

Archaic Roof-Tiles from Apollonia Pontica

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The aim of the paper is to present the main types of pan and cover tiles, eaves tiles, and antefixes that were part of the roofs of the uncovered temples and other structures from the late Archaic and early Classical periods from the island of Saint Kirik (fig. 1.1), where the *temenos* of Apollonia Pontica (present-day Sozopol, Bulgaria) was located.¹

Pan and Eaves Tiles

Type 1. Corinthian pan tile consisting of tile backer and raised side borders, the latter with pronounced triangular profile (fig. 1.2). There is no rib at the upper end and no beveled lower end. All surfaces are equally well treated. The type is illustrated with few fragments from an Archaic dwelling to the west of the Archaic temple and from the layer beneath the foundations of the early Classical temple. The type resembles for example Type F.Ia from Istros,² but no exact parallels of the side borders' profiles have been found so far. The type is combined with an eaves tile with gutter, with the same profile of the raised borders. One fragment has entirely preserved length of 66 cm and the width could be reconstructed to 61 cm based on an eaves tile with gutter (fig. 1.3). The presence of mounting holes in the eaves tiles indicate that the antefixes that covered them also had mounting holes for fastening and an additional slab was mounted in the front side of the eaves tile. At present, the type could be dated broadly to the middle and the second half of the 6th century BC.

Type 2. Corinthian pan tile, consisting of tile backer, raised side borders, with or without rib at the upper end, and beveled lower end (fig. 1.4, 2.1). The latter was shaped by means of an undercut, 0,5–0,7 cm deep and 6–6,5 cm wide, and by beveling the corners of the lower base. All surfaces are well treated. Numerous fragments are documented in the area of the Archaic and early Classical temples. One tile of this type from a sunken structure lined with roof tiles has a completely preserved length of 67 cm. The type has exact parallels in the pan tiles of the Archaic Panionion (about 560 BC). The profile of the side borders is identical, as well as the upper rib and especially the undercut of the pan to shape the beveled lower end.³ Similar are the pan tiles from Station Dynameis/Ostbau in Didyma (530/525 BC), however with less distinct undercut.⁴ The reconstructed length of the tiles from the Archaic Panionion is 57,3 cm – and 54–55 cm from Station Dynameis/Ostbau. The width is respectively 61,5 and 47–48 cm. The roof-tile from Saint Kirik is of the greatest length, corresponding to that of Type 1, which fact allows to suggest that it had also a similar width, i.e. 60–61 cm. In the Archaic Panionion, the pan tiles are covered with Corinthian type cover tiles, and at Station Dynameis/Ostbau the cover tiles are of eastern Greek (mixed) type, corresponding to **Type 2 cover tiles** from Saint

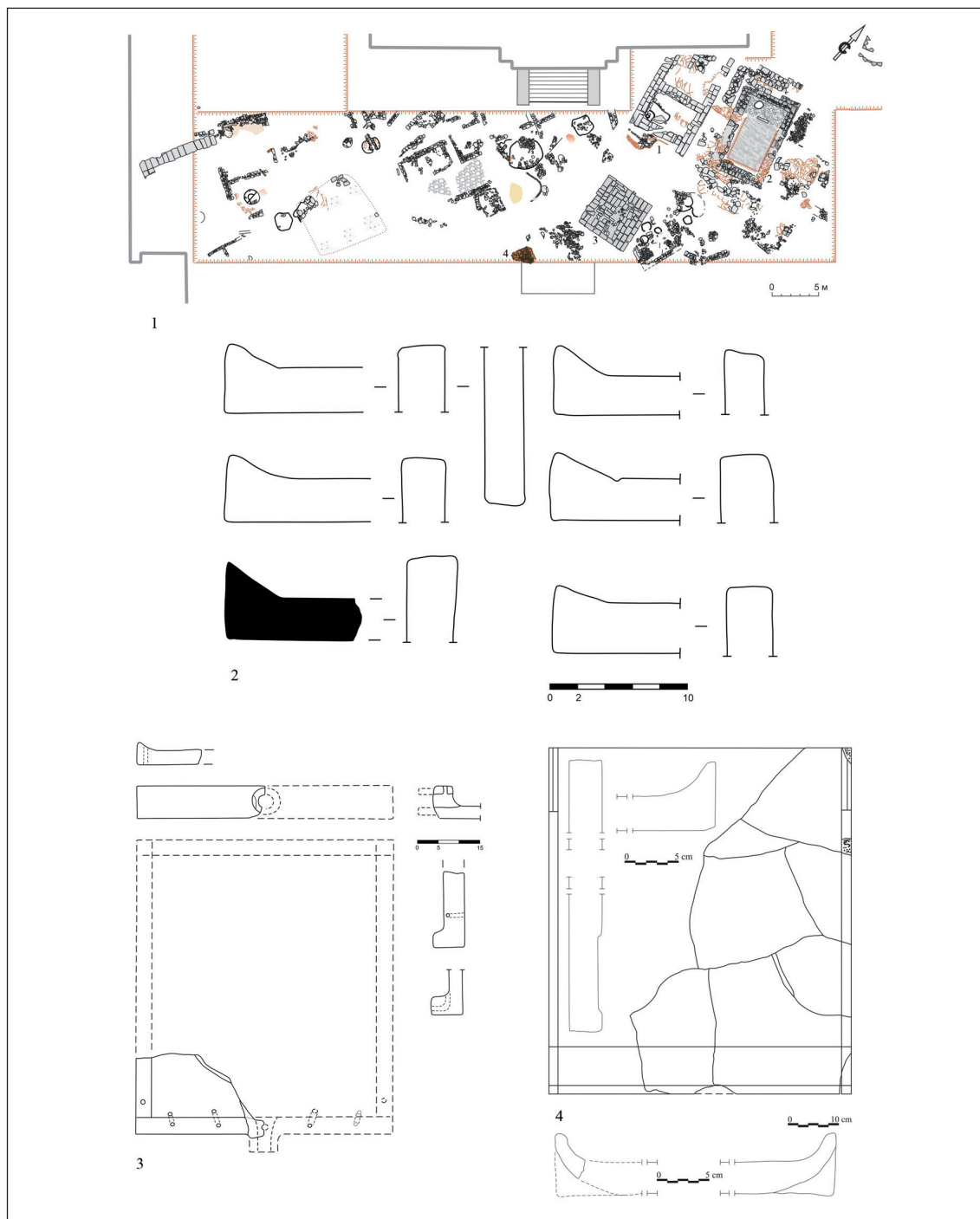


Fig. 1: 1.1. Plan of the excavated Archaic and Early Classical structures on the island of St. Kirik: 1: Archaic temple; 2: Early Classical temple; 3: Archaic altar; 4: Sunken structure lined with roof-tiles. – 1.2: Pan tiles, Type 1. – Fig. 1.3: Eaves tile with water spout. – 1.4: Pan tile, Type 2.

Kirik. At both sites, the pan tiles are combined with eaves tiles with guilloche, and the antefixes are decorated with lion heads at the former and with Gorgons at the latter. On the island of Saint Kirik, eaves tiles' fragments with guilloche and antefixes with gorgon and guilloche were discovered in the area of the two temples (fig. 2.2). Based on the stylistic analysis of the antefixes with gorgons, the pan tiles are dated to the last quarter of the 6th century BC (see below).⁵

Type 3. The presence of numerous Corinthian type eaves tiles consisting of tile backer, two raised side borders beveled at the lower end for mounting an antefix, rectangular fields on the upper surface of the tile backer along almost the entire length of the raised side borders, rib in the upper end and beveled lower end (fig. 2.3), indicate the existence of corresponding Corinthian type pan tiles with two raised side borders with cut out lower ends, beveled flange and rib in the upper end. At this stage of the study of the roof tiles from Saint Kirik, it is difficult to distinguish the fragments of such pan tiles due to their close resemblance to the Corinthian type pan tiles from the late Classical and early Hellenistic period that could be related to reconstructions of the roof of the early Classical temple. The evidence of the eaves tile should be revealing enough of the characteristics of the pan tiles.

The two rectangular raised fields on the upper base begin from the line of the cutting of the raised side borders and end at 8,5 cm from the upper end of the tile. Together with the front taenia, these features clearly define the tiles as eaves tiles. The profile of the side borders is almost rectangular. All surfaces are well treated. Such roof tiles were found in the area of the early Classical temple. Similar eaves tiles, with cut out raised borders at the lower end of the tile and a raised field along almost the entire length of the borders, are known from Larisa on Hermos⁶ and the Samian Heraion.⁷ In both cases, the eaves tile is combined with antefixes with Corinthian type cover tile, but the construction allows also using Laconian cover tile. At present, it is impossible to positively identify the presence of Archaic Corinthian type cover tiles on the island of Saint Kirik. The discovered fragments most probably belong to late Classical/early Hellenistic tiles. Unequivocal evidence of the use of Corinthian cover tiles is provided only by the antefixes with gorgon and guilloche. Therefore, one cannot exclude the possibility the above-discussed Corinthian pan and eaves tiles to have been combined with Laconian cover tiles and antefixes. The presence of similar eaves tiles in Larisa and the Samian Heraion, dated broadly to the middle and the second half of the 6th century BC, suggests that they should belong to the late Archaic and early Classical phase of monumental architecture in the temenos. They may have been part of the roof of the early Classical temple.

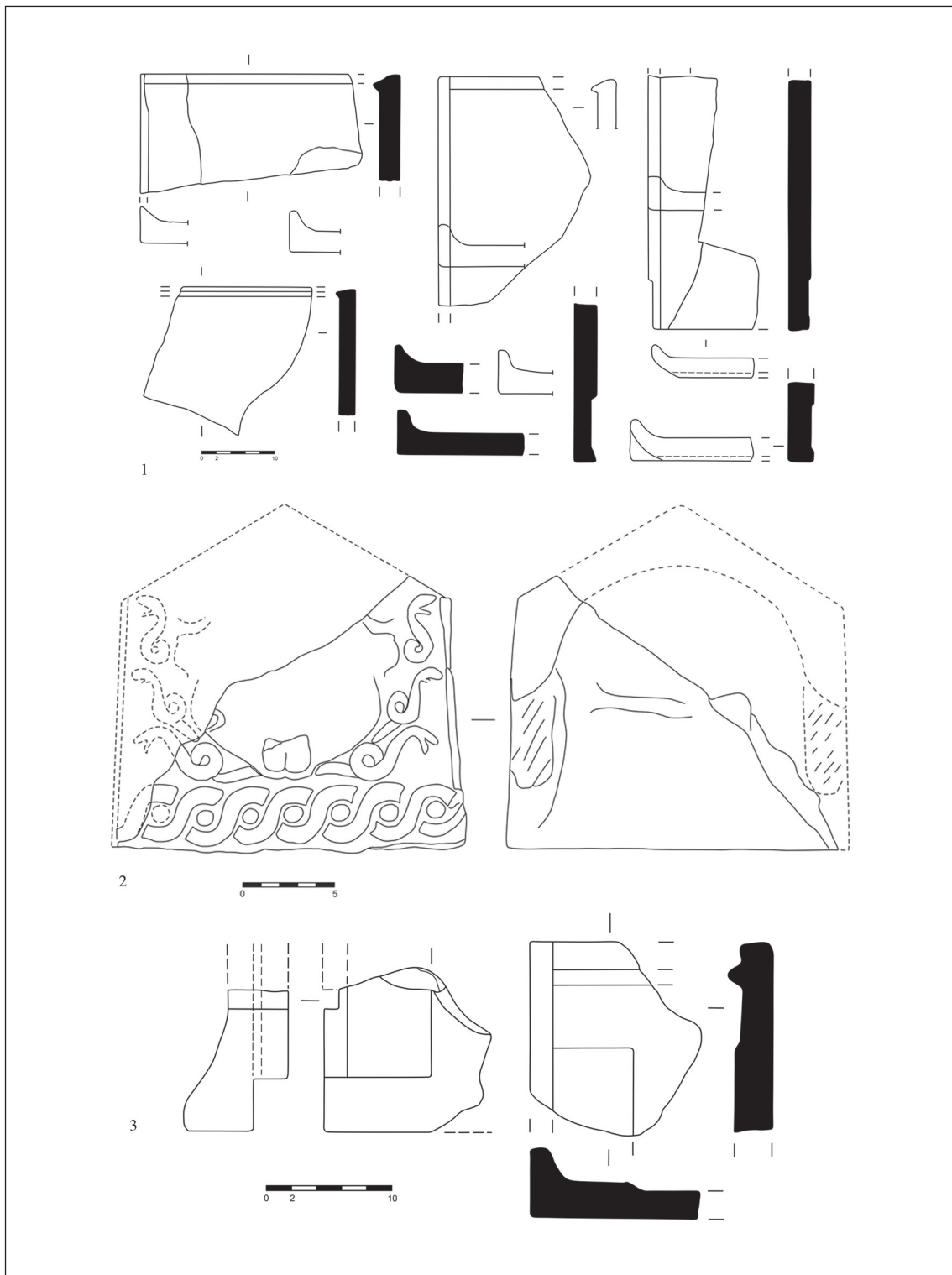


Fig. 2: 2.1: Pan tiles, Type 2 – 2.2: Antefix with gorgon. – 2.3: Eaves tiles, Type 3.

Cover Tiles and Antefixes

Type 1. Laconian type cover tile, with short board at the front end for clutching at the one in front of it (fig. 3.1). Probably, the back end was not given a specific shape, but the diameter was slightly smaller to fit in the next one. The inner and outer surfaces are very well treated. The type is attested with few fragments and no complete specimens, but most probably, the length was equal to that of the pan tile – 66 cm. External width 18 cm, internal 16 cm. Height 12 cm. They have been discovered in the area of the two temples. The type is broadly similar to Type D. I–II from Istros.⁸ Most probably, this type of cover tiles is related to the **pan tiles of Type 1**, dated to the middle and the second half of the 6th century BC. The cover tile of the palmette antefix with seven-leaf palmette has an identical cross-section and is of the same date⁹ (fig. 4).

Type 2. The type consists of two vertical lateral sides and an arched upper side (fig. 3.2). At the back of the cover tile, the thickness of the upper part diminishes in order to shape a groove for mounting the next tile. The construction is a combination between Corinthian and Laconian type of cover tile, for which reason it is defined as mixed or East Greek type.¹⁰ Height 8,5 cm. External width 14,4 cm. This type of cover tile is combined with **pan tiles of Type 2** from Saint Kirik, as well as with the eaves tiles with guilloche and the antefixes with gorgon and guilloche. The length of the cover tile could be reconstructed based on the length of the pan tiles of Type 2–67 cm. The length of the intact examples of cover tiles from Station Dymaieis/Ostbau from Dydimia is equal to that of the pan tiles, 54–55 cm¹¹. The largest number of fragments of this type was found in the

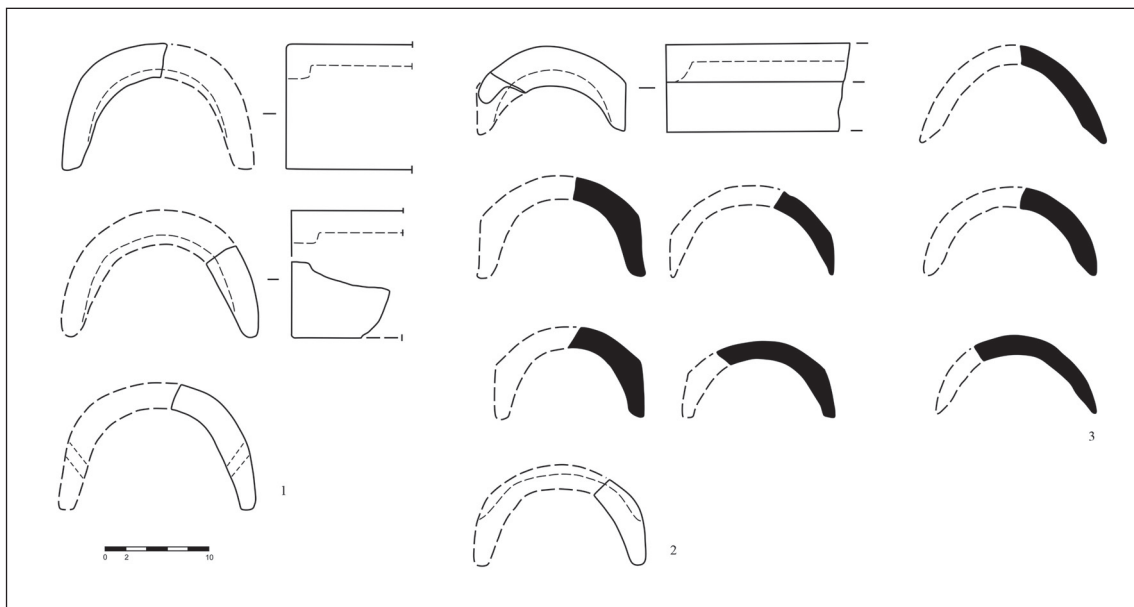


Fig. 3: 3.1: Cover tiles, Type 1. – 3.2: Cover tiles, Type 2. – 3.3: Cover tiles, Type 3.



Fig. 4: Palmette antefix.

area of the two temples. The type has parallels in Didyma, Miletos, and Istros.¹² Based on the stylistic analysis of the antefixes with gorgon, the parallels, and the stratigraphic evidence,¹³ this roof should be dated to the last quarter of the 6th century BC and belongs to the Archaic temple. Another argument for relating this roof to the temple is the presence of a geison block that was discovered in the temple and is made of the same material (Muschelkalk) as the temple's foundations. Such blocks were normally used in monumental buildings with pan and cover tiles of the discussed types, along with eaves tiles with guilloche and antefixes with guilloche (the Archaic Panionion, Station Dynameis/Ostbau, Kalabaktepe).¹⁴

Type 3. Laconian type cover tile, attested with numerous fragments from the area of the two temples, without intact specimens (fig. 3.3). There is no evidence of how the front and back end were shaped. It differs from **Type 1** mainly in the shape of the lateral edges. While the edge of Type 1 is massive and almost flat, here it is beveled on the inside. The inner and outer surfaces are well smoothed. External diameter 18 cm, internal 17 cm, height 9,5 cm. The lack of sufficient data about its construction impedes identifying good parallels. There is no positive evidence of the respective type of pan tiles. The general chronology of the type could be set in the second half of the 6th and the first quarter of the 5th century BC.

Conclusion

The available evidence allow for an almost complete reconstruction of the elements of roofs that have exact parallels in Miletos and Didyma in term of types and decoration – a testimony to the active exchange in the period and the transportation of bulky goods between metropolis and colony. The presence of various types of pan and cover tiles and of architectural terracottas indicate the use of various standards, as well as different phases within the Archaic and early Classical period. Particularly valuable is the new evidence about the frieze with warriors from the temenos of Apollonia Pontica, the recent analysis of which indicated the presence of another building/roof in the traditions of western Asia Minor, dated to about 500 BC.¹⁵ The new evidence about Archaic roof tiles and architectural terracotta from Apollonia Pontica add considerably to our knowledge about their use and distribution in the Greek colonies on the western coast of the Black Sea.

Notes

¹ Panayotova et al. 2014; Panayotova et al. 2021. The present study discusses the preliminary results of the project Archaic roof tiles and architectural terracottas from Apollonia Pontica, funded by the Scientific

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² Zimmermann 1990, 226, Fig. 2, Pl. 28b; Zimmermann 1992, Abb. 2–3.

³ Busching 2013, 36 Taf. 28. 32–35. 37.

⁴ Schneider 1996, 57–70 Taf. 34, Abb. 35–47.

⁵ Panayotova et al. 2014, fig. 2.4–5; Panayotova et al. 2021, 607.

⁶ Åkerström 1966, Abb. 12.

⁷ Ohnesorg 2009, Abb. 16.

⁸ Zimmermann 1990, 227 Fig. 3, Pl. 29 a (b–c); Zimmermann 1992, Abb. 4.

⁹ Stoyanova et al. 2019, 167, fig. 7, 9.

¹⁰ Zimmermann 2007, 635 Taf. 82.1–2.

¹¹ Schneider 1996, 70–91.

¹² Schneider 1996, 70–91 Abb. 48–66; Zimmermann 2007, Taf. 82.1–2.

¹³ See Panayotova et al. 2021, 607–610.

¹⁴ Busching 2013, 11–27, Taf. 4–5, 8, 9.1, 18.

¹⁵ Panayotova et al. 2021.

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See endnote 1, about the authors of the figures.

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