

STYLISTIC ANALYSIS OF THE ARCHITECTURAL ORNAMENTATION OF THE STOAS OF THE ASKLEPIEION AT ANCIENT MESSENE

古代都市メッセネのアスクレピオス神域のストアにおける建築装飾の様式分析

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The Hellenistic sanctuary of the Asklepios at Messene has a square courtyard surrounded by the Stoas from its four sides. It has been considered by that the Asklepieion was built between the end of the 3rd century and the 2nd century B.C. Nevertheless, the recent studies of the buildings of the Asklepieion assigned that the construction of the sanctuary is dated as the first half of the 2nd century B.C. The stylistic analysis of the architectural ornamentation demonstrates that the Stoas are dated to the first half of the 2nd century B.C., which agrees with the recent dating of the other buildings of the Asklepieion and archaeological findings. It is also confirmed that the ornamentations of the Stoas belong to the traditional architecture from the early Hellenistic period back to the middle of the 4th century to the 3rd century B.C. The Corinthian Stoa was influenced by the trend of the founder, who is believed to be a king of Macedonia.

Keywords : *Hellenistic architecture, stoa, architectural ornamentation, construction date*

ヘレニズム建築, ストア, 建築装飾, 建設年代

1. Introduction

The Asklepieion of the Messene (Fig. 1) was excavated by A. Orlandos from 1956 to 1974¹⁾ and the architectural remains have been surveyed by several scholars in recent years. Prof. A. K. Orlandos first excavated the Temple of Asklepios, and Prof. P. Themelis conducted further investigations and published findings in four parts. Birtachas has been performing research and restoration for many years on the East Propylon and Ekklesiasterion, and his findings have been published.²⁾ With respect to the Artemision and other rooms along the west side, the restoration of the superstructure and the description of the remains and inner architecture have already been published by Chlepa.³⁾ Sioumpara also has published the findings and detailed analysis on the temple of Asklepios.⁴⁾ The present study by the Japanese survey team concentrated on the stoas surrounding the Temple, as commissioned by Prof. P. Themelis. The author, as a member of the Architectural Mission of Kumamoto University to Messene (leader; Prof. J. Ito) participated in the architectural survey of these Stoas of the Asklepieion from 2000 to 2004, and made their restoration (Fig. 2).⁵⁾

The principle of the Messenian Stoas can be summarized as follows: The Messenian Stoa has two aisled colonnades (so-called double-stoa) and each outer and inner colonnades have different in their size and ornamentation. The outer column has an Attic-type base standing on a square plinth and supporting a smaller column and a Corinthian capital. A beam is consisting of an architrave-frieze and a backer block, both of which are supporting upper structure. Sima and antefix are crowned above cornice. Plinth, sima and antefix are made of lime stone; the other parts are made of poros instead. The inner column also has an Attic-type base standing a cylinder plinth instead and supporting a bigger column and a Corinthian capital. The upper structure was made of wood.

There have been no inscriptions discovered that relate directly to the construction dating of the Asklepieion, so it is necessary to discuss the dating from its architectural character and other archaeological evidence, including the historical background. The archaeological evidence from the excavation informs us that the entire Asklepieion was built at the same time. An previous sanctuary was discovered from the south part of the Temple of the Asklepios, which consists of three phases from Archaic to Hellenistic period.⁶⁾ Themelis believed that the final phase of this sanctuary was between the end of the 4th century and the end of the 3rd century B.C. from the dating of the twenty-nine coins found in the sanctuary. Thus, it is considered that the new sanctuary, that is, the Asklepieion, was built soon after the former sanctuary from these findings. This means that the Asklepieion was built soon after the last phase of the former sanctuary, perhaps at around the end of the 3rd century B.C. Nevertheless, the recent research of the Asklepieion made it clear that the sanctuary is dated to around the first half of the 2nd century B.C.

The small stock rooms behind the fountain of the Asklepieion and at the south side of the Stoa of the early Imperial period⁷⁾ are dated to the middle of the 2nd century B.C. from the pottery and coins found within them.⁸⁾ Judging from the connections of the walls, this room was built after the Asklepieion. Thus, from this evidence, we can say the construction of the Asklepieion is between the end of the 3rd century and the middle of the 2nd century B.C. The coins from the Temple of Artemis Orthia, which is located in the northwest of the Asklepieion (Fig. 1, left), are believed to belong to the last phase of this sanctuary, which was the middle of the 2nd century B.C. It is widely known that the function of the Artemision was taken over from the Temple of Artemis Orthia.⁹⁾

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According to Bradani and Matthaïou, two inscriptions at a round bath just south of the Temple of Artemis Orthia (Inscription no. 3625) and from south side of the Temple of Asklepios (Inscription no. 1045) tell us that there was a family who worked on the cult in both sanctuaries.¹⁰ This can be interpreted to mean that the sanctuaries of both the Artemis Orthia and the Asklepieion were in use around the middle of the 2nd century B.C. at the same time.¹¹ Thus, the last phase of the Temple of Artemis Orthia might be adaptable as the chronology of the Asklepieion.¹² Adding to these archaeological evidences, the sculpture of Damophon is another important factor for the dating. More than a hundred statue bases were found in the courtyard, and it is considered that most of them supported statues of Damophon. Thus, the sculpture program was probably linked to the planning of the Asklepieion, as Pausanias reports a great number of sculptures of Damophon (Pausanias IV, 31, 10).¹³ The dating of the sculptures of Damophon has a long history of debate. According to recent studies, they are dated to the first quarter of the 2nd century B.C.¹⁴ All these evidences lead to the consensus that the Asklepieion dates to around the first half of the 2nd century B.C.

Since it is certain that the entire sanctuary was built at the same time, this new construction date is adaptable to the date of the Stoa's construction. Nevertheless, it is necessary to verify that the new dating is adaptable to the Stoa's. The present paper focuses on the aspect of the stylistic analysis of the architectural ornamentation of the Stoa's and examining the new dating of the construction. In addition, in order to understand the Stoa's of the Asklepieion on the historical context of Hellenistic architecture, the trend of the architectural ornamentation in mainland Greece in Hellenistic period will be discussed.

2. Architectural ornamentation

2-1) Raised panel of the plinth and the stylobate

A slightly raised panel with margins all round embellishes each face of the outer plinth block and the upper surface of the stylobate between the columns (Fig. 3). The margins measure ca. 3 cm in width and ca. 2 cm in depth.¹⁵ In contrast, there is no ornamentation on the inner plinth. There has long been discussion as to whether the raised panels are protective or ornamental. As Roux and Cooper claim, it might be reasonable to say that the raised panel is used to create a shadow in order to accent the joint, rather than to protect the surface.¹⁶ The shadow produced by the raised panel helps to strengthen the articulation of the step.¹⁷

The crepidoma with raised panel found together with a sunken rebate is usually characteristic of Peloponnesus stoa's of the middle and late 4th century B.C.¹⁸ Examples include the crepidoma of the Thersilion at Megaropolis (360-350 B.C.),¹⁹ the South Stoa at Corinth (ca. 338-330 B.C.),²⁰ the Philippeion at Olympia (338-330 B.C.),²¹ the Echo Stoa (the first construction phase A; the second half of the 4th century B.C.; pottery from below floor),²² and the South Stoa (the middle of the 4th century; pottery from below floor).²³ The ornamentation of the plinth was also popular in the late Hellenistic period, as at the plinth of the east façade of the Temple of Apollo at Didyma (ca. the 2nd century B.C.). Raised panels on the upper surface of the crepidoma can be observed not only at the Stoa's but also at the entrances of the North Propylon, the East Propylon and the Bouleuterion from the Asklepieion at Messene. This fact leads to the hypothesis that the stoa's and surrounding buildings were constructed at the same time. Two stoa's from Olympia show good examples of raised panels on the upper surface of the crepidoma; both the Echo Stoa (the first construction phase A; second half of the 4th century B.C.; pottery from below floor),²⁴ and the South Stoa (middle of the 4th century; pottery from below floor) have a raised panel and three-step rebate.²⁵ In summary, the decorative risers confirm that the Stoa's belong to the full tradition of Hellenistic architecture.

2-2) Plinth

In the Stoa's of the Asklepieion at Messene, there are square plinth blocks in the outer colonnade (Fig. 3) but cylindrical plinth blocks in the inner colonnade

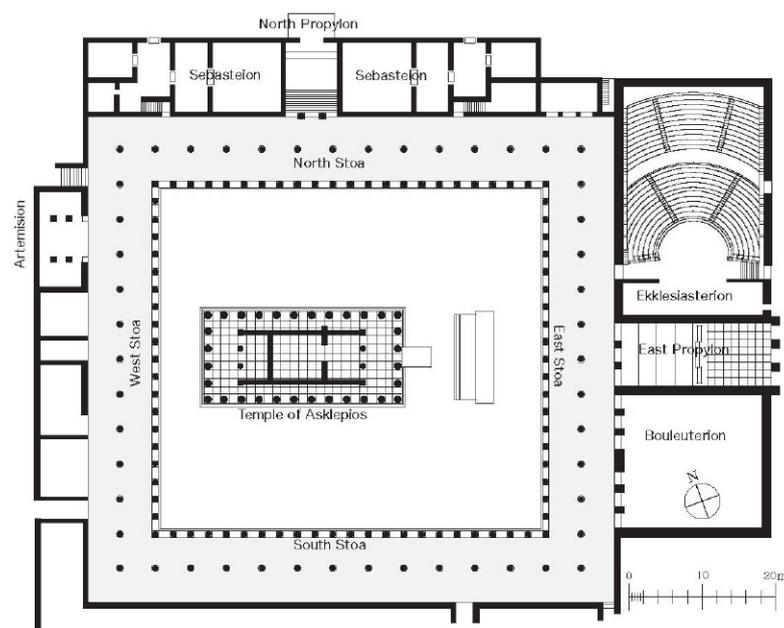


Fig. 1 Reconstructed plan of the Asklepieion

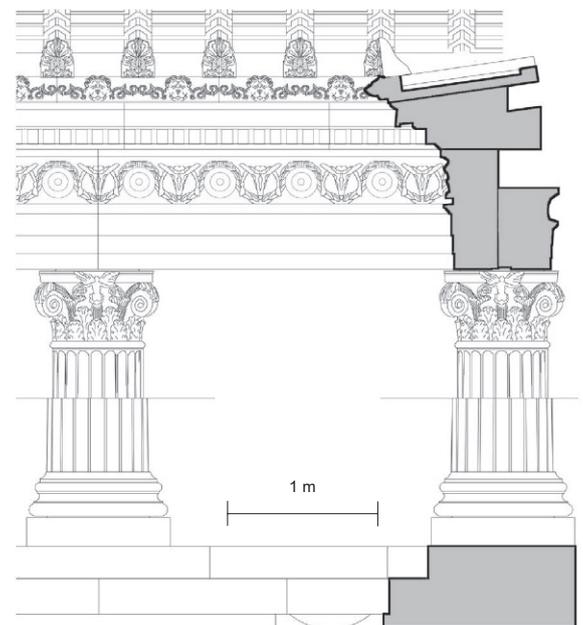


Fig. 2 Restored order of the outer colonnade

(Fig. 4).²⁶⁾ Coulton reasonably considered that the plinth was initially regarded as an alternative to the lower torus, but the two were combined by Hermogenes and many other later architects.²⁷⁾ The plinth combined with the upper moulding began to appear soon after Hermogenes,²⁸⁾ who was mentioned by Vitruvius (Vitruvius III 2, 6) as the architect of the Temple of Artemis at Magnesia on the Maeander. The Temple of the Artemis was probably built around 220-190 B.C. from the stylistic point of view.²⁹⁾ The square plinth was commonly used in Ionic buildings in the 2nd century B.C.; the Temple of Apollo at Didyma, and other temples in Asia Minor.³⁰⁾ In contrast, there are not so many examples of cylindrical plinths in Ionic buildings.

The plinth was also commonly used in Corinthian buildings in the late Hellenistic period, for instance, in the Corinthian column of the Lesser Propylon at Eleusis (54 B.C., inscription),³¹⁾ and popularly used in imperial Roman buildings. Nevertheless, at the inner Corinthian colonnade of the South Stoa at Olympia (mid-4th century B.C., pottery from below floor),³²⁾ the columns stand on the stylobate directly instead of using a plinth.³³⁾ This fact means that the choice of plinth depended on the preferences of the architect or founder in the early Hellenistic period before Hermogenes. In general, therefore, the plinth of Messene shows the character of the 2nd century B.C.

2-3) Attic-type base

The Attic-type bases of the outer and inner colonnades and of the front columns and antae of the North and East Propylon are in the traditional form which consists of a torus, a scotia and a torus (Figs. 4, 5).³⁴⁾ In the early Hellenistic buildings in Peloponnesus, the so-called 'Peloponnesus type' cavetto and torus moulding was common, like at the inner base of the Temple of Zeus at Nemea.³⁵⁾ Nevertheless, when the torus, scotia and torus moulding was adopted to the Ionic column of the north and east porch of the Erechtheion at the Athenian Acropolis,³⁶⁾ the new 'Attic-type base' had been accepted in Peloponnesus by the early 3rd century B.C., and in Asia Minor by the early 2nd century B.C.³⁷⁾ The profile of the Messenian base clearly shows the character of the early 2nd century B.C. base, the scotia of which is not as deep as the scotia of the base of the Temple of Artemis at Magnesia on the Maeander.³⁸⁾ From a stylistic point of view, therefore, the Messenian base is datable to the beginning of the 2nd century B.C.

2-4) Column flutes

The number of flutes of the Messenian columns is twenty, unlike the normal Ionic column of twenty-four (Fig. 4).³⁹⁾ There was no general rule for the number of flutes in Hellenistic Corinthian columns. There are twenty flutes in the inner columns of the South Stoa at Olympia and twenty-four flutes in the inner half-columns of the Tholos at Epidauros.⁴⁰⁾ In the case of the Tholos of Epidauros, eight acanthus leaves of the Corinthian capital are arranged above the twenty-four flutes of the column so that the axis of the leaf is aligned with the axis of the column flute. Conversely, in the case of the South Stoa at Olympia and the Stoa of the Asklepieion at Messene, the eight acanthus leaves of the Corinthian capital are arranged above the twenty flutes of the column, so that the axis of the leaf is not aligned with the axis of the column flute. This probably means that the columns and capitals of the Corinthian order in Messene and Olympia were not planned as a continuous design process, but treated as separated architectural parts.⁴¹⁾

2-5) Reeded fluting

The fluting of the Messenian column has normal convex grooves, but also has concave grooves (so-called reeded flutes) in the lower part of the column (Fig. 4).⁴²⁾ The reeded flute was used not only in the Stoa, but also in the Artemision, the Bouleuterion and the Archive.⁴³⁾ The origin of the reeded flute is most likely from the polygonal Doric column, which might have had the same function as the reeded flute, because the polygonal flutes can be seen in the lower part of the column of the stoa.⁴⁴⁾ Coulton properly argued that the purpose of the polygonal treatment is to protect the fragile sharp edges of the Doric arrises from traffic passing through the colonnade. This hypothesis is supported by the fact that most polygonal columns are finished up to the height of a person.⁴⁵⁾ This explanation might be adaptable for our reeded flutes, even though the edges of Ionic flutings are not as sharp as Doric fluting (Fig. 4). Since Ionic flutes do not have sharp edges like the arrises of Doric flutes, they are carved not in a polygonal but in a reeded form.

The outer column has reeded fluting only on the courtyard side; that is, half of the column is finished as normal fluting but the other half is finished as reeded fluting. This kind of treatment can be observed in the Palestra at Olympia (the 2nd century B.C.),⁴⁶⁾ for instance, where a quarter of the corner column of



Fig. 3 Outer plinth and crepidoma (northeast corner)



Fig. 4 Column base with inner plinth (No. B09)

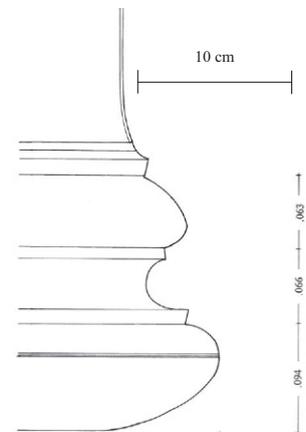


Fig. 5 Moulding profile of the anta base of the North Propylon

the outer colonnade is fluted, which faces the courtyard, but the other three quarters of the column are unfluted. Since the flute originally aims to make a sharp shadow by its arrises, its aesthetic effect was probably favored until the late Hellenistic period. In fact, the columns standing in front of the inner rooms of the Palaestra at Olympia, which were always in the shade, have polygonal fluting all around.

There are many examples of reeded fluting in the Hellenistic period: the Stoa of Attalos at Delphi (middle of the 3rd century B.C.), the South Stoa at Delos (middle of the 3rd century B.C.), and the Stoa of Philip at Megalopolis (ca. 340-330, upper structure was reconstructed in unknown period).⁴⁷⁾ There is also an example of unfluted columns at the entrance of Ephebeion at Priene. (ca. 130 B.C., inscription from neighboring building.⁴⁸⁾ These facts support our hypothesis that the reeded flute aimed to protect arrises from traffic, and dates to between the second half of the 3rd century B.C. and the first half of the 2nd century B.C.

2-6) Corinthian capital

There are two types of Corinthian capitals in the Stoas of Messene; a small capital with twelve acanthus leaves in a tie and a big capital with eight acanthus leaves (Fig. 6).⁴⁹⁾ Most early examples of Hellenistic Corinthian capitals have more than eight acanthus leaves. For example, the Corinthian capital of the Temple of Apollo Bassitas at Bassae (ca. 430-400 B.C.) has sixteen leaves in a tie, the capital of the inner pilaster of the Tholos at Delphi (ca. 390 B.C.) has fourteen leaves in a tie, and the capital of the pilaster of the Monument of Lysicrates at Athens (335/334 B.C.) also has fourteen leaves in a tie.⁵⁰⁾ There are capitals with more than eight leaves in the 4th century B.C., but not in the 3rd century B.C. Therefore, it could be said that the small Corinthian capital with twelve leaves from Messene is an exception among Hellenistic Corinthian capitals.

From another point of view, the small Corinthian capital from Messene belongs to the tradition of mainland Greece, a stump-like shape called 'Tegean type' by Toma.⁵¹⁾ In the case of the small capital from Messene, the ratio of the bottom diameter to the height of the kalathos is 1:0.722 (No. C25).⁵²⁾ This ratio is close to that of examples from the 4th century B.C.: the capital of the Temple of Apollon at Bassae (1:0.850), the capital of the Temple of Athena Alea at Tegea (1:0.894), the capital of the Temple of Zeus at Nemea (1:0.758), and the capital of the Rotunda of Arsinoe at Samothrace (1:0.923).⁵³⁾

The Messenian Corinthian capital has been considered to date back to between 200 B.C. and 50 B.C.⁵⁴⁾ Heilmeyer correctly categorizes the Corinthian capital of the Stoas not as a Roman capital, but as a late Hellenistic capital. Heilmeyer considered this capital to date to the first half of the 1st century B.C., because the Asklepieion was dated to the 2nd century B.C.⁵⁵⁾ The Hellenistic Corinthian capital was developed over a long period of time, and this fact makes the chronology by stylistic analysis difficult. Bauer points out that the capital of the inner pilaster of the Rotunda of Arsinoe at Samothrace (ca. 275 B.C., inscription)⁵⁶⁾ is probably the first example of what we can call a 'normal' Corinthian capital.⁵⁷⁾ The capital has a bell-shaped kalathos with two ties of acanthus leaves, which consist of eight leaves each. Striped caulises rise up between acanthus leaves of the second tie and outer and inner tendrils sprout from the top of caulis. There is a thin square abacus on the top. The point is, however, that there is no two-leafed calyx on the top of the caulis. The completely 'normal' Corinthian capital, therefore, emerged in the beginning of the late Hellenistic period; that is, the end of the 3rd century B.C. or the beginning of the 2nd century B.C.

The capital of Hermopolis Magna in Egypt (Fig. 7) might be the first Corinthian capital from the late Hellenistic period which is close to the Messenian capital.⁵⁸⁾ This capital has all the essential elements of a 'normal' Corinthian capital.⁵⁹⁾ It has two ties of acanthus leaves, which consist of eight leaves in each tie. Striped caulises rise up between the second acanthus leaves, and outer and inner volutes sprout from the top of the two-leafed caulis. The vegetable decoration of the upper kalathos is also the same in character to that of the Messenian capital. The acanthus leaf of the Hermopolis Magna is somewhat flatter than the one of Messene; therefore, the Hermopolis Magna capital might be older than the Messenian capital.⁶⁰⁾ The capital of the Hermopolis Magna is estimated at 240-230 B.C. from the dating of the sculpture. The capital of the Circular Temple B in the Largo Argentina at Rome (Fig. 8) might be the most similar to the capital of Messene.⁶¹⁾ Although the upper part of the capital is missing, it is possible to analyze the style of its acanthus leaves, which have round serrations and round holes around them. These characteristics of the acanthus leaves are quite similar to those of the Messenian capital; especially, the swelling around the holes looks almost exactly the same. Comparatively, the serration at the Messenian capital is not as sharp as that at Largo Argentina, indicating that the Messenian capital may be older than the Largo Argentina capital. The Circular Temple B is considered as the 1st century B.C., probably



Fig. 6 Messene, Corinthian capital with winged figure, big type (No. C24)



Fig. 7 Hermopolis Magna, Corinthian capital (240-230 B.C.)



Fig. 8 Largo Argentina, Corinthian capital from the Circular Temple B (probably 82-79 B.C.)

the time of Sulla (82-79 B.C.).⁶²⁾ Two capitals from Asia Minor have round serrations and round holes which are typical of late Hellenistic capitals: Milas (in front of the school)⁶³⁾ and the capital from the Museum at Pergamon.⁶⁴⁾ Both of these capitals are considered to date to the first half of the 1st century B.C. This ornamentation style from the 1st century B.C. is quite different from that of the Messenian capital. In summing up, judging from the ornamentation, the Messenian capital seems to belong to the 2nd century B.C.⁶⁵⁾

2-7) Figured capitals - Eros or Nike

There is either a figure or a vegetable decoration in the middle of Corinthian capitals (Fig. 6). The winged figural motif of the Messenian capital is considered to be Eros or Nike.⁶⁶⁾ The placement of a small ornamental object in the middle of the Corinthian capital can be seen in some examples from the 4th century B.C. in Greece: the capital of the Temple of Apollo at Bassae, the capital of the Temple of Zeus at Nemea, the capital of the Temple of Athena Alea at Tegea, and the capital of the Rotunda of Arsinoe at Samothrace, all of which have a central leaf in the middle. This axial ornamentation has a long tradition throughout the Hellenistic Corinthian capital.⁶⁷⁾ Although there are not so many precursors of figured capitals in Greek architecture, they were common in ancient antiquity in general. The figured capital had already existed in Egypt.⁶⁸⁾ A winged figured capital was favored in Hellenism, especially in Asia Minor.⁶⁹⁾

The motifs of acanthus figure or winged semi human + semi vegetable figure can be observed in Asia Minor in the Hellenistic period. There are acanthus figures on four anta capitals from the northeast and southeast corners of the pronaos of the Temple of Apollo at Didyma,⁷⁰⁾ where a winged female with acanthus leaves shows the same concept as the Messenian figure. The anta capitals of Didyma are dated to the second half of the 2nd century B.C., especially the northeast corner capital is considered as the earliest one because the form of the acanthus compares closely with an anta capital from the Propylon of the Bouleuterion at Miletos, dated by epigraphic evidence to 175-163 B.C.⁷¹⁾ In addition, the frieze of the Temple of Artemis at Magnesia on the Maeander also has an acanthus figure. This frieze block was used as the beam running between the two antae at the entrances to the pronaos and opisthodomos. The akroterion of the same Temple has an acanthus figure. No evidence of the construction date has been discovered, but it is probably built in the first half of the 2nd century B.C.⁷²⁾

The use of Eros on the motif of the capital probably began in the late Hellenistic period in Pergamon.⁷³⁾ There is a figure of Eros on the anta capital from the Temple of Hermes and Herakles on the Middle Gymnasium terrace,⁷⁴⁾ where Eros stands on acanthus leaves and tendrils. The Temple of Hermes and Herakles is believed to have been constructed in the time of Eumenes II (197-159 B.C.) and its upper structure was rebuilt in the 1st century B.C. from a stylistic point of view. Therefore, the Eros anta capitals might also belong to the 1st century B.C., which is later than the Messenian capital. In summing up, the motif of the winged semi human/semi vegetable figure is commonly seen in the 2nd century B.C.; therefore, the figural capital of Messene might be dated to the 2nd century B.C.

2-8) Frieze ornamentation – bucrania and phialai

The frieze of the Messenian stoa is ornamented with alternative bucrania⁷⁵⁾ and phialai⁷⁶⁾, festooned by a continuous garland (Fig. 9).⁷⁷⁾ Bucrania, or bull's heads, are one of the most favored ornamental motifs in Hellenistic architecture, and can be seen from the 3rd century to 2nd century B.C., especially in Pergamon⁷⁸⁾ and Delos.⁷⁹⁾ Phialai are ceramic or metallic vessels, forming a wide round shallow bowl sometimes with a small hole in the middle, principally used for making libations.⁸⁰⁾ According to Webb, bucrania and phialai are usually used on continuous horizontal architectural parts, but not on high places like pediments or roof tiles.⁸¹⁾ Bucrania often alternate with other objects and the combination of bucranium with a round motif such as phiale or rosette was common from the 3rd century B.C.⁸²⁾

Bucranium-phiale friezes began to be used as inner architectural ornaments in the 4th century B.C. and as outer ornaments in the 3rd century B.C. This can be said of the Corinthian capital as well.⁸³⁾ The first example of a bucranium-rosette frieze is the inner frieze of the North Propylon at Epidauros. The North Propylon is dated to the end of the 4th century B.C. from the similarity to the sima of Tholos.⁸⁴⁾ Bucranium-phiale friezes from the 3rd century B.C. are found in two buildings of Samothrace.⁸⁵⁾ The external decorative panel of the Propylon of Ptolemy II has a garlanded alternating ornamentation of bucrania and rosettes, which are carved with such high quality that the bucrania skulls seem to be covered with translucent skin (Fig. 10). This high-quality technique of the early-Hellenistic period is obviously older than the conventional technique of the Messenian frieze. The Propylon of Ptolemy II is dated to ca. 285-280 B.C. from the inscription of the outer architrave, which mentions Ptolemy II,



Fig. 9 Messene, architrave-frieze with bucrania and phialai connected by festoon (No. E16)

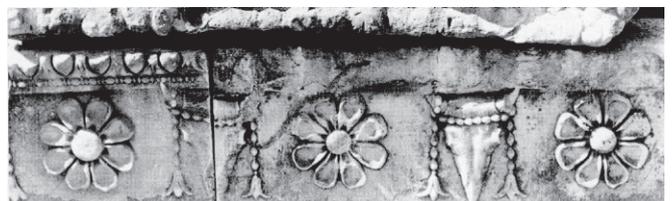


Fig. 10 Samothrace, Bucrania-rosette frieze Type A from the entablature of the Propylon of Ptolemy II

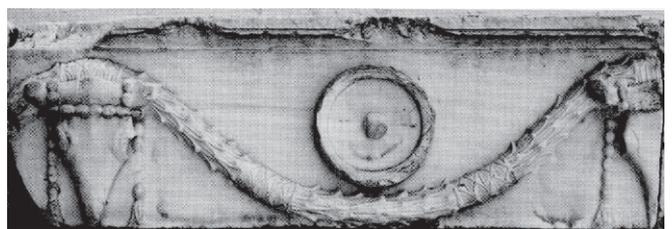


Fig. 11 Pergamon, Bucrania-phialai frieze from the entablature of the Temple of Demeter

who was the ruler of Samothrace.⁸⁶ There are also two bucrania in the outer and inner frieze panels of the Rotunda of Arsinoe at Samothrace.⁸⁷ Here again, the characteristics of the bucrania are quite different from the Messenian bucrania. The Rotunda of Arsinoe is dated to ca. 300-270 B.C. from the inscriptions which mention that the building was dedicated to the God of Arsinoe.⁸⁸

The motif of alternating bucrania and phialai festooned by a garland also exists in Asia Minor. The frieze of the Temple of Demeter at Pergamon is decorated with alternating bucrania and phialai, and a garland connects them across a rather wide distance (Fig. 11).⁸⁹ In contrast, the distance between the bucrania and phiale of the Messenian frieze is surprisingly small and makes a crowded impression. This is probably because of the strong desire of Messenian investors and architects to decorate the frieze with a hundred bucrania from end to end of the Stoa.⁹⁰ The temple of Demeter is dated to 269-263 B.C.⁹¹ The necking of three columns of the Temple of Apollo at Chryse is sculptured with garlanded bucrania and phialai separated by short distances and connected by a thick festoon.⁹² The motif on the frieze from Chryse is as same as that at Messene, except that the festoon begins from the horn as normal, whereas the Messenian phialai are under the swags of the garlands (Fig. 9). The Temple of Apollo at Chryse is estimated to the middle of the 2nd century B.C. by its recent excavators.⁹³ In addition, the same frieze pattern is observed in the Ephebeion of the Lower Gymnasium at Priene.⁹⁴ Its long continuous frieze is sculptured with alternating bucrania and a phiale, festooned across long distances by a waved garland. The ornament motif of Ephebeion is the same as that at Messene; however, the pattern of architectural ornamentation is not the same as that of Messene; particularly, the dentil placed over the frieze does not exist in the Messenian frieze. The Ephebeion is dated to around 130 B.C. based on inscriptions from the lower gymnasium and stadium.⁹⁵

The frieze ornamentation of bucrania, phialai and festoon had a long tradition in Asia Minor and the Aegean islands since the 3rd century B.C. From the stylistic point of view, then, the Messenian frieze is dated to the first half of the 2nd century B.C. However, this kind of frieze ornamentation became less common in the 1st century B.C.

2-9) Soffit panels

The architrave and backer blocks in the Messenian Stoa had panels recessed along their longitudinal axes (Fig. 12). Wegner analyzed the soffit panels of Asia Minor from the late Hellenistic to early Imperial Roman eras, and proposed that the architraves from the Temple of Athena Polias at Priene and those from the Artemision at Ephesos (the later building) were the first soffit panels.⁹⁶ Additionally, Frazer proposed that the ratio of the width of architrave bottom to the soffit panel was about 1/4 in the beginning, but became much thinner (about 1/5) through the Hellenistic period.⁹⁷ Frazer’s proposal seems reasonable, even Vitruvius did not comment on it. In fact, in the case of Messene, the bottom width of the architrave is av. 579 mm, and the width of the soffit panel is av. 117 mm, so the ratio of the Messenian soffit panel to architrave bottom width is calculated as 1:0.202 = about 1/5. This ratio is close to the examples from the 2nd century B.C. and thinner than the soffit panels of the Temple of Artemis at Magnesia on the Maeander (1:0.21) and of the Propylon of Ptolemy II at Samothrace (1:0.205).⁹⁸ From the stylistic character of the soffit panel, therefore, the architrave-frieze of Messene is older than the 3rd century B.C.; that is, it can be dated to the 2nd century B.C.

2-10) Sima and antefix

Only two sima blocks from the Stoa have been discovered, although 119 sima blocks from the Temple of Asklepios have been found.⁹⁹ Both of them are created in the same design in different sizes, and made of limestone.¹⁰⁰ The sima blocks consist of a decorative front face with a lion’s head waterspout and continuous vegetable ornament and they include the first step of the roof tile in back (Fig. 13).¹⁰¹ The profile has a taenia at the bottom, a flat decorative concaved part in the middle, and an Ionic cyma at the top. This profile pattern began from the 4th century B.C, for example as at the sima from Thersilion at Megalopolis.¹⁰²

The lion’s head waterspout of Messene has a wide skull with a flat nose and swelling eyebrows. Particularly, round eyes characterize the lion’s head, which is a common feature from the 4th century to the 3rd century B.C. in Greece.¹⁰³ The lion’s head of the sima at the Propylon of Ptolemy II at Samothrace is a similar example.¹⁰⁴ According to Frazer, the lion’s head at Samothrace was made under the influence of the lion’s head waterspout of the Temple of Zeus at Nemea and of the Temple of Asklepios at Epidauros.¹⁰⁵ In addition, the wide nose and mouth found at the Messenian sima can be observed not only at the North Propylon in Samothrace but also at other simas from mainland Greece of the 2nd century B.C.¹⁰⁶ Therefore, the lion’s head of Messene is considered to

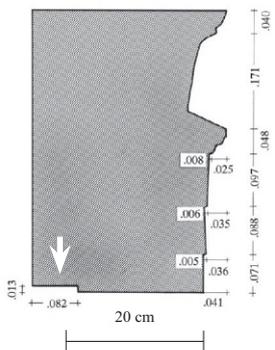


Fig. 12 Soffit panel from the bottom of the backer (No. A01)



Fig. 13 Sima with lion’s head waterspout and vegetable ornament (No. S02)



Fig. 14 Antefix with acanthus leaf base with double palmettos (No. AF02)

be well in line with the tradition in Hellenistic mainland Greece.

The vegetable ornament between the lions' heads has a symmetrical pattern (Fig. 13). A set of vegetable ornamentation has the same width as one of the roof tiles.¹⁰⁷⁾ A striped caulis rises from the two-leafed caulis beside the lion's head and reaches to the two-leafed calyx in the middle. The acanthus leaves have low venations and sharp serrations. Their formalized patterns make an unnatural impression. A striped caulis grows upwards from this calyx and a grooved tendril also grows upwards and then bends down. The upper striped caulis reaches the second two-leafed calyx. The last canalized tendril grows up from the second calyx, and ends in eddies. The canalized tendril has a flat section, which was common from the middle of the 3rd century B.C.¹⁰⁸⁾ Additionally, the ornamental pattern of the Messenian sima is similar to many examples from the early Hellenistic period, between the 4th century and the 3rd century B.C. The basic ornamental pattern from the Messenian simas can be observed at the marble sima from the North Propylon at Epidauros, as well as at the terracotta simas from Corinth, the sima block of the Temple of Apollo at Delphi, the sima block of the Propylon of Ptolemy II at Samothrace and an unattributed sima from Olympia.¹⁰⁹⁾ This fact means that the ornamentation of the Messenian sima is under the influence of a long Hellenistic tradition.¹¹⁰⁾

Two antefixes were discovered from the Stoas of the Asklepieion (Fig. 14).¹¹¹⁾ The Messenian antefix has a flat and horizontal two-leafed acanthus base at the bottom with double palmettos emerging from it. The palmettos have a central core in the middle surrounded by a small palmetto with twelve serrations, and again by a big palmetto with twelve S-shaped serrations. The design of the antefix from the stoas is exactly the same as the antefix from the Temple of Asklepios.¹¹²⁾ The pattern of two-leafed acanthus base and double-leafed palmettos belongs to the old type of antefix which began from the 4th century B.C.; the terracotta antefixes from the Thersilion at Megalopolis, Dodona, Pella and from the Odeion at Athens.¹¹³⁾

From the stylistic point of view, therefore, the antefix, like the sima, shows the influence of a long architectural tradition from the early Hellenistic period, that is, from the 4th century to the 3rd century B.C. This argument agrees with the general understanding that the architectural tradition had continued until the late Hellenistic period in mainland Greece, especially in Peloponnesus.¹¹⁴⁾ This fact means that, in order to analyze the chronology of the late Hellenistic architectural ornamentation, we need to compare only with the examples from mainland Greece, because of this tendency of tradition. Sioumapra correctly related the Messenian sima to examples of the old sima type, which was used in the late-Hellenistic period: the simas from the Temple at Lykosoura, the Temple L at Epidauros and the Temple E at Corinth.¹¹⁵⁾ Therefore, it is concluded that the sima and antefix of the Stoas of the Asklepieion can be dated to the first half of the 2nd century B.C.¹¹⁶⁾

3. Conclusion

The Asklepieion and its Stoas have been considered by the present excavator to be dated between the end of the 3rd and the 2nd century B.C.; however, the new chronology based on the stylistic analysis of the architectural ornamentation of the Stoas confirmed that the Stoas were constructed between the first half of the 2nd century B.C. Especially, the Corinthian capital with figures and vegetable motifs, the frieze decoration of bucrania and phialai and the soffit panel of the architrave demonstrate the character of Hellenistic architecture in the 2nd century, not in the 3rd or the 1st century B.C. This new construction date based on the stylistic analysis of the architectural ornamentation agrees with the dating of the other buildings of the Asklepieion and the archaeological findings from the excavations. Cooper considers the construction of the Asklepieion is after 183 B.C., which is probably correct (the entry of Messene into Achaian League).¹¹⁷⁾ On the other hand, the dating of the coins from the stock room behind the Fountain to after the middle of the 2nd century B.C. contradicts the dating of the Stoas. Thus, the Stoas can be dated roughly to the first half of the 2nd century B.C., but preferably to the first quarter.

Furthermore, it was clarified that the Stoa of the Asklepieion was influenced by the tradition of the early Hellenistic architecture, which belong to the middle of the 4th and the 3rd century B.C. As we have seen in the chapter of the sima and antefix, this argument agrees with the general understanding that the old architectural tradition had been continued until the late Hellenistic period in mainland Greece, especially in Peloponnesus. The result of this result approve of the Lauter's argument that the Hellenistic architectural was influenced by the local architectural tradition in each region.¹¹⁸⁾

When the Corinthian capital was used in Hellenistic building, it aimed to portray a high status or to emphasize something special.¹¹⁹⁾ The developing importance of the Corinthian capital in the mid-Hellenistic period might be related to two buildings. The first was the monumental gateway of the Bouleuterion at Miletos connecting the entrance and the Doric colonnaded courtyard by the Corinthian order (170 B.C., inscription). The gateway was located in a public space (beside the South Agora), and the Corinthian façade was designed as a symbolic monument. The Bouleuterion was built by two architects from Miletos, who were in important position under the Seleukid king Antiochus IV Epiphanes (175-164 B.C.).¹²⁰⁾ This king undertook a new project to renovate the Temple of Olympieion, which was originally designed as a Doric temple, as a huge Corinthian temple (174 B.C. onward).¹²¹⁾ The design of these two contemporary buildings was not aimed to follow Greek architectural tradition but to show the power and authority of the Hellenistic king.¹²²⁾ It is widely known there was some relationship between Messene and Philipp V of Macedonia (Plutarch, Aratus).¹²³⁾ This fact might suggest the hypothesis that a Macedonian king donated to the construction of the Asklepieion at Messene; however, it is difficult to prove because of the lack of historical information.

List of the Figures

- | | |
|-----------------------|--|
| Figs. 1, 2, 5, 12: | Drawing by the author and Architectural Mission of Kumamoto University to Messene |
| Figs. 3, 4, 6, 9, 13: | Photos by Y. Hayashida |
| Fig. 7: | Hermopolis Magna, Corinthian capital (Bauer 1973, pl. 32-5) |
| Fig. 8: | Largo Argentina, Corinthian capital from the Circular Temple B (Heilmeyer 1970, pl. 3-1) |
| Fig. 10: | Samothrace, Bucrania-rosette frieze Type A from the entablature of the Propylon of Ptolemy II (Webb 1996, pl. 139) |

Fig. 11: Pergamon, Bucrania-phialai frieze from the entablature of the Temple of Demeter (Webb 1996, pl. 14)

Abbreviations

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Notes

- Orlandos published the excavation results as annual reports and they were also summarized in H. von U. Jantzen (ed.), "Neue Forschungen in Griechischen Heiligtümern," Tübingen, 1974.
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- Themelis 2001, p. 24; Sioumpara 2011, p. 211.
- Themelis 2003, p. 81.
- Twenty-two coins were identified as the Athenian four drachmae dated to 188/7 or 170 B.C. Sioumpara 2011, p. 211, fn. 613.
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- Müth 2007, pp. 180-183 (about 160 B.C.); Sioumpara 2011, pp. 212-215 (the first quarter of the 2nd century B.C.).
- Two-step risers can be observed in the stylobate and lower step of the Temple of Asklepios. (Sioumpara 2011, Figs. 5-7, pls. 9-10.) About the risers of the stoa crepidoma, see J. Coulton, "The Stoa at the Amphiarion, Oropos," *BSA* 63, 1968, pp. 147-183; for those of the temple, see Cooper 1996, vol. 1, pp. 172-175.
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- Broneer 1954, fig. 13.
- E. Kunze, *et al.*, *Olympische Forschungen*, vol. 1, 1944, pls. 3-5.
- Coulton 1976, pp. 48, 268; Koenigs, 1994, pls. 3-5, 7, 26-29, 31, 72.
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- A. Orlandos, *Prakt* 1959, pl. 136a; 1960, pl. 103a; 1963, pls. 94a, 95a.

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- 28) About Hermogenes: O. Bingöl, "Zu Säule und Gebälk bei Hermogenes," in: Ernst-Ludwig Schwandner (ed.): *Säule und Gebälk. Zu Struktur und Wandlungsprozeß griechisch-römischer Architektur*, Bauforschungskolloquium in Berlin vom 16.-18. Juni 1994. Diskussionen zur Archäologischen Bauforschung. Bd. 6, 1996, pp. 148-152; W. Hoepfner – E.-L. Schwandner (eds.): *Hermogenes und die hochhellenistische Architektur*, XIII. Internationalen Kongresses für Klassische Archäologie. Mainz 1990; E. Fabricius, "Hermogenes," in: *Paulys Real-Encyclopädie der classischen Altertumswissenschaft*, 15. Halbband, p. 879.
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- 32) Coulton 1976, p. 268.
- 33) Curtius 1890, pl. 60.
- 34) Shoe 1936, pp. 179-180; Shoe 1952 pp. 181-184; L. S. Meritt, "Geographical Distribution of Greek and Roman Ionic Base," *Hesperia* 38, 1969, pp. 186-204; Rumscheid 1994, pp. 297-298.
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- 37) L. S. Meritt, "Geographical Distribution of Greek and Roman Ionic Base," *Hesperia* 38, 1969, pp. 190-191; Coulton 1977, pp. 101-102, fig. 40.
- 38) C. Humann, *Magnesia am Maeander*, 1904, figs. 35, 67, 78.
- 39) R. Yoshitake, *et al.*, "A Survey of the Stoa of the Asklepieion in Messene," *Architectural Institute of Japan*, No. 576, 2004, p. 210, figs. 5-6.
- 40) Olympia, South Stoa (Curtius 1890, Figs. 60-61); Epidauros, Tholos (Roux 1961, fig. 31, pl. 48).
- 41) The Ionic column of the Artemision from the Asklepieion at Messene normally has twenty-four flutes. Chlepa 2001, fig. 43.
- 42) A. Orlandos, *Prakt* 1971, pl. 199; R. Yoshitake, *Ibid.*
- 43) Chlepa 2001, figs. 26, 34.
- 44) Coulton 1976, pp. 111-114.
- 45) Coulton 1976, p. 112.
- 46) Curtius 1890, figs. 73-75.
- 47) Coulton 1976, p. 256.
- 48) Webb 1996, pp. 100-101, fig. 75.
- 49) A. Orlandos, *Prakt* 1959, pl. 136β; 1963, pls. 96α-β; 1970, pls. 182α-β; 1971, pl. 200α; R. Yoshitake, *et al.*, "A Survey of the Stoa of the Asklepieion in Messene," *Architectural Institute of Japan*, No. 576, 2004, p. 210, fig. 8; Müth 2007, pp. 143-146, 179-180, fig. 70; Sioumpara 2011, pp. 5-6; Toma 2006.
- 50) The capitals from Tholos at Delphi and the Monument of Lysicrates are half capitals crowned on the pilaster, so that the number of leaves of the capital is calculated as twice the number of leaves from a half tie.
- 51) Toma 2006, p. 40.
- 52) At the big Corinthian capital from Messene, the ratio of bottom diameter to height of kalathos is 1:0.932 (No. C24).
- 53) The measurements are from several sources: the capital of the interior of the Temple of Apollo at Bassae (F. A. Cooper, *The Temple of Apollo Bassitas*, Vol. 4, Princeton, 1996, pl. 49), the restored capital from the interior of the Temple of Athena Alea at Tegea (B. H. Hill and C. K. Williams, *The Temple of Zeus at Nemea*, 1966, pl. 29 b), the restored capital from the interior of the Temple of Zeus at Nemea (Bauer 1973, suppl. pl. 18), the capital from the interior of the Rotunda of Arsinoe at Samothrace (Frazer 1990, pl. 118). See also Müth 2007, p. 179.
- 54) The Messenian capital has been dated to the first or second half of the 2nd century B.C., (C. Brörker, *Blattkelchkapitelle*, Berlin, 1965, p. 17), the first half of the 1st century B.C. (Heilmeyer 1970, pp. 36, 53 and 78.), the second half of the 2nd century B.C. or the 1st century B.C. (Rakob and W.-D. Heilmeyer, *Der Rundtempel am Tiber in Rom*, Mainz am Rhein, 1973, p. 20, fn. 7), the first half of the 1st century B.C. (Coulton 1976, p. 256: The stoa is dated as the 2nd century B.C.), the 2nd century B.C. (Lauter 1986, p. 268), and the beginning of the 2nd century B.C. (Themelis 1994, p.162.)
- 55) Heilmeyer 1970, p. 53.
- 56) It is certain that the Rotunda of Arsinoe at Samothrace dates to ca. 275 B.C. from the inscription. (Frazer 1990, p. 233)
- 57) Frazer 1990, p. 173; Lauter 1986, p. 268; Bauer 1977, p. 119.
- 58) Bauer 1973, pl. 32-5. The capital of Hermopolis Magna was finished with various colors; red in kalathos, grey-green in acanthus leaf and inner volute, orange in outer volute. This capital was probably reused for an architectural block of the early church in the time of Ptolemaios III Euergetes (246-221 B.C.). A. J. B. Wace, A. H. S. Megaw and T. C. Skeat, *Hermopolis Magna, Ashmunein - the Ptolemaic sanctuary and the basilica*, Alexandria, 1959, p. 8, pls. 1, 15-2, 16-1.
- 59) According to Bauer, the capital of the Rotunda at Samothrace is the almost complete form of the "Normal" Corinthian capital, and this normal type was predominantly used in mainland Greece and in Asia Minor in the 2nd century B.C. Bauer 1973, p. 119; Frazer 1990, p. 172.
- 60) Toma also considered the capital from Hermopolis Magna to be the closest example to the Messenian capital. Toma 2006, p. 49.
- 61) Heilmeyer 1970, pp. 36, 78, pls. 3-1, 60-1.
- 62) Heilmeyer 1970, pp. 37, 78. The evidence for the dating is not clear. It is commonly known that the capital of the Tholos by the Tiber at Rome was constructed as a Greek/Hellenistic capital by Greek masons (probably from Attica) in the middle of 2nd century B.C. and partly replaced with a Roman=Hellenistic capital by Roman masons in the beginning of the 1st century A.D. The capital from the Circular Temple B at Largo Argentina is considered to belong to the same group of the capital from the Tholos by the Tiber at Rome, which was repaired in the early 1st century A.D. (M. W. Jones, *Principles of Roman Architecture*, Rome, 2000, p. 141). Nevertheless, the two capitals have different characteristics and are made from different materials.
- 63) Heilmeyer 1970, p. 78, pl. 20-1.
- 64) Heilmeyer 1970, p. 78, pl. 20-2.
- 65) A Corinthian capital was discovered from the Grave Monument III (K-III) I in the west side of the Stadion-complex and from the Temple of Artemis-Limnatis of Mt. Ithomi at Messene. From a stylistic point of view, the capital might be dated to the first half of the 1st century B.C. The Grave Monument III (KIII) is dated to between 215 and 190 B.C. from coins discovered at the north side of the grave. (P. G. Themelis, *Prakt* 1998, pp. 123-124; 1999, pp. 97, 108; 2000, p. 98, pls. 6-7, figs. 59γ-62α). Toma agreed with this dating based on stylistic analysis of the Corinthian capital (Toma 2006, pp. 41-42). The architectural study of this monument will be published by Prof. Dr. J. Ito and Dr. A. Takeda in the near future. About the Temple of Artemis Limnatis, see Toma 2006, p. 41.
- 66) A. K. Orlandos, *Prakt* 1970, pls. 182-α, β.
- 67) Lauter pointed out that the Messenian capital follows a long tradition of vegetable Corinthian capitals in Hellenistic Peloponnesus. (Lauter 1986, p. 268, pls. 36 a, b.)
- 68) G. Roux, "Le Val des Muses et les Musées Chez Les Auteurs Anciens," *BCH* 78, 1954, pp. 27-36. Nevertheless, only four examples of Eros and three of Nike from Egyptian tiles in the Roman era are known. (Von Mercklin 1962, pp. 55-56, 252-255, pls. 248, 251) For Nike, (Von Mercklin 1962, pp. 55-56, pls. 255, 258, 260). For Eros, (Von Mercklin 1962, pp. 56-57, pls. 148-151).
- 69) Webb mentioned that the popularity of Eros in Hellenism was probably influenced by the new comedy of that time (Webb 1996, p. 39).
- 70) Webb 1996, pl. 78; Wiegand 1941, p. 70, pls. 219.
- 71) Webb 1996, p. 104; W. Voigtländer, "Der jüngste Apollontempel von Didyma," *IstMitt* 14, 1975, pp. 106-107.
- 72) Webb 1996, pp. 89-90, 155-156.
- 73) It is also reported there was a figure of Nike or Eros near the altar of Poseidon and Amphirite at Tinos, which is dated to around 100 B.C. (Webb 1996, p. 39)
- 74) Webb 1996, p. 67.
- 75) A bucranium (pl. bucrania in Latin; βουκράνιον in Greek) are the ox-bull skulls, which were the most valuable sacrifice to God in ancient Greece.
- 76) A Phiale (pl. phialai in Latin; ἡ φιάλη in Greek) is a kind of ancient Greek ceramic or metallic vessel.
- 77) Architrave-frieze blocks; A. Orlandos, *Prakt* 1970, pls. 182γ-183; 1971, pls. 194α-β; 195α-β; Backer; A. Orlandos, *Prakt* 1971, pl. 197δ; 1972, pls. 111α-γ; R. Yoshitake, *et al.*, "A Survey of the Stoa of the Asklepieion in Messene," *Architectural Institute of Japan*, No. 576, 2004, p. 210, fig. 7; Müth 2007, fig. 67.

- 78) Several fragments of a marble bucranium-garland frieze had been discovered at the Asklepieion at Pergamon. The excavators believe that these marble fragments belong to the Ionic temple and dated them as 280-270 B.C. by comparison to the frieze from the Temple of Demeter (Webb 1996, p. 37).
- 79) A lot of architectural ornamentation of bull's head and bucranium was discovered at Delos. It is interesting that Webb pointed out that the popularity of bucrania in Delos might be related to the special worship of Apollo in this place (Webb 1996, p. 30).
- 80) V. Chankowski, "Les places financières dans le monde grec classique et hellénistique des cités," *Pallas* 74, 2007, p. 97.
- 81) Webb 1996, pp. 29-30.
- 82) A round architectural motif used before the Hellenistic period is a rosette in the metope of the Doric Tholos at Epidauros. About the round object and its definition, Frazer 1990, pp. 201-205.
- 83) Fraser 1990, pl. 155; Roux 1961, pl. 77.
- 84) Bauer, 1973, p. 97.
- 85) Webb 1996, pls. 139 (type-A), 140 (type-B); Fraser 1990, pls. 161b, 162.
- 86) Fraser 1960, pl. 35.
- 87) Fraser 1990, pl. 161a, 162; McCredie 1992, pls. 35-40, 115-118.
- 88) Webb 1996, pp. 147-148.
- 89) Fraser 1990, pl. 164; Webb 1996, fig. 14.
- 90) A hundred bucrania means a great sacrifice, and there were generally a hundred bucrania in each stoa of the Asklepieion (In actuality, the number was not exactly a hundred—it is calculated as 99 in the East and West Stoas, and 109 in the North and South Stoas.). The same meaning for this number of bucrania was pointed out for the frieze of the Propylon of Ptolemy II at Samothrace. (Frazer 1990, pp. 3, 60, 68, 143, 198)
- 91) The evidence of its dating is not clear. (Fraser 1960, p. 209; Webb 1996, p. 55.)
- 92) Webb 1996, fig. 6.
- 93) Webb 1996, p. 52; Akurgal 1985, pp. 257-260.
- 94) Webb 1996, fig. 75.
- 95) Webb 1996, pp. 100-101.
- 96) M. Wegner, "Soffiten von Ephesos und Asia Minor," *ÖJH* 52, 1978/80, p. 91.
- 97) Frazer 1990, p. 197, fn. 130, pl. 153. Frazer cites the main measurements of the soffit panels from the temples in Asia Minor as follows: "The soffit panel of the architrave in the Mausoleum at Halikarnassos, ..., 1:0.14. In the Temple of Artemis at Priene, 1:0.202; in the Temple of Artemis at Ephesos, 1:0.28, in the Mausoleum at Belevi, 1:0.236, in the temple at Messa, 1:0.27; and in the second century B.C., in the Temple of Artemis at Magnesia, 1:0.21; in the Temple of Apollo at Aigai, 1:0.24.." Frazer 1990, p. 197.
- 98) The similarity of the design proportions of these two buildings (the Temple of Athena at Priene and the Propylon of Temenos at Samothrace) has been pointed out by Lehmann 1982: pp. 95, 96, 99, 104, 120, 124, 128, 140, 142.
- 99) A. Orlandos, *Prakt* 1962, fig. 7, pls. 120γ-ε, 1969; figs. 12-13; 1969, pls. 132α-γ; 1971, pls. 196-197γ; 1972, figs. 4-6; pls. 112-113γ; Sioumpara 2011, p. 172, pls. 32, 46-49. A pattern of terracotta roof tile has been discovered. A. Orlandos, *Prakt* 1960, p. 225, fig. 8, pl. 165γ; 1971, pl. 203β.
- 100) When the sima is made of stone, sometimes it is created together with a geison. M. F. Billot, "Le décor des toits de Grèce du Ile s. av. Ier s. ap. J.-C. Traditions, innovations, importations," *BCH* 121, 1997, p. 237.
- 101) Corinthian roof tiles made of limestone have been discovered at the Temple of Asklepios. Sioumpara 2011, pl. 50.
- 102) M. F. Billot, "Le décor des toits de Grèce du Ile s. av. Ier s. ap. J.-C. Traditions, innovations, importations," *BCH* 121, 1997, fig. 38. The Thersilion is dated to 370 B.C. by Roux. (Roux 1961, p. 415); G. Hübner, "Dachterrakotten aus dem Kerameikos von Athen," *AM* 88, 1973, pp. 134-135, fn. 237.
- 103) For example, Tholos at Delphi, the Temple of Asklepios at Epidauros. M. F. Billot, "Le décor des toits de Grèce du Ile s. av. Ier s. ap. J.-C. Traditions, innovations, importations," *BCH* 121, 1997, p. 252.
- 104) Frazer 1990, p. 169.
- 105) Fraser 1990, p. 214, pls. 166-177. Frazer also asserted that the lion's head at Samothrace appeared to be based on the lions' heads of the Temple of Athena Polias at Priene, the Temple of Athena Alea at Tegea, the Temple of Zeus at Nemea, and the Mausoleum at Belevi.
- 106) F. Willemensen, *Die Löwenknopf-Wasserpeier vom Dach des Zeustempels*, OF IV, 1959, p. 48, pl. 74.
- 107) There is no relationship between the placement of the lion's head and the column position, even though the axial distance of two lions' heads and the width of roof tile measure the same. This fact agrees with the argument that there was no relationship between the width of sima and column position by Bingöl. (O. Bingöl, "Die Beziehung zwischen dem Abstand zweier Wasserpeier und dem Rankenschema der Traufsima in der hellenistischen Zeit, in: Bauplanung und Bauphysik der Antike," *DiskAB* 4, 1984, pp. 70-80.)
- 108) M. F. Billot, "Le décor des toits de Grèce du Ile s. av. Ier s. ap. J.-C. Traditions, innovations, importations," *BCH* 121, 1997, p. 245; Sioumpara 2011, p. 240, fn. 966.
- 109) Terracotta simas from Corinth (I. Thallon-Hill and L. S. King, *Corinth IV-1: Decorated Architectural Terracottas*, Cambridge, 1929, figs. 32, 34, 36.). Marble simas of North Propylon at Epidauros, of the Poseidon Temple at Izmir, of the Apollon Temple at Delphi (Roux 1961, pls. 76, 89). Marble sima of the Temple of Athena Alea at Tegea (Roux 1961, pl. 89; Frazer 1990, pl. 174). There is also an unattributed terracotta sima at Olympia (late 4th century B.C.; Frazer 1990, pl. 177).
- 110) Sioumpara 2011, p. 240. This fact agrees with the argument that the sima of mainland Greece has a long tradition from the early Hellenistic period. It is interesting to compare the two historical facts that Italian ornamentation of sima was introduced into north Greece and Asia Minor in the early Hellenistic period; while, in contrast, old Greek sima ornamentation was favored in Macedonia. M. Pfrommer, "Großgriechischer und mittelitalischer Einfluß in der Rankenornamentik frühhellenistischer Zeit," *Jdl* 97, 1982, pp. 119-190; N. E. Kaltsas, *Πηλινες διακοσμημένες κεραμώσεις από τη Μακεδονία*, 1988, pp. 69-71; Themelis 1994, p. 157, fn. 46.
- 111) A. Orlandos, *Prakt* 1959, p. 168, fig. 9; Themelis 1994, pp. 164-165; Sioumpara 2011, pp. 174-176, pls. 32, 52.
- 112) Themelis 1994, p. 164, type 8, fig. 20, Pl. 55.
- 113) M. F. Billot, "Le décor des toits de Grèce du Ile s. av. Ier s. ap. J.-C. traditions, innovations, importations," *BCH* 121, 1997, p. 255.
- 114) Sioumpara 2011, p. 241.
- 115) Sioumpara 2011, p. 240, fn. 962.
- 116) The sima from the Temple of Asklepios has been dated to between the first and the second quarter of the 2nd century B.C. A. Orlandos, *Prakt* 1969, p. 100, fig. 12, pls. 132-a, b.; M.-F. Billot, "Le décor des Toits de Grèce du Iles. av. au Iers. ap. J. - C. Traditions, Innovations, Importations," *BCH* 121, 1997, p. 280; Themelis 1994, p. 165; Sioumpara 2011, p. 212, fn. 622. Sioumpara believed that it is not possible to argue with the hypothesis that the sima was produced in good-quality because the sima block could be paradeigmata, or models prepared by the mason master, or stocks for reparation. Sioumpara 2011, p. 243.
- 117) P. G. Themelis, "Damophon von Messene: sein Werk im Lichte der neuen Ausgrabungen," *Antike Kunst* 36, 1993, p. 38; F. Cooper, "Curvature and other architectural refinements in a Hellenistic Heroon at Messene," in L. Haselberger (ed.), *Appearance and Essence: Refinements of Classical Architecture: Curvature*, University Museum Monograph 107, Symposium Series 10, The University of Philadelphia, 1999, p. 193.
- 118) Lauter 1986, pp. 5-6.
- 119) J. J. Coulton, "Why build Doric? The Choice of Orders in Hellenistic Architecture," in J. Ito (ed.) *Symposium for International Collaborative Studies on Ancient Messene*, Tokyo 2002, pp. 49-55, esp. 54. See also Müth 2007, pp. 171-172.
- 120) Knackfuß 1908, pp. 95-99, pls. X-XI; Akurgal 1969, pp. 213-214, pl. 72; J. J. Coulton, *Ibid*, p. 54.
- 121) Travlos 1971, pp. 402-403.
- 122) It is pointed out that the Corinthian capital was also favored by the Ptolemaic dynasty; for instance the Temple of Sarapis, or Serapeum at Alexandria, built during the time of Ptolemy III Euergetes (246-222 B.C.). J. J. Coulton, *Ibid*, p. 54; J. McKenzie, *The architecture of Alexandria and Egypt 300 c. BC - AD 700*, 2011, figs. 62-69, pp. 35, 53-55.
- 123) Plutarch, *Aratus*, (trans.) J. Dryden, (ed.) A. H. Clough, *Lives of the Noble Grecians and Romans*, 2009, Ch. 65 (eBooks of the University of Adelaide Library). See also Müth 2007, p. 80.

和文要約

1960年代にオランダスによって発掘された古代都市メッセネのアスクレピオス神域は、中央のドリス式神殿と祭壇を囲む矩形の中庭に面してコリント式のストア（列柱廊）が建ち、その背後に民会場や会議場などがあった。ストアを含むアスクレピオス神域の建設年代は、現在の発掘者であるテメリス教授による前3世紀末から前2世紀とする大まかな見解が広く知られている。これは、アスクレピオス神域が建てられる以前に同じ敷地にあった、古い神域の最後の建設フェーズが前3世紀末であることを根拠としている。しかし近年の研究では、前2世紀前半とする意見が多い。その主な根拠は、アスクレピオス神域の北西に立つアルテミス・オルシア神域付近から発見されたコインと碑文に基づいている。アルテミス・オルシア神域は、アスクレピオス神域が建設されたときにその機能が神域に取り込まれたが、この神域から出土したコインと碑文がおよそ前2世紀半ばであると考えられているからである。また中庭に立つドリス式神殿も、様式的に見て前2世紀前半であると比定されている。本稿ではストアの建築装飾の様式分析を行って、アスクレピオス神域およびストアの建設年代を検証すると共に、ヘレニズム建築における当該ストアの様式的特徴を明らかにする。

正方形または円筒形プリンスの上に立つ礎盤は、トルス・スコティア・トルスからなるいわゆるアッティカ式礎盤である。アッティカ式礎盤は、前5世紀末にアテネで最初に使われて以降、前3世紀以降ペロポネソス半島で受け入れられた。正方形プリンスは、前3世紀末より小アジアで使われ始め、前2世紀を通じて多くの類例が見られる。円柱の胡麻柄線形フルートは、前3世紀半ばから前2世紀にかけて類例が見られる。コリント式柱頭は、大小2つのタイプが存在し、大きいタイプは内部柱、小さいタイプは外部柱に使用された。大小いずれの柱頭も、アカンサスの葉の様式から見て、前3世紀ではなく前2世紀前半の特徴がみられる。また柱頭の中央には、半植物＝半人間の形態をしたエロスまたはニケの彫刻があり、これは前2世紀ごろから流行した建築装飾のモチーフである。さらに、フリーズの浮彫彫刻は、花飾りのあるブクラニア（牛頭骨）とフィアラ（丸杯）とが交互に並び、花綱で結ばれている。ブクラニアは、ヘレニズム建築で最もポピュラーな建築装飾のモチーフの一つであった。ブクラニアとフィアラ（またはロゼッタなどの円形の装飾）

は前3世紀から見られ、前2世紀には多くの類例が見られるが、逆に前1世紀にはほとんど類例がない。アーキトレイブの底面に見られる長方形の装飾帯は、プロポーシオンからみて前2世紀のものである。シーマはライオン頭部の樋口とその間の植物模様によって装飾されている。ライオンは、鼻柱が横に広く、眉毛付近がふくらんでおり、丸い目をしている点に特徴があり、前3世紀半ばのサモトラケのシーマによく似ている。シーマの植物模様は、前4世紀半ばから見られる古い構図で、前2世紀まで多くの類例がある。アンテフィクスは、2枚の水平なアカンサスの葉の上にバルメットが載る構図で、シーマと同様に前4世紀半ばから前2世紀まで類例がある。

このようにメッセネのストアの建築装飾は、様式によって厳密な編年は困難であるが、およそ前3世紀から前2世紀までの特徴を備えていることが分かる。ヘレニズム建築は地域の建築的伝統を強く受け継ぐ傾向があり、ペロポネソス半島に位置するメッセネにおいては、盛期ヘレニズムになっても古くから続く建築的伝統が保持されていた。今回の建築装飾の分析によって、ギリシア本土および小アジアにおける盛期ヘレニズムの建築が、古典末期から初期ヘレニズム期の伝統を引き継いでいることが裏付けられた。また、比較的厳密な編年が可能であるコリント式柱頭のアカンサスの葉や、アーキトレイブ底面の長方形の「装飾帯（soffit panel）」には前2世紀前半の特徴が見られ、アスクレピオス神域の新しい建設年代とも一致する。したがってストアの建設年代も、およそ前2世紀前半と考えられる。

他方、メッセネのストアはコリント式オーダーを本格的に採用した最初のストアであり、古典期にはなかった新しい傾向が見られる。ミレトスのプーレウテリオンの門（前175～前163年建造、碑文）やアテネのオリンピエオン（前174年～未完、碑文）は、セレウコス朝の君主アンティオコス四世エピファネスと深い関係にあった。メッセネと同時代に建てられたこれら二つのコリント式の建物の存在は、ヘレニズム君主が力と権威を示す新しい様式としてコリント式オーダーを好んだことを示している。メッセネはマケドニアの君主フィリップ五世と深い関係にあったことは知られているが（プルタルコス、『英雄列伝』）、彼がアスクレピオス神域を建設したという証拠はまだ見つかっていない。

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