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## THE LOCAL PRODUCTION OF LAMPS IN *ALBURNUS MAIOR*: WORKSHOPS OR LOCAL BRANCHES?

*Alburnus Maior (nowadays Roșia Montană, Alba County, Romania) is situated in the area of the region known as 'Golden Quadrilateral' of the Western Carpathians. Although the archaeological research carried out in Alburnus Maior did not reveal defining elements of the lamps production: clay extraction, pottery kilns, archetypes or moulds, a series of indications can provide important arguments regarding the existence of workshops that produced lamps. Thus, the possibilities to identify local workshops that produced lamps are limited, being reduced to the analysis of their finished products. An important collection of lamps consisting of 1694 items was examined for this study. It should be mentioned the fact that the majority of the lamps were found in a funerary context.*

*Alburnus Maior – lamps – stamp – kilns – moulds – funerary context*

### 1. Introduction<sup>1</sup>

The archaeological research conducted during 2001-2006 in the perimeter of the current locality Roșia Montană, within the *Alburnus Maior* National Research Program have resulted in providing a picture of the ancient *Alburnus Maior*. Thus, the main elements of the organizational system of Roșia Montană area in the Roman period consist of: zones of metalliferous deposits exploitation (Masivele Cetate, Cârnic, Jig, Orlea); habitat structures, including sacred areas (Carpeni, Tăul Țapului, Găuri–Hop, Hăbad) and cremation cemeteries (Tăul Găuri–Hop, Valea Nanului, Carpeni, Tăul Corna, Jig–Piciorag, Țarina și Tăul Secuilor/Pârâul Porcului) (Bocan and Neagu 2018: 92-93) (**fig. 1**).

Although the field surveys and investigations carried out in Roșia Montană under the *Alburnus Maior* National Research Program did not reveal defining elements of the pottery production: clay extraction locations, processing installations (tailing ponds, enclosures for the primary processing of clay and for drying the objects before firing, furnaces and storage rooms of the finished products), they provide some clues for the attestation of the pottery production.

Thus, the 2001 archaeological campaign discovered in the Hăbad location a mould for the production of *terra sigillata*, associated to a fibula of the Almgren 70 variant, dated to the first half of the 2<sup>nd</sup> century (Bocan and Neagu 2018: 93, fig. 3, 2; Pescaru et al. 2003: 125, fig. 8, 3, fig. 9, 3-4, fig. 10, 1-2). Two fragments of the lower part are preserved from the mould. It is decorated with pearled ovules, rosettes and palmettes (**fig. 2, 2**). Moreover, in the archaeological campaign

of 2004, in the necropolis of Tăul Secuilor/Pârâul Porcului a *terra sigillata* jug was discovered (Zirra et al. 2005: 292; Bocan and Neagu 2018: 93, fig. 3, 1 a-b) (**fig. 2, 1**). It can be noted the fact that this item was produced by combining three parts manufactured separately: the rim with the neck and the base with the lower part of the body were modelled on the potter's wheel. The upper part of the body was made by modelling in a mould intended for the manufacturing of bowls of the Dragendorff 37 type, however printed *up-side-down*. This fact probably indicates that the cast was manufactured intentionally to obtain a different form.

The authors of the discovery in the Hăbad location thought of a workshop somewhere in Dacia (Pescaru et al. 2003: 132), but the ovolos, rosettes and palmettes on this vessel, identical with the ones on the mould, indicate the presence in the Roșia Montană area of workshop that produced *terra sigillata*.

Although during the years 2001-2006 extensive archaeological research was conducted at Roșia Montană, there were no findings of pottery kilns, archetypes or moulds, discoveries that could support the production of *lucernae* in *Alburnus Maior*. Nevertheless, a series of indications can provide important arguments regarding the existence of workshops that produced lamps, even if their main components are unknown. Thus, the possibilities to identify local workshops that produced lamps are limited, being reduced to the analysis of their finished products. An important collection of lamps consisting of 1694 items was examined in this study. It should be mentioned the fact that the majority of the lamps were found in a funerary context. For the typological framing, it has been used the classification made by Sigfried Loeschcke, for the lamps at *Vindonissa*, in 1919 (Loeschcke 1919). The favourite typological series consists of lamps of the Loeschcke X type, manufactured using the bivalve mould technique.

<sup>1</sup> The translation was done by Alexandra Decu.



**Fig. 1.** The general plan of the archaeological sites identified on the territory of Roșia Montană (after Simion et al. 2007-2008, pl. I)

In order to demonstrate the existence of local workshops that produced lamps in *Alburnus Maior*, the following criteria were used:

- stylistic analysis (the decorative motifs on the shoulder, discus, base, handle), certain imperfections noticed in terms of execution of the items and finishing can be arguments based on which series of items can be identified;
- identification based on the stamps of some local producers whose names are not found in other provinces of the Roman Empire;
- microscopic analysis of the clay used in the manufacturing of the studied lamps (Rusu-Bolindeț et al. 2008: 69, pl. 336).

In this paper we focus our attention on the second criterion: identification based on the stamps of some local producers whose names are not found in other provinces of the Roman Empire. For the lamps that have the manufacturer stamp on the base, we have included in this study both the marks attested only at *Alburnus Maior*; and the ones that are known only in *Dacia Superior* province. The argument that prompted us to pay attention also to the stamps known only in *Dacia Superior* (CAI, respectively LVCI) is given by the large number of discoveries at Roșia Montană. Thus, 12 lamps bearing the stamps of these craftsmen on the base were discovered.

## 2. The analysis of the stamps

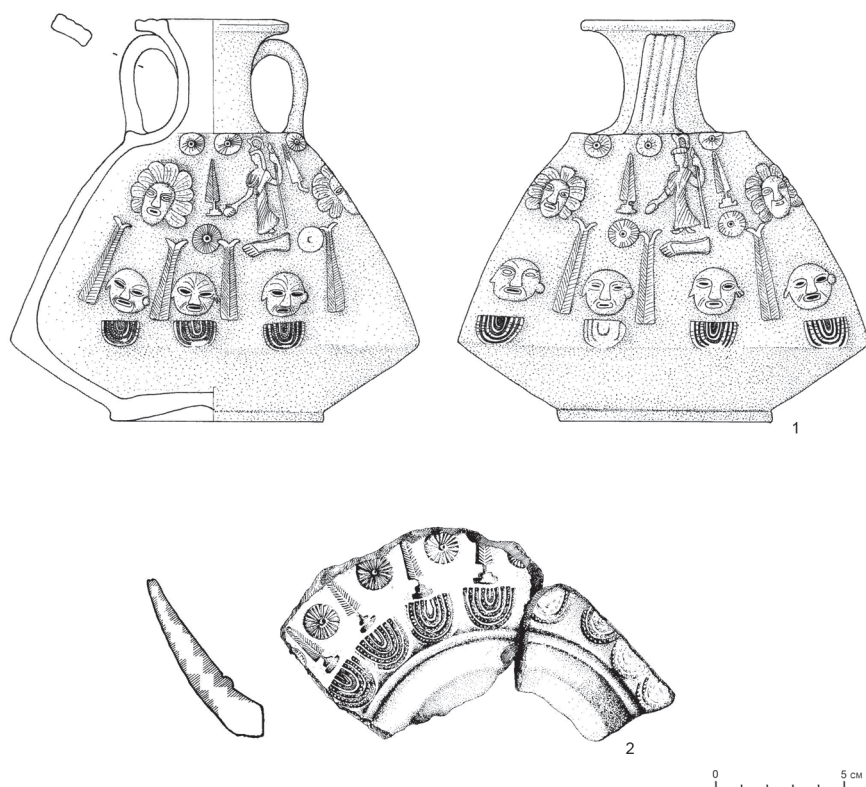
### CIO (fig. 3, 3)<sup>2</sup>

The mark of this producer is known only at *Alburnus Maior* and is represented by a single example from the cremation necropolis at Tăul Secuilor/Pârâul Porcului. It has been preserved the lower part of a lamp of the Firmalampen type, from the stratigraphic unit S 055, having incised on the base, in raw clay, the letters CIO. We failed to identify this producer in the epigraphic material discovered at *Alburnus Maior*. Given the item's precarious state of conservation (restoration on the stamp, severely burnt secondarily and damaged by the soil acidity) we do not exclude the possibility that the stamp was made of the letter I incised on raw clay, placed between two incised circles.

### LV · PV · LI (fig. 3, 4-5)

The mark of this producer is known only at *Alburnus Maior*, where two lamps from the inventories of two cremation graves in

<sup>2</sup> The drawings were made by Georgiana Ducman.



**Fig. 2.** 1. *Terra sigillata* type jug discovered in the necropolis at Tăul Secuilor/Pârâul Porcului (*Alburnus Maior*) (drawings by Georgiana Ducman); 2. Fragment from a *terra sigillata* mould discovered at Hăbad (*Alburnus Maior*) (after Pescaru et al. 2003: 140, fig. 8, 3).

the necropolis at Tăul Secuilor/Pârâul Porcului (G 207, respectively G 218) were discovered. Morphologically, the two lamps belong to the Loeschke X type, one of which, discovered in G 207, with a disk adorned with 'mask' was found with a coin issued during the Emperor Hadrian. This stamp may designate the initials of the producer who had *tria nomina*, as he was a Roman citizen, LV(cius) PV[...] LI[...]. The stamp is rendered in relief, with capital letters organized in three groups each of two letters, separated by *interpunctio*. It should be mentioned the fact that we failed to identify this producer in the epigraphic material discovered at *Alburnus Maior*. In supporting the completion of this producer's *praenomen*, there is another discovery in the same necropolis. In the inventory of a cremation grave – G 211, a fragmentary lamp of the Firmalampen type was discovered. It is interesting that, although the item in question has the FORTIS stamp, hardly visible, rendered in relief, imprinted on the base, on the shoulder it has another mark in the form of a graffito, incised in the raw clay, before burning. A small part of the shoulder is preserved, bearing the distinguishable inscription [...]CIVS PV[...] (fig. 3, 6). The corroboration with the two lamps marked with the stamp LV PV LI would allow the completion [LV]CIVS PV[...]. The presence of the FORTIS stamp on the base of the lamp in question is a certain argument according to which in this workshop were probably copied the lamps of the prolific North Italic producer *L. Aemilius Fortis*. In order to differentiate its copies from the original North Italic products, the local craftsman inscribed his name, in raw clay, on the shoulder of this lamp.

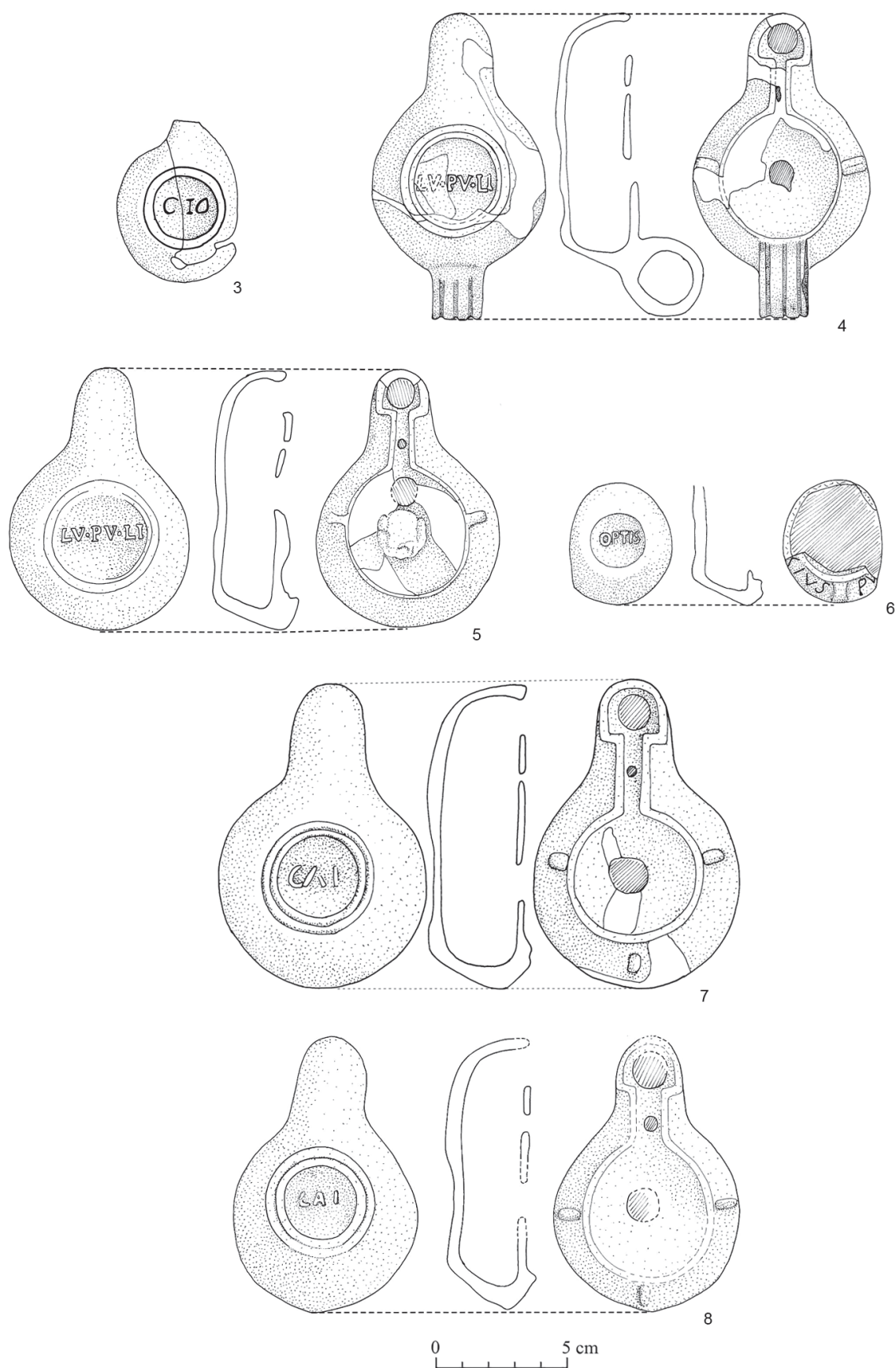
#### CAI (fig. 3, 7-8 and fig. 4, 9-13)

This mark could probably designate the initials of the producer who, as a Roman citizen, had *tria nomina* C(AIVS) A[...] I[...] (Gostar 1961: 193). We do not exclude the possibility that the stamp in question represents the genitive case of the producer Caius (Băluță 2003: 1).

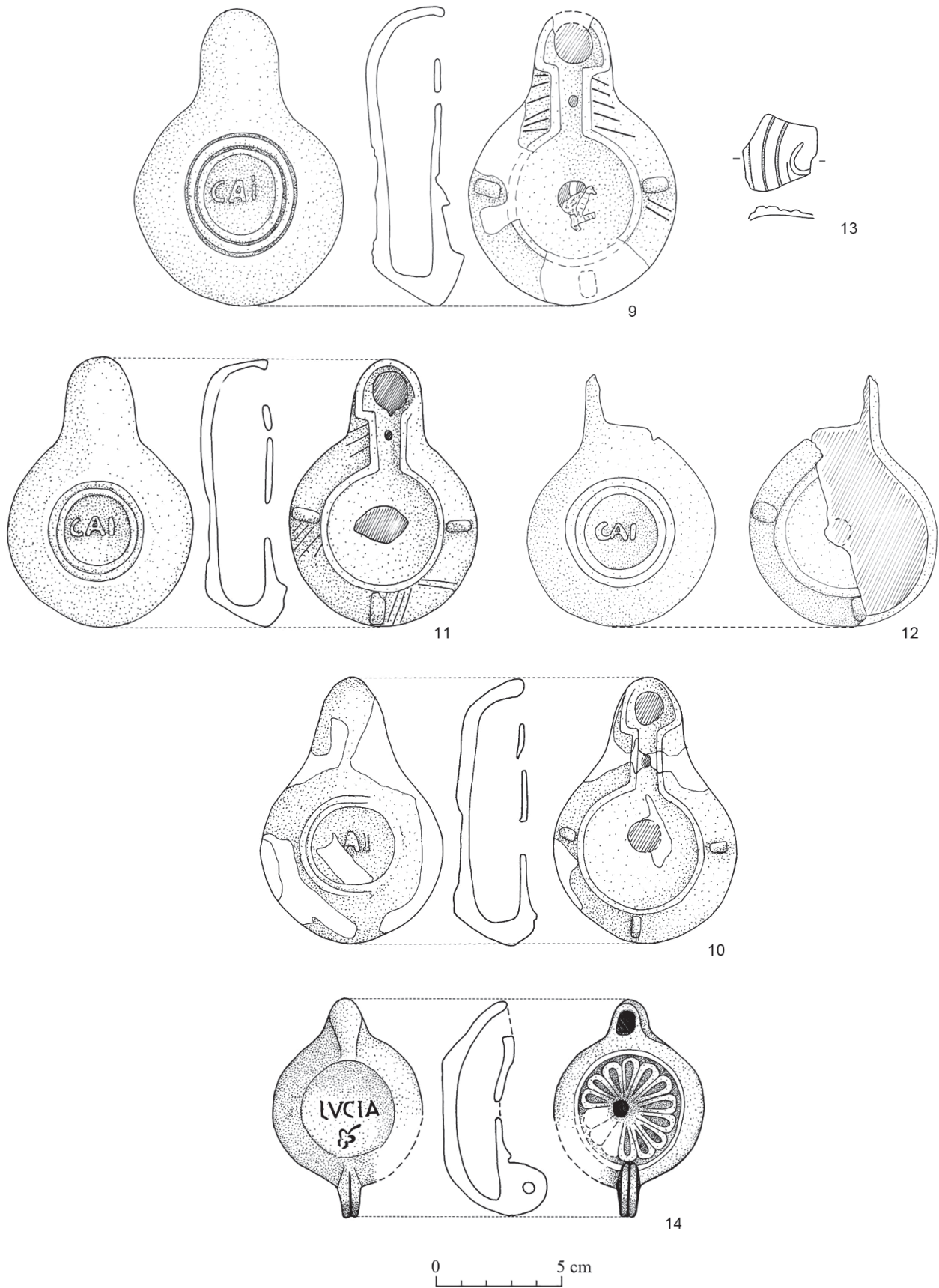
The mark of this producer is known only in *Dacia Superior*, with 14 items found: at *Apulum* – three items (Băluță 1983: 53, pl. LVIII, 2 a-b, XCVI, 25; Băluță 2003: 1-3, no. I, 1-3), *Cristești* – three items (Băluță 1983: 53, pl. XCVI, 23-24, 26; Gostar 1961: 158, no. 34, fig. 10; Isac and Roman eds. 2006. s.v. Man: 263, no. 263, fig. 263), *Micăsasa* – two items (Alicu 1994: 17, 202, note 97), *Micia* – two items (Băluță 1977: 225, no. 93, pl. V/49; Bocan and Neagu 2015: 140, no. 21, pl. IV, 21, IX, fig. 5; Bocan and Neagu 2016: 543, no. 5, fig. 2, 5), *Sighișoara* – one item (Băluță 1983: 53, pl. XCVII, 3), *Ulpia Traiana Sarmizegetusa* – two items (Alicu 1985: 85, pl. II, V; Alicu 1994: 17, 172, 190, no. 490, 1109; Alicu 2006: 14, 118, 171, Kat 490, Taf. X, 490, Kat. 1109; Băluță 1983: 53, pl. XCVII, 1; Isac and Roman eds. 2006. s.v. Isac: 71-72, no. 195, fig. 195) and *Tibiscum* – one item (Benea 1990: 147, 159, no. 42, fig. 6, 42; Benea 1996: 59, pl. 2, 2; Hamat and Georgescu 2013: 227, pl. II, 8).

The archaeological investigations conducted at *Alburnus Maior* discovered seven items, classified in the Loeschke X type, bearing the stamp CAI imprinted on the base. The items were found in a funerary context and are part of the





**Fig. 3.** 3. Loeschcke X type lamp with graffiti *ante cocturam* CIO produced at *Alburnus Maior*; 4-5. Lamps with the stamp LV·PV·LI produced at *Alburnus Maior*; 6. Lamp with graffiti *ante cocturam* [...]CIVS PV[...] and the stamp FORTIS produced at *Alburnus Maior*; 7-8. Lamps with the stamp CAI produced at *Alburnus Maior* (drawings by Georgiana Ducman).



**Fig. 4.** 9-13. Lamps with the stamp CAI produced at *Alburnus Maior*; 14. Lamp with the stamp LVCIA produced at *Alburnus Maior* (drawings by Georgiana Ducman).

inventories of cremation graves in the cemeteries of Tăul Corna (three items), respectively Tăul Secuilor/Pârâul Porcului (four items). The mark is imprinted in two graphic variants: with the letters C and A in ligature and another form of graphic rendering in which the letters are individualized, without ligature.

The discovery of a high number of lamps bearing this stamp on the base at Roșia Montană, corroborated with the special writing, by comparison with the items stamped with the same mark discovered in other centers of the province, are indications suggesting that the seven lamps analyzed by us are produced at *Alburnus Maior*. Of course, this allowed us to assume the existence of a large *officina* in *Dacia Superior*, in one of the big craft centers attested by archaeological research (*Apulum* or *Ulpia Traiana Sarmisegetuza*), probably with more branches in other centers of the same province, of which one located at *Alburnus Maior*.

#### LVCIA (fig. 4, 14 and fig. 5, 15-18)

The mark of this producer is known only in *Dacia Superior*, with five items found: *Apulum* – three items (Băluță 2003: 123, cat. no. 1-3) and *Ulpia Traiana Sarmisegetuza* – two items (Alicu 1994: 29, cat. no. 1171-1172). Furthermore, it should be signaled the discovery of lamps at *Sucidava* – two items (Gherghe and Cojoc 2011: 78, nos. 75-76, pl. 14, 72, pl. 47, 73) and Orlea – one item (Gherghe and Cojoc 2011: 78, no. 77, pl. 14, 74) with the stamp LVCI on the base. Our attention is drawn to the lamp of the Loeschcke VIII type discovered at *Sucidava* with the inscription LVCI, made by raw clay incision. Under the mark there is a circle with a point in the center, also made by incision. The lamp at Orlea stands out to the writing, similar with the discoveries at *Apulum*. Petre Gherghe and Mirela Cojoc believe that these items are local or provincial imitations of the lamps of the producer *Lucius* (Gherghe and Cojoc 2011: 47).

Five lamps bearing the stamp LVCIA on the base were discovered at *Alburnus Maior*. The items were found in a funerary context, as part of the inventories of cremation graves in the cemeteries at Tăul Găuri-Hop (two items), respectively Tăul Secuilor/Pârâul Porcului (three items). Morphologically, one item is classified under the Loeschcke VIII type and the others belong to the Loeschcke X type. A particular issue is raised by the discovery of the abovementioned item of the Loeschcke VIII, in a cremation grave (G 146) in the necropolis at Tăul Secuilor/Pârâul Porcului (fig. 4, 14). This lamp stands out both due to the decoration on the disk (rosette with alveolate lobes) and by the incised mark, rendered in the form of a graffito. Under the stamp, there is a leaf stylized by incision in raw clay. In the same cemetery were found other two lamps of the Loeschcke VIII type, similar in terms of ornamentation on the disk. As regards the mark in the form of a graffito, it prompts us to assign the item in question to the beginning of the workshop that produced lamps imprinted with the mark LVCIA, at *Alburnus Maior*, intended exclusively for the local population. The other four items, classified under the Loeschcke X type, with the stamp rendered in relief, probably belong to another stage, in which the *officina* is recognized in the provincial framework.

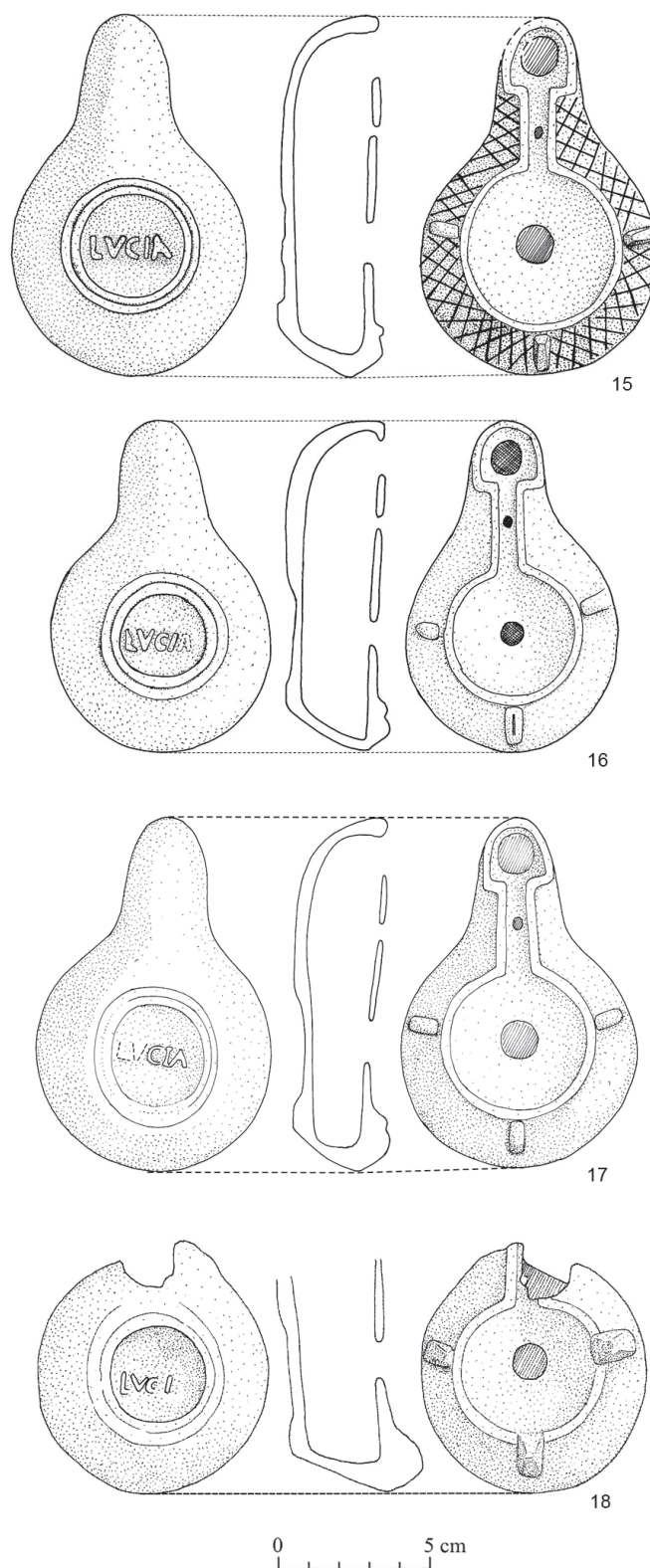


Fig. 5. 15-18. Lamps with the stamp LVCIA produced at *Alburnus Maior* (drawings by Georgiana Ducman).

The large number of items bearing this stamp on the base, by comparison with the discoveries in other centers, corroborated with the writing and the presence of the lamp with a mark incised in the raw clay, are all indications suggesting



the existence of a workshop of this producer at *Alburnus Maior*. Of course, this fact does not exclude the presence of branches of the same producer in other centers of *Dacia Superior* (*Apulum* and *Ulpia Traiana Sarmizegetusa*), as the composition of the clays and the writing are different from one production centre to another.

### 3. Conclusions

In this study we attempted to explain some aspects related to the identification of a local lamp production at *Alburnus Maior*. Firstly, it is necessary to consider the level of the archaeological research conducted on the site at Roşia Montană. Probably because only certain perimeters that would have been damaged by the implementation of the future mining project were studied, the archaeological research did not reveal the defining elements of the pottery production (pottery kilns, clay tailing ponds etc.). Thus, we attempted to demonstrate the existence of pottery workshops at *Alburnus Maior* by analyzing their finished products, namely the pottery and in our case, the lamps discovered during the archaeological research conducted between 2001 and 2006. The starting point of our approach is represented by the discovery of a fragmentary mould in the location Hăbad and of a *terra sigillata* jug in the cremation necropolis at Tăul Secuilor/Pârâul Porcului. The two items have three identical decorative elements based on which we can assume the existence of a workshop that produced *terra sigillata* at *Alburnus Maior*. The reasoning applies also to the lighting instruments. The alleged existence of this workshop, corroborated with the

discovery of a large number of lamps lead us to think of the existence of lamp manufacturing workshops, even if the defining elements (archetypes and moulds) are absent. By using criteria such as the stylistic analysis (the ornamental motifs on the shoulder, disk, base, handle), the identification of the stamps of some local producers whose names are not found in other provinces of the Roman Empire, the appearance of the clay, the finishing and some manufacturing imperfections, we can say that from the 1694 lighting instruments, a vast majority of lamps can be assigned to local workshops.

The analysis of this set of ancient lighting instruments found in Roşia Montană ascertained the fact that a number of 15 lamps with a decorated shoulder have the stamp of some Italian Peninsula producers on their base: FESTI (one item), FORTIS (10 items), MVRRI (one item), SEXTVS (one item), respectively VETTI (two items). This fact does not exclude the possibility that these lamps in question are local products, but rather sustains the hypotheses that either the said producers had branches in this location, or we are dealing with workshops that copied the marks of these producers.

The existence of *officinae* specialized exclusively in the production of lamps in the Dacian provinces is insufficiently documented at this stage of research. Only the workshop of *Armenius* at *Romula* and the workshop of *Ianuarius* at *Ulpia Traiana Sarmizegetusa* are regarded as certain. The presence at *Alburnus Maior* of the stamp of a craftsman (LV PV LI), unknown in the rest of the Roman Empire, attests the presence of a new workshop on the map of discoveries in the *Dacia Superior* province. Furthermore, we believe that the craftsman who signs the lamps with the stamp LVCIA had the main workshop at *Alburnus Maior*.

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### Catalogue of the lamps

Abbreviations used: G = grave; S = trench; L = length; Lp = length preserved; w = width; wp = width preserved; h = height; hp = height preserved

#### Figure 3

3. Firmalampen type (fragmentary, reservoir, base and lower part of the nozzle are preserved). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului, 2004, S 055. Lp = 6,2 cm; w = 4,6 cm. Fabric RM 3 (The description of the fabrics: Rusu-Bolindeț et al. 2008: 69, pl. 336). The nozzle with a single burner. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the mark CIO, made by ante coctum incision. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363588 (Bocan and Neagu 2018: 102, fig. 8, 6; Rusu-Bolindeț and Botiș 2018. s.v. Neagu: 79, no. 194).
4. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/ Pârâul Porcului 2005, G 218. L = 12 cm; w =

7,9 cm; h = 5,6 cm. Fabric RM 5. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a prominent cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. Wide shoulder with two lugs. The nozzle with a single burner is elongated, rounded and arrow-shaped. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp [LV]·PV·LI. Wide handle with three grooves set on the shoulder. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363585 (Bocan and Neagu 2018, 102, fig. 9, 2; Rusu-Bolindeț and Botiș 2018. s.v. Bocan: 73, no. 179).

5. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/ Pârâul Porcului 2005, G 207. L = 10,1 cm; w = 7,1 cm; h = 3 4 cm. Fabric RM 3. The round discus adorned with a 'mask' with a filling hole towards the nozzle is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. Wide shoulder with two lugs. The nozzle with a single burner is

elongated, rounded and arrow-shaped. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp LV·PV·LI. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363582 (Bocan and Neagu 2018: 102, fig. 9, 1; Rusu-Bolindeț and Botiș 2018. s.v. Neagu: 74, no. 180).

6. Firmalampen type (fragmentary, the pieces of the lid, reservoir and nozzle are missing). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2005, G 211. Lp = 4,6 cm; wp = 3,9 cm; h = 2,8 cm. Fabric RM 3. Smooth, round discus is outlined from the shoulder through a cord. On the narrow shoulder, which preserved a lug, is rendered as graffiti an inscription, made in the raw fabric, prior firing [...]CIVS PV[...] may be distinguished. The reservoir has the shape of a truncated cone. Concave base; across the sunken area within is the stamp [F]ORTIS barely legible, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363583 (Bocan and Neagu 2018: 102, fig. 8, 7; Rusu-Bolindeț and Botiș 2018. s.v. Bocan: 79, no. 195).
7. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2005, G 215. L = 12 cm; w = 8 cm; h = 4 cm. Fabric RM 3. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. Wide shoulder with three lugs. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp CAI, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363584 (Bocan and Neagu 2018: 101, fig. 9, 5; Rusu-Bolindeț and Botiș 2018. s.v. Neagu: 71, no. 174).
8. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Corna 2002, G 187. L = 11,2 cm; w = 7,6 cm; h = 3,8 cm. Fabric RM 11. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. The wide shoulder, with three lugs. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp CAI, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: TC 1209 (Damian et al. 2008: 172, no. 1, pl. 167/1; Bocan, Ursuțiu and Cociș 2007-2008: 209, no. 5, pl. 1, 5; Bocan, Ursuțiu and Cociș 2008: 47, no. 5, pl. 11, 5).

#### Figure 4

9. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2004, G 108. L = 10,8 cm; w = 7,5 cm; h = 3,3 cm. Fabric RM 3. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. The wide shoulder, with three lugs is decorated with radial incisions set between the side lugs and nozzle. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp CAI, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363581 (Bocan and Neagu 2018: 101, fig. 9, 3; Rusu-Bolindeț and Botiș 2018. s.v. Bocan: 72, no. 175).
10. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2004, G 103. L = 10,7 cm; w = 7,9 cm; h = 3,3 cm. Fabric RM 5. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. Wide shoulder with three lugs. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on

a multiple base-ring; across the sunken area within is the stamp [C]AI, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363580 (Rusu-Bolindeț and Botiș 2018. s.v. Neagu: 72, no. 176).

11. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2005, G 225. L = 10,7 cm; w = 7,6 cm; h = 3,3 cm. Fabric RM 3. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. The wide shoulder, with three lugs preserves traces of incised decoration. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp CAI, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363587 (Bocan and Neagu 2018: 101, fig. 9, 4; Rusu-Bolindeț and Botiș 2018. s.v. Bocan: 72, no. 177).
12. Loeschcke X Lamp (fragmentary, the pieces of the lid and nozzle are missing). Roman Cremation cemetery from Tăul Corna 2002, G 205. L = 10 cm; w = 8 cm; h = 3,5 cm. Fabric RM 11. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord. The wide shoulder, preserves one lug. The nozzle with a single burner. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp CAI, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: TC 1343 (Damian et al. 2008: 183, no. 5, pl. 185/5; Bocan, Ursuțiu and Cociș 2007-2008: 209, no. 6, pl. 2/6; Bocan, Ursuțiu and Cociș 2008: 47, no. 6, pl. 12, 6).
13. Lamp undeterminable as the type (base fragment). Roman Cremation cemetery from Tăul Corna 2002, G 11. Fabric RM 3. Lp = 3,2 cm; wp = 3 cm; hp = 0,6 cm. The lamp stands on a multiple base-ring; across the sunken area within is the stamp C[AI], in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: TC 26 (Damian et al. 2008: 76, no. 13, pl. 7/13; Bocan, Ursuțiu and Cociș 2007-2008: 209-210, no. 7, pl. 2/7; Bocan, Ursuțiu and Cociș 2008: 47, no. 7, pl. 12/7).
14. Loeschcke VIII Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2004, G 146. L = 8,9 cm; w = 6,3 cm; h = 4,2 cm. Fabric RM 5. The round, concave discus decorated with a rosette, with a filling hole in the center is outlined from the shoulder through a cord. Narrow shoulder. Short nozzle. Circular reservoir. Incised in the middle of the plain base is the mark LVCIA and trefoil leaf *infra*. Lamellar handle on the shoulder. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 334394 (Bocan and Neagu 2018: 101-102, fig. 10/1; Rusu-Bolindeț and Botiș 2018. s.v. Bocan: 70, no. 171).

#### Figure 5

15. Loeschcke X Lamp (reconstructed). Roman Cremation cemetery from Tăul Secuilor/Pârâul Porcului 2005, G 218. L = 12,1 cm; w = 8,1 cm; h = 3,7 cm. Fabric RM 5. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. Wide shoulder with three lugs, decorated with incised grid pattern. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp LVCIA, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363586 (Bocan and Neagu 2018: 101-102, fig. 10/2).
16. Loeschcke X Lamp (entire). Roman Cremation cemetery from Tăul Găuri-Hop 2002, G 40. L = 11,6 cm; w = 7,5 cm; h = 3,7 cm. Fabric RM 9. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a



small aeration orifice. Wide shoulder with three lugs. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp LVCIA, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 334401. Unpublished.

17. Loeschcke X Lamp (entire). Roman Cremation cemetery from Tăul Secuilor/ Pârâul Porcului 2004, G 43. L = 11,6 cm; w = 7,9 cm; h = 3,3 cm. Fabric RM 5. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel furnished with a small aeration orifice. Wide shoulder, with three lugs. The nozzle with a single burner is elongated. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-

ring; across the sunken area within is the stamp LVCIA, barely legible, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: 363570. Unpublished.

18. Loeschcke X Lamp (fragmentary, the nozzle is missing). Roman Cremation cemetery from Tăul Găuri-Hop 2001, G 93. Lp = 8,3 cm; w = 7,6 cm; h = 4,5 cm. Fabric RM 3. The round, smooth discus, with a filling hole in the center is outlined from the shoulder through a cord, pointing to the nozzle and surrounding it thus forming a channel. Wide shoulder with three lugs. The nozzle with a single burner. The reservoir has the shape of a truncated cone. The lamp stands on a multiple base-ring; across the sunken area within is the stamp LVCIA, barely legible, in relief letters. Dating: the 2<sup>nd</sup> century AD. Inventory no.: HG 392 (Moga et al. 2003: 203).

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