Thanks to recent analyses of representative sets of vessels from the reference sites, the study of Mediaeval pottery in Serbia regained its place in the focus of research. After publishing the results of the excavations at Stalač, a fortified town at the turn of the fifteenth century,¹ and the Maglič Castle,² certainly one of the most successful examples of Serbian military architecture of that time, the research potential of Late Mediaeval pottery is best underlined by the finds from the Studenica Monastery, the well-known endowment by the founder of the dynasty, Stefan Nemanja (1166–1196, †1199), and the most respected Serbian monastery.³ In the context of the overall results of the excavations at the monastery complex, dating from the 1180s, the study of this assemblage has significantly helped us to understand various aspects of pottery, including its production. A reliable delineation of two Mediaeval horizons – one from the late twelfth and the thirteenth centuries, and the other from the fourteenth and the first half of the fifteenth – with pottery assemblages illustrating the consumption models, enables the study of Mediaeval Serbian pottery production in its full complexity, including technological aspects and the issues of standardization and specialization. Several related research projects have been launched, archaeological examinations among them. On the other hand, while preparing the publication of archaeological excavations at the monastery, construction parts of a pottery kiln have been identified, indicative for the discussion of its production. Those finds are the first of their kind to come from the territories of Mediaeval Serbia, and for that reason their meaning in wider social and economic milieus should be examined. Apart from identifying the location of the workshop, the aim of this article is to discuss the character of the products

The paper results from the research project of the Institute of Archaeology in Belgrade, Urbanization Processes and Development of Medieval Society (no 177021), funded by the Ministry of Education, Science and Technological Development of the Republic of Serbia.

¹ Minić, Vukadin 2007.
² Popović, M. 2012.
³ Popović, M. 2015.
themselves and the issues of production organization and its context, bearing in mind the specific nature of the site.

IDENTIFYING THE POTTERY KILN

Among the objects found in the monastery complex, parts of clay rods and small, curved construction elements in the form of the Latin letter S merit special attention (Fig. 1). These were carefully collected during the excavations, but their function was not explained in the report.⁴ Out of the total of 90 fragments, there are 74 massive cylindrical pieces and 16 curved ones.⁵ As the fragments did not match each other, their original shape and dimensions could not be determined precisely. This is particularly true for the curved pieces. On the other hand, it can be presumed that cylindrical rods were between 30 and 35 cm long. One can further observe the difference in quality of the construction pieces. Compared to the curved finds, the clay rods were made in a much rougher fashion. It is noteworthy that there is a certain regularity in the fragmentation of the finds. If we put aside very small points, massive fragments are larger, between 10 and 15 cm in length. The curved kiln elements are preserved to the length span-

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⁵ Most of the rods are 3.4–3.7 cm in diameter, and the largest one is 4.2 cm wide. The longest rod measures 14.5 cm, and the diameters of the curved finds are between 1 and 1.8 cm.
ning from 2.6 to 8.6 cm. Small stains from green glaze are visible on some of them.

It is obvious that these finds were part of a kiln. Pottery kilns with clay rods had been in use since the Bronze Age, more or less frequent in different periods. The basic principle of firing with the help of radially distributed rods is attested in Namazga-depe (Ahal, Turkmenistan), in the first half of the second millennium BC. Similar constructions were also used throughout the Antiquity and the Middle Ages, up until the present time. The spatial distribution of Mediaeval kilns and their parts, as presented by Jacques Thiriot, shows the concentration of finds in the East and in the Mediterranean. From what we know so far, the earliest Mediaeval kilns with clay rods come from ninth-century Samarqand. In the following centuries and up to the present, the basic construction of such a kiln has remained the same, so that the suggested reconstructions of their original shape differ only in details. The main body of the kiln includes two parts: above a dug-in firebox, there is a cylindrical chamber with shelves made up of rows of clay rods, to encircle the empty space in the middle for the circulation of air (Fig. 2). The best description of kilns comes from the beginning of the fourteenth century, from Abu’l-Qāsem Kāśānī’s manuscript on minerals and precious stones ‘Arāʾ es al-jawāher wa nafāʾ es al-atāʾ eb. Its last chapter, entitled The Art of Ceramics and regarded as the best source for the study of Islamic pottery production, states that “… These (vessels) are placed in the kiln, called in Arabic shakhureh and locally dam [and dasht]. This is like a high tower, and inside it has row upon row of fired earthenware pegs, each an arsh [or: a dhira’] and a half long, fitted into holes in the wall. The vessels are placed on them and fired for twelve hours with a hot even fire, with this stipulation: that no wood be put on until the smoking has stopped, so that the smoke does not ruin or blacken the pots. In Kashan they burn soft wood [like hyssop and walnut], and in Baghdad, Tabriz and other places the wood [of the willow] is stripped of its bark so that it does not smoke. The vessels are removed from the kiln after a week [after they have cooled].”

The early date of the Samarqand kilns and a similar chronology of other finds from the East, from Persia (Iran), together with the overall simplicity of the construction with clay rods, allowed for the conception of their eastern origin. As yet, this hypothesis is not disputed, but the transfer across the Mediterranean of both the construction of such kilns and the firing technique was not explained sufficiently. According to the established development and distribution patterns, changes in the layout of clay rods and shelves, influencing the circulation of hot air and, therefore, the quality of firing, occurred already in the next century with the transfer of technology to the west coast. Finds from Zaragoza are dated to the tenth-eleventh centuries, and the later stages saw the degradation of the kiln construction. This was said to be a consequence of efforts to attune the firing technique to the rather complicated kiln construction. Findings from the Balkans, from Corinth in the Peloponnese (eleventh-twelfth centuries), Serres in Macedonia, and Massinoplis in Thrace (late thirteenth and

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7 Naumann 1971; Thiriot 1994; 1997, 346–362, Fig. 290; Aubert, Nikolaïdès 1995, 242, Fig. 3; François et al. 2003, 326–327, Figs. 1, 2; François, Shaddoud 2013, 25–27.
9 Naumann 1971, Abb. 3; Thiriot 1997, 363–365; Konstantinidou, Raptis 2015, Fig. 13.
the fourteenth centuries) have been analyzed in such a context. These kilns were studied in more detail, and two additional finds are known. The kiln from Preslav in Bulgaria is dated to the ninth-tenth centuries, while the finding from Coconi in Romania dates from the first half of the fifteenth. The presented assessments, especially those regarding the chronology and spatial distribution, have influenced the view that pottery kilns with clay rods were introduced to the Byzantine world only after the Latin occupation of Constantinople in 1204, and precisely in the areas ruled by the Latins. However, archaeological findings from the Middle Byzantine Period, the above-mentioned kiln from Corinth and new finds from Thessaloniki and Ierissos allow for questioning of that conception. Moreover, they unambiguously point to a direct taking over of both the construction and the firing technique from the East.

In the light of this discussion, the Studenica find and its thorough interpretation gain in importance. One may first ask exactly why a kiln with clay rods should have been chosen for firing pottery. And, perhaps more importantly, was this choice somehow connected to the general plan of the monastery? While analyzing its rampart construction, with the layout of towers deviating from the usual practice of fortification, Marko Popović concluded that Studenica was built according to a predefined plan whose author had no clear picture of the configuration of the terrain. It is further believed that in the course of construction works the plan had to be changed and adjusted to the topographical conditions. Based upon these deliberations, questions may be raised regarding the kiln find in the monastery complex. First, did the model of an ideal monastery, i.e. the pattern according to which Studenica was built, include a pottery workshop with the specific type of kiln, or was it chosen only to conform to a general idea that a monastery should produce all goods for monastic community, including pottery? Perhaps this particular kiln construction was suggested by the mason himself, drawing on his personal experience and skills? As for now, these issues cannot be resolved on the basis of the above-listed analogous finds of the same date from the lands of the Byzantine commonwealth. Due to the well-known architectural features of the complex, the dilemma of the origin of the template for such kilns is particularly striking in the case of Studenica. On the one hand, there are uncontested Byzantine influences on the conception of the monastery, and on the other the architecture of the Virgin Evergetis church interweaves Romanic with Byzantine art.

**IDENTIFYING THE MANUFACTURE AREA**

Although Mediaeval potters usually worked in the villages within monastic properties – the examples from fourteenth-century Serbia include Banjska, St Archangels and Konča – pottery craft could have been organized within the limits of a walled monastery as well. Some examples from the earlier Middle Ages, like the ones from Egypt – Kellia and Saint-Jeremia, and Bulgaria, around Preslav, may perhaps also be regarded as a model for this trade in the following centuries. Judging by them and by archaeological finds from the site, localization of the workshop and its characteristics could be determined with a greater level of certainty.

In the course of the decades-long excavations of the Studenica monastery complex, no architectural remains of a pottery kiln were uncovered, but the described finds pointed to its existence. Without firm material evidence, one can discuss the dimensions and capacity of the kiln only conditionally, through analyses of stratigraphic data and the characteristics of vessels. To that end, we should first identify the manufacture area, and the archeological record can help us resolve that issue. Almost thirty years ago, excavations in the eastern part of the monastery churchyard revealed a complex stratigraphy and the remnants of buildings, which was largely confirmed in the course of the recent revision works. To summarize the results, two buildings come from the earliest construction phase in the sector of the East Gate – one with a porch, leaning on the rampart and named as Eastern monastic building, and the nearby building XI.

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13 Morgan 1942, 14–22, Fig. 17/j–l; Papanikola-Bakirtzis et al. 1992, 31–32, Figs. 21–22; Zekos 2010, 53.
14 Totev 1976.
16 Raptis 2011, 190; Konstantinidou, Raptis 2015.
17 Konstantinidou, Raptis 2015, in the earlier bibliography.
22 Field documents from the 1982–1985 excavations, organized by the Republic Institute for the Protection of Cultural Monuments, Belgrade, and led by Milica Jankovic MA, are missing. The stratigraphy of cultural layers and architectural contexts are reconstructed according to the annual reports and a synthetic article by Milica Jankovic (Jankovic 1985; 1986a; 1986b), and according to the results of the 2013 revision excavations (Popovic, M. 2015, 162–185, Fig. 99, and references therein).
a temporary wooden chapel. Further to the west, in the area of the future Southeast Palace, above the original terrain the remains of an oven and traces of a firepit were found.23 Together with postholes, these finds clearly indicate that in the first century of the monastery’s existence there were some wooden buildings. The next stratigraphic layer was formed soon after the Eastern monastic building was burnt down in the first third of the thirteenth century. St George’s Chapel was built on its ruins, and in the second half of that century two more spacious buildings (VII and V respectively) were erected to the north. Soon after that, at the beginning of the fourteenth century, the already-mentioned Southeast Palace was constructed. A century later, St Demetrios’ Chapel was added to this complex, while building VIII, erected between the two chapels, comes from the last construction phase in this area, i.e. from the sixteenth and the first half of the seventeenth centuries.

The majority of the fragments of clay rods were found in the layer of burning debris above the original ground surface in the area between the East Gate and St Demetrios’ Chapel (Fig. 3). This substantial layer, thick between 0.40 and 0.50 m (402.22–402.72 m above sea level) contains burnt beams, plenty of sleg, animal bones and pottery, owing to which its upper chronological limit may be set around the middle of the thirteenth century.24 Without any doubt, this would mean that the pottery kiln was constructed already in the first construction phase, at the time of the establishment the monastery and the erection of the Eastern monastic building. Because the field documents are missing, the distribution of clay rods could not be reconstructed. Yet, on the basis of some more recent finds, the zone of their most intense distribution can be localized, as mentioned, between the East Gate and St Demetrios’ Chapel. As confirmed by recent archaeological excavations, fragments of the rods were also found north of this zone, in the area of future buildings III, V, and VII, but in small numbers. This can be explained by subsequent leveling of the terrain, preceding the construction of new buildings. The original ground surface in the eastern part of the churchyard was somewhat lower then in the rest of the complex, so it had to be filled with earth prior to further building works.25

As shown in earlier studies, the spatial organization of Mediaeval Serbian monasteries followed the Byzantine model. Places of cult, i.e. the churches and monastery refectory, were built in strictly defined intra-mural spaces, which was not the case with housing and economic areas.26 Such activities were usually organized within the same buildings: kitchens, bakeries, various storage rooms, and workshops were situated on the ground floors, while storeys were used for residential

purposes. Unlike other activities, pottery production requires a great amount of space, and it had to be organized in a particular way. Even if we put aside a pottery kiln, special compartments are needed for every single stage of the production process, first of all for forming and drying vessels. Regrettably, these last operations are in most cases hard to prove by archaeological means, as they do not leave any material traces. This fact adds to the importance of the painted ware workshop in the Tuzlal’ka Monastery near Preslav. Dated to the ninth-tenth centuries, the workshop produced ceramic icons, tablets and vessels for the Bulgarian capital. This building had separate rooms for keeping raw materials and clay preparation, for cutting the tablets and for the second firing (after painting the ware), as well as for stocking final products, while the kiln for the first firing was situated next to the river, some 60–70 m north of the monastery.

All the presented results allowed for setting up the basic assumptions about the Studenica pottery workshop, unique in the lands of Mediaeval Serbia. On the basis of the exhaustive archaeological analysis by Marko Popovic on the spatial setting of buildings in the thirteenth-century monastery complex we are close to the conclusion that the pottery production area was situated between the Eastern monastic building and building IIIa. Precisely in that area, almost 400 m² large, there was a concentration of clay rods (Fig. 4).

Fig. 4. Plan of the Studenica monastery in the first half of the thirteenth century:
The Church of Virgin Evergetis (1), Refectory (2), The Church of St Nicolas (3), East gate (4), Eastern monastic building (5), building III (6), presumed manufacture area (7)

The intensity of the activities therein is also illustrated by pottery shards, mostly of hearth pots.33

However, two questions remain open concerning the function of the kiln and, consequently, the organization of pottery production. First, was the kiln with clay rods used to fire vessels from both functional groups, hearthware and tableware? Secondly, did it perform both firings, the biscuit firing and the second one, after glazing? Taking into account both possibilities, i.e. firing unglazed and glazed ware,34 and firing glazed vessels only, previous research of such kilns did not resolve this issue either. Traces of green glaze, although quite sporadic, point to the firing of glazed ware, but this cannot be used as grounds for further suggestions. Also, one can assume that the S shaped devices could not be used as hangers unless the wares have already been fired once. The latter options suggest that only the second firing was performed, usually executed at a lower temperature.35 This possibility is backed by the already mentioned Tuzlal’ka find.

When judging a spatial model, one should consider that production intensification would lead to the displacement of a workshop, or at least some of its units.36 This matter is worthy of future study on a larger sample. If a hypothesis is to be advanced that all pottery groups were produced within the monastery complex, and confirmed afterwards by archaeological analyses, then we might reckon with the displacement of a part of the activities outside the fortification. This might even broaden the chronology of the workshop and result in setting somewhat different research goals: in that case, additional surveys of the monastery surroundings should be undertaken, first of all along the Studenica Rivulet.

WHO MANUFACTURED POTTERY, AND FOR WHOM?

Before I try to answer this question, the characteristics of pottery vessels from the presumed Studenica workshop should be described. The features of final products, in the first place their uniformity, provide an important source for the estimation of the production process. This uniformity refers to raw material composition, technology, shape, and volume.37 For such a discussion, pottery assemblages dated to the first century of the monastery’s existence are of immense importance. Ceramic contexts comprise vessels of both groups, hearthware and tableware, including a few sgraffito and painted vessels, undoubtedly imported from Byzantium (Fig. 5).38 Vessels of the first group, among all the pots, share a common clay composition with the coarse-grained sand-temper fabric. They were made on a slowly rotating potter’s wheel and fired in reducing atmosphere; therefore their colour is chestnut, ranging from reddish-brown to greyish-brown. The pots were produced in two sizes. Smaller pots are less than a litre in volume, and the medium ones between a litre and two, with only a few larger pots. Baking covers also display uniformity. All of them are conical in shape, bearing rows of finger-impressed decoration above the rim.

Tableware consists exclusively of bowls, coming in several calotte-shaped varieties on a short ring foot; the products of Byzantine workshops will not be studied in this article. Potters clay for tableware was tempered with the sand of varying fineness, and all the bowls were fired once. The latter options suggest that only the second firing was performed, usually executed at a lower temperature. This possibility is backed by the already mentioned Tuzlal’ka find.

When judging a spatial model, one should consider that production intensification would lead to the displacement of a workshop, or at least some of its units. This matter is worthy of future study on a larger sample. If a hypothesis is to be advanced that all pottery groups were produced within the monastery complex, and confirmed afterwards by archaeological analyses, then we might reckon with the displacement of a part of the activities outside the fortification. This might even broaden the chronology of the workshop and result in setting somewhat different research goals: in that case, additional surveys of the monastery surroundings should be undertaken, first of all along the Studenica Rivulet.

30 Totev 1976.
31 A while ago, the same purpose was proposed for a high, two-storey kiln from the fourteenth century Namasija Monastery, near the town of Paracin, but one should not take this without caution. The kiln was situated next to the Refrectory, and consisted of a ground floor and an upper storey with a wooden floor. It had two fireboxes, one at each level. According to preliminary field information, Marin Brmbolic (1981, 134–135) supposed that the kiln may have served to dry food. Much later, the author significantly broadened the description, stating that “the space at the ground floor level was partly divided into two unequal sections” and that “a large quantity of prepared clay has been found, as well as specialized tools and color and glaze stains on pebbles, allowing to suppose that vessels were formed in the ground floor [one of its sections?] and fired in the kiln”. It is further stated that this monumental kiln was multipurpose: “Among other functions, the ground floor of the building and the kiln were probably used for modeling and firing of pottery vessels, while on the upper floor there was a monastery kitchen” (Brmbolic 2011, 40–41). Beyond a doubt, a detailed analysis should be undertaken to resolve the issue of this important kiln’s function. There is also a kiln at the Manasija Monastery, coming from the sixteenth-seventeenth centuries. For this information I wish to thank Gordana Simić and Marko Popović.
32 Popović, M. 2015, 259–260, Fig. 168.
33 Popović, M. 2015, Figs. 81, 94, 131.
34 Naumann 1971, 180.
38 For the results of archaeological analysis of pottery cf. Popović, M. 2015, 211–215; Bikić 2015.
glazed in almost the same nuance of green (Fig. 6).³⁹ A local origin for the hearthware was suggested above with a higher level of certainty, which is in line with the usual Mediaeval practice. On the other hand, as the archaeometric survey has just started, the issue of localization of tableware production remains unresolved.

Although one cannot argue against its Byzantine manner, other questions concerning the organization of pottery production in the turbulent thirteenth century prevent us from taking a firm stand on this issue.⁴⁰ Not forgetting traces of green glaze on construction parts of the kiln – its curved elements but also clay rods – a final assessment could be made only after conducting petrographic and physical-chemical analyses of the finds.

The general features of the pottery point to the work of a skilful craftsman. One can study the clear choices he made throughout the process of pottery making, concerning above all standardized clay quality, firing procedures and vessel shapes. Thus, we have to pose the question: Who was in charge of pottery production in the monastery, a monk or a professional potter? Or perhaps a former apprentice in some workshop turning to a monk? To answer this, we should first remind ourselves of common knowledge about monastic life. Apart from the spiritual practice, everyday life in a monastery is filled with various economic activities, and all of them actually reflect spiritual efforts and discipline. Since all the aspects of pottery production in a monastery are intimately connected with the economy, there are no explicit proofs that the monks were engaged in this labour.⁴¹ On the one hand, there was a real and justified need of a brotherhood for such production, not only for consumption, but for possible exchange as well, and on the other, this craft is not fully in line with everyday life in such an environment. Tasks like weaving ropes and baskets, or spinning wool, can satisfy spiritual needs and be among the obediences,⁴² and because of their rhythmic repetition they can be seen as being in harmony with the concept of monastic silence. In sharp contrast, pottery production is a social activity, dynamic in all its aspects, and it also implies a division of labour.⁴³ For these reasons, and because of the seasonality of this craft, it would be a more realistic scenario that potters from nearby villages or, periodically, professionals from the outside were engaged for this purpose.

³⁹ Technological markers may also be useful for the study of the organization of pottery production, cf. Santacreu 2014, 245–249.
⁴⁰ Bikic 2015.
⁴¹ Dvoržák Schrunk 2003, 89.
⁴² Dvoržák Schrunk 2003, 89.
⁴³ Rice 1987, 182.
It can be further noted that the quantity of vessels is relatively large as seen against a modest level of exploration of the units dating from the first century of the monastery’s history. Together with this, there are only a few forms in the pottery repertoire: pots in three sizes – the largest for storage, the medium-sized for cooking, and the smaller for drinking from – then baking covers, and several mutually very similar green-glazed bowls. This is almost identical to the general picture of ceramics in Early Mediaeval Orthodox monasteries, where there were three main groups of pottery: dishes (bowls), cooking pots, and drinking vessels, cups or jugs.44

The described features of pottery from Studenica and its uniformity lead to certain assumptions regarding the production organization model. To approach that issue, and given the lack of other sources, we have to lean on previous typologies, including the cause-consequence relationship between demand, production, and distribution.45 Although the studies of this model were not based on Mediaeval samples, in pottery production there are common parameters which can be applied in this particular case as well. So, considering the characteristics of ceramics from Studenica, displaying clear technological choices regarding the raw material composition, firing procedures, and uniformity in shapes and sizes, one may first think of the concept of a workshop in a rural area satisfying the needs of its founders and supplying close surroundings. Among the models already suggested, several can be seen as matching what this author believes was the case with the production organization model in Studenica, and the closest one would be the conception of dispersed corvée, which, according to Cathy Lynne Costin, includes “part-time labor producing for elite or government institutions within a household or local community setting.”46 Unlike the case of the production organization model, an estimation of the production scope cannot be presented here, as there are no reliable quantitative data, either for Studenica or for the sites in its vicinity. We can only suppose that the workshop activity was seasonal, which could imply occasional work of specialized potters, who must certainly have lived within reach of the monastery.47

CLOSING REMARKS

The phrase preliminary considerations in this article’s title was chosen because at this opening stage of the research there are still numerous blanks in our knowledge of pottery production in the Studenica monastery. For this reason the paper cannot end with a proper conclusion, but rather with some closing remarks. To that end, it seems appropriate to discuss the production context of these activities in Studenica, which “...refers to the general conditions or circumstances in which production occurs, including the physical environment in which production takes place and the social, political, economic, and ideological milieus that structure relations among producers and between producers and consumers.”48

Given its political and ideological meaning, Studenica provides an inspirational platform for such deliberations. As a church mausoleum of the founder of the Nemanjić dynasty, Studenica was not only first among Serbian monasteries, but was an institution in itself.49 It was founded as an independent monastery, and its prior was given the highest rank, even to become the head of the Church in Serbia, enjoying the full protection of the Great Zupan.50 The monastery was built at the time of Serbia’s greatest political prosperity; its organization and overall appearance mirror the complexity of political and cultural realities of the time.51

The status of the first endowment and the new center of gatherings (not only religious) of the subjects of a newly independent state must have reflected on the economic situation of Studenica. Founded in the place of the once “desolate hunting ground for beasts”,52 with very little arable soil and economic resources, the monastery was certainly planned to become a kind of economic center for the population in its immediate and more distant vicinity.

From what is known so far, apart from the more remote domains the large landed estate of Studenica comprised several nearby villages as well. These provided craftsmen for the monastery’s needs, and were

44 Dvorzák Schrunk 2003, 88.
50 Maksimović 1988, 42–43; Studenica Typicon, chapters 12 and 13, pp. 59–62.
52 Life of St Simeon, 97.
part of the whole economic complex. One can further speculate that there were active relationships between Studenica and the other monasteries, not only the villages, and in that context it is easier to understand the setting up of the pottery trade there. Constructing the kiln within the limits of the monastery, and in the early stages of its history, can testify to the will of the founder to support one of the activities important to the local community. If this was so, the consumers of the workshop’s products were the locals as well, and in the case of Studenica it can be supposed that the exchange was taking place with the other centres, like Stara Pavlica, Djurdjevi Stupovi, and St Peter’s Church, which would encircle the area gravitating towards the capital in Ras. Given the level of research, there is no decisive archaeological confirmation of pottery distribution in the early thirteenth century, but bearing in mind the situation from the end of the thirteenth and the fourteenth centuries, when pottery of the same formal and stylistic features occurred throughout the region, we may suppose with considerable certainty that the settlements in the Ras area were interconnected through the trading channels in the earlier period as well.

At any rate, the very existence of the workshop in the monastery is one of the significant markers of the inclusion of Studenica in the economy of the early Nemanjić state, differentiating it from the endowment monasteries built by other rulers. Added to previous knowledge, the results of the study of pottery production and distribution present Studenica as having been shaped according to an ideal conception of the sacral central place, which included ideological (religious and political), cultural, and economic aspects. It remains to be seen whether there were other such models, or whether Studenica was an exception.

Acknowledgments
I wish to express my gratitude to Marko Popović for making available to me the results of the archaeological excavations at the Studenica monastery, including his spatial analysis; to Konstantinos Raptis (Hellenic Ministry of Culture and Sports, Ephoreia of Antiquities of Thessaloniki City) for information on kilns with clay rods, including the unpublished one from Thessaloniki, as well as for the critical reading of the manuscript; to Jacques Thiriot and Veronique François (CNRS – Laboratoire d’Archéologie Médiévale et Moderne en Méditerranée), and Demetra Papanikola-Bakirtzi (Director of the Leventis municipal Museum of Nicosia) for supplying me with the indispensable literature.

Translated by Ivan Bugarski

54 Bošković 1975, 7–13.
55 Bikić 2003, 201–202; Bikić 2015.
BIBLIOGRAPHY:


Aubert, Nikolaidès 1995 – C. Aubert, A. Nikolaidès, Céramique byzantines et four a barres médiéval de la place des martyrs à Beyrouth, La céramique médiévale et Méditerranée, Actes du 6e congrès, Aix-en-Provence, 239–242.


Bošković 1975 – Ђ. Бошкović, Основа на неки карактеристике регионални просторног планирања споменика на територији средњовековне Рашке, Рашка, биенална, 1, 7–14.


Janković 1986a – M. Janković, Затворени археолошке целине манастира Студенице, Саоптево
XVIII. Republics and wars for the protection of monuments of culture, Beograd 1986, 7–20.


Popović, M. 2012 – M. Popović, Maglički zamak, Beograd.


ИЗРАДА КЕРАМИКЕ У МАНАСТИРУ СТУДЕНИЦА: ПРЕТХОДНА РАЗМАТРАЊА

Кључне речи: глинени шипки, грчарска пећ, производи простор, потрошачки, производни контекст.

Грађа из манастира Студеница, сакупљена у току шездесет година истраживања манастирског комплекса, донела је веома значајне помаке у сагледавању различитих аспеката керамичког материјала, укључујући и производне. Поздање као извађање два средњовековна хоризонта – старји из првог део 12. и 13. века, односно мањи из 14. и прве половине 15. века – са скуповима керамичких посуда који ове насобинске хоризонте илюстрирају у смислу потрошачког образаца, омогућава да се производња керамике у средњовековној Србији сагледа у њеној комплексности која подразумева технологски аспект, као и питања стандардизације и специјализације. Томе у већој мери доприносе и конструктивни делови грчарске пећи. Ови налази, први те врсте на подручју средњовековне Србије, имају велики значај као разумевање производње керамике, али и ширег привредног миљеа. Стога је чињеница овог рада, да поред идентификације места радионице, размјери питања у вези са организацијом производње и карактером самих производа, тј. посуда, као и производни контекст, с обзиром на специфичну функцију налазишта.

Идентификације керамичких пећи
Током археолошких искарања у манастиру Студеница, издање глинених шипака и ситних закривљених елемента опака тврдно у латинским слова С i С (сл. 1) су бриљако сакупљени као предмет препознати, али њихова функција и значење тада нису били детаљно разматрање. Реч је о укупно 90 фрагмената, од тога 74 масивних цилиндричних комада и 16 ситних закривљених елемената. На појединим деловима су видљиве мање мреже зелених глазура.

Откривени делови јасно упућују на пећ са глиненим шипкама, какве су подигнуте за печење керамике почетом бројног доба, мада са различитом учешћем. Основни корупс пећи чине два дела: над укупним локвиметром подиже се цилиндрична комора, са пописама сачињеним од низова глинених шипак које су у средини твориле хрупки простор за проток ваздуха (сл. 2). Поред дистрибуције на Истоку и широм Медитерана, неколико налаза потиче из севера и са Балкана. У хронолошком следу најрангији су налази из околине Прслава (9–10. век), затим из Коринта, Солун, Јерисоса (11–12. век), Сера и Масинополиса (13–14. век) и са локалитета Сосопи у Румунији (прва половина 15. века).

Идентификације производног простора
На основу примера из ранијих раздобља средњег века, попут оних из Египта или околине Прслава, као и расположивих археолошких података из само Студенице, могуће је претпоставити, са доста сигурности, позицију керамичке радионице и утврдити неке њене одлике. У недостатку материјалних доказа (архитехничких остатака керамичке пећи), о димензијама и њеном функцији пећи може се говорити посредно, а на основу производних налаза стратиграфских података, као и особина самих посуда. Највећа количина делова глиних шипака потиче из једног лепоњивен над првобитним теменом, који је истражен у истонском делу манастира (сл. 3). На основу откривеног гранчица је одређена грана хронолошког слоја појачана око средине 13. века. То би значило, без много сумње, да је првара пећ подигнута у првој етапи, у време заснивања манастира, истовремено са истом константом. Зона са најугљивом концентрацијом индикативних налаза се јасно омеђује између истоничних капија и паркалиса Св. Димитрија, а делова пећи је било и на површинама северно од ове зоне, односно на простору каснијих грађевина III, V и VII.

Стратиграфски подаци и утврђена дистрибутивна схема налаза глиних шипака воде ка разматранању места производног простора или манастира за израду керамике. За претпоставку о простору где је могла бити организована производња керамике, важи речена анализа просторија око објекта у манастирском комплексус у раздобљу 13. века, који је у разници на основу свих производних археолошких података. Они без много сумње усмеравају на простор између источног делова и гранење III, широм подручја од готово 400 m², где су укратко функције везане за производњу керамике. Из тога се посматра и да је ова дистрибутивна схема налаза такође у означеном простору, уз локалност осталих података, изредно историје, изведен од своје посматрање на простору III, односно парадокс пећи и претпоставке о решавању простора. Ни претходна истраживања не су дадена просечна просторије, али нису дате смење за даље претпоставке. Ни претходна истраживања пећи са глиненим шипкама дасици лихе у том смислу, откривајући обе могућности, како печење неглеђосаних и глеђосаних посуда, се уочава и у овај посуда, али не је дате смење за даље претпоставке. Ни претходна истраживања пећи са глиненим шипкама дасици лихе у том смислу, откривајући обе могућности, како печење неглеђосаних и глеђосаних посуда, али не је дате смење за његову реализацију у том простору. Важи речена анализа просторија око објекта у манастирском комплексус у раздобљу 13. века, који је у разници на основу свих производних археолошких података. Они без много сумње усмеравају на простор између источног делова и гранење III, широм подручја од готово 400 m², где су укратко функције везане за производњу керамике.

Ко је производно керамичко посуђе и за кога?
Готови производи претстављају значајан извор информација за процену производних активности, при чему претпоставки критеријум представља унформност посуђа, коју се изузима из његове информације. Сугерирајући обе могућности, како печење неглеђосаних и глеђосаних посуда, се уочава и у oвај посуда, али не је дате смење за његову реализацију у том простору. Ни претходна истраживања пећи са глиненим шипкама дасици лихе у том смислу, откривајући обе могућности, како печење неглеђосаних и глеђосаних посуда, али не је дате смење за његову реализацију у том простору.
smislu uniformnosti sировине, procedure izrade i formalnih osobina (sl. 5). Dok je za ovrijenije lozne s velikom sigurnošću pretpostavljen domaće poročno, s obzirom na ustaljenu sredovjekovnu praksu, most izrade zeleno glebo- sanih trpeznih zedal (sl. 6) ostalo je otoroveno, budući da su planirana arheoizmijske istraživanja na samom mostu. S druge strane, rako njihov vizantijski manir nije sporan, druga pitanja koja se tiče organizacije proizvodnje kerami- ke u turbinom treh. već se ne dopuštaju zauma crnog stava u vezi s mesto izrade. Tako, u ovim razmatranjima treba imati na umu trome zelenen na konstruktiv- nih delovima, pret, s toga na krvnim elementima, ali i na pojedinih sivim hipkama. O svemu ovome končani sud biće moguće tek nakon obavljenih petrografskih i fi- ziko-chemijskih analiza.

Sud biće moguće tek nakon obavljenih petrografskih i fizičko-chemijskih analiza.

Završne napomene
Zbog samog koncepta, pret svega političkog i ideolo- škog značaja, Studenica predstavlja idealan primer razma- trašljenih iliako političkog, dруштvenog i privrednog kontek- sta u kojem se odvija izrada keramike. Kao hram-mauzolej rođanačelnika vladarske dinastije Nemavića, Stefana Ne- mavića, Studenica ne samo da ima pravo mesto među naftanri- ma, već je praktično svojvrsna uskupa. Osnovana je kao samostalni manim, a njih ugušen je dobiv najviši rang, kao neka vresta poglava u vezi sa granicama srpske države, pod punom zaštitom velikog župana. Izgrađena u vremenu naj- većeg političkog uspona Srbije, Studenica svojom organizacijom i ukrupnim izgledom ohranjena jednog iz naftanri- kih i kulturnih privilača tog vremena.


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