), although the presence of wild boar has to be noted, being perhaps even more numerous, given that some examples may have mixed with the domestic pork bones analysed by Alexandru Gudea, as it was already presumed.²⁰⁴ Amongst the domestic animals, pork and cattle predominate in nearly identical proportions, very probably with a slight preponderance of the latter, as the graphs in Fig. 24 seem to indicate; the observation concerning the possible presence of boar bones amongst the pork ones has to be also taken into consideration. The following position belongs to the ovicaprines, in this case with significant differences between the two methods of quantification, ultimately with a minimum of 7.95% and a maximum of 20.45%.

The analysis of the osteological material from the settlement at Lazuri indicates the presence of primitive, less productive breeds of cattle and pork, the animals being butchered at an old age.²⁰⁵ However, the data are scarce and their interpretation becomes risky; that is why the previous observation remains under question, otherwise we could think about the importance of cows as a source of milk and its secondary products, but also the importance of cattle for carrying out agricultural work or for traction in general.

In this regard, the domestic animals and a particular diet (alongside the role of cattle in agriculture), the preponderance of cattle, followed by pork and ovicaprines (these two switching places sometimes), characterise in general the early medieval period, thus the second half of the 1st millennium AD, across wider areas in Eastern Europe.²⁰⁶ In connection with the environment of the Prague culture,

²⁰³ COSMA/GUDEA 2002, 74.

²⁰⁴ COSMA/GUDEA 2002, 74, 77, 78–79.

²⁰⁵ COSMA/GUDEA 2002, 77–79.

²⁰⁶ PACHKOVA/TERPYLOVSKII 1990, 370; PARCZEWSKI 1993, 109–110; BRATHER 2008, 177–182; DOLINESCU-FERCHE 1979, 216–217; DOLINESCU-FERCHE 1986a, 151–152; FUSEK 1994, 144–145; PLEINEROVÁ 2000, 232–235; MITREA 2001, 210 tab. 2; KUNAPROFANTOVÁ 2005, 272–274; STANC 2006, 226.

the dominant role of the cattle could have been the result of the increased mobility of the population preferring a semi-pastoralist lifestyle.²⁰⁷ Sometimes an accentuated presence of the pork and ovicaprines was noted, in contrast with a diminished presence of the cattle.²⁰⁸ In the Slavic milieu from central-western Europe, the osteological material frequently indicate a more important role of pork in alimentation, being followed by ovicaprines and horses; in other cases cattle predominates or even venison.²⁰⁹ In the north-east, in the settlements at Rashkov III, Glubokoe or Selishte, cattle and pork predominate, while in other cases pork and ovicaprines are more frequent.²¹⁰ From this point of view, a comparison of several settlements first underlines the differences within the same large regions (Fig. 25). Secondly, while the ovicaprines have a relatively constant presence, there is an opposed relation between cattle and pork, as an increased presence of one species determined a decreased presence of the other.

The role of cattle in the pastoral economy of the

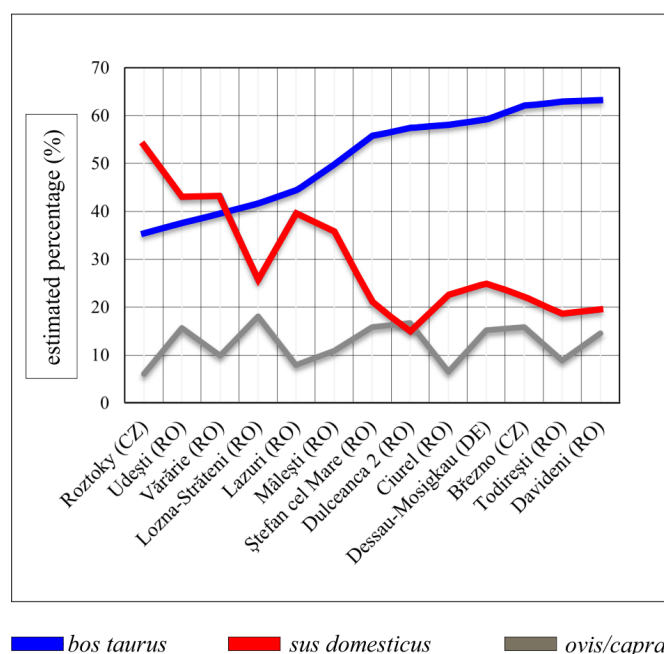


Fig. 25. Distribution of the primary species of domestic animals in some settlements from the second half of the 6th century – 7th century.

early Slavs is also confirmed by the contemporaneous early Byzantine sources.²¹¹ Sheep meat was seldom consumed in medieval Russia.²¹² Horse bones were also occasionally discovered in settlements like the one from Lazuri (here only in hut 8), and it was presumed that they were butchered and

eaten at a certain date.²¹³ Some medieval Russian sources indicate the consumption of horse meat among the Eastern Slavs until a later period.²¹⁴

With reference to the same settlement in Lazuri, positioned in a micro-zone with a landscape probably dominated by deciduous forests and marshland, and crossed by small permanent or seasonal watercourses, it is strange that there is such a small share of wild animals in the diet of the community there (note, no fish bones were found!). As a complementary source of food, but also for the manufacture of certain garments, it is possible that wild animals were used to a greater extent than indicated by the Lazuri settlement alone.²¹⁵

HOUSEHOLD (DOMESTIC) PRODUCTION AND THE PROBLEM OF SPECIALIZED PRODUCTION

The economic system of any society surmises the production, distribution and consumption of goods.²¹⁶ However, it is currently risky to postulate such a system in this geographic area within the period under discussion since the necessary archaeological data are lacking. Multiple variables have influenced the organization of production, and concrete situations could not be understood with the help of a unified model. This led to the proliferation of 'typologies' that aimed to provide explanations for the organization and functioning of production activities within diverse geographic areas and cultural environments.²¹⁷

In the current case, the archeological signs of the existence or initiation of a specialized production, regardless of its specifics, are few and hard to decipher. On the other hand, we can imagine that between the domestic production, on the one hand, and the specialized one, on the other, there are intermediate forms of production, which are hard (or even impossible) to capture.²¹⁸ Therefore, in each community we can assume the existence of activities which required a certain degree of specialization, that is, the presence of one or more people with the necessary skills and knowledge, as well as the appropriate tools, for instance to build homes or manufacture tools, wooden storage containers, or transport means from the same materials. Similarly, the manufacturing of manual quern-stones required experience and specific tools, which were not available to every family.

Specialized production, most likely of reduced intensity, can only be attested indirectly,²¹⁹ but the identification of the communities in which such activities took place is not currently possible in the territory under discussion, and as stated above, we can also not make any statements about the degree of specialization. Similarly, concrete statements cannot be made about the potential

²⁰⁷ KUNA/PROFANTOVÁ 2005, 351 and SZMONIEWSKI 2016, 35. For the settlements from the Wallachian Plain (southern Romania), see PALIGA/TEODOR 2009, 125.

²⁰⁸ PLEINEROVÁ 2000, 235; PARCZEWSKI 1993, 110.

²⁰⁹ HERRMANN 1968, 87–90; HERRMANN 1979, 50, 54–65 note 12.

²¹⁰ CORMAN 1998, 73, 206 diagram 5.

²¹¹ PARCZEWSKI 1993, 110.

²¹² WORONIN 1959, 248.

²¹³ See HERRMANN 1968, 87, DOLINESCU-FERCHE 1986, 152, and STANC 2006, 196.

²¹⁴ WORONIN 1959, 247–248.

²¹⁵ To supplement with additional information from a closer geographical area (today's Slovakia): bears, rabbits, wild birds, turtle, molluscs and even an amphibian (FUSEK 1994, 145).

²¹⁶ E.g., with referrals, COSTIN 1991, 1–2.

²¹⁷ COSTIN 1991, 6.

²¹⁸ BRATHER 2008, 186.

²¹⁹ COSTIN 1991, 32–33.

distinction between 'individual specialization' (individuals or households that produce for local consumption), 'dispersed workshops' (larger workshops that produce for local consumption) and 'community specialization' (a community with individuals and households that have a production aimed at regional consumption). The latter case, with reference to the production of iron and manufacturing of diverse objects, is illustrated in the Upper Tisa region during the La Tène period.²²⁰

Within each household, economic activities were undertaken, some of them planned for the cold season, when agricultural tasks could not be performed. Although less numerous, the spindle whorls and the vertical loom weights indicate the presence of spinning and weaving activities within every family, albeit such objects are missing from some dwellings. The suggested presence of a loom inside structure 51 from Lazuri remains uncertain, but the unusual plan, its internal layout and the presence of a second, large fire installation (an oven carved out of the wall) suggest a special function of this construction in comparison with the proper dwellings. As already presumed, the ovens carved out of the dwellings' walls, especially when they have larger dimensions, and even the indoor ones could have also been used for pottery firing (mainly small vessels), albeit within a domestic production which was sporadic and un-organized.²²¹ The outdoor ovens, like those from the settlements at Lazuri-Lubi tag and Zalău-Mihai Viteazul Blvd. could have had one such function, albeit not exclusively. They occupy a wider surface in comparison with the regular ovens and their vault is higher than that of the ovens carved out of the dwelling's wall, so they could have been used not only for baking bread or cooking, but also for firing pottery.²²² Certain particularities of some of the constructions could also suggest a preponderantly economic role, among them also those which are devoid of any installation for fire.

The paucity of the inventory from the settlements (aside from the pottery which almost entirely handmade, so not the result of a specialised production), and of the one from burials, can only draw the image of some communities in which the domestic crafts fulfilled subsistence needs. If in the case of clay vessels made without the potter's wheel, a domestic, sporadic, and unorganized production (probably supported especially by women) is usually assumed,²²³ fast wheel-thrown pottery was the result of a specialized

production (permanent or seasonal and intended for a market some), supported by professional potters.²²⁴ Since a small quantity of undecorated pottery made on the slow wheel was also found in the settlements at Lazuri-Lubi-tag and Zalău-M. Viteazul Blvd., even an initial attempt to produce locally this type of pottery might be presumed, as a precedent of a specialised production. The available evidence is not offering an answer to the question regarding the origin of the vessels modelled on the slow wheel and dated to the end of the 6th century – beginning of the 7th century, which were found in the settlements from Lazuri or Zalău, whether they were locally produced or imported. The itinerant craftsmen might have played a certain role during this period in the appearance of the future (specialised) production centres of early medieval pottery.²²⁵

In the matter of the slow-wheel vessels, initially this change in the production and consumption of such pottery, regardless of the explanations that might justify it, does not originate within the Avar Qaganate. This type of pottery was received in two distinct environments. Once inside the Avar Qaganate of the Early and Middle periods, but pottery related to the late antique tradition (made on the fast wheel) was also produced there in relative continuity, at least up to a certain date.²²⁶ Then in some peripheral areas or near the borders of the Qaganate the new type of pottery was taken up in an environment where hand-made vessels were the norm, and which has usually been attributed to the early Slavs. Of course, it can be assumed that the milieu of the Avar Qaganate played an important role in the transmission of the pottery in question, especially in the areas immediately adjacent to and influenced by it.²²⁷

Over time, the production of pottery made on the slow wheel was perfected, being organized even at the level of some workshops, which remain difficult to specify in more convincing terms. But concrete situations prove that the process had an uneven course, with variables from region to region and even at the level of smaller areas.²²⁸ The way in which this production was organized remains little known, the reconstruction proposals being supported mainly on ethnographic parallels and theoretical assumptions. It is difficult to choose between a sustained seasonal economic activity in the household ('household industry') and the individual workshop model, with evolution towards specialization and the trading of products, usually within a relatively small local market.²²⁹ Designation 'individual specialization' was proposed, i.e. individuals or households that produce for local consumption or even real workshops, oriented towards the same type of consumption.²³⁰ In any

²²⁰ COSTIN 1991 and COSTIN 2001.

²²¹ For example, TEODOR 1996, 54 and TENTIUC 1996, 107.

²²² Furthermore, it was already suggested that some of the ovens carved out of the walls or the main fire installations placed in one corner of the dwellings might have been also used for metal smelting and processing (TEODOR 1996, 30), since different tools which were surely used for such activities were sometimes discovered in connection with them in other areas. A suitable example: a sunken hut from the settlement at București-Soldat Ghivan Nicolae St., containing one mould for earrings, one clay spoon, tools and waste (TEODORESCU 1972, 77). It is curious the case of the house 36 at Bernashivka, with 64 stone moulds, but it is more certain that they were just stored there (an itinerant craftsman?), as evidence of on-site use of those stone moulds has not been reported (VINOKUR 1998).

²²³ "Household production", after PEACOCK 1982, 8. See also HEROLD 2010, 97–98, alongside a commentary on D. P. S. Peacock's explanations. On early medieval pottery production of this kind, for example TEODOR 1996, 54 and TENTIUC 1996, 107.

²²⁴ PEACOCK 1982, 8–9, 17–43; COSTIN 1991.

²²⁵ In relation to the early medieval period, the role cannot be neglected of an "itinerant domestic production", which could transmit technology and certain forms of vessels (GRASSI 2010, 8, 22–23).

²²⁶ VIDA 1999, 17–18, 33–106, 179–191.

²²⁷ For instance, COMȘA 1973a, 170–171.

²²⁸ As an example, this observation is repeated in the case of pottery from the north-eastern part of Hungary, possibly dating to the 9th century (TAKÁCS 2016).

²²⁹ PEACOCK 1982, 8–9, 17–31; HEROLD 2014, 224. Also, STANCIU 2016, 138–139, commented being an interesting ethnographic parallel from Eastern Transylvania.

²³⁰ COSTIN 1991, 8.

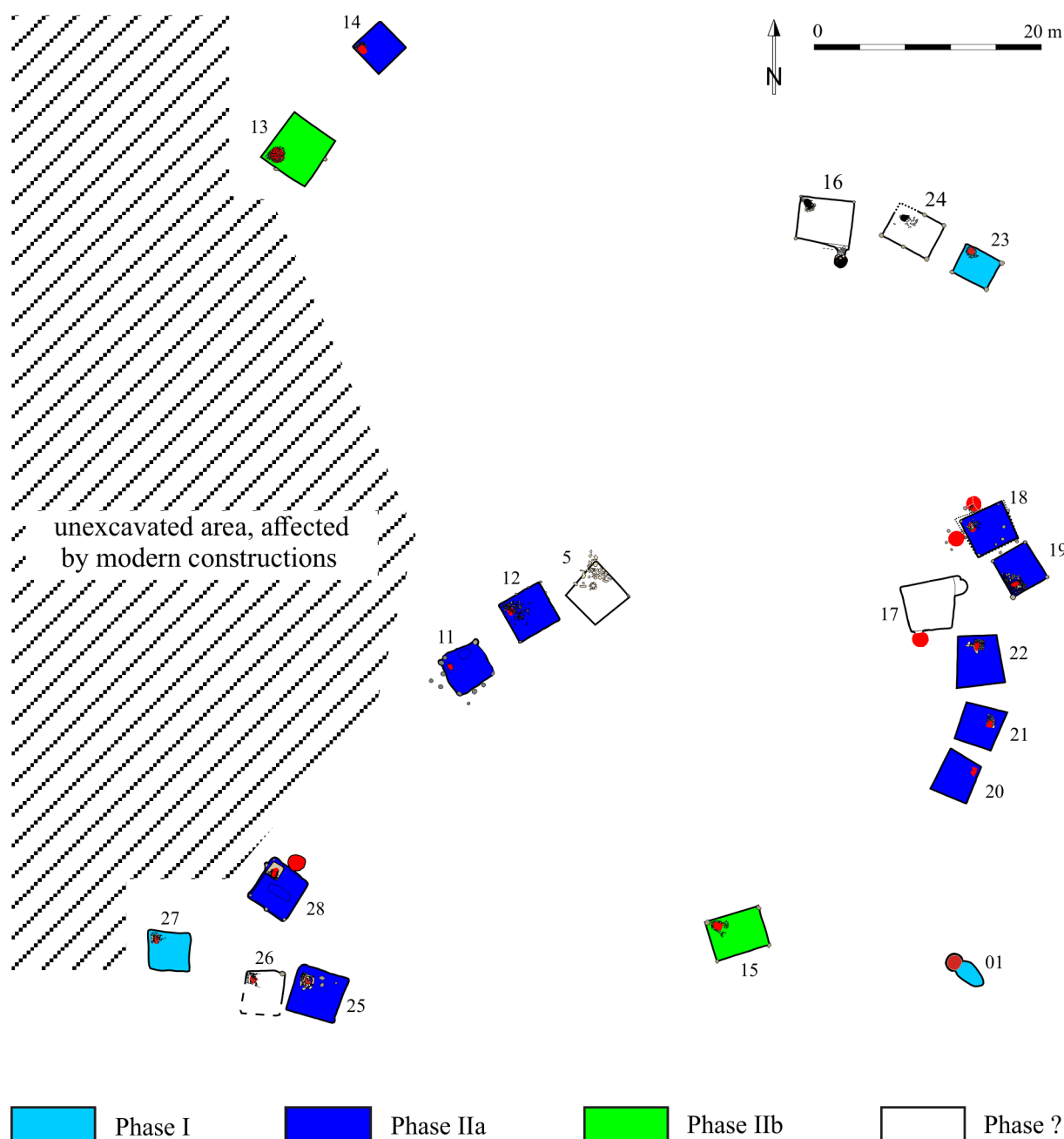


Fig. 26. The settlement at Zalău-Mihai Viteazul Blvd. 104-106 (north-west Romania), with proposed evolution during three stages between approximately the middle of the 6th century and the first third of the 7th century.

case, the forms in which the production of ceramics was organized over time did not register a linear evolution, they were always influenced by the economic and social organization, as they also responded to external impulses, and the transitions, especially sudden, from one model to another are processes that are difficult to explain.²³¹

Agricultural and manufacturing tools or other iron objects are basically absent. However, timber for building dwellings had to be cut and even slightly carved, and the presence of whetstones in dwellings suggests the daily use of some knives or other tools with an iron blade. Given this situation, the presumption of a special value of these objects has to be repeated; they were carefully preserved, repaired

and in the end recycled to recover the iron. Indirectly, such a situation suggests a reduced intensity or an imbalance in the production of much-needed, high-value and harder-to-acquire iron objects. In any case, we can assume that the identification of suitable places for the procurement of natural resources, the process of reducing ore and obtaining crude iron, as well as the manufacture of various objects, were activities that required special knowledge and experience accumulated over time. Consequently, there must have been skilled people to support such activities (naming them as craftsmen or artisan is not wrong),²³² possibly even within villages with families for whom this more likely seasonal activity represented an important source of livelihood. Now we cannot know more precisely how this important activity

²³¹ PEACOCK 1982, 50–51; STARK 2003, 206–208.

²³² E.g., COSTIN 1998 and COSTIN 2001, 281–285.

was organized, with obligatory social relations. We could believe in the existence of a micro-regional organization model or even at a somewhat more extensive level, which involved the obtaining of raw iron and the processing of finished objects, these more likely intended for exchange with agricultural or other products.

The explanation for the quasi-absence from the geographical area under study of some artifacts made of bronze or silver, elements of clothing in the first place, is also difficult,²³³ and which (in relation to their quality) could indicate a certain social hierarchy and social networks. However the clay mould from Lazuri and the clay ladle found in the same settlement are concrete elements that in more certain terms indicate the presence of 'individual retainers' (not necessarily 'attached specialists', according to very precise typologies), more likely autonomous, and who worked to order, for individuals whose status was superior in relation to the common inhabitants of the settlement.²³⁴ Certain differences in social (and economic) status within each community can be assumed, but this is an aspect that the quantity and quality of the artefacts, respectively their horizontal distribution, does not indicate. In relation to such a problem, attention is drawn to the internal organization of the settlement at Zalău-Mihai Viteazul Blvd., with groups of dwellings arranged along a relatively circular perimeter, and in the central area of the settlement there were three sunken dwellings, two of them probably functional at the same time (Fig. 26).²³⁵

The previous specifications outline an autarchic rural, self-sufficient economic system. Assumptions about the economic interactions between neighboring settlements within a micro-zone or between those located at greater distances can only be speculative. However, we should consider at least a reduced intensity of exchanges between nearby settlements, more likely with agricultural products and possibly domestic animals, also the need to procure iron tools or quern-stones as examples should be considered, in this cases maybe from longer distances. The organization of settlements in groups that occupy a well-defined geographical area in some microzone is usually signaled,²³⁶ and those on the valley of the small Zalău river in northwestern Romania offer a very good example (Fig. 27). More certainly in the last third of the 6th century and the first third of the 7th century on a distance of no more than 9 km, measured along the valley (about seven kilometers in a straight line measured) five settlements functioned at the same time.²³⁷ A cemetery

was also partially investigated, and the assumption that it could be used by the immediately neighboring settlements is not without grounds. On such a small area, the situation previously described could even indicate a certain form of inter-community organization, even more economic interactions between the respective settlements.

In relation to such important issues related to chronology, but also to the possibility of specifying links with foreign cultural environments, the topic of possible imported goods remains under discussion. But not much can be said about it. The dating of the horn combs from the settlement at Zalău-Mihai Viteazul Blvd. is not certain, otherwise these artifacts could indicate contacts with the Gepid environment or the horizon that in some places continued during the Early Avar period. The same could be the explanation for so few sherds of vessels worked on the fast wheel, but the possibility that they were found in a secondary position cannot be ruled out. In fact, the reception of external influences is much more solidly argued by the examples that indicate the acquisition of pottery made on the slow wheel and the initiation of such local production.

In the absence of any evidence, references to a trade based on the use of coins are useless.

CONCLUSIONS

A model of Early Slavic culture was proposed a long time ago. Generally, this model's core characteristics were validated, and often differences were emphasized in relation to the culture of the Late Imperial Roman age.²³⁸ Importantly, regional variables and 'provincial areas' were proposed, but this discussion is complicated by the tenuous issue of ethnic identification.²³⁹ The association of the following characteristics defines this model.²⁴⁰ The specifics of the habitation: rural settlements that are not fortified, positioned along valleys, dwellings that are more or less deepened, with a quasi-square shape and containing a heating facility, usually, an oven. A simple economic model: primarily agricultural, based on the cultivation of millet and wheat, an important role is assigned to the rearing of cattle, a lack of specialized trade, handmade pottery resulting from household production, lack or scarcity of precious artefacts produced locally, weak contacts to outside communities, incoming influences primarily from the Danubian and Nistru regions. Funerary practices: flat cremation burials, with or without urns. This is the image of a society with structures that could be configured outside the widely debated 'original homeland' of the Slavs, during their migration and the successive colonization of new territories.²⁴¹

In the area of the Upper Tisa Basin, this new horizon of habitation was manifested in forms diverging from

²³³ Bronze fibulae (with inverted foot), one in the Pișcolt cemetery (without precise context) and another specimen reported as a stray find from Tiszaszentmárton (north-east Hungary), together with a bronze buckle found in a hut from Hajdúnánás-Verestengerjárs, also in northeastern Hungary. All are foreign products, regardless of how they could reach the Upper Tisza region. For illustration, comments and references to the bibliography see STANCIU 2015, 194–200, with figs. 21/1–2 and 22/3.

²³⁴ For instance, BRUMFIEL/EARLE 1987, 5–6 and COSTIN 1991, especially p. 7–13.

²³⁵ STANCIU 2011, 116–117, 116 Fig. 21, 728–729 Pl. 118.

²³⁶ KURNATOWSKA 1974, 91–93; PRIKHODNIUK 1990, 209–210; PRIKHODNIUK/TERPILOVSKII 1990, 425.

²³⁷ These have been identified so far, there may have been others. Better known is the settlement at Zalău-Mihai Viteazul Blvd., which evolved during at least two stages. It is the same archaeological expression of these

settlements, with supposed dating during two thirds of a century. However, given the supposed high mobility of the respective communities, it would be more correct to state that we cannot be completely sure of their functioning at the same time.

²³⁸ GODŁOWSKI 1979a, 1979b, 1980, 2005a, 2005b, 2005c.

²³⁹ Just briefly, PARCZEWSKI 1993, 122–125.

²⁴⁰ See note 238.

²⁴¹ 'Originally Slavic territory' understood dynamically, precisely due to the gradual movement of the Slavs (GOJDA 1991, 7).

those specific to the Late Imperial Roman age and the Early Migration period. The differences are not necessarily indicated by the funerary rites of incineration, practiced previously by the Germanic bearers of the Przeworsk culture, but also the early Dacians or the way in which the organization of the living space was adapted to the local geographic conditions. We are talking about the quantity, quality and variety of artefacts, the presence of objects which could indicate interactions with the outside world, the deposits or monetary thesauruses, but also certain evidence for the existence of specialized crafts (features specific to the local environment in the roman period). Further, the internal organization of the settlements from the Late Imperial Roman age was more sophisticated, with a larger variety of constructions (deepened or at the surface), dwellings themselves and various types of non-residential structures, sometimes with the possibility of reconstructing farms.²⁴² Alongside qualitative differences between the inventories of graves, the features noted above suggest a relatively strongly stratified society that had hierarchies and communities, in which attachment to private property is always suggested by the archaeological data.

In regards to the habitation in the same region of the Upper Tisa during the 6th century, but most likely in its last half, it should be emphasized that the sum of current evidence points to a simplified economic model, and a society to measure, with hierarchies that are hard to glimpse. The settlements are located in a microregion that is fairly favorable to human habitation. Some of the settlements



Fig. 27. Early Slavic settlements (also a cemetery with flat cremations burials) in the upper segment of Zalău Valley (Sălaj County, northwest Romania): 1, Zalău-Valea Mății; 2, Zalău-Farkas domb; 3, Zalău-Mihai Viteazul Boulevard no. 104-106; 4, Zalău-Dromet SA 1; 5, Zalău-Dromet SA 2; 6, Badon-Doaște.

had a low habitation in the prior period, starting with the year 400. An appropriate example is the inferior basin of the Someș river (in north-western current day Romania and north-eastern Hungary). In this case, the horizontal distribution of the settlements, some of them along the river Crasna, extending through the valley of Zalău river, up to the Meseș Gate, suggest the relative mobility of these communities and the tendency to advance in the direction of the Transylvanian Basin (Fig. 2).

Starting with the end of the 5th century and during the first two thirds of the next century, the region of the lower Someș was found in the immediate vicinity of the territory directly controlled by the Gepids, but the potential interactions between the Early Slavic settlement and the environment specific to the Gepid Kingdom remain invisible. This observation should indirectly contradict the dating of the Early Slavic habitation in the first half or the first two thirds of the 6th century. Regarding the relations to the outside world and the following period, we should direct our attention to the Early Avar Khaganate, from where it is most likely that slow-wheel pottery was spread to this area (and

²⁴² In the same location, a good example for the comparison between the two horizons of habitation is offered by site in Lazuri-Lubi tag. An examination of the habitation during the Late Imperial Roman period and the complex organization of the settlement form that time is presented in STANCIU 2022. Also see GINDELE 2010.

shortly resulted in local production). This change in terms of pottery can be interpreted as evidence of an evolution process and a transformation during the 7th century, although the dating of some settlements in that period is debatable (the middle of the 7th century and its second half being most interesting).

Regardless of the explanations, the rapid dynamic of the evolutions happening at that time is reflected in the settlements dated to the 8th – 9th/10th centuries,²⁴³ and sometimes it is possible to specify a more precise dating. Without going into details, the image of this rural habitation is one that can be generalized to the entire Carpathian Basin and beyond. Of course, this topic is of great interest in relation to the geographic area under current examinations, but thus far garnering insufficient discussion: revealing (unfortunately, only with the help of archaeology) the process which resulted in the structuring of a local Early Medieval society.

In the immediate south-eastern vicinity of the Upper Tisa region, during a large part of the 6th century, the 'Gepid world' can be understood as a local Late Antiquity environment. In the immediately following period, the intervention of the Avars inside the Carpathian basin had important, but not earth-shattering consequences concerning the perpetuation of some of the preexisting demographic structures and technological traditions, as was the case for pottery. The horizon under discussion has been explained as standing between a relative 'Late Antiquity' and a 'Late Avar Period' (or an initial stage of the Early Medieval period) and was attributed to the Early Slavs, mostly likely the result of a migration from the north – north-east.

From the perspective of the production activities of the communities and their external connections, the interpretation of the archaeological research suggests the horizon of habitation in the Upper Basin of the Tisa can be accounted for by a simple model, adapted to the needs of primary subsistence. However, the changes underwent in a short period of time were significant, which is why the possibility of understanding the 7th century as an early or transition stage to a local Early Medieval society needs to be discussed.

²⁴³ For instance, an older finding in relation to the territory of Slovakia (ČILINSKA 1986).

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