

AMPHORA-SHAPED GLASS AND CORAL BEADS

DISTANT CULTURAL CONNECTIONS IN THE CARPATHIAN BASIN AT THE BEGINNING OF THE LATE IRON AGE

The territory defined as the Carpathian Basin mostly by archaeologists and less by geographers was in the past, and also today, a melting pot in which different cultural influences came together and became entangled, to create new cultural trends and features. The interaction of different groups and communities from this region is frequently illustrated archaeologically by the circulation of certain artefacts. For the beginning of the Late Iron Age, one excellent example is provided by the distribution of amphora-shaped beads made of glass or of those made of branches of red coral.

The amphora-shaped beads were produced in Mediterranean workshops or in those from the Black Sea region between the end of the 5th century and the beginning of the 3rd century BC¹. They were usually made of translucent glass paste, while the examples made of cobalt blue or turquoise glass paste are rare, though occasionally found both in the areas from the vicinity of the Mediterranean workshops (for example in Slovenia²) and in more distant places (in Slovakia or Moravia³). The glass beads imitate artefacts with a similar morphology, but made of gold, which were already used in Greece and Macedonia during the Late Archaic period (fig. 1)⁴. Moreover, the pendants made of precious metals were copied in bronze or amber both in Greece⁵ and in other areas from the Balkans (fig. 2, 1)⁶.

The amphora-shaped glass beads circulated to the north, reaching some populations from the temperate Europe, but they are more commonly found in the Carpathian Basin, the north-western Balkans and the Lower Danube region (see list 1). The beads discovered in the Carpathian Basin were analysed by a series of specialists who mostly discussed the problems related to their distribution and chronology. Amongst them can be noted the older studies of J. Meduna, N. Venclová and M. Čížmař, or the more recent ones of P. Popović and M. Schönfelder⁷. Taking over from them, my initial attempt was to update the distribution map provided by the last two cited authors⁸, albeit more recently the list of finds became far larger.

As concerning the beads made of branches of red coral (*Corallium rubrum*), they come from the Mediterranean, coral harvesting being attested both by literary sources and archaeological discoveries⁹. One volume focusing on the Mediterranean coral, which was published more than a decade ago¹⁰ and in which B. Schmid-Sikimić analysed the coral harvesting and trade in the Adriatic¹¹, represents another important contribution to this field of study.

As a consequence, previous studies concerning both the amphora-shaped glass beads and those made of coral allow now a comprehensive discussion about the means and ways of circulation of these objects amongst the communities from the Carpathian Basin.

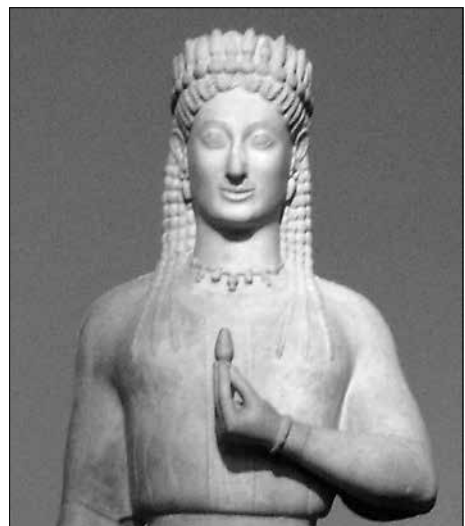


Fig. 1 Row of amphora-shaped beads shown on a Late Archaic statue from the rural cemetery at Myrrhinous (Merenda) in eastern Attica (middle of the 6th century BC). – (After Hurwit 2007, 270 fig. 30).

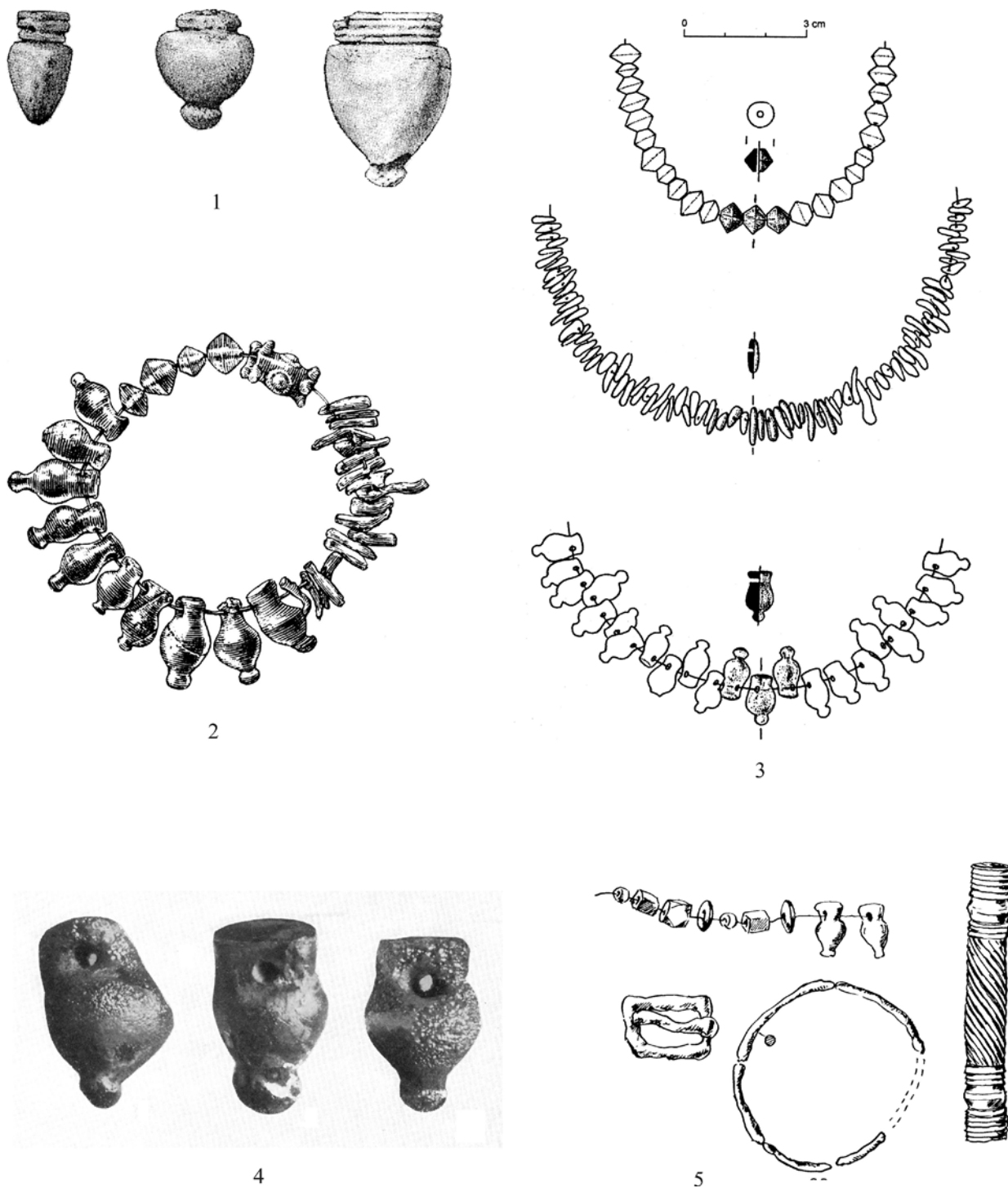


Fig. 2 1 amphora-shaped amber beads from Trebenište/MK (after Popović 1997, 171 fig. 3, 3-5). – 2 glass and coral beads from Brno-Horní Heršpice (okr. Brno-město/CZ; after Meduna 1970, 227 fig. 4). – 3 glass and coral beads from grave no. 21 at Dubník (okr. Nové Zámky/SK; after Bujna 2002, 28 fig. 1). – 4 amphora-shaped glass beads from Budapest-Gellérthegy-Tabán (after Bónis 1969, 198 pl. 5, 1-3). – 5 amphora-shaped glass beads from an Avar period burial at Kisköre (Kom. Heves/H; after Garam 1979, 31 pl. 24, 26). – Different scales.

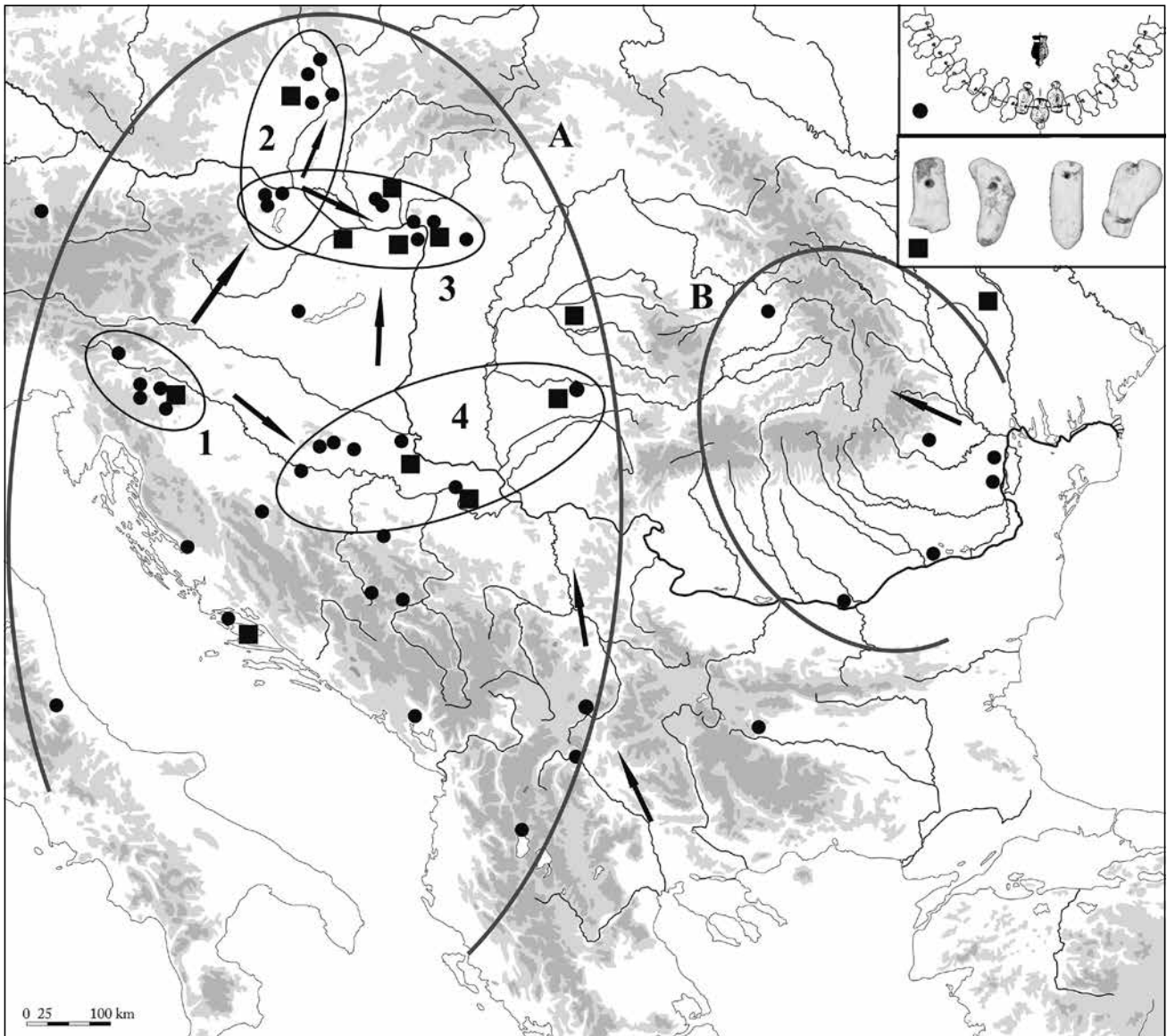


Fig. 3 Distribution of the amphora-shaped glass beads (● list 1) and coral beads (■ list 2). – **A** western area. – **B** eastern area. – **1-4** groups of finds from the Carpathian Basin. – Above, right: row of amphora-shaped glass beads from Dubník (okr. Nové Zámky/SK; after Bujna 1989, 321 pl. 24, 7) and coral beads from Aradu Nou (jud. Arad/RO; photo A. Rustoiu). – (Map A. Rustoiu).

The distribution map of the glass beads indicates the presence of two major areas of circulation: one to the west and another to the east (fig. 3A-B). Their presence underlines the existence of different supply sources. Thus, the western area consists of the north-western Balkans and most of the Carpathian Basin, the find distribution indicating the impact of the Greek cities and workshops from the Adriatic and Greece on their circulation northward (fig. 3A). The eastern area consists of the Lower Danube region and eastern Transylvania, suggesting that in this case the beads' circulation was influenced by the workshops from the Greek Pontic cities (fig. 3B).

The most numerous discoveries are attested in the Carpathian Basin. However, they are quite clearly concentrated in a series of geographic and cultural areas. These concentrations are chronologically relevant and they also allow the identification of some inter-community networks of communications from the beginning of the Late Iron Age.

The first group of finds includes beads coming from tumulus burials in the south-eastern Alpine region, in modern Slovenia (**fig. 3A, 1**). The majority of them originate from the area of the Dolenjska group, from funerary inventories belonging to the Negova phase, which is contemporaneous with the La Tène A-B1 period (second half of the 5th century-first two thirds of the 4th century BC)¹². However, amphora-shaped glass beads are also present later in this region, for example the one from a La Tène grave of the 3rd century BC from Novo mesto-Kapiteljska njva (SLO)¹³. Besides that, the beads from the south-eastern Alpine region are the earliest-dated ones from the entire territory in question.

The second group includes the finds from Lower Austria and Moravia (**fig. 3A, 2**). They come from Celtic graves usually dated to the La Tène B1¹⁴.

The third group consists of finds coming from Celtic cemeteries in south-western Slovakia and northern Hungary (**fig. 3A, 3**). The majority of the contexts containing such beads are dated to the La Tène B1¹⁵. Sometimes they are also used at the beginning of the La Tène B2, as some local discoveries from the east of the Danube are showing¹⁶. Lastly, the beads found in the Celtic *oppidum* at Budapest-Gellérthehy-Tabán¹⁷ (**fig. 2, 4**) illustrate the perpetuation of such objects over a longer period until the Late La Tène.

The fourth group consists of grave goods recovered from the southern Carpathian Basin, the middle and lower valleys of the Drava and Sava rivers, and the Romanian Banat (**fig. 3A, 4**). In general the beads in question belong to the inventories of some graves dated to the La Tène B1 and the beginning of the La Tène B2. They are part of a »pre-Celtic« cultural horizon (the so-called Čurug phase¹⁸) which had numerous contacts with the Central European La Tène area¹⁹. It has to be noted that amphora-shaped glass beads associated with bits of coral branches and amber pearls also appear in burials belonging to the early phases of some Celtic cemeteries (dated to the end of the La Tène B1 and the beginning of the La Tène B2), for example at Aradu Nou (jud. Arad) in the Romanian Banat²⁰.

With the exception of the south-eastern Alpine zone, in all of the mentioned groups of finds the amphora-shaped glass beads were sometimes accompanied by beads made of coral (see **list 2**), as part of some complex jewellery sets incorporating other types of beads (**fig. 3**). This is the case of the finds from Brno-Horní Heršpice (okr. Brno-město/CZ; **fig. 2, 2**), Dubník (okr. Nové Zámky/SK; **fig. 2, 3**), Kosd (Kom. Pest/H; grave no. 55), Sremska Mitrovica (Sremski okrug/SRB) or Aradu Nou. In other rarer situations, for example at Kosd (grave no. 56), coral beads were not combined with glass beads. The contexts in which coral beads were found belong to the La Tène B1 and the beginning of the La Tène B2 sub-phase. This contemporaneity with the chronology of the amphora-shaped glass beads indicates that in general coral beads arrived in the Carpathian Basin from the Adriatic coast and the north-western Balkans together with glass beads. In this context, it is also significant that in grave no. 39 from Kosd one row of coral beads also contains three bi-truncated silver beads²¹. Such artefacts were produced in workshops from Macedonia and the north-western Balkans at the end of the Early Iron Age and the beginning of the Late Iron Age²².

The spatial distribution of the aforementioned four groups of finds, as well as their chronology, also underlines the routes of communication on which these objects circulated inside the Carpathian Basin. From this point of view, it is relevant that in all of these groups the amphora-shaped glass beads are sometimes associated with amber beads (see **list 1**). Thus, it can be concluded that the well-known Amber Route of the eastern Alpine region played an important role in the circulation of the amphora-shaped beads from the Adriatic and the south-eastern Alpine region (where the earliest discoveries are attested) to the north and up to Moravia. At the same time, starting from this route, similar objects were distributed downstream the Danube, from the Lower Austrian crossing point of the pan-European (north-south and west-east) routes of communication to the Celtic communities from south-western Slovakia and northern Hungary. From the south-eastern Alpine region to the east, these beads were distributed alongside other important routes following the course of the Drava and Sava rivers and down to the Danube²³.



Fig. 4 Fântânele-Dâmbu Popii (jud. Bistrița-Năsăud/RO), grave no. 79: row of beads containing an amphora-shaped glass bead. – (Photo A. Rustoiu).

The discovery of some amphora-shaped beads along the Vardar-Morava corridor (at Skopje-Ždanec [MK] and recently at Kale-Krševica [Pčinjski okrug/SRB]²⁴, an important manufacturing and trading centre) could also indicate a circulation from Macedonia to the north along this route which was also intensively used during the Early Iron Age²⁵. Lastly, glass beads could have come from the southern Carpathian Basin to the north along the Danube, up to the Budapest region. The cultural contacts between these two areas during the 4th century BC are also confirmed by other discoveries. For example, the hoard of silver jewellery of local origin from Čurug (Južnobački okrug/SRB) also contains a brooch of the early Dux type²⁶. On the other hand, brooches with a spiral bow decorated with chains and axe-shaped pendants of the type included in the hoard from Čurug²⁷ are also attested in the cemetery at Pilismarot (Kom. Komárom-Esztergom/H)²⁸, in the area of the Danube's bent.

Thus the distribution of the amphora-shaped glass beads in the Carpathian Basin seems to indicate that they tend to concentrate in four distinct geo-cultural areas. Moreover, the beads circulated between these groups along the traditional routes of communication which facilitated economic and social inter-community connections across wide areas. The origin of these artefacts in the Mediterranean workshops is also confirmed by, amongst other things, their association with coral beads within these groups.

As concerning the second main area of distribution, consisting of the finds from the Lower Danube region and eastern Transylvania (**fig. 3B**), it suggests other directions and mechanisms of distribution. First, it has to be noted the almost complete absence of coral beads. The single exception is a small hoard of jewellery made of gold, silver and bronze, which also contains a row of 70 coral beads, 75 amber and glass beads and two cowry shells. The hoard was discovered in the fortified settlement at Bunești (jud. Vaslui), in eastern Romania, and was dated to the second half of the 4th century to the beginning or the first half of the 3rd century BC²⁹. The absence of Mediterranean coral items indicates the orientation of the communities from the Lower Danube region towards the workshops from the Greek cities on the western and north-western Pontic coast, which produced amphora-shaped glass beads. Furthermore, this orientation is also con-

firmed by their frequent association with Greek pottery or other artefacts produced in the Greek centres from the Black Sea region³⁰. As concerning the chronology, the beads in question come from burials dated to the second half of the 4th century BC and from settlements which were still used in the first half of the 3rd century BC.

From the Lower Danube region, such objects also reached Transylvania crossing the Carpathians. So far, the single known example comes from the inhumation burial no. 79, without weapons, from the cemetery at Fântânele-Dâmbu Popii (jud. Bistrița-Năsăud/RO; **fig. 4**)³¹. This burial contains a rich set of metal jewellery mostly of the La Tène type. They are accompanied by a row of five clay beads (**fig. 5, 1**), two light green glass beads (**fig. 5, 10-11**), four blue glass beads having different shapes and dimensions (**fig. 5, 6, 12, 14-15**), seven beads made of bronze wire or sheet (**fig. 5, 2-5, 7-9**), one bronze pendant (**fig. 5, 17**), one amber bead (**fig. 5, 16**) and one amphora-shaped bead made of yellowish translucent glass paste (**fig. 5, 13**). The presence of a brooch of the »Thracian« type belonging to a variant dated to the first half of the 3rd century BC³² amongst the garment accessories (**fig. 5, 26**) indicates some connections with the communities from the Lower Danube basin where such objects are common. The same cultural contacts are probably behind the presence of the amphora-shaped glass bead included amongst the other beads. On the opposite way, the coral beads discovered in the fortified settlement at Bunești, eastward the Carpathians, could have come from the Carpathian Basin as a result of such distant connections. Aside from that, a series of other artefacts of the La Tène B2 type came to light in the same settlement, of which the early Dux brooches are worth mentioning.

The mechanisms through which both the amphora-shaped glass beads and the coral ones circulated were diverse and complex. Albeit the hypothesis that at least some of these artefacts were traded cannot be excluded, the social inter-community networks very probably played a far more important role. These networks implied a higher degree of individual mobility and less the migration of large groups. The establishing of such social networks was based on a variety of strategies of inter-community communications. Amongst these strategies can be listed the diplomatic agreements between the leaders of different communities, the gift or/and hostage exchanges, matrimonial alliances, etc³³. All of these practices facilitated the circulation of some cultural goods from one area to another, sometimes across wider spaces.

K. Kristiansen has noted that exogamy and also polygamy were important strategies involved in the establishing of external alliances and distant networks of interaction during the expansion stages of some communities dominated by warlike elites (the importance of these elites is illustrated by the funerary inventories containing panoplies of weapons which define their social functions and status)³⁴. Precisely in the La Tène B1-B2 (4th century-beginning of the 3rd century BC), the Carpathian Basin experienced a process of gradual colonisation that lasted several generations across wider areas. Some northern territories were initially occupied along the Danube and in Transdanubia, while later the colonisation process extended in the northern and eastern parts of the Great Hungarian Plain, in Transylvania, and lastly in the southern Carpathian Basin³⁵. Thus, at least some of the garments accessories containing rows of glass, coral or amber beads might be the result of the mobility of some women involved in external marriages. Furthermore, a series of funerary discoveries from the Carpathian Basin seem to sustain the existence of such practices within the La Tène communities³⁶. The burial no. Cx 50 from the La Tène cemetery at Aradu Nou, without weapons, could illustrate another possible example³⁷. Its inventory includes a rich jewellery set belonging to a woman, consisting of a pair of earrings made of twisted silver wire, two bronze bracelets of a local type, several rows of more than 400 glass beads having various shapes and colours (including amphora-shaped beads), coral and amber beads and two Greek silver necklace fasteners with filigree decoration. The silver earrings are specific to the end of the Early Iron Age in the north-western Balkans, while in the La Tène B2a such artefacts were integrated in garment assemblages of the La Tène type, for example at Belgrade-Karaburma³⁸. As concern-

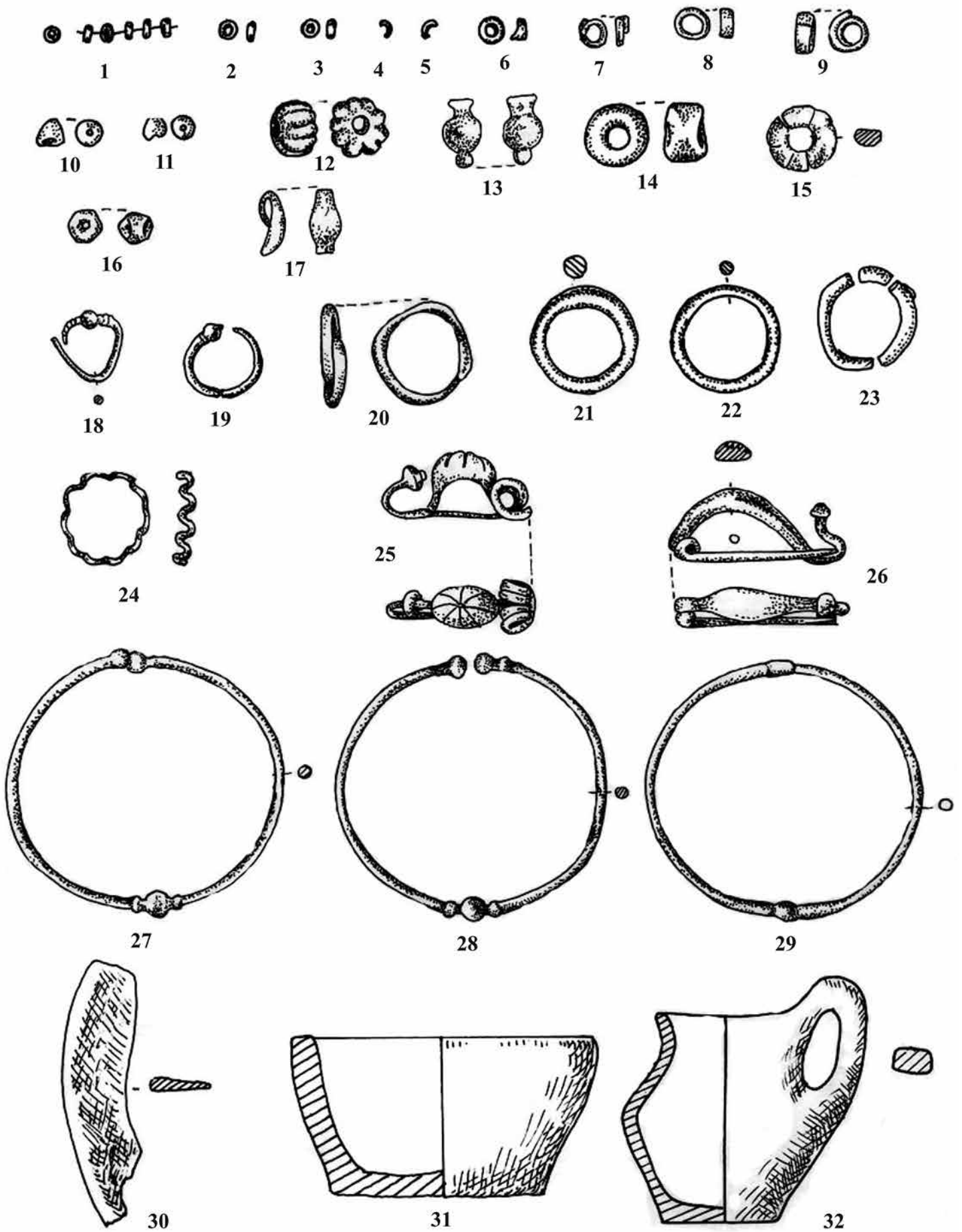


Fig. 5 Fântânele-Dâmbu Popii (jud. Bistrița-Năsăud/RO), grave no. 79: **1. 31-32** ceramic. – **2-5. 7-9. 17-22. 25-29** bronze. – **6. 10-15** glass. – **16** amber. – **23. 30** iron. – **24** silver. – (After Rustoiu 2008, 55 fig. 22). – 1-29 scale 1:1; 30-32 scale 1:2.



Fig. 6 Partial grave inventory from Velika (Požeško-slavonska županija/HR) containing different types of glass and amber beads. – (Photo Municipal museum Požega, courtesy of M. Dizdar / H. Potrebica).

ing the row of beads consisting of elements made of different materials and having different shapes, similar assemblages for bodily ornamentation were also identified in the north-western Balkans in burials belonging to the »pre-Celtic« horizon, for example at Novo mesto³⁹ in Slovenia, or at Velika⁴⁰ (Požeško-slavonska županija) in Croatia (**fig. 6**). The presence of a costume decorated with this kind of ornaments in a burial from a La Tène cemetery, like the one at Aradu Nou, could indicate that the deceased came from a community of the north-western Balkans and arrived in the Celtic community upon the conclusion of a matrimonial alliance.

The analysis of the female garment assemblages from different cultural areas also indicates that there is a strong connection between their distribution and the communication routes⁴¹. Therefore, it can be presumed that the practice of exogamy was used as a means of social communication, to conclude political, social and economic alliances between communities which controlled access along different segments of these routes. The distribution of the aforementioned four groups of finds consisting of coral and amphora-shaped glass beads, to which those made of amber can be added, is an argument sustaining this idea.

Lastly, it has to be also noted the »practical« role of these beads. They were not simple bodily ornaments of Mediterranean origin, but also had an apotropaic function, being associated with other artefacts having a

similar role or even healing qualities, as in the case of coral. Thus, these richly decorated rows of beads were also powerful protective instruments against all sorts of menacing, evil forces that threatened the life of various individuals. Moreover, there is no coincidence that they were mostly worn by women and children, the most vulnerable members of the community. Precisely these apotropaic characteristics of the glass beads contributed to their preservation and long-lasting use. This also led to the presence of some amphora-shaped beads in later archaeological contexts, for example in the Celtic *oppidum* at Budapest-Gellérthegy-Tabán (fig. 2, 4). At the same time, similar artefacts appeared even in cemeteries of the Avar period. For example, one row of beads that also included two amphora-shaped glass beads was found in grave no. 154 from the cemetery at Kisköre (Kom. Heves) in Hungary⁴² (fig. 2, 5). These beads were very probably reused when a Celtic burial was accidentally destroyed upon digging the new funerary pit.

It can be therefore concluded that the analysis of the coral and amphora-shaped glass beads indicates that, in spite of their Mediterranean origin, these artefacts circulated amongst the communities of the Carpathian Basin as part of some complex social connections. Amongst them, the practice of exogamy seems to have played an important role.

LIST 1: AMPHORA-SHAPED GLASS BEADS FROM THE BALKANS AND THE CARPATHIAN BASIN

Contexts with associations of glass and amber beads in *Italic* (after Popović 1997; Schönfelder 2007, 318-321; Rustoiu 2008, 171; 2011a, fig. 4, with additions)

Macedonia: Delogožda; *Skopje-Ždanec*. – Montenegro: Podgorica-Momišići. – Bosnia-Herzegovina: Rudine-Rusanovići (III); Sanski most; *Tuzla*; *Vratnica*. – Serbia: Kale-Krševica (Popović 2007, fig. 3, 13); *Sremska Mitrovica*. – Croatia: *Donja Dolina*; Dracevac; Gradac (Potrebica/Dizdar 2002, 114 pl. 5); Osijek; Pleternica; *Velika*; Vičja luka (Bobovišća, island of Brač). – Slovenia: Kranj-Lajh; Magdalena gora; *Novo mesto-Kapiteljska njva*; Stična; Sv. Vid. – Hungary: Budapest-Gellérthegy-Tabán; Hatvan-Boldog; Keszthely-Csórégödör; Kosd; *Pilismarot*. – Austria: *Au am Leithagebirge-Kleine Hutweide*; Bad Deutsch Altenburg/Carnuntum; *Mannersdorf am Leithagebirge* (Ramsl 2011, 131 pl. 60, 8). – Slovakia: *Dubník*; Michal nad Žitavou. – Czech Republic (Moravia): Blučina-Hřbitovni ulice; *Brno-Horni Heršpice*; Mutěnice; *Přitluky*. – Romania (Banat and Transylvania): *Aradu Nou* (Rustoiu/Ursuțiu 2013a); Fântânele-Dâmbu Popii. – Romania (Lower Danube region): Berteștii de Jos; Chișcani; Pietroasele-Gruiu Dării; Radovanu; Zimnicea. – Bulgaria: Pistiros (Bouzek 2014, fig. 26, 3).

LIST 2: CORAL BEADS FROM THE CARPATHIAN BASIN (AFTER SCHMID-SIKIMIĆ 2000, WITH ADDITIONS)

Serbia: *Sremska Mitrovica*. – Croatia: Vukovar. – Hungary: Hatvan-Boldog; Kosd; Ménfőcsanak; *Pilismarot*; Zsadány-Orosi puszta. – Czech Republic (Moravia): *Brno-Horni Heršpice*. – Slovakia: *Dubník* (Bujna 1989, 271 fig. 42 pl. 24; 2002). – Romania (Banat and Transylvania): *Aradu Nou* (Rustoiu/Ursuțiu 2013a).

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Notes

- 1) Meduna 1970, 231. 235; Venclová 1990, 59. – For the Black Sea region see Puklina 2010, 487. 493 (with previous Russian bibliography). One mould for casting this kind of beads comes from Pontic Olbia: Krutilov 2010, 474 no. Rb-6.
- 2) Magdalenska gora: Hencken 1978, 41 fig. 169, g.
- 3) Dubník: Bujna 1989, 271 fig. 42 pl. 24; 1991, 231 f. – Přitluky: Ludikovský 1962, 78 fig. 4.
- 4) Sindos 1985, 265. – Popović 1997, 168 fig. 3, 7-8.
- 5) Philipp 1981, pl. 25, 82.
- 6) Popović 1997, 168-170 fig. 3.
- 7) Meduna 1970. – Venclová 1990. – Čížmař 1991. – Popović 1997. – Schönfelder 2007, 308 f.
- 8) Rustoiu 2008, 52-57; 2011a, 95 f.
- 9) Champion 1976. – Feugère 2000. – Perrin 2000 etc.
- 10) Morel/Rondi-Costanzo/Ugolini 2000.
- 11) Schmid-Sikimić 2000.
- 12) Gabrovec 1987, 78 f.
- 13) Križ 2001, 40. 125 no. 314.
- 14) Mannersdorf: Ramsel 2011, 202. – Au am Leithagebirge: Nebenhay 1973, 24.
- 15) Pilismarot: Bognár-Kutzián 1975. – Keszthely: von Hunyady 1942, pl. 40, 1. – Dubník: Bujna 1989, 271 fig. 42 pl. 24; 1991, 231 f.; 2002.
- 16) Petres/Szabó 1986, 262 fig. 5.
- 17) Bónis 1969, 198 f.
- 18) Božič 1981.
- 19) Popović 1996. – Dizdar/Potrebica 2002. – Ljuština 2013.
- 20) Rustoiu/Ursuțiu 2013a; 2013b, 325-327.
- 21) Schmid-Sikimić 2000, 154 fig. 9.
- 22) Rustoiu/Berecki 2014, 253 pl. 6.
- 23) Šašel 1992, 435-437. 630-633.
- 24) Popović 2007, fig. 3, 13.
- 25) Potrebica 2008, 198 fig. 3.
- 26) Grbić 1928, pl. 1, 5. – Ljuština 2010, 61 pl. 4, 1.
- 27) Grbić 1928, pl. 4. – Ljuština 2010, 61 pl. 4, 11.
- 28) Bognár-Kutzián 1975, 37 pl. 6, 1.
- 29) Teodoru 1998, 37.
- 30) See e.g. the graves from Berteștii de Jos (jud. Brăila/RO) and Chișcani (jud. Brăila/RO): Sirbu 1983, 12 f. 29.
- 31) Rustoiu 2008, 55 f. fig. 22; 2011a, 95 fig. 3.
- 32) Zirra 1996-1998, 38 type Ic.
- 33) Rustoiu 2012.
- 34) Kristiansen 1998, 397-399.
- 35) Rustoiu 2012. – Rustoiu/Ursuțiu 2013b. – Ljuština 2013.
- 36) Rustoiu 2004-2005; 2011b, 166-168.
- 37) Rustoiu/Ursuțiu 2013a.
- 38) Ljuština/Spasić 2012.
- 39) Križ/Stipančić 2003.
- 40) Dizdar/Potrebica 2002, pl. 2, 4. – Potrebica/Dizdar 2014, fig. 6.
- 41) Casini 2012. For the various means of circulation and distribution of the jewellery and body ornaments from one cultural area to another, see also Feugère 1993, 44-47 figs 7-8.
- 42) Garam 1979, 31 pl. 24, 26.

References

- Bognár-Kutzián 1975: I. Bognár-Kutzián, Some new early La Tène finds in the Northern Danube Basin. In: J. Fitz (ed.), *The Celts in central Europe. Papers of the II. Pannonia Conference. Az István Király Múzeum Közleményei A 20 (Székesfehérvár 1975)* 35-46.
- Bónis 1969: É. Bónis, *Die spätkeltische Siedlung Gellérthegy-Tabán in Budapest. Archaeologia Hungarica Series Nova 47 (Budapest 1969)*.
- Bouzek 2014: J. Bouzek, *The Celtic mercenary reconsidered*. In: Ch. Gosden / S. Crawford / K. Ulmschneider (eds), *Celtic art in Europe. Making connections. Essays in honour of Vincent Megaw on his 80th birthday (Oxford 2014)* 223-233.
- Božič 1981: D. Božič, *Relativna kronologija mlajše železne dobe v jugoslovanskem Podonavju. Arheološki Vestnik 31, 1981, 315-336*.
- Bujna 1989: J. Bujna, *Das latènezeitliche Gräberfeld bei Dubník I. Slovenská Archeológia 37/2, 1989, 245-347*.
- 1991: J. Bujna, *Das latènezeitliche Gräberfeld bei Dubník II. Analyse und Auswertung. Slovenská Archeológia 39/1-2, 1991, 221-255*.
- 2002: J. Bujna, *Sklené koráliky z laténskeho hrobu 21 z Dubníka*. In: D. Staššiková-Štukovská (ed.), *História skla 2001. Zborník príspevkov z 1. kolokvia o historickom skle z územia Slovenska, Nitra 6.6.2001. Informátor Slovenskej Archeologickej Spoločnosti pri SAV Supplement 6 (Nitra 2002)* 27-29.
- Casini 2012: S. Casini, *La pratica dell'esogamia nella cultura di Golasecca*. In: S. Marchesini (ed.), *Matrimoni Misti. Una via per l'integrazione tra i popoli/Mixed Marriages. A way to integration among peoples. Convegno multidisciplinare internazionale; Verona-Trento 1-2 dicembre 2011 (Trento 2012)* 65-77.
- Champion 1976: S. Champion, *Coral in Europe: commerce and Celtic ornament*. In: P.-M. Duval / C. Hawkes (eds), *Celtic art in ancient Europe: five protohistoric centuries/L'Art Celtique en*

- Europe protohistorique: débuts, développements, styles, techniques. Proceedings of the Colloquy held in 1972 at the Oxford Maison Française (London et al. 1976) 29-38.
- Čížmař 1991: M. Čížmař, Příspěvek k cizím kulturním vlivům na morvaských keltských pohřebištích. Časopis Morvaského Muzea 76, 1991, 69-76.
- Dizdar/Potrebica 2002: M. Dizdar / H. Potrebica, Latenska kultura na prostoru Požeške kotline. *Opuscula Archaeologica* 26, 2002, 111-131.
- Feugère 1993: M. Feugère, Des parures et des hommes. Économie et société en Gaule méridionale à travers l'exemple des parures celtiques du Midi. In: A. Daubigney (ed.), *Fonctionnement social de l'Âge du Fer. Opérateurs et hypothèses pour la France. Table ronde internationale de Lons-le-Saunier (Jura), 24-26 octobre 1990* (Lons-le-Saunier 1993) 43-55.
- 2000: M. Feugère, Le corail à l'époque romaine. In: Morel/Rondi-Costanzo/Ugolini 2000, 205-210.
- Gabrovec 1987: S. Gabrovec, Dolenjskagrupa. In: A. Benac (ed.), *Praistorija jugoslavenskih zemalja. 5: Željezna doba* (Sarajevo 1987) 29-119.
- Garam 1979: É. Garam, *Das awarenzeitliche Gräberfeld von Kisköre* (Budapest 1979).
- Grbić 1928: M. Grbić, Srebrna ostava iz Čuruga na Tisi. *Glasnik Istorijskog Društva u Novom Sadu* 1, 1928, 10-22.
- Hencken 1978: H. Hencken, The Iron Age Cemetery of Magdalen-ska gora in Slovenia. *Mecklenburg Collection 2 = American School of Prehistoric Research Bulletin* 32 (Cambridge, M.A. 1978).
- von Hunyady 1942: I. von Hunyady, *Die Kelten im Karpatenbecken. Dissertationes Pannonicae II*, 18 (Budapest 1942).
- Hurwit 2007: J. M. Hurwit, The Human Figure in Early Greek Sculpture and Vase Painting. In: H. A. Shapiro, *The Cambridge Companion to Archaic Greece* (Cambridge 2007) 265-286.
- Kristiansen 1998: K. Kristiansen, *Europe before history* (Cambridge 1998).
- Križ 2001: B. Križ, *Kelti v Novem mestu/The Celts in Novo mesto* [exhibition catalogue] (Novo mesto 2001).
- Križ/Stipančić 2003: B. Križ / P. Stipančić, *Katalog der ausgestellten Funde*. In: B. Križ (ed.), *Bernstein- und Glasschmuck aus Novo mesto, Slowenien* [exhibition catalogue]. *Schriftenreihe des Keltenmuseums Hochdorf, Enz* 5 (Hochdorf/Enz 2003) 88-104.
- Krutilov 2010: V. V. Krutilov, Moulds. In: N. A. Lejpunskaja / P. Guldager Bilde / J. M. Højte / V. V. Krapivina / S. D. Kryžickij (eds), *The lower city of Olbia (sector NGS) in the 6th century BC to the 4th century AD*. *Black Sea Studies* 13 (Aarhus 2010) 473-477.
- Ljuština 2010: M. Ljuština, The Late Hallstatt Communities in the Serbian Part of the Danube Basin. In: S. Berecki (ed.), *Iron Age Communities in the Carpathian Basin. Proceedings of the International Colloquium from Târgu Mureș, 9-11 October 2009*. *Bibliotheca Musei Marisensis Seria Archaeologica* 2 (Cluj-Napoca 2010) 59-78.
- 2013: M. Ljuština, Southern fringe of the Carpathian Basin during the 4th century BC and the first contacts with the La Tène world: the case study of the Belgrade confluence, Serbia. *Acta Archaeologica Carpathica* 48, 2013, 87-109.
- Ljuština/Spasić 2012: M. Ljuština / M. Spasić, Celtic Newcomers between Traditional and Fashionable: Graves 63 and 67 from Karaburma. In: S. Berecki (ed.), *Iron Age Rites and Rituals in the Carpathian Basin. Proceedings of the International Colloquium from Târgu Mureș, 7-9 October 2011*. *Bibliotheca Musei Marisensis Seria Archaeologica* 5 (Târgu Mureș 2012) 391-400.
- Ludikovský 1962: K. Ludikovský, Žárový latěnský hrob y Přitlukách na Moravě. *Památky Archeologické* 53, 1962, 77-86.
- Meduna 1970: J. Meduna, Latěnské pohřebiště v Brně-Horních Heršpicích. *Památky Archeologické* 61/1, 1970, 225-235.
- Morel/Rondi-Costanzo/Ugolini 2000: J.-P. Morel / C. Rondi-Costanzo / D. Ugolini (eds), *Corallo di ieri, Corallo di oggi. Atti del Convegno, Ravello, Villa Rufolo, 13-15 dicembre 1996*. *Scienze e Materiali del Patrimonio Culturale* 5 (Bari 2000).
- Nebehay 1973: S. Nebehay, Das latènezeitliche Gräberfeld von der Kleinen Hutweide bei Au am Leithagebirge, p. B. Bruck a.d. Leitha, NÖ. *Archaeologia Austriaca Beiheft* 11, 1973, 1-80.
- Perrin 2000: F. Perrin, L'origine de la mode du corail méditerranéen (*Corallium rubrum* L.) chez les peuples celtes: essai d'interprétation. In: Morel/Rondi-Costanzo/Ugolini 2000, 193-203.
- Petres/Szabó 1986: E. F. Petres / M. Szabó, Notes on the so-called Hatvan-Boldog type scabbards. In: A. Duval / J. Gomez De Soto (eds), *Actes du VIII^e Colloque sur les Ages du Fer en France non Méditerranéenne, Angoulême, 18-19-20 mai 1984*. *Aquitania Supplément* 1 (Bordeaux 1986) 257-272.
- Philipp 1981: H. Philipp, *Bronzeschmuck aus Olympia*. *Olympische Forschungen* 13 (Berlin 1981).
- Popović 1996: P. Popović, Early La Tène between Pannonia and the Balkans. *Starinar* 47, 1996, 105-125.
- 1997: P. Popović, Les perles de verre en forme de vase ou d'amphore sur l'espace entre la mer Adriatique et le Danube. *Starinar* 48, 1997, 165-171.
- 2007: P. Popović, Nakit iz Krševice. In: M. Blečić / M. Črešnar / B. Hänsel / A. Hellmuth / E. Kaiser / C. Metzner-Nebelsick (eds), *Scripta praehistorica in honorem Biba Teržan. Situla* 44 (Ljubljana 2007) 813-820.
- Potrebica 2008: H. Potrebica, Contacts Between Greece and Pannonia in the Early Iron Age – With Special Concern to the Area of Thessalonica. In: P. F. Biehl / Y. Y. Rassamakin (eds), *Import and Imitation in Archaeology. Schriften des Zentrums für Archäologie und Kulturgeschichte des Schwarzmeerraumes* 11 (Langenweißbach 2008) 187-212.
- Potrebica/Dizdar 2014: H. Potrebica / M. Dizdar, Changing Identities of the Iron Age Communities of Southern Pannonia. In: C. N. Popa / S. Stoddart (eds), *Fingerprinting the Iron Age. Approaches to Identity in the European Iron Age. Integrating South-Eastern Europe into the Debate* (Oxford 2014) 123-141.
- Puklina 2010: O. O. Puklina, Glass objects. In: N. A. Lejpunskaja / P. Guldager Bilde / J. M. Højte / V. V. Krapivina / S. D. Kryžickij (eds), *The lower city of Olbia (sector NGS) in the 6th century BC to the 4th century AD*. *Black Sea Studies* 13 (Aarhus 2010) 487-498.
- Ramsl 2011: P. C. Ramsl, *Das latènezeitliche Gräberfeld von Mannersdorf am Leithagebirge, Flur Reinthal Süd, Niederösterreich. Studien zu Phänomenen der latènezeitlichen Kulturausprägungen. Mitteilungen der Prähistorischen Kommission* 74 (Wien 2011).
- Rustoiu 2004-2005: A. Rustoiu, Celtic-indigenous connections in Oltenia during the middle La Tène. *Observations concerning a Celtic grave from Telești. Ephemeris Napocensis* 14-15, 2004-2005, 53-71.

- 2008: A. Rustoiu, Războinici și societate în aria celtică transilvăneană. Studii pe marginea mormântului cu coif de la Ciumești. Interferențe Etnice și Culturale în Mileniile I a. Chr.-I p. Chr. 13 (Cluj-Napoca 2008).
- 2011a: A. Rustoiu, Celto-Pontica. Connections of the Celts from Transylvania with the Black Sea. *Pontica* 44, 2011, 91-111.
- 2011b: A. Rustoiu, The Celts from Transylvania and the eastern Banat and their southern neighbours. Cultural exchanges and individual mobility. In: M. Guštin / M. Jevtić (eds), *The Eastern Celts. The Communities between the Alps and the Black Sea* (Koper 2011) 163-170.
- 2012: A. Rustoiu, The Celts and Indigenous Populations from the Southern Carpathian Basin. Intercommunity Communication Strategies. In: S. Berecki (ed.), *Iron Age Rites and Rituals in the Carpathian Basin. Proceedings of the International Colloquium from Târgu Mureș, 7-9 October 2011. Bibliotheca Musei Marisiensis Seria Archaeologica* 5 (Târgu Mureș 2012) 357-390.
- Rustoiu/Berecki 2014: A. Rustoiu / S. Berecki, Celtic Elites and Craftsmen: Mobility and Technological Transfer during the Late Iron Age in the Eastern and South-Eastern Carpathian Basin. In: S. Berecki (ed.), *Iron Age Crafts and Craftsmen in the Carpathian Basin. Proceedings of the International Colloquium from Târgu Mureș, 10-13 October 2013. Bibliotheca Musei Marisiensis Seria Archaeologica* 7 (Târgu Mureș 2014) 249-278.
- Rustoiu/Ursuțiu 2013a: A. Rustoiu / A. Ursuțiu, Indigenous and Celtic garment assemblages in Banat and the surrounding areas at the beginning of the La Tène period (Observations regarding the silver spiral earrings). In: I. V. Ferencz / N. C. Rișcuța / O. Tutilă Bărbat (eds), *Archaeological small finds and their significance. Proceedings of the Symposium »Costume as an identity expression«* [2013, Deva] (Cluj-Napoca 2013) 77-88.
- 2013b: A. Rustoiu / A. Ursuțiu, Celtic colonization in Banat. Comments regarding the funerary discoveries. In: V. Sîrbu / R. Ștefănescu (eds), *The Thracians and their neighbours in the Bronze and Iron Ages. Proceedings of the 12th International Congress of Thracology. Târgoviște 10th-14th September 2013. »Necropolises, cult places, religion, mythology«* (Brașov 2013) Vol. II, 323-345.
- Šašel 1992: J. Šašel, *Opera selecta. Situla* 30 (Ljubljana 1992).
- Schmid-Sikimić 2000: B. Schmid-Sikimić, Edelkoralle in der Adria. Zur Frage der Korallenfischerei und des Korallenhandels in der Eisenzeit. In: Morel/Rondi-Costanzo/Ugolini 2000, 147-158.
- Schönfelder 2007: M. Schönfelder, Zurück aus Griechenland – Spuren keltischer Söldner in Mitteleuropa. *Germania* 85, 2007, 307-328.
- Sindos 1985: Sindos [exhibition catalogue Thessaloniki] (Athēna 1985).
- Sîrbu 1983: V. Sîrbu, Câmpia Brăilei în sec. V-III î.e.n. Descoperiri arheologice și interpretări istorice. *Studii și Cercetări de Istorie Veche și Arheologie* 34/1, 1983, 11-41.
- Teodoru 1998: V. V. Teodoru, Contribuții la cunoașterea civilizației geto-dacice în zona est-carpatică în lumina cercetărilor arheologice. *Arheologia Moldovei* 21, 1998, 29-41.
- Venclová 1990: N. Venclová, Prehistoric glass in Bohemia (Praha 1990).
- Zirra 1996-1998: V. V. Zirra, Bemerkungen zu den thraco-getischen Fibeln. *Dacia* 40-42, 1996-1998, 29-53.

Zusammenfassung / Summary / Résumé / Rezumat

Amphorenförmige Glasperlen und Korallenperlen.

Kulturelle Fernbeziehungen am Beginn der späten Eisenzeit im Karpatenbecken

Die Verteilung verschiedener archäologischer Funde spiegelt häufig die Art und Weise wider, in der unterschiedliche Gemeinschaften miteinander in Verbindung stehen. Dabei stellt die Verbreitung von amphorenförmigen Glasperlen und Korallenperlen vom Beginn der späten Eisenzeit ein einschlägiges Beispiel dar. Eine Untersuchung dieser Funde belegt, dass sie aus mediterranen Werkstätten stammen und in der Folge über das Karpatenbecken durch soziale Kontakte zwischen unterschiedlichen Gruppen und Gemeinschaften verbreitet werden. Die Exogamie war ein wichtiger Faktor im Austausch solcher Gegenstände zwischen verschiedenen Gesellschaften.

Amphora-Shaped Glass and Coral Beads.

Distant Cultural Connections in the Carpathian Basin at the Beginning of the Late Iron Age

The circulation of different archaeological artefacts frequently reflects the manner in which a wide variety of communities used to communicate. The distribution of amphora-shaped glass and coral beads at the beginning of the Late Iron Age provides a relevant example. The analysis of these artefacts indicates that they came from Mediterranean workshops, subsequently being distributed across the Carpathian Basin through social contacts established between different groups and communities. The practice of exogamy was an important factor in the inter-community exchange of such cultural goods.

Perles en forme d'amphore en verre et perles de corail.

Connexions culturelles à longue distance dans le bassin des Carpates, au début de La Tène

La diffusion de différents objets archéologiques reflète souvent la manière qu'avaient diverses communautés de communiquer. La répartition des perles en forme d'amphore en verre et des perles de corail, au début de La Tène, en fournit un bon exemple. L'analyse de ces types indique qu'ils proviennent d'ateliers méditerranéens, et ont donc été diffusés dans le bassin des Carpates à travers les contacts sociaux établis entre différents groupes et communautés. La pratique de l'exogamie a joué un rôle important dans les échanges inter-communautaires de tels objets.

Traduction: M. Feugère

Mărgele de sticlă în formă de amforă și mărgele de coral.

Conexiuni culturale la distanță în Bazinul Carpatic la începutul celei de a doua vârste a fierului

Circulația unor artefacte arheologice reflectă frecvent maniera de comunicare între comunități diferite. Distribuția mărgelilor de sticlă în formă de amforă și a mărgelilor realizate din ramuri de coral la începutul celei de a doua vârste a fierului constituie exemple relevante în acest sens. Analiza acestor artefacte indică faptul că ele provin din ateliere mediteraneene, fiind ulterior distribuite de-a lungul Bazinului Carpatic pe baza contactelor sociale stabilite între diferite grupuri sau comunități. Practica exogamiei a constituit un factor important în schimbul intercomunitar al unor astfel de bunuri.

Schlüsselwörter / Keywords / Mots clés / Cuvinte cheie

Rumänien / Karpatenbecken / Latènezeit / Glasperlen / Koralle / Fernbeziehungen / Handel

Romania / Carpathian Basin / La Tène period / glass beads / coral / long-distance relations / trade

Roumanie / bassin des Carpates / période de La Tène / perles en verre / corail / relations à longue distance / échanges

România / Bazinul Carpatic / epoca La Tène / mărgele de sticlă / coral / relații la distanță / schimburi

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INHALTSVERZEICHNIS

Petr Šída, Sandra Sázelová, Pavel Havlíček, Libuše Smolíková, Jaroslav Hlaváč, Lower and Middle Pleistocene Sediment Sequence with Archaeological Finds in Horky nad Jizerou (okr. Mladá Boleslav/CZ)	283
Michael Francken, Katerina Harvati, Joachim Wahl, Soziale Binnengliederung im linearbandkeramischen Gräberfeld von Schwetzingen (Rhein-Neckar-Kreis)	303
Daniel Neumann, Anja Pütz, Marina Vohberger, Ein schnurkeramisches Grab mit Silexdolchbeigabe aus Aschheim (Lkr. München). Absolute Datierung, Strontiumisotopenanalysen und archäologische Vergleiche	319
Vlastimil Král, Petr Limburský, Petr Menšík, Polished Stone Tools of the Early Bronze Age in Bohemia	335
Nathalie Ø. Brusgaard, Harry Fokkens, Stijn F. M. van As, Hans D. J. Huisman, The Potential of Metal Debris: a Late Iron Age Ironworking Site at Oss-Schalkskamp (prov. Noord-Brabant/NL)	345
Aurel Rustoiu, Amphora-Shaped Glass and Coral Beads. Distant Cultural Connections in the Carpathian Basin at the Beginning of the Late Iron Age	365
Regula Wahl-Clerici, Annemarie Wiechowski, Markus Helfert, Britta Ramminger, Thomas Schierl, Die Mühlsteinproduktion im Steinbruch von Fonte da Ribeira. Zum römischen Bergwerksdistrikt von Três Minas, Gralheira und Campo de Jales (distr. Vila Real/P).	379
Gisela Michel, Die Dame mit dem Sonnenschirm – zu Grab Köln, Severinstraße 129	395
Alexandra Hilgner, Eine kommunikative Bilderwelt? Anmerkungen zu einer angelsächsischen Gürtelschnalle aus Burwell (Cambridgeshire/GB)	403
Simone Häberle, Jörg Schibler, Wim Van Neer, Heide Hüster Plogmann, Fischknochen als Indikatoren für Gewässerzustand und menschliche Fischselektion. Eine zusammenfassende Auswertung mittelalterlicher und neuzeitlicher Fischreste aus dem Rheineinzugsgebiet der Schweiz	417

