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### A SARMATIAN HORSE-RIDER AT THE COURT OF THE DACIAN KINGS. THE TYPOLOGY (I).

**Abstract:** The proposed series of papers will focus on the reinterpretation of a cheek-piece discovered in the Dacian fortress of Costești-Cetățuie during the first systematic excavations undertaken there at the beginning of the XX<sup>th</sup> c. The iron cheek-piece discovered back then presents a specificity that has not been observed before, namely what seems to be a *tamga* sign engraved on the exterior of the piece (Fig. 1/1). For unknown reasons, the sign was not observed during the first publication. As such, the general purpose of this effort will be to assess the inherent meaning of this sign and its implications for the typology of such horse-bits. In the first paper I will approach the typology of such cheek-pieces in the Dacian *milieu* and in the neighbouring western areas. In the second article of the series I will focus on the question of such cheek-pieces in the North Pontic region, as well as the presence of *tamga* signs on objects from the Dacian and North Pontic areas. All this will be done in order to better understand the historical context that led to the appearance of a *tamga* sign on a type VIII cheek-piece in the Dacian fortress at Costești-Cetățuie.

**Keywords:** *bit, cheek-piece, tamga, Dacian, Sarmatian.*

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The iron cheek-piece was published before, as part of Glodariu and Iaroslavschi's typology of horse-bits discovered in the Dacian *milieu* (Fig. 2/2, 6)<sup>1</sup>. The piece is kept in the deposits of the National History Museum of Transilvania, with the inventory no. 571=V41. The Museum's catalogue provides some information about its context of discovery<sup>2</sup>. It was found in tower no. 4 of the fortress at Costești-Cetățuie, during the first systematic excavations that took place there between 1925-1929 under the coordination of D.M. Teodorescu and A. Ferenczi from the University of Cluj, under the auspices of V. Pârvan<sup>3</sup>. In the first publication of the results of those excavations, D.M. Teodorescu does not speak specifically about tower no. 4 (he describes, more generally, the second line of defence of this fortress – the stone wall and the so-called *buttress-towers*)<sup>4</sup>, while in the description of the material remains recovered during the excavation he mentions the presence of horse-bits, without providing any further details<sup>5</sup>. Tower no. 4 is located on the W side of the fortress, under the upper plateau of the fortress, near

<sup>1</sup> GLODARIU/IAROSLAVSCHI 1979, Fig. 73/24.

<sup>2</sup> Information provided by R. Mateescu from National Museum of Transylvanian History, who had pointed out the piece and provided support for its publication.

<sup>3</sup> TEODORESCU 1930, 267-268.

<sup>4</sup> TEODORESCU 1930, 273.

<sup>5</sup> TEODORESCU 1930, 288.

the cistern<sup>6</sup>. It is an isolated tower placed north-west and on the same terrace with the stone curtain wall that comprises towers no. 1-3, presenting a dimension of 10,40 X 12 m<sup>7</sup>. It has been proposed that it was built together with the other stone structures during the second phase of construction of the fortress and that it functioned in the period between Burebista's reign and the second Daco-Roman wars (roughly between the middle of the 1st c. BC and the beginning of the 2nd c. AD)<sup>8</sup>. Regarding their character, these towers were associated with a more prevalent military purpose, being called *buttress-towers* by Teodorescu<sup>9</sup> or *bastions* by C. Daicoviciu<sup>10</sup>, in opposition to the so-called *house-towers* from the upper plateau of the same fortress<sup>11</sup>. An important chronological hint is offered by the fact that this defensive stone structure was abandoned during the last phase of occupation of the fortress, when the so-called *red vallum* was erected, overlaying the previous structure (attested, at least, for tower no. 1 of the defence line)<sup>12</sup>.

The cheek-piece has the following characteristics: it is made out of iron, having a total length of around 11 cm, while its width fluctuates between 1.65 cm at its ends to 0.7 cm in the middle area (**Fig. 2/1**). The object's section is flat and wide at the edges, becoming rectangular in its middle part. This speaks about the manufacturing process as well. The object was made from a rectangular profiled iron bar, which was flattened towards the ends by hammering. Around the center the iron bar was perforated, probably with a small, rectangular puncher, resulting in two sockets with rectangular sections that protrude out of the body of the cheek-piece. On the same side of the bar as the protrusions, on one of the flatter ends, a sign was engraved, probably with a small stamper. The sign, parallel to the length of the piece, has 1.2 cm in length, being composed of three more or less equal sized parts. The sign can be described as being composed of two opposite volutes, united in their central posterior area by a straight line.

#### TYPE VIII HORSE-BITS FROM THE DACIAN HEARTLAND

The object, identified as a cheek piece of a horse-bit, was included by Glodariu and Iaroslavschi in their type III of horse-bits (**Fig. 2/6**)<sup>13</sup>. It can be assigned to the VIII<sup>th</sup> type in Werner's typology, that presents so-called *propeller* type cheek pieces with two sockets<sup>14</sup>. All 17 finds of this type of horse-bits listed by Werner come from Geto-Dacian *davae* (Bâzdana, Costești-Cetățuie, Piatra Craivii, Grădiștea de Munte, Ocnița, Poiana, Polovragi, Popești, Răcătău and Radovanu – **Fig. 1**) and were discovered in layers inside the settlements (except for the two found in the tumuli from Popești and Radovanu)<sup>15</sup>. Their dating corresponds to the

general chronology of the settlements (that is 2nd c. BC – beginning of the 2nd c. AD)<sup>16</sup>, except in the case of the fragmentary cheek-piece, part of the inventory of tumulus no. IV at Popești (**Fig. 3**), whose chronology was limited by A. Vulpe to the period between 150 BC – the reign of Augustus<sup>17</sup>, a similar chronology being suggested by A. Rustoiu for this grave<sup>18</sup>. V. Sîrbu considers this tumulus to be dated in the 1st c. BC<sup>19</sup>. D. Božič, in a recent article on the type VIII horse-bits, proposes a chronology limited to LT D1 for the inventory of this tumulus, as well as for the tumulus of Radovanu and the horse-bits from the Cellenița I necropolis of Mala Kopanja (because of their association with LT D1 swords and the characteristics of the inventories of the two graves)<sup>20</sup>. The fragmentary cheek-piece with two sockets was recovered from the plowed surface of the tumulus (**Fig. 3/19**), while other fragmentary remains of the same type of horse-bits were recovered from the inventory of the tumulus (the most relevant being another cheek-piece fragment – **Fig. 3/2**) and what seems to be remains of typical *wheels* with spikes on the inside (**Fig. 3/4,11**), as well as mouth-piece fragments (**Fig. 3/1**)<sup>21</sup>.

Other remains of such cheek-pieces or bits of type VIII have been discovered since Werner's work had come to light. Three more examples of cheek-pieces of this type from Poiana were further published in 1998 (**Fig. 4/1-3**)<sup>22</sup>. They were dated largely between the 2nd c. BC – 1st c. AD<sup>23</sup>. A cheek-piece attributable to this type was published from Brad, although in this case the body of the piece is slender, elongated and bent, ending in two rings, with a prominence on top (**Fig. 4/5**)<sup>24</sup>. It had been dated to the second Dacian phase of the settlement, that is during the 1<sup>st</sup> c. BC<sup>25</sup>. V. Sîrbu published another fragmentary cheek-piece of this general type from Grădiștea, Brăila County. It was discovered in the filling of pit 31, where the remains of a dismembered child were found as well<sup>26</sup>. Still, the cheek-piece was not directly associated with these human remains, being recovered together with other dispersed archaeological materials, including other remains of the horse-bit (**Fig. 4/6**)<sup>27</sup>. The character of the archaeological material made V. Sîrbu consider the most probable use of the context as a waste pit, without excluding the possibility that it could have functioned as a

horse-bit elements pertaining to the VIII type that have been published after Werner's synthesis.

<sup>16</sup> WERNER 1988, 51.

<sup>17</sup> VULPE 1976, 214; Fig. 16.

<sup>18</sup> RUSTOIU 1996, 148.

<sup>19</sup> SÎRBU 1994, 127, 135.

<sup>20</sup> BOŽIČ 2018, 138-141.

<sup>21</sup> VULPE 1976, 214, Fig. 11, 16.

<sup>22</sup> TEODOR *et alii* 1998, p.80, Fig. 30/3,6, 10. Werner mentions only one type VIII cheek-piece from Poiana, without representing it – Werner 1988, p. 49. This is the piece published first in VULPE 1951, Fig. 22/8 and later republished by BORANGIC/BĂDESCU 2014, p. 90 in their catalogue, with a wrong reference to VULPE/TEODOR 2003, XXXIX, where it is not included; the pieces published in TEODOR *et alii* 1998 and again in VULPE/TEODOR 2003 represent unpublished cheek-pieces, kept in the Tecuci Museum; the earlier piece published by R. Vulpe is kept in the National Museum of Romanian History in Bucharest, as shown by its inclusion in BORANGIC/BĂDESCU's latter catalogue (Fig. /4).

<sup>23</sup> TEODOR *et alii* 1998, 47.

<sup>24</sup> URSACHI 1995, 146, Pl. 49/7, 247/11.

<sup>25</sup> URSACHI 1995, 146.

<sup>26</sup> SÎRBU 1985, 90.

<sup>27</sup> SÎRBU 1985, 90.

<sup>6</sup> DAICOVICIU *et alii* 1989, 179.

<sup>7</sup> DAICOVICIU *et alii* 1989, 179; GLODARIU 1983, 89.

<sup>8</sup> DAICOVICIU *et alii* 1989, 180.

<sup>9</sup> TEODORESCU 1930, 273.

<sup>10</sup> DAICOVICIU/FERENCZI 1951, 14-15.

<sup>11</sup> DAICOVICIU *et alii* 1989, 179.

<sup>12</sup> DAICOVICIU *et alii* 1989, 179.

<sup>13</sup> GLODARIU/IAROSLAVSCHI 1979, 125; Fig. 73/24 (Inv. No. 571).

<sup>14</sup> WERNER 1988, 48-51; Taf. 23, 24, 70a; No. 571 from Costești in Taf. 23/No. 163.

<sup>15</sup> WERNER 1988, 49-50. We will further present only the cheek-pieces and



storage or burial pit at some point<sup>28</sup>. The context was dated by the researcher in the first half of the 1st c. BC<sup>29</sup>, while the settlement functioned between the beginning of the 2nd and the end of the 1st c. BC<sup>30</sup>. The same author publishes, together with his collaborators, other elements belonging to the VIII<sup>th</sup> type that have been uncovered at Pietroasele-Gruia Dării. The most easily attributable of the elements is a cheek-piece of the usual *propeller* type (although with a slender body – **Fig. 5/1**) discovered in Cx 102<sup>31</sup>. It was found in the upper side of a so-called *moviliță* context, dated by the author to the first c. AD (approx. 1-75 AD)<sup>32</sup>. Other less easily attributable elements from the same settlement could be mentioned, such as a possible fragmentary cheek-piece<sup>33</sup> that presents a widened end and a central orifice, instead of the usual socket (**Fig. 5/2**), while another piece, hesitantly interpreted by the authors as an iron key, could represent, in fact, a fragmentary cheek-piece of the *propeller* type (if the piece is, indeed, fragmentary – **Fig. 5/3**)<sup>34</sup>. Besides cheek-pieces two so-called *wheels* had been found, a smaller, four-spoked iron piece, with spikes on one side (**Fig. 5/5**)<sup>35</sup> and a bigger, bronze *wheel* with similar spikes on a side, but with the interior body presenting a more complex pattern (the bases of the four-spokes were given, this time, a square form – **Fig. 5/6**) that is fragmented<sup>36</sup>. The first four-spoked iron *wheel* had been found in context no. 2, which was dated by the author between 10-40 AD<sup>37</sup>, while regarding the second bronze *wheel* no context of origin was provided. Another four-spoked bronze *wheel* was interpreted by the author as a similar piece (**Fig. 5/7**)<sup>38</sup> in relation to horse-bits, although it seems more likely to be a four-spoked pendant with four protuberances on the exterior of the *wheel*, as defined by A. Rustoiu<sup>39</sup>. In the nearby Dacian fortification of Târcov, a yet unpublished cheek-piece of the typical *propeller* type was found recently. The author of the research dates the fortress during the 1st c. AD<sup>40</sup>. At Sprâncenata, in western Muntenia, an interesting fragmentary iron piece that had the form of an *arrow-head* was found, C. Preda having doubts about its functionality (**Fig. 5/4**)<sup>41</sup>. Given its unusual ending for a possible arrow-head (it presents a globular knob at the intact ending), it could actually represent a fragmentary cheek-piece of the type we will encounter further down at Mala Kopanja (**Fig. 10/16**), although further verification is needed. In the same settlement, between the few iron objects recovered, a mouth-piece that can be attributed to this type

of horse-bit, but not exclusively, was found as well<sup>42</sup>. The settlement was dated between the 2nd c. BC – 1st c. AD by the author of the research<sup>43</sup>.

A more certain ascribable fragmentary cheek-piece of the VIII<sup>th</sup> type was uncovered at Sighișoara-Wietenberg, pertaining to the second phase of building L2/93-95, dated by the authors between the end of the 1st c. BC – first half of the 1st c. AD (**Fig. 6/10**)<sup>44</sup>. At Tilișca other remains of bits belonging to this type have been found: two cheek-pieces of the *propeller* type, one fragmentary (**Fig. 6/1**), while the other had two iron strap ends attached directly to the central sockets of the cheek-piece, together with a rectangular mouth-piece that was decorated with a herring bone pattern (**Fig. 6/9**). Another mouth-piece, identical to the first one (including the decoration) was identified on the same terrace (**Fig. 6/3**)<sup>45</sup>. The fragmentary cheek-piece was found on the 3rd terrace<sup>46</sup>, while on the 5th terrace, in section 57A1 an iron deposit composed of bit fragments was recovered (the isolated mouth-piece plus three more fragments – **Fig. 6/2-4**), together with iron rings, nails, iron bars and spikes, door hinges, a *situla* attachment etc. (**Fig. 6/2-5**)<sup>47</sup>. The more complete horse-bit was recovered from an iron tool deposit on the same V<sup>th</sup> terrace, in surface 57, that contained two other almost complete bits and an iron loop (**Fig. 6/6-9**), a spear head, sickles, a hearth dog and an iron chain<sup>48</sup>. The last two archaeological contexts are dated largely by N. Lupu in the *La Tène* period<sup>49</sup>. Still, the presence of a *situla* dated in the first c. BC that was found in a leveling layer seems to mark the point between the last two phases of development of the fortress in the late *La Tène* period, a moment dated by the authors around the middle of the 1st c. BC<sup>50</sup>. It would seem reasonable to date them – at least the first deposit with horse bits elements – in the second late *La Tène* phase of the fortress, given the presence in its inventory of the *situla* attachment whose dating can reach the middle of the 1st c. AD (*Supra* n. 47), while the area of the V<sup>th</sup> terrace presented a dense occupation with work-shop structures (that could be related to the deposits)<sup>51</sup> and destruction remains caused by the Daco-Roman wars are attested on the same terrace as well<sup>52</sup>. The composition of the two deposits is quite relevant, as they contain entire or fragmentary bits of two different types. While the mouth-piece (**Fig. 6/3**) from the first deposit was found together with an isolated *Thracian* type cheek-piece (**Fig. 6/4**; type XVI at Werner), the second deposit contained two almost complete *Thracian* type bits (**Fig. 6/6-7**), besides the half-complete type VIII bit (**Fig. 6/9**) that is of our direct interest. In a more recent article D. Božič tends to suggest that this cheek-piece could be dated to the LT D1, but only based on the herring pattern on the mouth-piece and its similarity to the one from the Radovanu tumulus<sup>53</sup>.

<sup>28</sup> SÎRBU 1985, 91.

<sup>29</sup> SÎRBU 1996, 293; Fig. 27,29.

<sup>30</sup> SÎRBU 1996, 110-112.

<sup>31</sup> SÎRBU *et alii* 2005, 25, Fig. 27/1, 85/5.

<sup>32</sup> SÎRBU *et alii* 2005, 89.

<sup>33</sup> SÎRBU/DUPOI 2001, 34 ; Fig. 36/3.

<sup>34</sup> SÎRBU/DUPOI 2001, 34 ; Fig. 37/4, 60/12.

<sup>35</sup> SÎRBU *et alii* 2005, 25 ; Fig. 50/6.

<sup>36</sup> SÎRBU/DUPOI 2001, 34 ; Fig. 59/14, 60/13.

<sup>37</sup> SÎRBU *et alii* 2005, p. 66.

<sup>38</sup> SÎRBU/DUPOI 2001, 34, Fig. 59/15, 60/10.

<sup>39</sup> RUSTOIU 1996, 126, Fig. 87/6; ANDRIȚOIU/RUSTOIU 1997, 114, Fig. 118/6.

<sup>40</sup> Informations based on the presentation *Târcov – o așezare dacică din secolul I p. Chr. din Subcarpații Buzăului* hold by the author of the research, Sebastian Matei, at the online conference *Arheologia perioadei de trecere de la epoca târzie a fierului la epoca romană în Dacia: Contacte și conflicte în secolele I-II p. Chr.*, organized by MNCR in 10.12.2021.

<sup>41</sup> PREDĂ 1986, 98 ; Pl. XLVIII/13, Pl. L/3

<sup>42</sup> PREDĂ 1986, 97 ; Pl. XLVIII/8;

<sup>43</sup> PREDĂ 1986, 121.

<sup>44</sup> ANDRIȚOIU/RUSTOIU 1997, 109-110, Fig. 116/7.

<sup>45</sup> LUPU 1989, 74, Fig. 24/11-12, 16.

<sup>46</sup> LUPU 1989, 39-40, Fig. 24/16.

<sup>47</sup> LUPU 1989, 50, Fig. 24/2,4,12; the *situla* attachment is type Eggers 18 and is dated to the 1st c. BC – first half of the I<sup>st</sup> c. AD, 79, note 100.

<sup>48</sup> LUPU 1989, 48, 85; Fig. 24/5,7,8,11.

<sup>49</sup> LUPU 1989, 85.

<sup>50</sup> LUPU 1989, 100-102.

<sup>51</sup> LUPU 1989, 29, 49.

<sup>52</sup> LUPU 1989, 105.

<sup>53</sup> BOŽIČ 2018, 142.

In the nearby fortress of Căpâlna other elements pertaining to the VIII type of horse bits have been uncovered. Most importantly, there was found a well-preserved iron horse-bit with typical *propeller* cheek-pieces with two protruded sockets and a mouth-piece composed by two rectangular sectioned bars that present elegantly carved grooves on all four sides (**Fig. 7/1**). Only one of the outer rings that connected the bit to the strap was preserved. The bit has two sets of rings placed on its interior, along the mouth-piece: two bigger sized, four-spoked *wheel*-shaped rings near the cheek-pieces, with four spikes oriented towards the horse's mouth and two smaller sized rings with four protuberances oriented outwards but without spokes, that rested on the opposite sides of the mouth-pieces' joint (**Fig. 7/1**)<sup>54</sup>. The piece was wrongly interpreted by its initial publishers as a *Thracian* type horse bit<sup>55</sup> (probably just the result of confusion, as another piece of a *Thracian* type cheek-piece was correctly interpreted)<sup>56</sup>. The horse bit is definitely part of the VIII type of Werner, as it has many similarities with the one recovered from the Radovanu tumulus (**Fig. 8**). Together they attest, at least on complete bits, the use of four-spoked *wheels* with spikes oriented towards the mouth of the horse in correlation with *propeller* type cheek-pieces. The smaller rings present on the Căpâlna bit represent an *unicum* on a complete bit of this type, while the use of such rings (bronze rings of type 1a and, possibly, 2) on gear harness is suggested by A. Rustoiu in relation to exactly this piece<sup>57</sup>, although it is not clear from the initial publication if the rings are made out of bronze or of iron. Regarding the dating of the bit, the authors mention that given the fact that it was discovered on terrace F of the fortress, a specific period is impossible to be provided, although they tend to attribute it to the final period of occupation of the fortress (that is, as in the case of Tilișca, between the middle of the 1st c. BC – beginning of the 2nd c. AD)<sup>58</sup>. Two other cheek-pieces from Căpâlna, this time made out of bronze, were correctly interpreted as pertaining to the same VIII type of bits<sup>59</sup>, although they share a specificity – ring-shaped endings – (**Fig. 7/2-3**) somewhat similar to the Brad cheek-piece (**Fig 4/5**). The quality of the print in the monography of Căpâlna is particularly bad in the area where these pieces are represented. Fortunately, the second cheek-piece was republished in a better quality by F. Medeleț in a discussion regarding bronze workshops in the Iron Gates region<sup>60</sup>. It can be seen better here that at least one of the cheek-pieces is decorated with three sets of horizontal incisions that encompass the two rectangular sockets on the exterior of the piece (**Fig. 7/3**). A fragmentary iron cheek-piece of the usual *propeller* type was found at Căpâlna as well (**Fig. 7/4**)<sup>61</sup>. They are largely dated in the period of occupation

of the fortress, that is the middle of the 1st c. BC – beginning of the 2nd c. AD<sup>62</sup>.

The mould discovered at Pecica by I. H. Crișan, which presents a slot for manufacturing this type of cheek-pieces (**Fig. 7/5**), further demonstrates that this type of horse-bits were produced locally and in bronze as well<sup>63</sup>. The workshop was dated in the 1st c. AD<sup>64</sup>. F. Medeleț suggested that a bronze cheek-piece discovered at Židovar in Banat (**Fig. 7/7**) could represent a product of this workshop, given the similar form, dimension and production technique<sup>65</sup>. I would argue that the form of this cheek-piece does not actually attest this. Crișan made casts using this mould and published them as well (**Fig. 7/6**). The cast seems, indeed, to be similar to the cheek-piece from Židovar (**Fig. 7/7**), given its prominent sockets. Still, if one looks closer at the original mould (**Fig. 7/5**) it can be seen that the endings of the cheek-pieces produced with it were enlarged, being closer to the *propeller* type cheek-pieces or, even more closer, to the bronze cheek-pieces with rings at their ends from Căpâlna (**Fig. 7/2-3**). The bronze cheek-piece from Židovar represents a different form, as its endings seem to have a rectangular section, enlarging to a truncated quadrangular pyramid form. As such, it seems to me that this cheek-piece from Židovar is, actually, different from any other cheek-pieces of this type because of its endings. It wears horizontal incisions, similar to the Căpâlna bronze cheek-pieces, although this time they are marked on top of the sockets, not in between and around them.

#### TYPE VIII HORSE-BITS IN THE WEST

Both Werner<sup>66</sup> and Zirra<sup>67</sup> agree on a *local* origin for the *propeller* type horse-bits, as they appear in Geto-Dacian settlements between the late 2nd c. BC – beginning of the 2nd c. AD. Still, other pieces were discovered further west from this general area. Werner was the first to ascribe the cheek-piece discovered in the Roman camp at Augsburg-Oberhausen to this type (**Fig. 9/1**)<sup>68</sup>. It is dated in the early Imperial period, as the context of provenance was dated as early as 15 BC, based on the pottery fragments identified and as late as 14/17 AD, given the associated coins<sup>69</sup>. It is a bronze cheek-piece of a slender *propeller* type, presenting a specificity – globular knobs at both ends of the piece<sup>70</sup>. D. Božić has recently published a number of iron horse-bit pieces that pertain to the same variant of this type, discovered at Orešac near Vitrovača, in the Drava valley, in today's Croatia, sometimes before 1904, together with 27 bronze pieces from a yoke, dated by M. Schönfelder in the 1st c. BC (**Fig. 9/2-3**)<sup>71</sup>. It seems that the 5 iron pieces were part of two different horse-bits, while the author publishes a sketch of a cheek-piece and a typical four-spoked *wheel* with spikes (**Fig. 9/2**), as well as photos of a cheek-piece and a mouth-piece (**Fig. 9/3**), which are, apparently, components

<sup>54</sup> GLODARIU/MOGA 1989, 103.

<sup>55</sup> GLODARIU/MOGA 1989, 104, Fig. 91.

<sup>56</sup> GLODARIU/MOGA 1989, 104, Fig. 92/9 is correctly interpreted as a *Thracian* type cheek-piece and is similar to the cheek-piece from the first deposit at Tilișca – Fig. 4; the one from Căpâlna was dated, by its context, to the beginning of the 2nd c. AD.

<sup>57</sup> RUSTOIU 1996, p. 155-156.

<sup>58</sup> GLODARIU/MOGA 1989, 104, 128.

<sup>59</sup> GLODARIU/MOGA 1989, 104 ; Fig. 92/3,5; They are attributed to the 3rd type in Glodariu and Iaroslavschi's typology of bits, that is more or less equivalent to the type VIII of Werner.

<sup>60</sup> MEDELEȚ 1995, Fig. 2/6.

<sup>61</sup> GLODARIU/MOGA 1989, 104, Fig. 92/5-6.

<sup>62</sup> GLODARIU/MOGA 1989, 104 ;

<sup>63</sup> CRIȘAN 1969, 95, Pl. I/2, I/11; WERNER 1988, 50.

<sup>64</sup> CRIȘAN 1969, 102.

<sup>65</sup> MEDELEȚ 1995, p. 96.

<sup>66</sup> WERNER 1988, p. 119.

<sup>67</sup> ZIRRA 1981, p. 149.

<sup>68</sup> WERNER 1983, 354; HÜBENER 1973, 39, Pl. 24/15.

<sup>69</sup> WERNER 1983, 357-358.

<sup>70</sup> WERNER 1983, 355.

<sup>71</sup> BOŽIĆ 2018, 145.

of the first horse-bit only<sup>72</sup>. A detail regarding the *wheels* of those bits is unclear to me – while it is proposed that both horse-bits had four-spoked *wheels* with spikes<sup>73</sup>, as the one seen in the first sketch (**Fig. 9/2**), the cheek-piece captured in the photo seems to have attached a type of *wheel* of a different, rectangular form, with spokes protruding from the edges of an iron square-plate (resulting in a kind of *barbed wheel*). The remains of similar spokes are seen on one end of the mouth-piece in the same photo (**Fig. 9/3**). The author mentions that the preserved cheek-piece and mouth-piece of the second horse-bit had an unusual form<sup>74</sup>, for which he did not find parallels, without providing other details. Nevertheless, it is certain that the published cheek-piece pertains to the same type as the one from Augsburg, with the specific presence of the *barbed wheel*. At the same time, the mouth-piece presents some kind of stoppers near its central joint, similar to a following example of a horse-bit from Mala Kopanja (**Fig. 10/1**). It seems that other horse-bits of type VIII were found at Orešac-Židovar, in the Serbian Banat region, as the same author mentions in the introduction of the article<sup>75</sup>. F. Medelet published the above discussed bronze-cheek piece from Židovar<sup>76</sup> (**Fig. 7/7**; *Supra.* no. 65), while Božić published the reconstruction of an iron horse bit of the typical VIII<sup>th</sup> type, with enlarged, *propeller* type cheek-pieces (**Fig. 7/8**)<sup>77</sup>.

A more complete lot of discoveries relevant in this discussion was found in the necropolis of Mala Kopanja, in Transcarpathia, adding a number of 17 new entire or fragmentary iron horse-bits examples of this general type<sup>78</sup>. V. Kotigoroşco internally classifies them as type II (equivalent to type VIII of Werner) with three variants. The first variant, A, is represented by horse-bits with typical *propeller* type cheek-pieces (3 cases – **Fig. 10/1-3**)<sup>79</sup>, while variant B (with 8 cases – **Fig. 10/4-11**) presents cheek-pieces that are similar, but slender, with a lanceolar form<sup>80</sup>, while variant C (with 2 cases – **Fig. 10/12,13**) is similar to B, presenting a specificity – globular knobs at both ends of the cheek-piece – whom the author describes as *arrow-head* endings, that are similar to the ones on the pieces from Augsburg and Orešac (**Fig. 9/1,2**)<sup>81</sup>. Furthermore, I would argue that what the author loosely defines as type VI (3 cases – **Fig. 10/14-16**)<sup>82</sup> are actually variants of the same general type, as the differences are inconsequential: the mouth-pieces are doubled, being made out by bending a rectangular iron bar, while the cheek-pieces present evident globular knobs at the ends; sometimes the cheek-pieces are purposely elongated, by the modelling of a thin, circular section segment towards both ends, as in the last piece (**Fig. 10/16**). Another horse-bit, this time fragmentary, was not included in the typology of horse-bits proposed by Kotigoroşco. It is comprised of a single cheek-piece with two loops, a simpler model than the

other ones (as its section is rectangular, without flattened endings), a doubled rectangular sectioned mouth-piece, plus the remains of two four-spoked *wheels* (**Fig. 10/17**)<sup>83</sup>. All variants from Cellenița I present the typical two rectangular sockets on the cheek-pieces, while their mouth-pieces are made out of two parts, with a rectangular profiled bar that has circular profiled loops at both ends, being attached to each other and to the cheek-pieces, in-between the rectangular sockets. The later specificity is a common feature for this type of horse-bits as well, as observed by V. Zirra in his study on horse-bits from pre-Roman Dacia<sup>84</sup>. The necropolis Cellenița I from Mala Kopanja was dated by V. Kotigoroşco between 120 – 60/50 BC<sup>85</sup>. What is interesting regarding the lot from Mala Kopanja is the presence in some cases of globular knobs on the ends of the cheek-pieces parallel to the use of typical *propeller* cheek-pieces.

Still, not only the typical (albeit different) horse-bits of the VIII<sup>th</sup> type had been found west and northwest of the Dacian mainland. H. Dolenz ascribed to the Dacian horse-bits a complete cheek-piece discovered at Magdalensberg (**Fig. 9/4,5**) and proposed this name for the variant, finding an analogy in a fragmentary cheek-piece discovered at Kempten, in Bavaria (**Fig. 9/6**)<sup>86</sup>. The piece from Magdalensberg was found in relation to an ash layer dated to the Claudian period<sup>87</sup>. On one hand, Dolenz tends to date the piece later, during the last quarter of the 1st c. AD<sup>88</sup>, following the example from Kempten and the general chronology proposed there by Mackensen<sup>89</sup>. On the other hand Božić stresses that the piece from Kempten has no clear context (as it comes from a rubble layer?)<sup>90</sup> and that the bit from Magdalensberg could have been part of the burnt layer, thus its chronology could not extend beyond the Claudian period<sup>91</sup>. He does this in order to suggest a chronology for a third complete horse-bit of the Magdalensberg type, without a clear context of origin, coming from Sisak, in Croatia (**Fig. 11/1**)<sup>92</sup>. All three cases of Magdalensberg variant of type VIII cheek-pieces are made out of bronze, while the mouth-piece (in two of the attested cases) is made out of iron, presenting the usual square section and circular loops at both ends. The bronze cheek-pieces have a more elaborate appearance than the usual cheek-pieces of the VIII type, displaying decoration, with two rows of punctured dots oriented vertically on the outside of the enlarged, rhombous parts of the cheek-pieces from Magdalensberg and Kempten (**Fig. 9/4,6**), while on the cheek-piece from Sisak (**Fig. 11/1**) four sets of horizontal incisions on the outside of the sockets are marked out (somewhat similar to the ones on the bronze cheek-pieces from Căpâlna or Židovar – **Fig. 7/3,7**). The body of the cheek-pieces enlarges towards both ends after the socketed central area, presenting a rhombous form that ends in a more complex globular knob than in the cases of

<sup>72</sup> BOŽIĆ 2018, 148-149.

<sup>73</sup> BOŽIĆ 2018, 149.

<sup>74</sup> BOŽIĆ 2018, 148.

<sup>75</sup> BOŽIĆ 2018, 131.

<sup>76</sup> MEDELET 1995, 96.

<sup>77</sup> MEDELET 1995, 97.

<sup>78</sup> KOTIGOROŞCO 2015, 126, Fig. 44/3-15, Fig. 47/1-3, Fig. 48/40.

<sup>79</sup> KOTIGOROŞCO 2015, 126, Fig. 44/3-5.

<sup>80</sup> KOTIGOROŞCO 2015, 126, Fig. 44/6-13.

<sup>81</sup> KOTIGOROŞCO 2015, 126, Fig. 44/14-15.

<sup>82</sup> KOTIGOROŞCO 2015, 126, Fig. 47/1-3.

<sup>83</sup> KOTIGOROŞCO 2015, 128, Fig. 48/40.

<sup>84</sup> ZIRRA 1981, 131.

<sup>85</sup> KOTIGOROŞCO 2015, 166.

<sup>86</sup> DOLENZ 1998, 91-93, Fig. 23/1; 66/20.

<sup>87</sup> DEIMEL 1987, 324-327, Fig. 86.

<sup>88</sup> DOLENZ 1998, 92.

<sup>89</sup> MACKENSEN 1987, 162, Fig. 66/20.

<sup>90</sup> MACKENSEN 1987, 170, No. 34, Fig. 66/20; BOŽIĆ 2018, 142.

<sup>91</sup> BOŽIĆ 2018, 142.

<sup>92</sup> BOŽIĆ 2018, 131.



the slender propeller type cheek-pieces with simpler globular knobs from Cellenița, Augsburg and Orešac. The sockets of the Magdalensberg (and probably Kempten) cheek-pieces have riveted strap ends attached to them, while a third one is attached to an external ring. This differs at the cheek-piece from Sisak, in the sense that two of the strap ends are directly attached to the two sockets by means of protruding through them and being locked on the other side by a flat head. Božič correctly indicates that this type of attachment has an analogy in the iron, *propeller* type horse-bit from Tilișca<sup>93</sup> (**Fig. 6/9** - but not exclusively, as we shall see below). This difference and other details made the author concur that it represents a Magdalensberg type horse-bit, but it still presents some characteristics that are closer to the iron bits of the Dacian heartland<sup>94</sup>. The author tries to date the piece, given the lack of context, by its association with the other Magdalensberg type horse-bits (and by the fact that they are made out of bronze) in the Augustan period<sup>95</sup>.

There is another complete horse-bit coming from Sisak, from the bed of the river Kupa, as probably is the case for the first bit from Sisak as well<sup>96</sup>. It is an elegant piece, in some ways similar to the ones before, as it is made out of bronze (except for the typical iron mouth-piece) and has two riveted straps attached to an openwork trefoil shaped distributor which connects, through its third socket, to the wheel-shaped cheek-pieces (**Fig. 11/2**). The latter present an openwork body, quite similar to the already mentioned fragmentary bronze piece from Pietroasele (**Fig. 5/6**), but with a more complex appearance, as seems to be suggested by its decoration with punctured S-shaped motifs along the circumference on the outside of the piece, while on the inside of the cheek-piece there are three short spikes<sup>97</sup>, similar to the spikes on the *wheels* of typical iron horse-bits of the VIII<sup>th</sup> type. The author assigns it to the Dacian type of horse-bits (because of the typical iron mouth-piece and the wheel-shaped cheek-pieces)<sup>98</sup>, proposing a new variant of the type VIII, bearing the name of the discovery place (that is, Sisak)<sup>99</sup>. The bit, given the lack of context, was dated to the same Augustan period, the same argument being given, the fact that it is made out of bronze – as the Magdalensberg type pieces (still, the similar, yet undated piece from Pietroasele is made out of bronze as well) and following the V-shaped decoration found on one of the trefoil shaped distributors, which the author associated with V-shaped motifs that appear on end loops of the early Imperial period ring junction from Britain (**Fig. /2**)<sup>100</sup>. I would not date the piece just by following such a detail found in a different cultural area at the time. I would rather accept a dating in the Augustan period, if the piece came with certainty from the same context as the first Magdalensberg type bit (**Fig. 11/1**) from Sisak, which, by analogy, can be much more easily placed in the Augustan period. Given the uncertainty

about their association though<sup>101</sup>, I would see more reason in a precautious attitude without proposing a certain datation for this piece.

After following the newer cheek-pieces and horse-bits relatable to the VIII<sup>th</sup> type in Werner's typology, I would like to propose general descriptions and describe the subvariants of the type that seem to stand out.

The typical horse-bit of the VIII type seems to always have an iron mouth-piece (even if the rest of the bit is made out of bronze). The mouth-pieces are mobile, being constructed by two adjoining elements that have a rectangular section and circular loops at both ends (with the partial exception mentioned for some mouth-pieces from Mala Kopanja – *Supra.* no. 82), that connect between themselves and the central niche of the cheek-pieces, in between the two rectangular sockets. The mouthpiece's loops that connect to the cheek-pieces have attached rings, on the outer side of the cheek-pieces, that connect it to the reins<sup>102</sup>. The two sockets on each cheek-piece were used to attach the bit to the rest of the bridle through leather straps (on the Magdalensberg type bits the straps were connected through riveted bronze endings, while on the iron bit from Tilișca and the bronze bit from Sisak we see riveted ends made out of iron and bronze attached directly through the sockets). The cheek-pieces have a narrow and rectangular central part, widening towards their ends (hence the *propeller* appellation). They vary in this sense, from wide pieces to more slender ones. It seems that many bits from the Dacian heartland are especially wide, while the western pieces tend to become slender and more elongated. The bits from Cellenița are quite telling in this sense, as they seem to represent a bridge between the typical *propeller* type and the slender western versions, like the one from Augsburg. Some of the bits from Cellenița present, as well as the other western bits, globular knobs at the ends of the cheek-pieces. The cheek-pieces from **Fig. 10/14,15** and even **16** are relevant for this evolution. We can see globular knobs at the ends of the Magdalensberg bronze type cheek-pieces too, even though they are more robust, with wide, rhombous endings. Another observation regarding these differences relates to the fact that bronze is used more frequently in the western areas, while iron is dominant in the Dacian heartland. Sometimes, the enlarged endings are perforated and given a circular form (as in the case of the bronze cheek-pieces from Căpâlna or Brad). These three elements (iron mouth-piece, external rings and cheek-piece) are constant for this type of cheek-pieces. A variable is posed by the use of four-spoked *wheels* with spikes on their insides. Werner knew only of three such *wheels* that were attached to the rest of the bit (two from Popești and the one from Radovanu)<sup>103</sup>, so he could not determine if they were present on all bits of this type<sup>104</sup>. The situation is not any clearer now, although more bits with spiked *wheels* attached had been found since (at Căpâlna, Cellenița I, Orešac and Židovar), as well as isolated pieces (like the one from Pietroasele or the bronze piece from the Orăștie Mountains – **Fig. 5/5,8**). Still, it can be observed that such

<sup>93</sup> BOŽIČ 2018, 142.

<sup>94</sup> BOŽIČ 2018, 142-143.

<sup>95</sup> BOŽIČ 2018, 142-143.

<sup>96</sup> BOŽIČ 2018, 131.

<sup>97</sup> BOŽIČ 2018, 132.

<sup>98</sup> BOŽIČ 2018, 143.

<sup>99</sup> BOŽIČ 2018, 132, 143.

<sup>100</sup> BOŽIČ 2018, 143; BISHOP 1988, Fig. Fig. 50/1c-d.

<sup>101</sup> BOŽIČ 2018, 131.

<sup>102</sup> WERNER 1983, 356.

<sup>103</sup> WERNER 1983, 356-357.

<sup>104</sup> WERNER 1983, 356.

spiked *wheels* are attested in relation to iron bits, especially with typical *propeller* type cheek-piece (like the Radovanu or Căpâlna bits). Even though they are attested in western areas as well (at Orešac and Cellenița I), they seem to present relatively different forms in that area. The Cellenița I lot of bits is quite relevant, where, given the more numerous character of the lot, only two bits have *wheels*, including one that does not present spikes (**Fig. 10/17**) and which has a rectangular section (while most wheels are circular in section) and is associated with a short, rectangular sectioned cheek-piece, that fits to the dimension of its *wheel*; the other one presents a swastika pattern, being associated with a wider-bodied cheek-piece (**Fig. 10/15**). At Orešac, the slender bodied cheek-piece is associated with a barbed *wheel* (*Supra*. no. 73), while at Židovar we see a typical iron bit with *propeller* cheek-pieces and four-spoked spiked *wheels* (**Fig. 7/8**). I think that the cheek-pieces's form is responsible for those differences. The enlarged, *propeller* type pieces can hold and apply better pressure on the four-spoked spiked *wheels*, while the slender cheek-pieces present different forms of *wheels* that are full-bodied (not with four spokes), with large protruding spikes at their corners. Probably not all bits had *wheels*, as suggested by their small number in the Cellenița lot, while it was more common to use typical *wheels* with *propeller* type iron cheek-pieces. Another discussion can be traced from this problem. The so-called Sisak variant of the Dacian bits does not present the usual cheek-pieces, as their cheek-pieces are circular, with a more complex four-spoked design, that present, more importantly, short spikes on their insides, just like in the cases of the typical *wheels* associated with *propeller* type bits (*Supra* no. 97). One could say that these kind of cheek-pieces (on the complete bit from Sisak and the fragmentary cheek-piece from Pietroasele) fulfil both the role of the usual cheek-piece and spiked wheel. Thus type VIII bits could present cheek-pieces associated with *wheels*, stand alone cheek-pieces without *wheels* and cheek-pieces that are, themselves, *wheels*. Werner had already hinted towards the association of *wheeled* cheek-pieces with the VIII type, as he made reference to an iron bit of this type discovered in the Sarmatic *milieu*, at Zolota Balka (**Fig. 1**)<sup>105</sup>. Another piece from Ocnița with X-shaped fittings was thought to possibly be part of a similar yet deteriorated wheel-shaped cheekpiece<sup>106</sup>. The same author mentions the existence of X-shaped fitted bits in the northern Black sea area<sup>107</sup>, but does not attribute the piece from Ocnița to this type, which I think is a matter to be considered. I will discuss more about North-Pontic horse bits in the second article of this series. Another element that can be discussed in relation to the VIII type in the Dacian heartland and the western areas is decoration. It can be observed that the bronze pieces are usually decorated (and, excepting Căpâlna, all come from western areas). While the Magdalensberg and Sisak variants present intricate decoration, the simpler bronze cheek-pieces discovered at Židovar, Căpâlna and the Magdalensberg type bit from Sisak all present sets of horizontal incisions on the exterior of the cheek-pieces. Such decoration is missing from the iron cheek-pieces. The only decoration associated with

typical iron bits are the herring bone pattern on the mouth-piece. We will see that the horizontal incisions are, actually, closer to another type of horse-bits, which we will discuss further below.

The chronology proposed by Werner for the type VIII horse-bits cannot be modified at the moment (that is, the end of the II c. BC – beginning of the II c. AD). If anything, there are more reasons to support such a chronology. The earliest datable bits are the ones from Popești and Radovanu in the outer-Carpathian region. We can see that by the Augustan period, the slender, knobbed variant had already reached Bavaria (as it is probably the same case for the Serbian and Croatian examples), while the chronology from Cellenița seems to support this, as they pertain to the 1st c. BC. Their appearance in the inner-Carpathian region, in the Dacian hillforts of the so-called *classical* Dacian period (middle of the 1st c. BC – beginning of the 2nd c. AD) seem to attest that they were used until the Roman conquest.

Type VIII horse bits have a large area of distribution, as suggested by Werner (from Augsburg in the west to Zolota Balka in the east, on the Dnieper – **Fig. 1**)<sup>108</sup>. We will follow the eastern horse-bits similar to the VIII type in the next article, as they spread even further than suggested above. But before we reach that point, there is another local type of cheek-pieces that have been linked to the VIII type.

#### TYPE V (C-E) HORSE BITS

When discussing the origin of the VIII type of horse-bits, Werner suggested a possible correlation with V<sup>th</sup>-IV<sup>th</sup> c. BC North-Pontic horse-bits<sup>109</sup> that is, of course, unfeasible given the difference in time. He then wonders if what he defined as type V (especially variant C) horse-bits, that are contemporaneous with the type VIII discussed above, most of them appearing in the eastern Dacian *davae*, could actually represent a link between the type VIII and the North-Pontic tradition, making reference to the same Zolota Balka wheel-shaped bit<sup>110</sup>. Glodariu and Iaroslavschi include in their type III (**Fig. 2/3-11**) Werner's type V (C, D, E), type VIII and IX (while Werner includes Glodariu and Iaroslavschi's type IV in his type IX – **Fig. /11-13**)<sup>111</sup>, the point being that Glodariu and Iaroslavschi's typology is broader. Werner defines the type V – C (**Fig. 12/1-4**) as straight bits with two sockets, while type V – D (**Fig. 12/5-8**) is similar, but with the two sockets placed laterally. The last, type V – E, is only represented by a two socketed cheek-piece made out of bone, found at Brad (**Fig. 12/9**)<sup>112</sup>. He observes that type V – C (with examples from Brad – **Fig. 12/1**, Costești – **Fig. 12/2**, Ichimeni – **Fig. 12/3** and Tinosu – **Fig. 12/4**), type V – D (with examples from Brad – **Fig. 12/5**, Ocnița – **Fig. 12/6**, Poiana – **Fig. 12/7** and Răcățau – **Fig. 12/8**) and type V – E (from Brad – **Fig. 12/9**) all come, as with the type VIII, from Dacian *davae*, this time especially from the Moldavian area where they are dated especially between the 1st c. BC – 1st c. AD, being separated by about two hundred years from the

<sup>105</sup> WERNER 1983, 357; WERNER 1988, 51.

<sup>106</sup> WERNER 1983, 357;

<sup>107</sup> WERNER 1988, 49.

<sup>108</sup> WERNER 1988, 51.

<sup>109</sup> WERNER 1988, 119.

<sup>110</sup> WERNER 1988, 119.

<sup>111</sup> WERNER 1988, 53.

<sup>112</sup> WERNER 1988, 36, Taf. 21.



earlier group of type V (A and B)<sup>113</sup>. More bits or fragments pertaining to the type V bits or fragments of them had been found (or published) since then. Firstly, it should be added that two cheek-pieces of variant V - D of this type from Răcătău were published by V. Căpitanu<sup>114</sup>, while Werner adds only one of them in his catalogue<sup>115</sup> (**Fig. 13/1**; **Fig. 12/8**). Two other iron cheek-pieces of the V-D variant had been published from Poiana (one that is complete, the other fragmentary, with a rectangular socket and a circular one, oriented in another direction – **Fig. 13/2,3**) dated, largely, to the 2nd c. BC – 2nd c. AD<sup>116</sup>. A cheek-piece with a flattened, rectangular sectioned central segment, made in order to create the two central sockets, was found at Pietroasele-Gruia Dării, but was not, unfortunately, provided with a context of provenance (**Fig. 13/4**)<sup>117</sup>. Still, two other complete bits of the V<sup>th</sup> type were found in the same settlement, in the complex C38<sup>118</sup>. The pieces are identical, although they differ in size and, while in the first case we can see that the ends of the cheek-piece are enlarging (**Fig. 13/8**), in the second case the cheek-pieces are straight (**Fig. 13/9**). Both cheek-pieces have a mouth-piece similar to the ones of the VIII type (composed of two elements with loops at ends and rectangular section). They link with the external rings, in between the two rectangular sockets. The cheek-pieces are circular in section, with the aforementioned specificities. An interesting detail is posed by the horizontal incisions found on the endings of the cheek-pieces. These were inlaid with bronze wires, as in the similar case of the cheek-piece from Brad (**Fig. 12/5**) or like the one from Ocnița (**Fig. 12/6**) which was inlaid with silver wire<sup>119</sup>. The bits were found in a so-called *moviliță* context, deposited carefully together, without any other relevant material (except for a couple of pottery fragments)<sup>120</sup>. The context was dated, by its relation with complex 35, in the first half of the 1st c. AD<sup>121</sup>. Two other cheek-pieces of the same type were recovered more recently in S-E Transylvania, in the fortress from Covasna (**Fig. 13/6, 7**). They are enlarging towards the ends while presenting the two typical sockets. They were found near the tower on terrace II and were dated stratigraphically to the 1st c. AD<sup>122</sup>. These are quite relevant for their distribution, as such bits tend to be found in Moldavia (**Fig. 1**). Besides V - D variants, other type V - C and B had been found since. A more uncertain, given the lack of context, but interesting pieces was discovered at Rudi “La Șanțuri” (Dondușeni, Republic of Moldavia – **Fig. 14/1**). The fortification had three phases (VII<sup>th</sup>-VI<sup>th</sup> c. BC, IV<sup>th</sup>-III<sup>rd</sup> c. BC, 2nd c. BC – 2nd c. AD)<sup>123</sup>. The author dated the cheek-piece to the IV<sup>th</sup> c. BC, although he mentioned that it is a type V - C bit after Werner, confusing the chronology with that of the types V A-B<sup>124</sup>. Given the misunderstanding, the piece could

come, following Werner’s typology, from the last phase of occupation of the fortification. Its form is interesting, reminiscent of the known piece from Ichimeni, in N-E Moldavia (**Fig. 12/3**). The cheek-piece from Rudi has two flattened central sockets, its body is straight and it has small knobs at its ends (as does the piece from Ichimeni as well – better seen in Pârvan’s publication – **Fig. 14/6**). The chronology for these two type V - C pieces is not clear though. The piece from Ichimeni comes from an earlier donation, so its context of discovery is not clear as well<sup>125</sup> (it was donated together with a Celtic plough, a Celtic *fibula* of *Dux* type and other objects, apparently coming from Ichimeni, first published by V. Pârvan – **Fig. 14/6**)<sup>126</sup>. If the association with the brooch is to be trusted, then these cheek-pieces can present an earlier datation than implied by their assignation to the type V - C horse bits. The *fibula* from Ichimeni was dated in the IV-III c. BC (as with the general chronology for this type of *fibulae*)<sup>127</sup>. But more importantly, it was observed that during the same period such types become fashionable in the local archaeological *milieu* as well<sup>128</sup>. S. Teodor mentions that in some Geto-Dacian settlements and especially in settlements and necropolis of the Poieniști-Lukașevka group of the 2nd c. BC (Lozna-Hlibicioc, Botoșana, Cucorâni, Rudăcăreni), the *fibulae* identified there present some features of (or represent themselves?)<sup>129</sup> the late *Dux* horizon from Czechia and Slovakia besides some other similarities to Central European forms that are encountered in the Poieniști-Lukașevka culture<sup>130</sup>. Given the yet not fully understood situation of the Celtic presence in Moldavia<sup>131</sup>, I will not delve into the chronological problem of these *fibulae*. For this paper, I think it is more important that the *Dux* or late horizon *Dux fibulae* appear in an area where we find mixed traditions somewhere between the IV and the II c. BC. This takes us to the last cheek-pieces that can be put in relation to the V<sup>th</sup> type of horse-bits. Three cheek-pieces were published by S. Teodor from the abovementioned settlement at Lozna-Hlibicioc. The first is a complete Celtic type bit that was part of the well-known iron deposit from Lozna, dated around the passage between the 2nd and the 1st c. BC<sup>132</sup> or during the first half of the 1st c. BC (**Fig. 14/3**)<sup>133</sup>. The second one is a type V - B cheek-piece, with a good analogy in the complete bit from Șopot, in Dolj County (**Fig. 14/2, 9**)<sup>134</sup>. It was found in dwelling no. 8 of the Lozna-Hlibicioc settlement<sup>135</sup>, a settlement corellated with the final phase of the Poieniști-Lukașevka culture that ends sometimes in the first half of the 1st c. BC<sup>136</sup>. Although the settlement from Hlibicioc presents ceramic material that can be dated between the IV-I c. BC<sup>137</sup> some elements are

<sup>113</sup> WERNER 1988, 44.

<sup>114</sup> CĂPITANU 1976, 54, Fig. 45/12-13.

<sup>115</sup> WERNER 1988, 43, no. 147 (= Fig. /8).

<sup>116</sup> TEODOR *et alii* 1998, 80, Fig. 30/5,13.

<sup>117</sup> ȘIRBU *et alii* 2005, 25.

<sup>118</sup> ȘIRBU *et alii* 2005, 25.

<sup>119</sup> WERNER 1988, 43; PUPEZĂ/POP 2018, 44.

<sup>120</sup> ȘIRBU *et alii* 2005, 76.

<sup>121</sup> ȘIRBU *et alii* 2005, 76.

<sup>122</sup> CRIȘAN/PUPEZĂ 2016, 76-77.

<sup>123</sup> ZANOCI 1998, 148.

<sup>124</sup> ZANOCI 1998, 85.

<sup>125</sup> WERNER 1988, 42.

<sup>126</sup> TEODOR 1999, 159; PÂRVAN 1926, Pl. XXXVI/1.

<sup>127</sup> HONCU/MUNTEANU 2018, 456; TEODOR 1988, 40.

<sup>128</sup> GEORGESCU 2013, 76.

<sup>129</sup> TEODOR 1999, 82, 107.

<sup>130</sup> TEODOR 1988, 43.

<sup>131</sup> HONCU/MUNTEANU 2018, 456-457.

<sup>132</sup> TEODOR 1980, 149-150.

<sup>133</sup> TEODOR 1992, 69.

<sup>134</sup> WERNER 1988, 40, Taf. 20/135.

<sup>135</sup> TEODOR 1992, 49.

<sup>136</sup> TEODOR 1992, 69.

<sup>137</sup> TEODOR 1992, 52, 58.

specific to the II-I c. BC (such as the so-called Dacian cups)<sup>138</sup>, while some decorated pottery vessels and "fire-dogs" are best associated with similar material of the Przeworsk culture dating from the 1st half of the 1st c. BC<sup>139</sup>. Besides, it seems to have only one level of occupation, dated in the 3rd- 2nd c. BC<sup>140</sup>, while the older structures had been completely destroyed and the ground probably levelled, with only scattered remains preserved<sup>141</sup>. This is important for the chronology of the cheek-piece (type V-B – **Fig. 14/2**) as it has been found in dwelling no. 8<sup>142</sup>, pertaining to this latter, main phase of occupation. The author mentions the piece as among those scattered when the settlement was abandoned<sup>143</sup>. Given these hints, this cheek-piece can be assigned to the main phase of occupation of the settlement at Lozna (III-II c. BC) perhaps even more to its last period of occupation. In general, the type V A-B was dated by Werner in relation to the V<sup>th</sup>-IV<sup>th</sup> c. BC tumuli of the North-Pontic steppe, while the graves from Zimnicea and Bugeac are dated in the latter part of the IV<sup>th</sup> c. BC<sup>144</sup>. As such, if we follow Werner's chronology for the type V A-B and that of the settlement, we can see that it could, theoretically, be dated in the IV<sup>th</sup> c. BC, but all the other contextual details suggest a later chronology for this piece. As such, the chronology for the type V A-B does not seem to be appropriate for this piece. On a closer look at Werner's typology, it can be seen that the piece from Șopot (**Fig. 14/9**), that has identical cheek-pieces to the piece from Lozna seems to be relatively different from the other examples of type V – B included in the type, as its cheek-pieces are shorter and don't present globular knobs at the ends as the others. Besides, it presents a specific mouth-piece, with three sets of double discs on each element of the mouth-piece, that made Werner consider a possible similarity to type V – C cheek-pieces discovered in the North-Pontic area<sup>145</sup>. It must be noted that there are similar cheek-pieces from the Sarmatian *milieu* dated in the 2nd- 1st c. BC (type I – 3 after Simonenko, C-shaped bits with widening ends – **Fig. 14/7-8**)<sup>146</sup> that are closer in shape, time and space to the piece from the piece at Lozna than the other pieces included in the types V – B by Werner. As such, I would argue that the pieces from Lozna and, perhaps, Șopot should not be included in Werner's type V – B, as those are earlier (V-IV c. BC), as the piece from Lozna is indicative for the next period (III-II c. BC, maybe even beginning of the I c. BC) and does appear in an area and time characterized by mixed traditions. The settlement at Lozna has been described as a "Latène settlement with Geto-Dacian, Bastarnic, Celtic and Greek ceramic archaeological material"<sup>147</sup>. Complementary to the lowering of the chronology for these two pieces pertaining to the "type V-B", the two pieces discussed before, pertaining to the type V – C (from Rudi and Ichimeni – **Fig. 14/1,6**) could hint towards an earlier dating of such pieces in the NE areas (if the association with the *Dux fibula* is to be

trusted), thus these two cheek-pieces could be seen as partly different from Werner's type V – C, as those are dated synchronous to the Dacian *davae*. They seem to represent a specific type of cheek-piece of type V-C, as they are slimmer and have knobs on their ends, somewhat more akin to the western knobbed type VIII cheek-pieces. Thus, I would argue that these two pieces could actually represent further proof for the evolution of the type V from a North-Pontic tradition, as supposed by Werner<sup>148</sup>. Another cheek-piece was published as coming from Lozna, a type V – D example (**Fig. 14/4,5**)<sup>149</sup>. This seems to be a confusion, as the piece is not mentioned at all in the text and the drawing seems to represent another piece – the first published cheek-piece of type V – D coming from Poiana (*Supra*. no. 22 – **Fig. 14/4,5**). Even this aspect is relevant, as it seems that the type V – D appear only in later Dacian *davae*, while these two partly different types (Lozna for type V – B, Ichimeni and Rudi for type V – C) seem to appear in contexts that can be related to earlier phases, in an environment prone to mutual influences.

But coming back to the general topic of the type V – C, D bits in the Dacian heartland, we can observe that all are made out of iron (except, of course, for the V – D piece from Brad made out of bone). And while the pieces from the first type remain relatively rare, coming from the outer-Carpathian region (except for the one at Costești), the examples of type V – D are common in the same areas, especially in the eastern *davae* and the area around the bend of the Carpathians, from where they reach the inner-Carpathian region as well (Covasna is relevant by its positioning), where they remain in use during the 1st c. AD (**Fig. 1**). The fact that the type V – C, D, E are found together with type VIII bits in the outer-Carpathian region and especially in the eastern *davae* is, in my opinion, sufficient reason to suppose that the latter evolved from the first, spreading afterwards in areas where the type V is not commonly used. And, given the discussion from above, it seems that some specific pieces could come from an earlier period (the type "V – C" pieces from Ichimeni and Rudi and the type "V – B" piece from Lozna) and could have represented models for the type V – D, although further proof is needed in this sense. From a technical point of view it seems only natural that the two socketed cheek-pieces of the type V – D, having a circular section, already some of them with enlarged endings, had been hammered in order to widen their ends and create the so called *propeller* type VIII cheek-pieces. The type V – D cheek-pieces present, sometimes, horizontal incisions, inlaid with precious metal as decoration representing a feature that is comparable to the decoration of some of the western, bronze type VIII cheek-pieces (the pieces from Zidovar, Sisak, Tilișca). Besides the decoration, the type V – D piece from Ocnița presents a system of strap attachment similar to the cases found in type VIII bits from Tilișca and Sisak.

In conclusion, it is quite visible that both type VIII and type V – C, D, E bits are quite common in the Dacian heartland during the late 2nd c. BC – beginning of the 2nd c. AD. They share common features and a common distribution area (in the outer-Carpathian area, especially in

<sup>138</sup> TEODOR 1992, 58.

<sup>139</sup> TEODOR 1992, 69.

<sup>140</sup> TEODOR 1999, 24.

<sup>141</sup> TEODOR 1992, 46.

<sup>142</sup> TEODOR 1992, 49.

<sup>143</sup> TEODOR 1992, 63.

<sup>144</sup> WERNER 1988, 41-42.

<sup>145</sup> WERNER 1988, 40.

<sup>146</sup> SYMONENKO 2015, 355, Fig. 80/4,10.

<sup>147</sup> WERNER 1999, 161.

<sup>148</sup> WERNER 1988, 44, 119.

<sup>149</sup> TEODOR 1999, Fig. 70/12.

the three eastern *davae* on the Siret and around the bend of the Carpathians). And while type V bits are found together with type VIII especially on the Moldavian plateau, the type VIII bits are found without their counterparts especially in the inner-Carpathian region (with the notable exception of Costești-Cetățuie – **Fig. 1**) and in the southern outer-Carpathian region. From these areas we can see that the model spreads westwards, partly changing in material and form. The differences in between examples of bits of the same type should be taken with reserve and only when more examples follow a similar pattern of form and distribution they should be considered as possibly representing a subvariant.

Following the typological approach undertaken in this article, it can be safely assumed that the presence of a VIII type cheek-piece at Costești-Cetățuie is to be expected in the inner-Carpathian region during this period. Still, the presence of the tamga sign on this piece can suggest an eastern area of provenience, as we shall see in the next article. As such, the focus of the next article in the series will be related to *tamga* signs discovered in pre-Roman Dacia and not only, together with a discussion regarding bits from the North Pontic area that are similar to the type V and type VIII of Werner. All of this will be done in order to better understand the context in which this cheek-piece has been created and the reasoning behind the use of such a sign on this type of horse-bits. That discussion will be integrated in the greater historical context of the 1st c. AD in the lower Danube and North-Western Pontic area, in an effort to compare the general historical view with the specific archaeological remains, as posed by the cheek-piece from Costești-Cetățuie.

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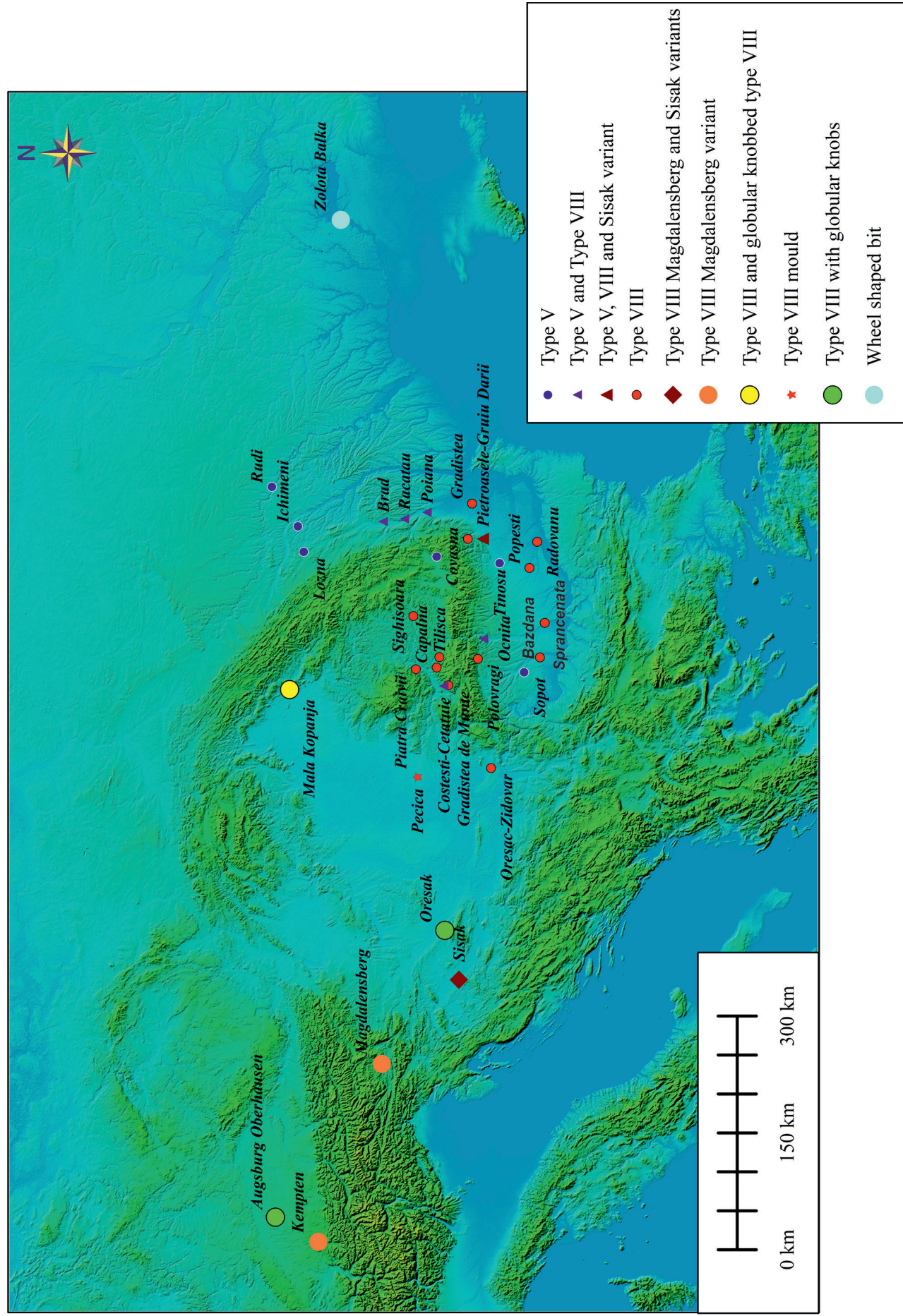
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**Fig. 1.** Distribution map.



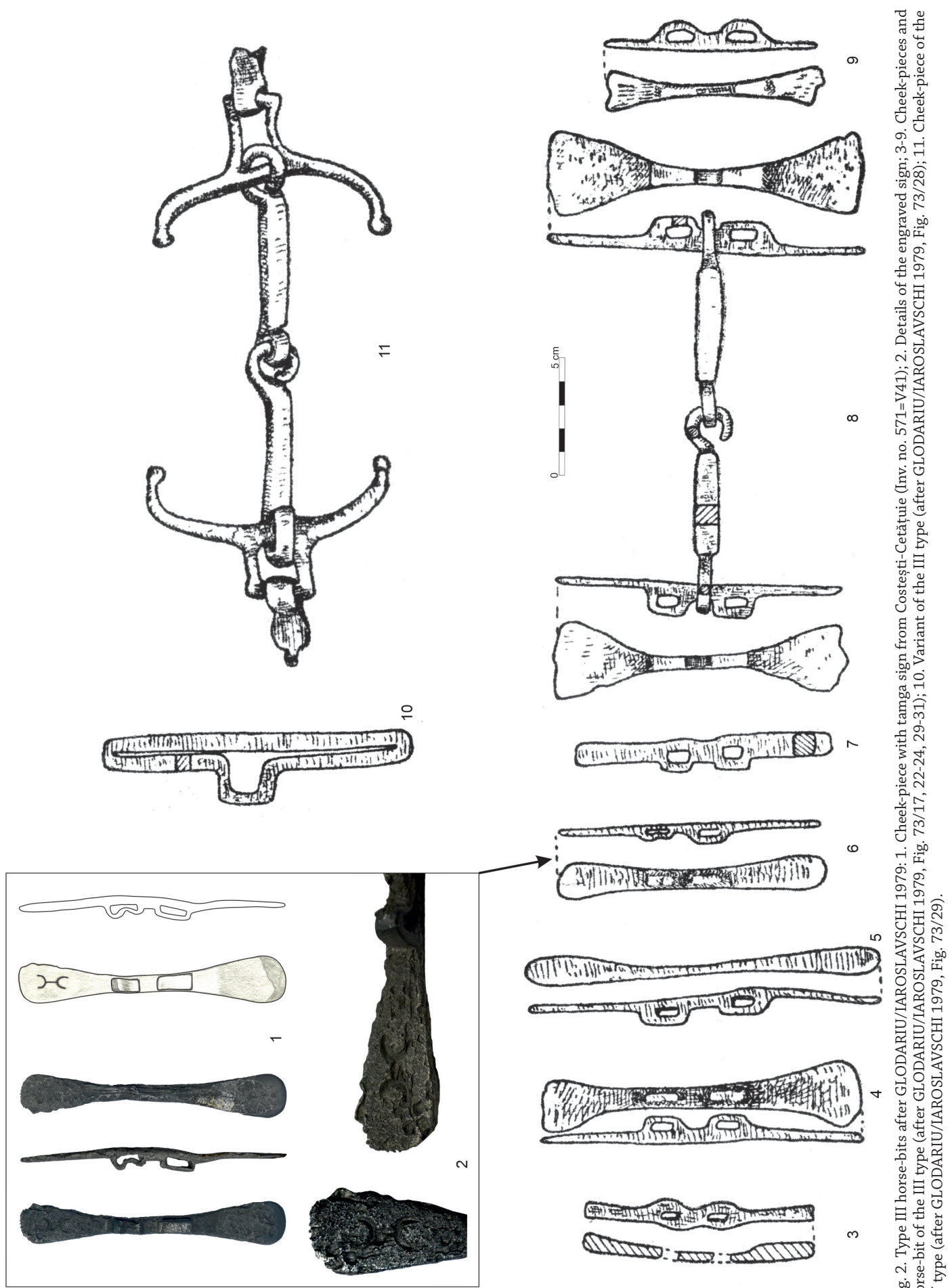
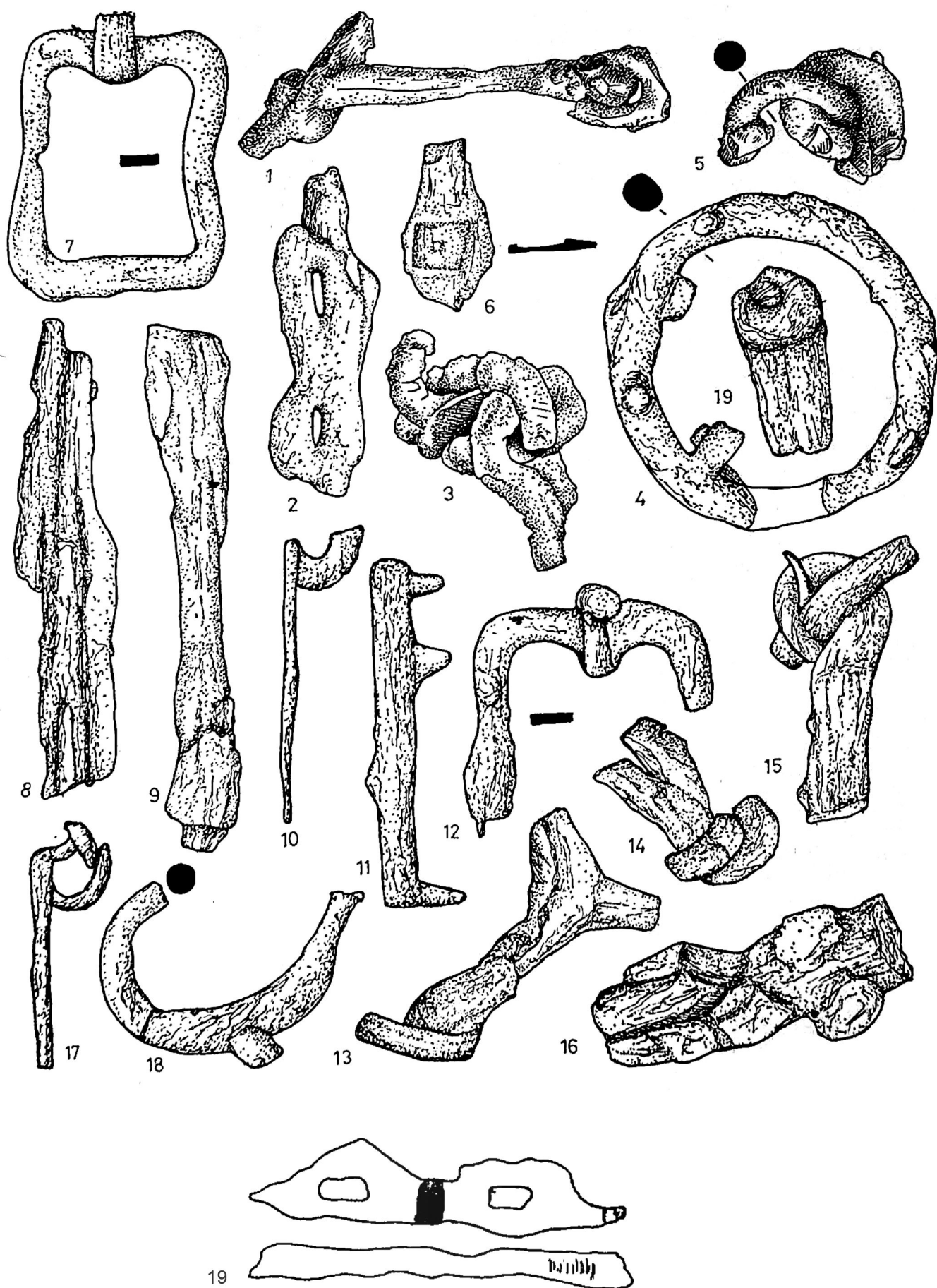
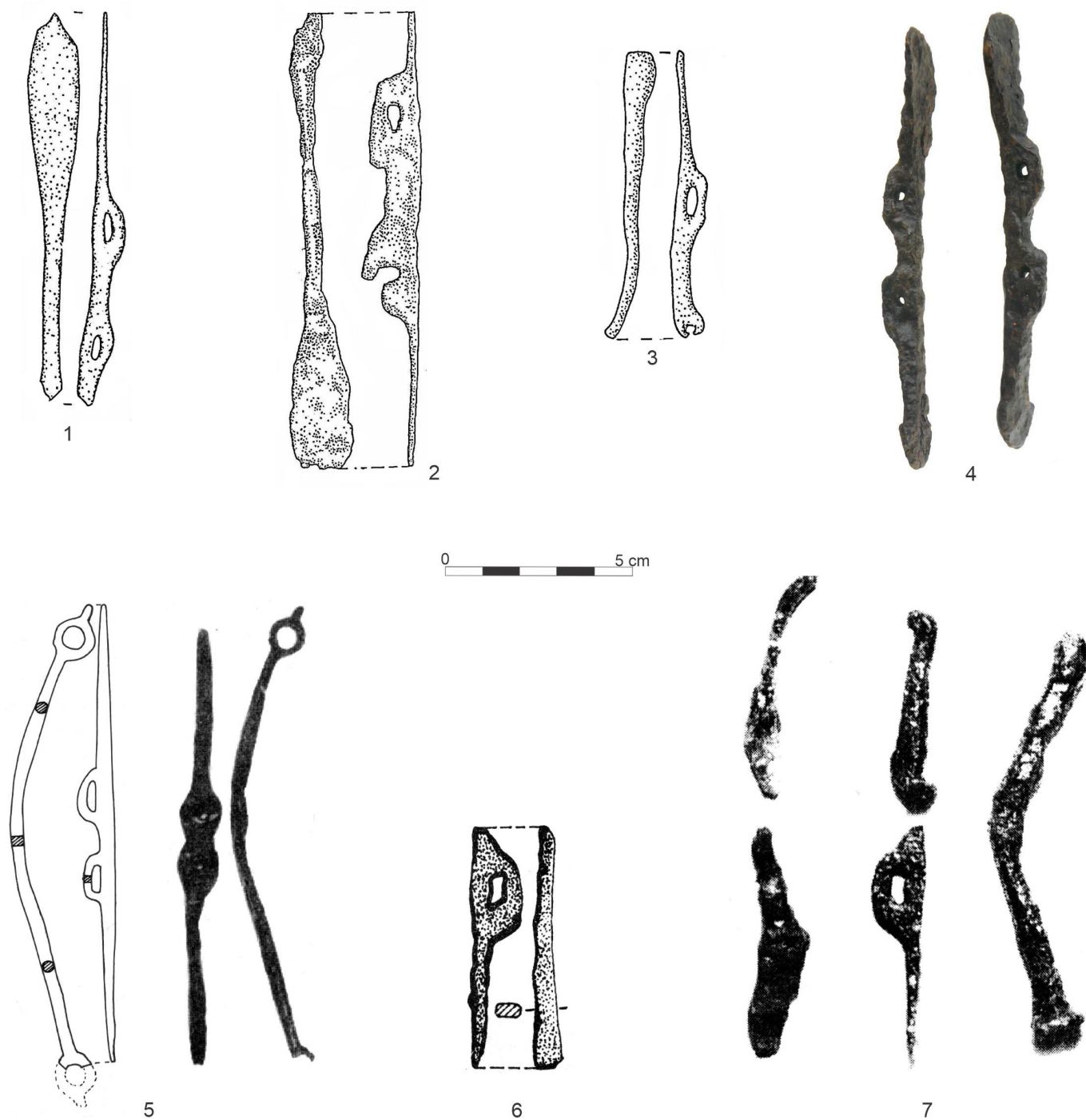


Fig. 2. Type III horse-bits after GLODARIU/IAROSLAVSCHI 1979: 1. Cheek-piece with tamga sign from Costești-Cetățuie (Inv. no. 571=V41); 2. Details of the engraved sign; 3-9. Cheek-pieces and horse-bit of the III type (after GLODARIU/IAROSLAVSCHI 1979, Fig. 73/17, 22-24, 29-31); 10. Variant of the III type (after GLODARIU/IAROSLAVSCHI 1979, Fig. 73/28); 11. Cheek-piece of the IV type (after GLODARIU/IAROSLAVSCHI 1979, Fig. 73/29).

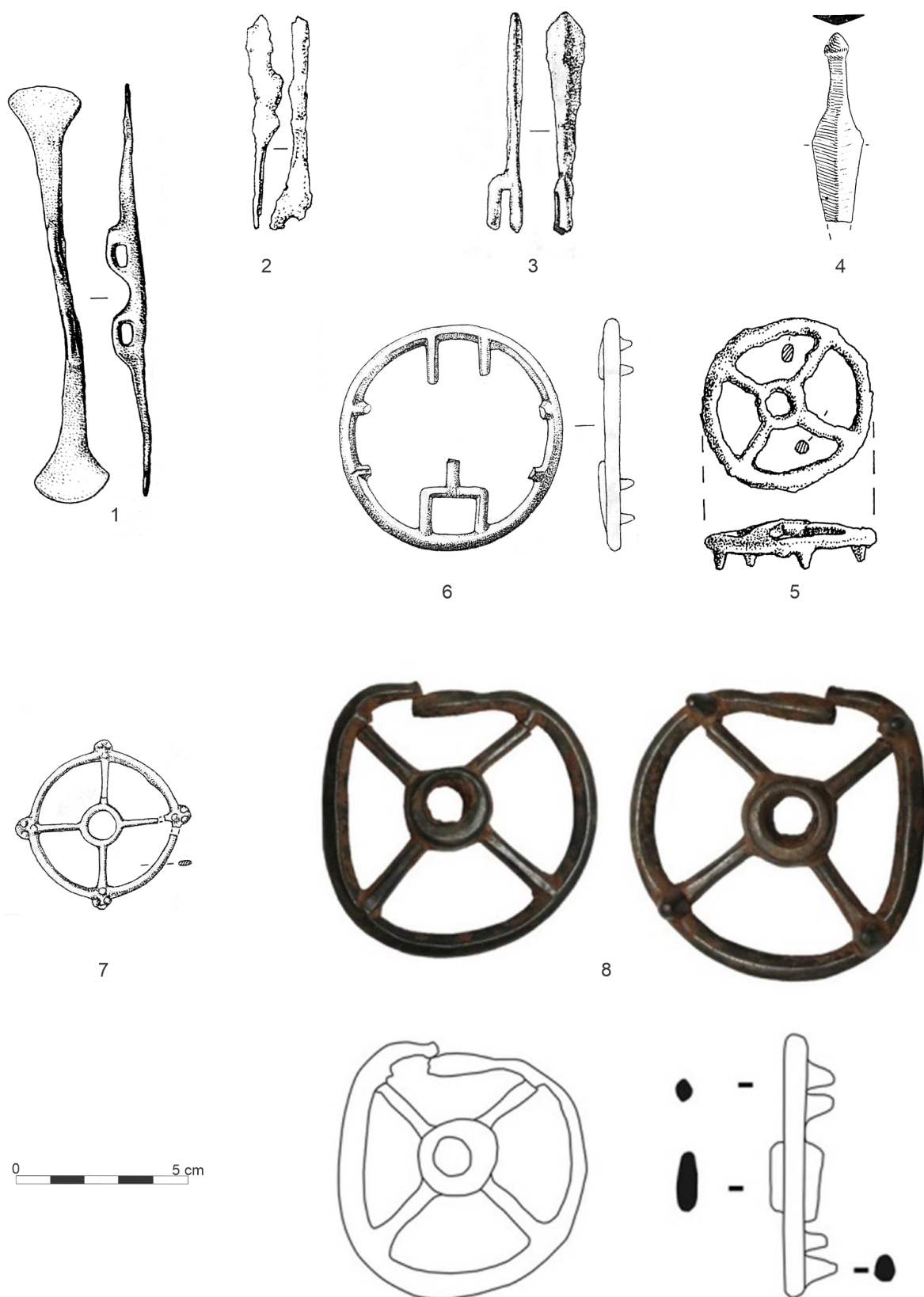


**Fig. 3.** Type VIII horse-bit fragments from tumulus 4 at Popești (without scale): 1-18. Fragmentary pieces from the inventory of the grave (after VULPE 1976, Fig. 16); 19. Drawing of the fragmentary cheek-piece from the plowed surface (after VULPE 1976, Fig. 11/4)



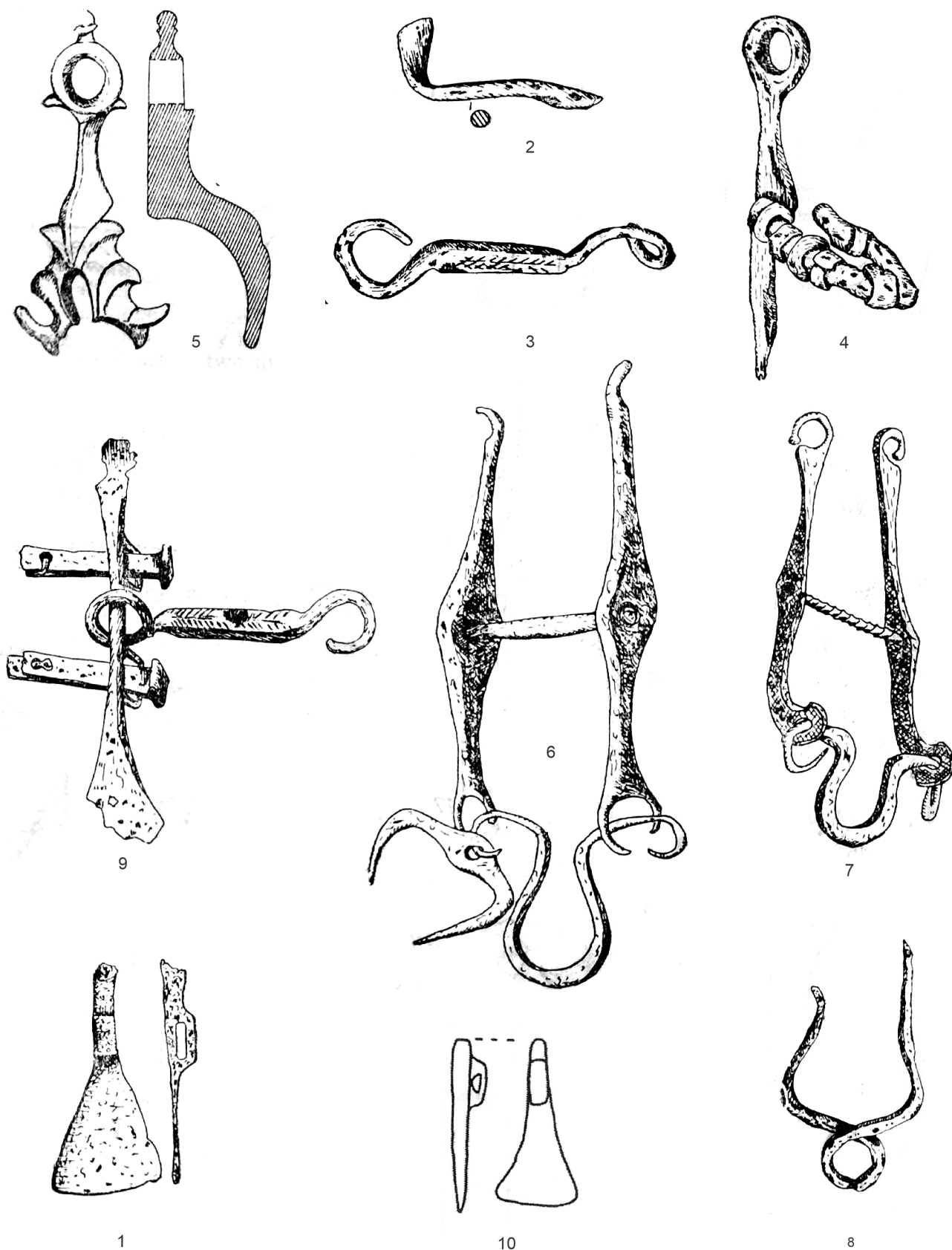
**Fig. 4.** Type VIII iron cheek-pieces and bit fragments: 1-3. Later published cheek-pieces from Poiana (after TEODOR *et alii* 1998, Fig. 30/3,6,10; VULPE/TEODOR 2003, Fig. 50/3,6,10); 4. Earlier published cheek-piece from Poiana (without scale - after VULPE *et alii* 1951, Fig. 22/8; BORANGIC/BĂDESCU 2014, 90); 5. Drawing and photo of the cheek-piece from Brad (without scale - after URSACHI 1995, Pl. 49/7, 247/11); 6. Drawing of the fragmentary cheek-piece from Pit 31 at Grădiștea (after SÎRBU 1996, Fig. 27/7); 7. Photo of the cheek-piece fragments from Pit 31 at Grădiștea (after SÎRBU 1996, Fig. 19/1).



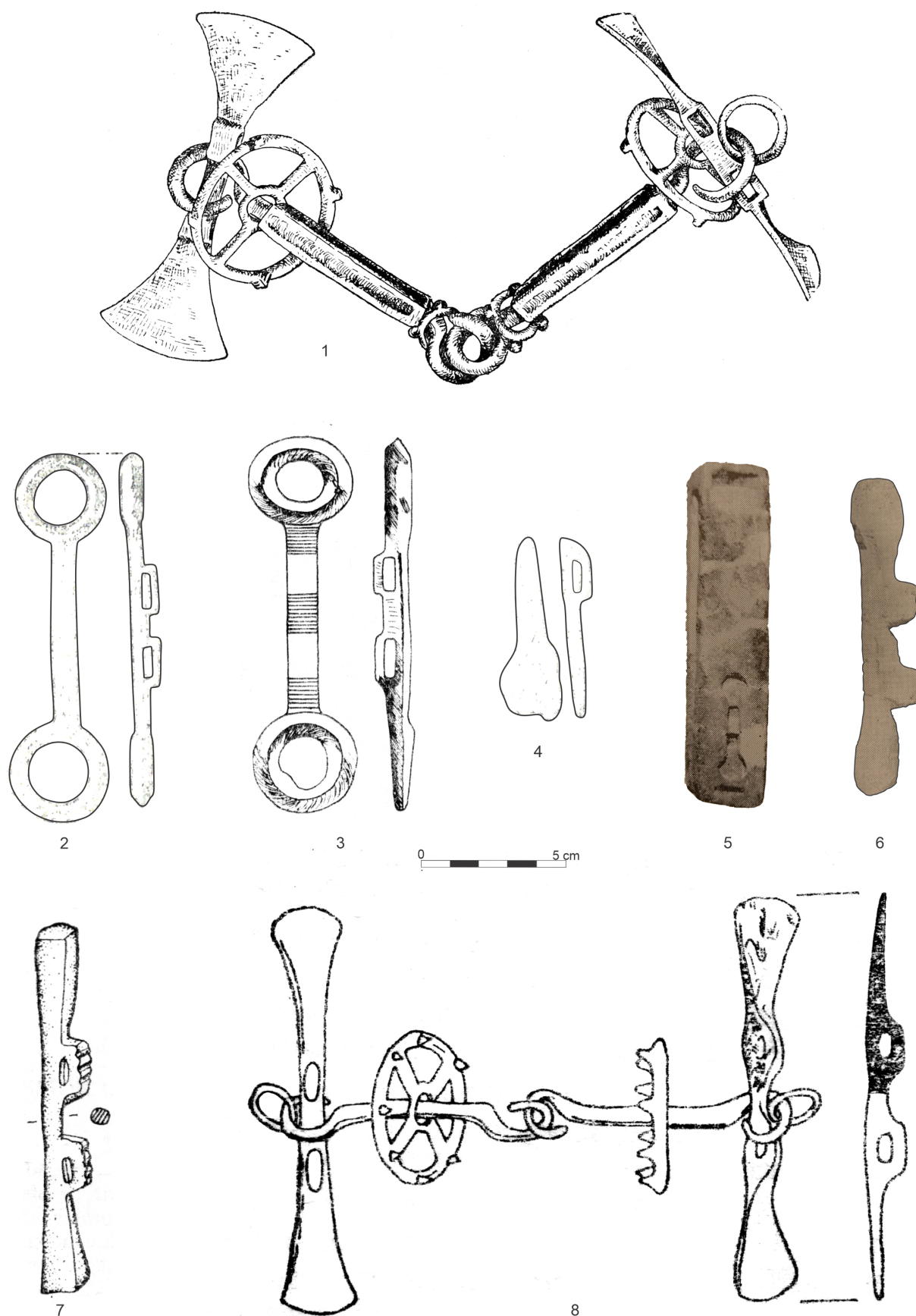


**Fig. 5.** Type VIII (possible) cheek-pieces, spiked wheels and pendant: 1. Iron cheek-piece from Cx 102 at Pietroasele - Gruiu Dării (after SÎRBU *et alii* 2005, Fig. 85/5); 2-4. Possible iron cheek-pieces from Pietroasele-Gruiu Dării (after SÎRBU/DUPOI 2001, Fig. 36/3, Fig. 37/4) and Sprâncenata (after Preda 1987, Pl. L/3); 5. Iron wheel with spikes from Pietroasele-Gruiu Dării (after SÎRBU *et alii* 2005, Fig. 50/6); 6. Bronze cheek-piece with spikes from Pietroasele-Gruiu Dării (after SÎRBU *et alii* 2005, Fig. 59/14); 7. Four-spoked bronze pendant from Pietroasele-Gruiu Dării (after SÎRBU/DUPOI 2001, Fig. 59/15); 8. Bronze wheel with spikes from the Orăștie Mountains (after CĂSĂLEAN 2019, Fig. 1/5).

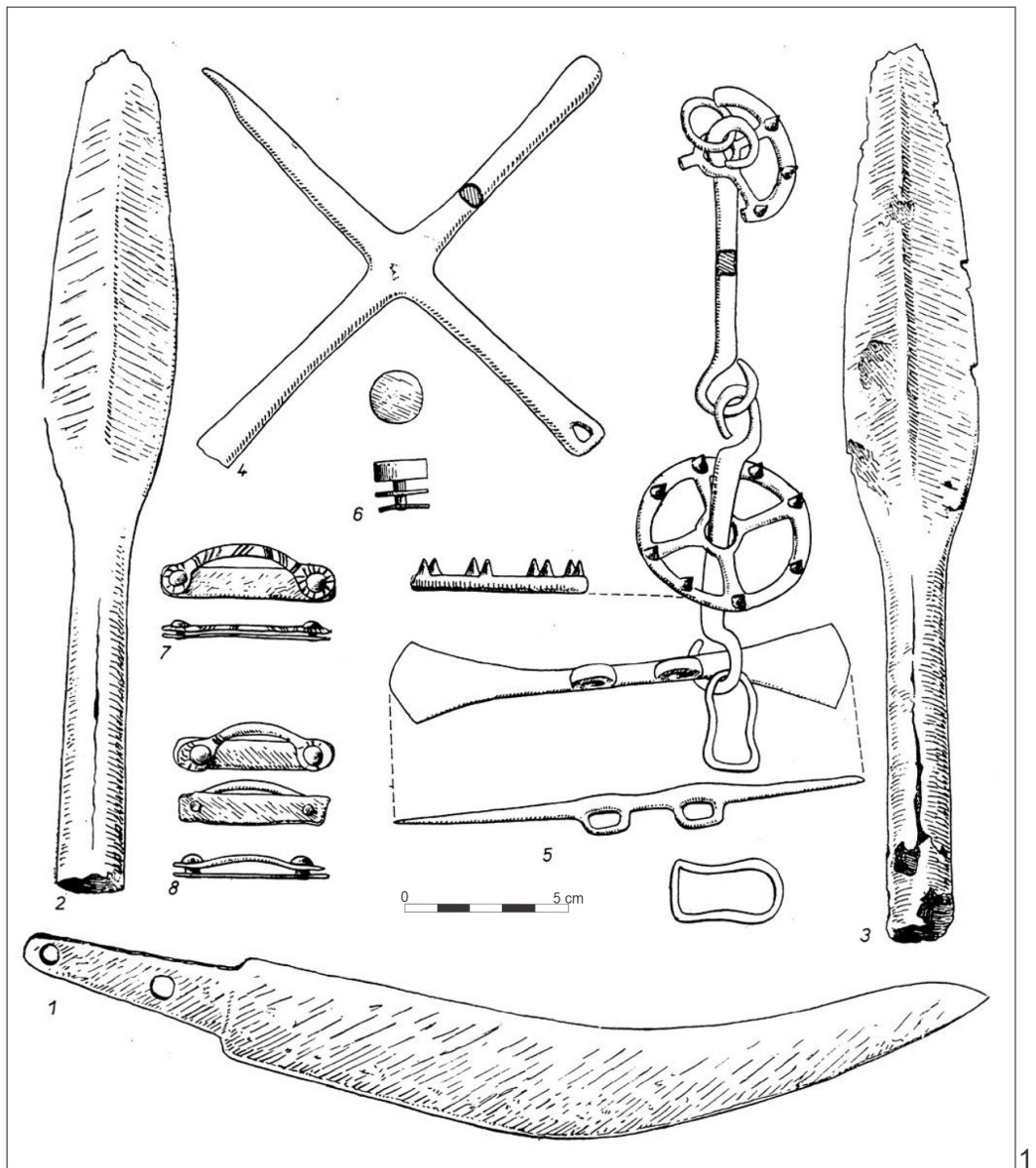




**Fig. 6.** Iron horse-bit fragments from Tilișca and Sighișoara (without scale): 1. Isolated cheek-piece (after LUPU 1989, Fig. 24/16); 2-5. Bit elements and situla attachment from the first deposit (after LUPU 1989, Fig. 24/2, 4, 12; Fig. 27/31); 6-9. Complete and fragmentary bit elements from the second deposit (after LUPU 1989, Fig. 24/5, 7, 8, 11); 10. Fragmentary cheek-piece from Sighișoara-Wietenberg (after ANDRIȚOIU/RUSTOIU 1997, Fig. 116/7).

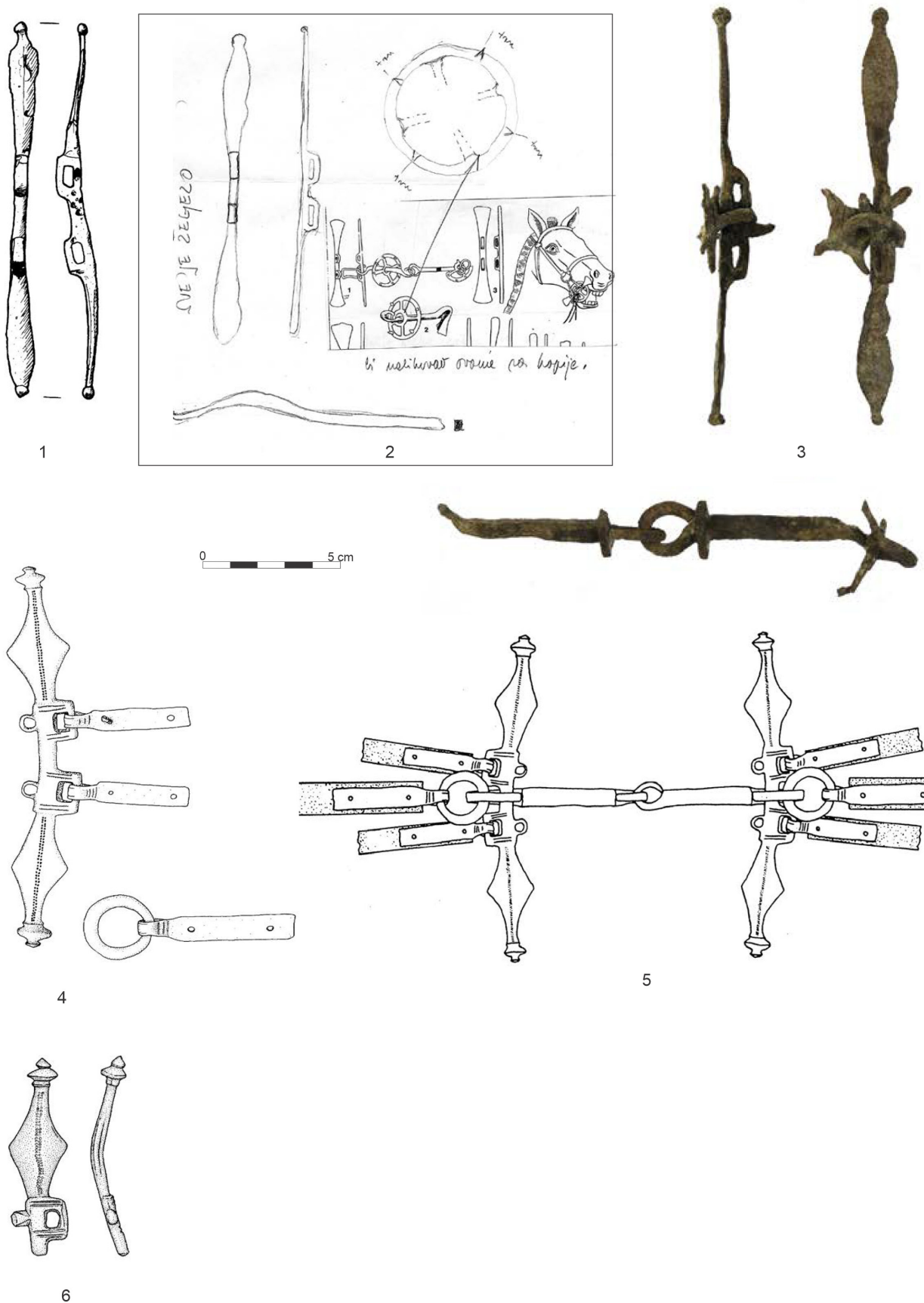


**Fig. 7.** Type VIII horse bit and pieces from Căpâlna, Židovar and mould from Pecica: 1. Complete iron cheek-piece (after GLODARIU/MOGA 1989, Fig. 91); 2-3. Bronze cheek-pieces (after GLODARIU/MOGA 1989, Fig. 92/5; MEDELEŢ 1995, Fig. 2/6); 4. Fragmentary iron cheek-piece (after GLODARIU/MOGA 1989, Fig. 2/3); 5. Pecica mould face with cheek-piece slot (without scale, after CRIŞAN 1969, Pl. I/2); 6. Cast model of the cheek-piece after the mould (without scale, after CRIŞAN 1969, Pl. I/11); 7. Bronze cheek-piece from Orešac-Židovar (without scale, after MEDELEŢ 1995, Fig. 2/3); 8. Reconstruction of an iron bit from Orešac-Židovar (after MEDELEŢ 1995, Fig. 2/7).

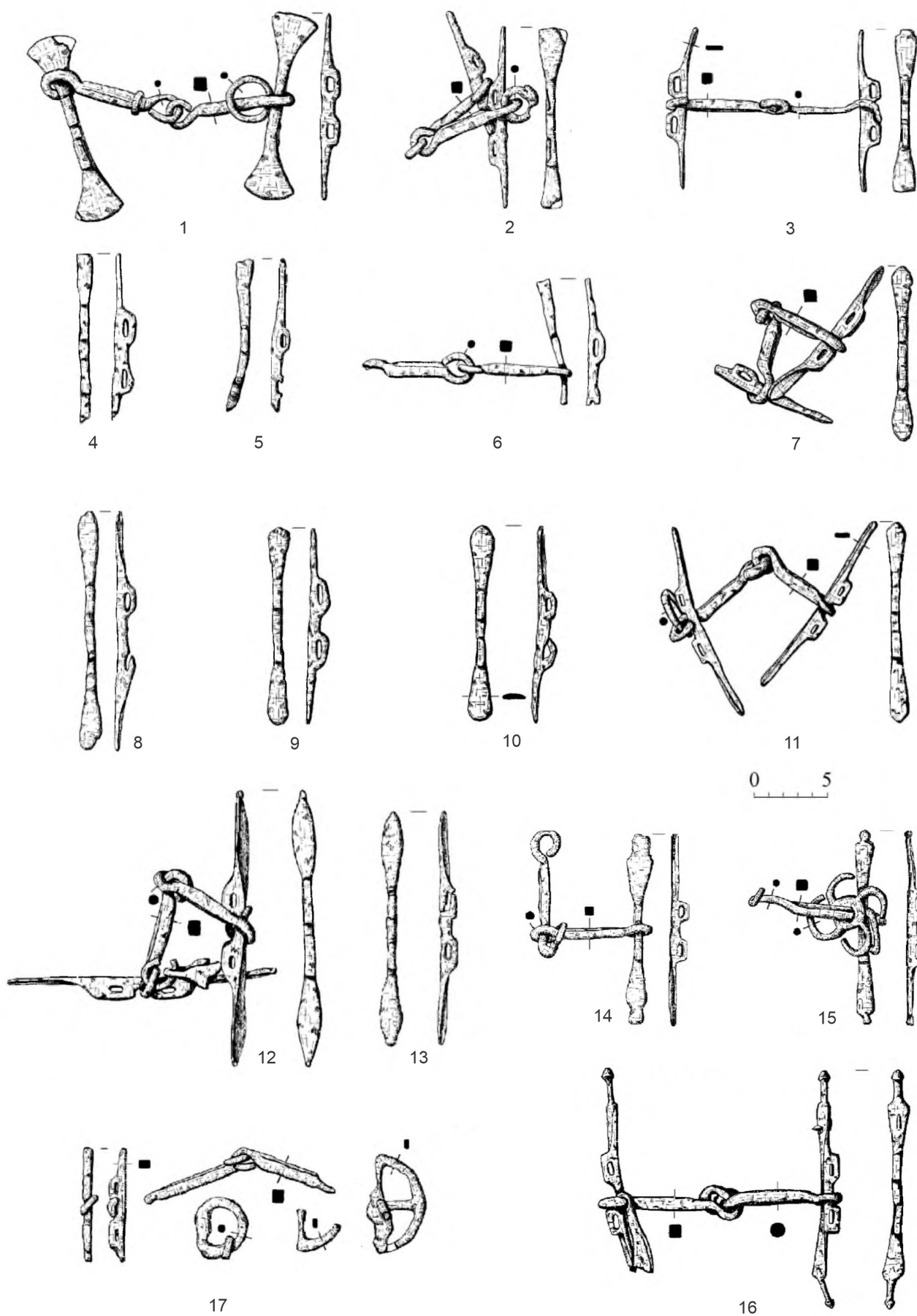


**Fig. 8.** Type VIII iron horse-bit from Radovanu: 1. Inventory of the Radovanu tumulus (after VULPE 1976, Fig. 18); 2. Photo of the horse bit (after BOŽIČ 2018, Fig. 10).



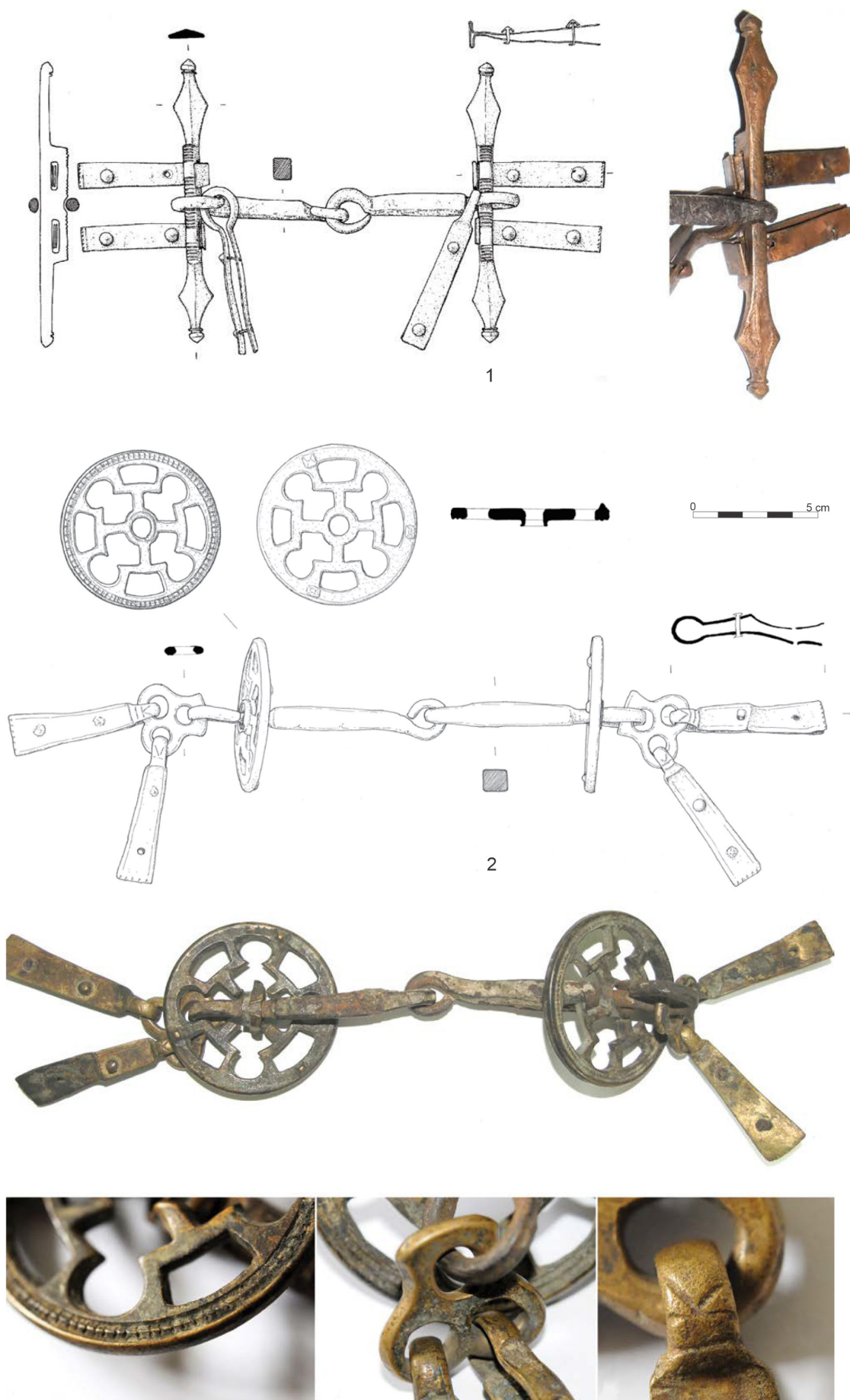


**Fig. 9.** Type VIII cheek-pieces from the west: 1. Bronze cheek-piece from Augsburg-Oberhausen (after HÜBENER 1973, Pl. 24-15); 2. Sketch of a cheek-piece and spike wheel from Orešac (after BOŽIĆ 2018, Fig. 17/1); 3. Photo of an iron cheek-piece and mouth-piece from Orešac (after BOŽIĆ 2018, Fig. 17/2); 4. Bronze cheek-piece from Magdalensberg (after DEIMEL 1987, Pl. 86/1, 3); 5. Reconstruction of the horse-bit from Magdalensberg (without scale, after DOLENZ 1998, Fig. 23a); 6. Fragmentary bronze cheek-piece from Kempten (after MACK-ENSEN 1987, Fig. 66/20).

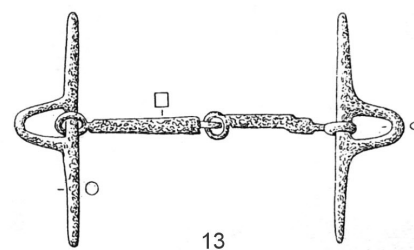
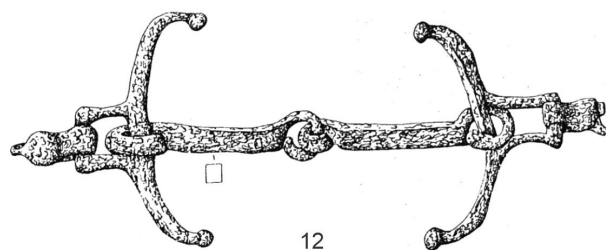
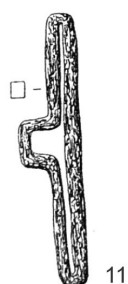
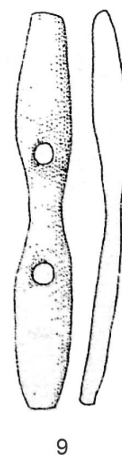
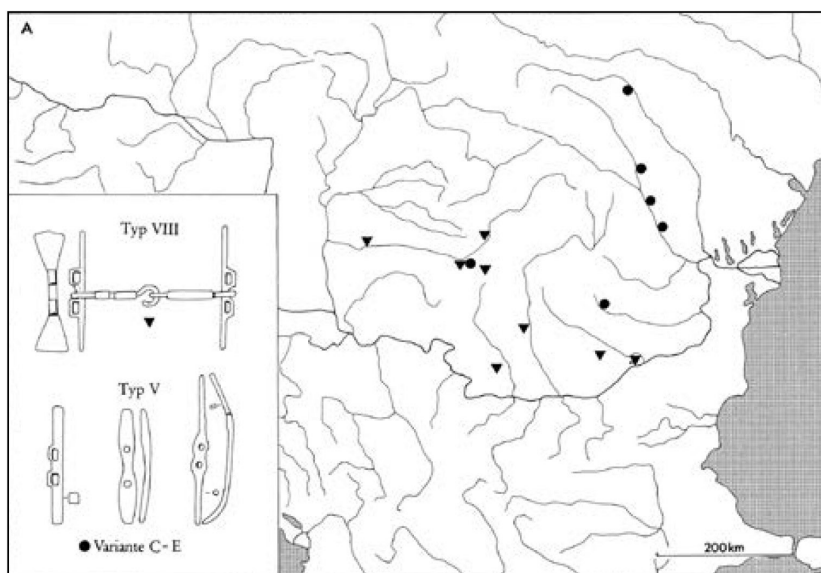
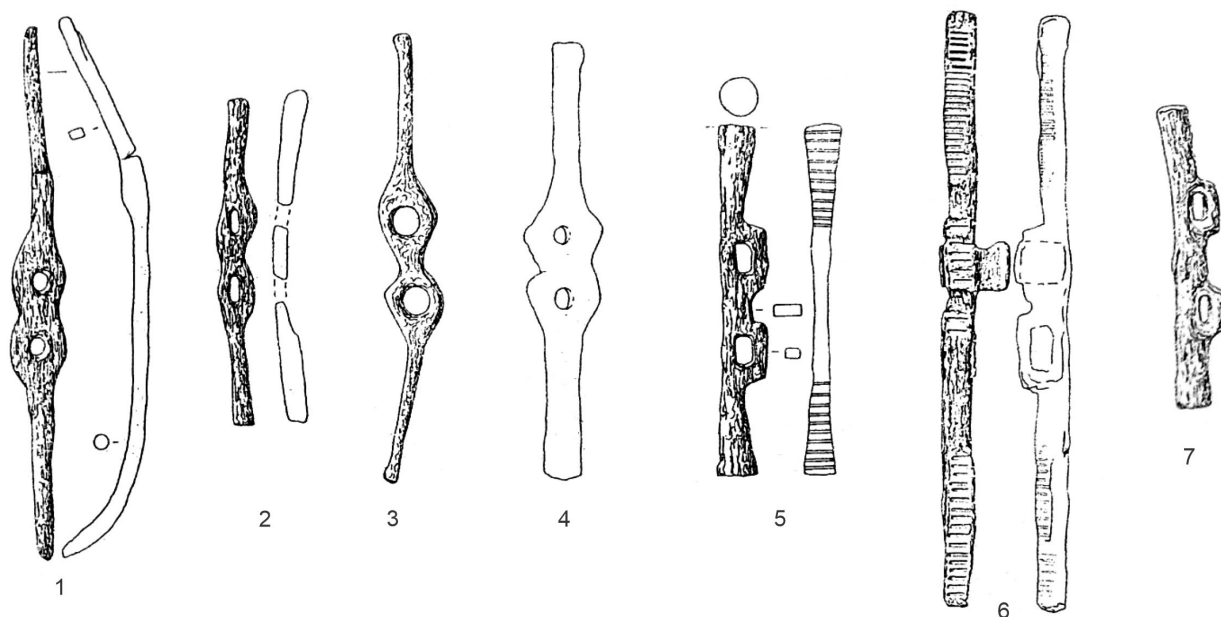


**Fig. 10.** Type VIII iron horse-bits from Mala Kopanja - Cellenița 1: 1-3. Type II, variant a (after KOTIGOROȘCO 2015, Fig. 44/3-5); 4-11. Type II, variant b (after KOTIGOROȘCO 2015, Fig. 44/6-13); 12-13. Type II, variant c (after KOTIGOROȘCO 2015, Fig. 44/14-15); 14-16. Type VI (after KOTIGOROȘCO 2015, Fig. 47/1-3); 17. Fragmentary bit (after KOTIGOROȘCO 2015, Fig. 48/40).

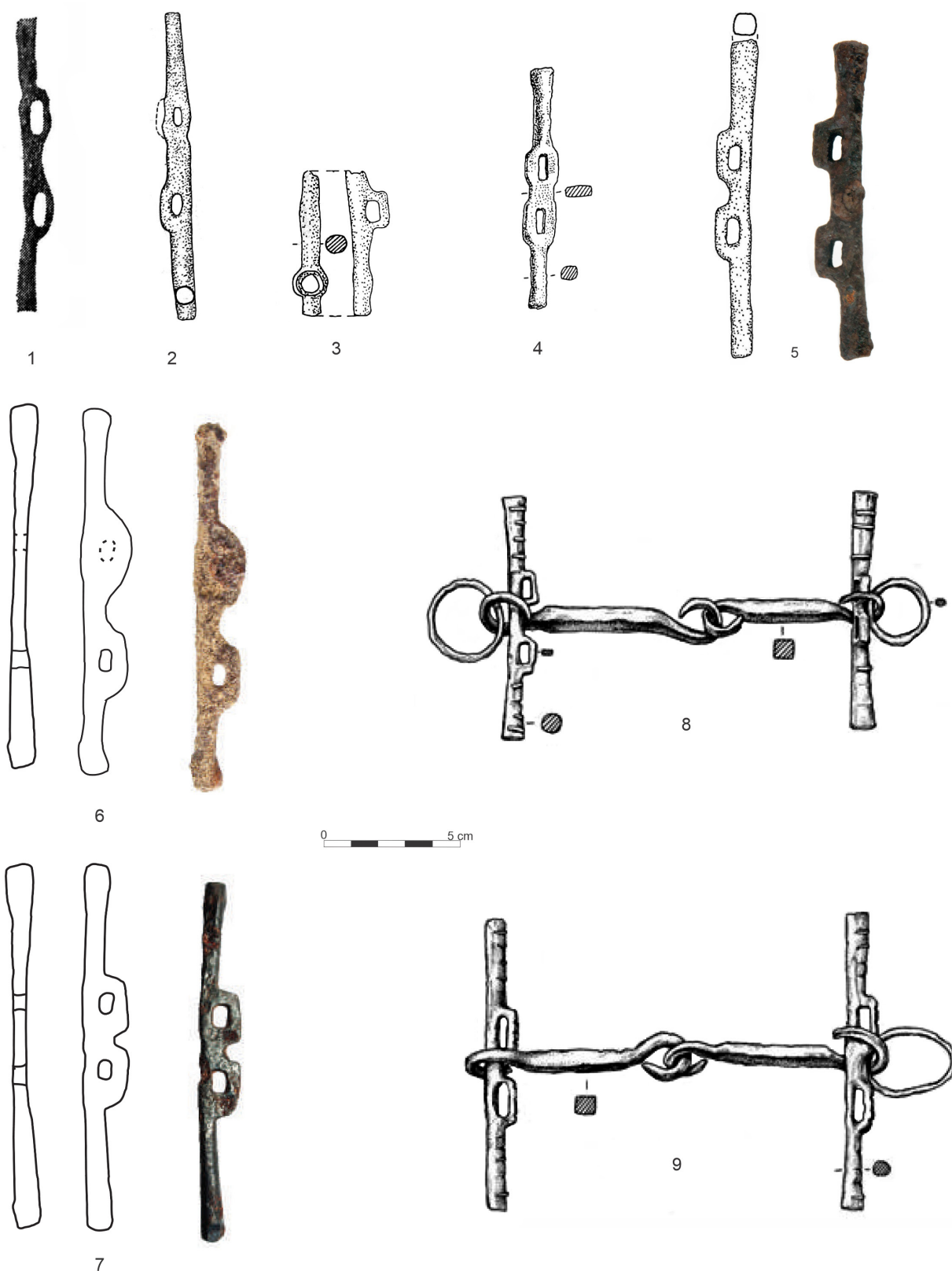




**Fig. 11.** Magdalensberg and Sisak variants of type VIII bits: 1. Bronze bit of the Magdalensberg type from Sisak and photo of one of its cheek-pieces (after BOŽIČ 2018, Fig. 1/1, 4); 2. Bronze bit from Sisak, photo and details (after BOŽIČ 2018, Fig. 2/1-4).

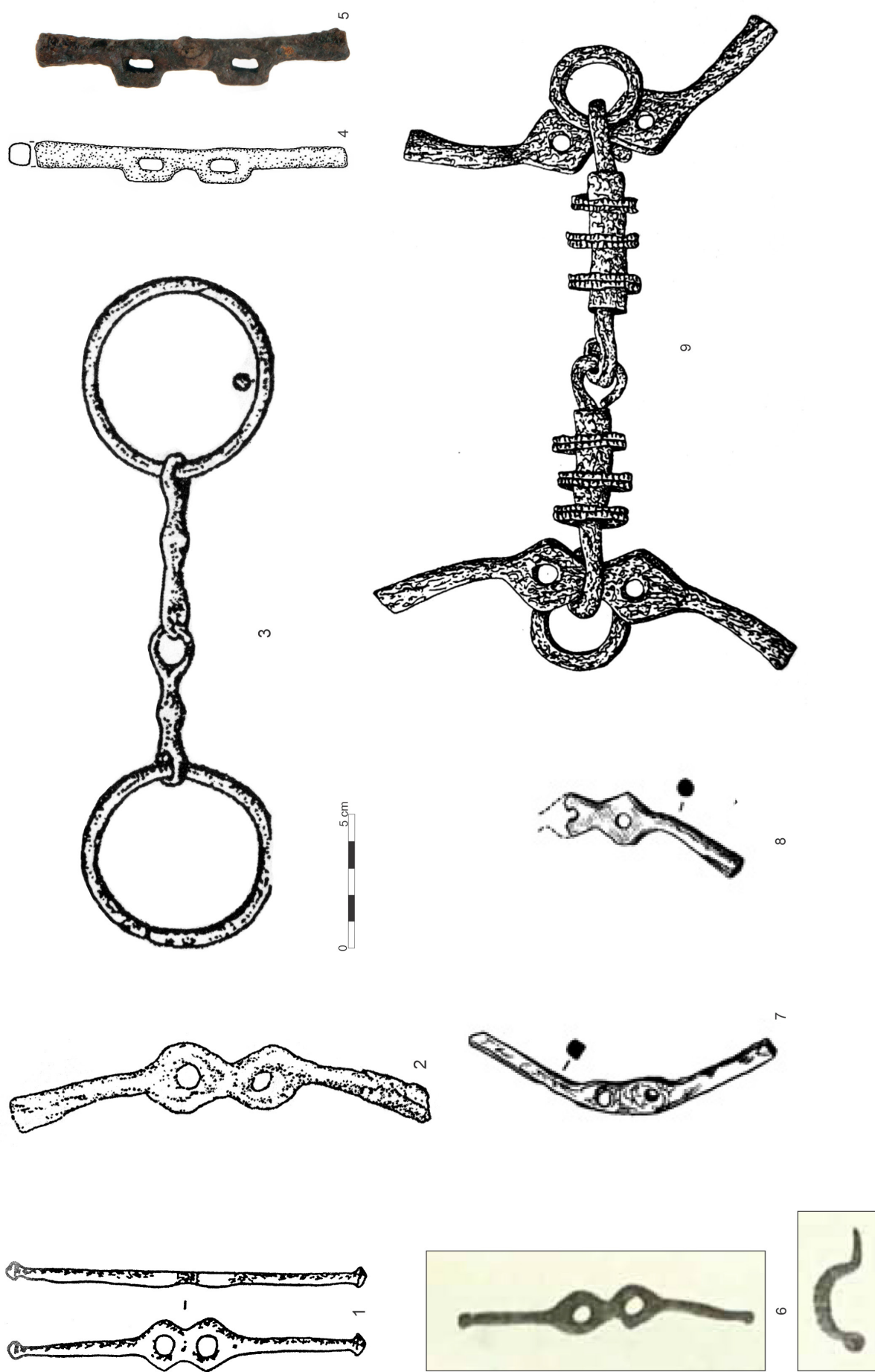


**Fig. 12.** Type V (C-E) horse-bits after Werner (without scale): 1-4. Cheek-pieces of variant C (after WERNER 1988, Taf. 21/131-142); 5-8. Cheek-pieces of the variant D (after WERNER 1988, Taf. 21/144-147); 9. Bone cheek-piece of variant E (after WERNER 1988, Taf. 21/148); 10. Distribution map of type VIII and type V (C-E) (after WERNER 1988, Taf. 70/A); 11-13. Type IX cheek-piece and horse-bits from Costești and Piatra Craivii (after WERNER 1988, Taf. 25/185-187).



**Fig. 13.** Type V – D iron horse-bits: 1. Cheek-piece from Răcătău (without scale, after CĂPITANU 1976, Fig. 14/12); 2-3. Cheek-pieces from Poiana (after TEODOR *et alii* 1998, Fig. 30/5, 13); 4. Cheek-piece from Pietroasele - Gruiu Dării (after SÎRBU *et alii* 2005, Fig. 93/4); 5. Earlier published cheek-piece of type V - D from Poiana (after VULPE *et alii* 1951, Fig. 22/8; TEODOR *et alii* 1998, Fig. 30/4; BORANGIC/BĂDESCU 2014, 89); 6-7. Cheek-piece from Covasna (after CRIȘAN/PUPEZĂ 2016, Pl. II/12-13); 8-9. Horse-bits from C38 at Pietroasele - Gruiu Dării (after MATEI/SÎRBU 2009, Fig. 15/1).





**Fig. 14.** Iron horse bits, cheek-pieces and fibula: 1. Cheek-piece of type V - C from Rudi "La Șanțuri" (after ZANOCİ 1998, Fig. 85/2); 2. Cheek-piece of type V - B from Lozna - Hlibiciuc (after TEODOR 1992, Fig. 18/1); 3. Celtic horse-bit from the Lozna iron deposit (after TEODOR 1999, Fig. 70/2); 4-5. Earlier published cheek-piece of type V - D from Poiana (after TEODOR *et alii* 1998, Fig. 30/4; BORANGIC/BADESCU 2014, 89); 6. Cheek-piece of type V - C and Dux fibula from Ichimeni (after PĂRVAN 1926, Pl. XXXVI/Fig. 1); 7-8. Cheek-pieces of type I - 3 of the Sarmatian milieu from Veseolaia Dolina and Velikoploskoe (after SIMONENKO 2015, Fig. 80/4, 10); 9. Horse-bit of type V - B from Șopot, Dolj (without scale, after WERNER 1988, Taf. 20/135).