



MERSİN ÜNİVERSİTESİ KILIKIA ARKEOLOJİSİNİ ARAŞTIRMA MERKEZİ
MERSIN UNIVERSITY PUBLICATIONS OF THE RESEARCH CENTER OF CILICIAN ARCHAEOLOGY

KAAM
YAYINLARI

OLBA
XII



MERSİN
2005

KAAM YAYINLARI
OLBA
XII

© 2005 Mersin/Türkiye
ISSN 1301 7667

OLBA dergisi hakemlidir ve Mayıs-Kasım aylarında olmak üzere,
yılda iki kez basılmaktadır.
Published each year in May and November.

KAAM'ın izni olmadan OLBA'nın hiçbir bölümü kopya edilemez.
Alıntı yapılması durumunda dipnot ile referans gösterilmelidir.
It is not allowed to copy any section of OLBA without the permit of KAAM.

OLBA'ya gönderilen makaleler aşağıdaki web adresinde ve bu cildin giriş sayfalarında
belirtilen formatlara uygun olduğu takdirde basılacaktır.
Articles should be written according the formats mentioned in the following web address.

OLBA'nın yeni sayılarında yayınlanması istenen makaleler için yazışma adresi:
Correspondance addresses for sending articles to following volumes of OLBA:

Prof. Dr. Serra Durugönül
Mersin Üniversitesi Fen-Edebiyat Fakültesi
Arkeoloji Bölümü
Çiftlikköy Kampüsü
33342-MERSİN
TURKEY

Diğer İletişim Adresleri
Other Correspondance Addresses

Tel: 00.90.324.361 00 01 (10 Lines) 4730 / 4734
Fax: 00.90.324.361 00 46
web mail: www.kaam.mersin.edu.tr
e-mail: kaam@mersin.edu.tr

Dağıtım / Distribution

Zero Prod. Ltd.
Tel: 00.90.212.244 75 21-249 05 20
e-mail: zero@kablonet.com.tr, aboratav@tayproject.org



MERSİN ÜNİVERSİTESİ
KILIKIA ARKEOLOJİSİNİ ARAŞTIRMA MERKEZİ
(KAAM)
YAYINLARI-XII

MERSIN UNIVERSITY
PUBLICATIONS OF THE RESEARCH CENTER OF
CILICIAN ARCHAEOLOGY
(KAAM)-XII

Editör

Serra DURUGÖNÜL
Murat DURUKAN

Bilim Kurulu

Prof. Dr. Serra DURUGÖNÜL
Prof. Dr. Coşkun ÖZGÜNEL
Prof. Dr. Tomris BAKIR
Prof. Dr. Hayat ERKANAL
Prof. Dr. Sencer ŞAHİN
Prof. Dr. Yıldız ÖTÜKEN
Prof. Dr. Erendiz ÖZBAYOĞLU
Prof. Dr. Susan ROTROFF
Prof. Dr. Marion MEYER



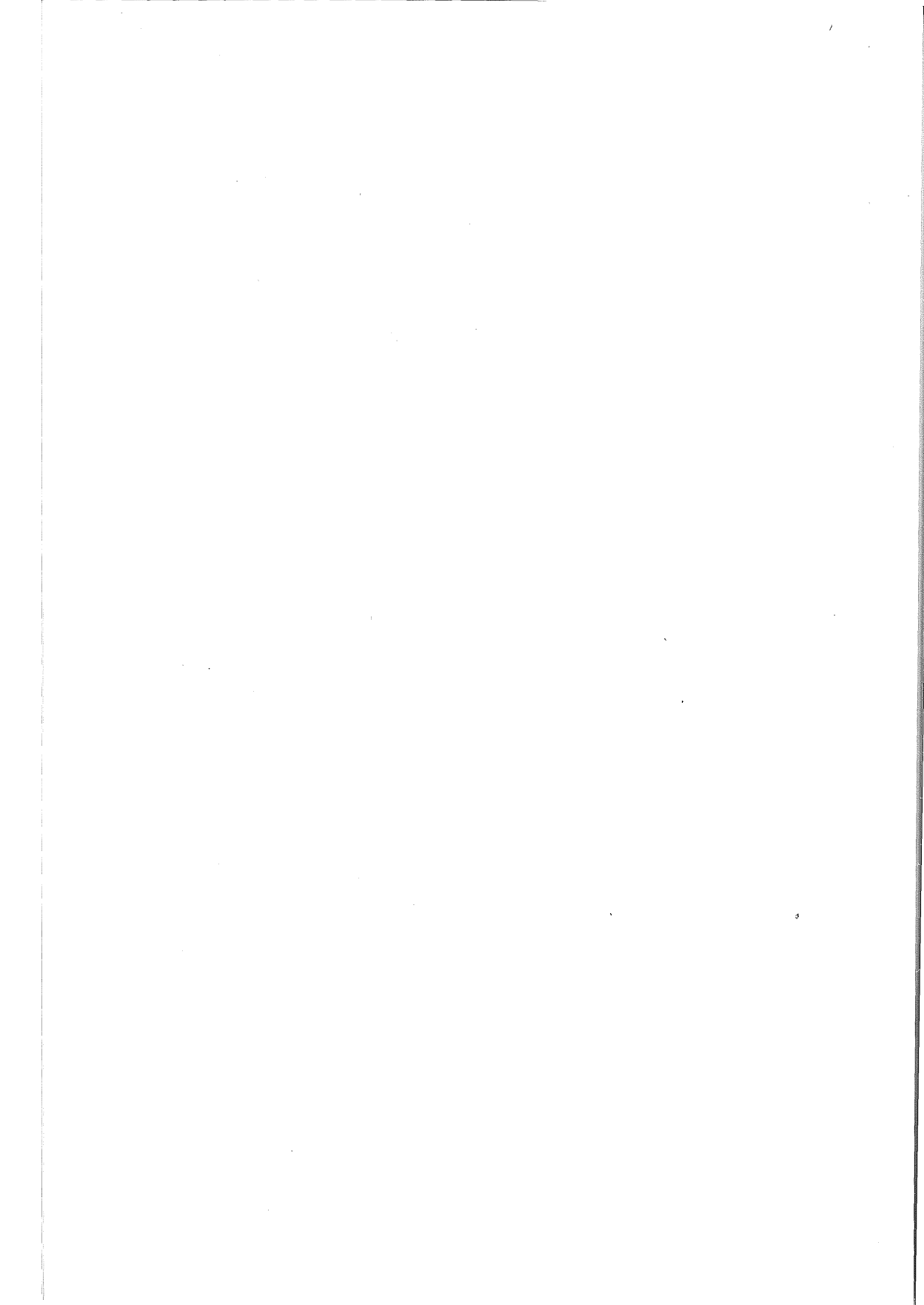
MERSİN
2005

Prof. Dr. Tahsin ÖZGÜÇ,
Prof. Dr. Ümit SERDAROĞLU
ve
Prof. Dr. Manfred KORFMANN'ı
kaybettik.
Saygıyla anıyoruz.

*OLBA'nın Basılması İçin Vermiş Olduđu Desteklerden Dolayı
Mersin Üniversitesi Rektörü Prof. Dr. Uğur Oral'a
Teşekkür Ederiz.*

İçindekiler/Contents

Elif Koparal <i>Göç Olgusunun Arkeolojik Materyal İle Tanımlanması: İon Göçleri Örneği</i>	1
Fahri Dikkaya <i>Arkeoloji'de Yerleşimi Anlamlandırmak</i>	21
Bilge Hürmüzlü <i>The Organization and Utilization of the Burial Grounds in Klazomenai</i>	39
Ayşe Gül Akalın <i>Antik Grek Yerleşim Tipleri, Kavramlar ve Tartışmalar</i>	69
Winfried Held <i>Loryma ve Karia Chersonesos'unun Yerleşim Sistemi</i>	85
Ersin Doğer <i>Yamanlar Dağı'nda Geç Antik Çağ İskanları: Kronolojik ve Mekan Organizasyonlarına İlişkin Sorunlar</i>	101
Kaan Şenol <i>Antik Dönem Ekonomisinin Kurgusunda Seramik Buluntuların Yeri, Sorunlar</i>	125
Gonca Cankardeş-Şenol <i>Amphora Mühürlerinin Köken ve Sosyal Statünün Belirlenmesindeki Etkileri ve Kent Lokalizasyonunun Tespitine Katkıları</i>	139
Ümit Aydınoğlu <i>Yerleşim Modeli Oluşturmak Mümkün Müdür? Dağlık Kilikia'dan İki Yerleşim Modeli Denemesi</i>	165



Yayın İlkeleri

1. Olba her yıl, ilki en geç 15 Mayıs'ta ikincisi en geç 15 Kasım'da olmak üzere iki sayı halinde yayınlanır. Yayınlanması istenen makaleler, zaman sınırlaması olmaksızın gönderilebilir. Hakemler tarafından olumlu değerlendirilen makalelerin adedi Olba'nın bir sayısı için fazla olduğu takdirde, bazı makaleler diğer sayıda yayınlanmak üzere havuzda bekletilir. Bu gibi durumlarda daha erken gönderilmiş olan makalelere öncelik tanınır.
2. OLBA'nın uluslararası bilimsel standartlara uygun olarak yayınlanabilmesi için aşağıda belirtilen teknik kurallara uyulmalıdır:
 - a- Makaleler, Word 5.0 ve üstü, Windows 95-98 veya Word 2000 yazım programı ile yazılıp diskete kaydedilerek gönderilmelidir.
 - b- Makaleler, figürleriyle birlikte çoğaltılmış olarak iki kopya halinde gönderilmelidir.
 - c- Metin yazılırken 10 punto, dipnot için ise 9 punto New York (Macintosh için) ya da Times New Roman (PC için) harf karakteri kullanılmalıdır.
 - d- Dipnotlar her sayfanın altına verilmeli ve makalenin başından sonuna kadar sayısal süreklilik izlemelidir.
 - e- Metin içinde bulunan ara başlıklarda, küçük harf kullanılmalı ve koyu (bold) yazılmalıdır. Bunun dışındaki seçenekler (tümünün büyük harf yazılması, alt çizgi ya da italik) kullanılmamalıdır.
3. Makale içindeki Yunanca karakterler için kullanılan Yunanca font da diskete yüklenerek yollanmalıdır.
4. Dipnotlarda kullanılan kaynaklar kısaltma olarak verilmeli, kısaltmalarda yazar soyadı, yayın tarihi, sayfa (ve varsa levha ya da resim) sıralamasına sadık kalınmalıdır. Sadece bir kez kullanılan yayınlar için bile aynı kurala uyulmalıdır.

Dipnot (kitaplar için)

Richter 1977, s. 162, res. 217

Dipnot (Makaleler için)

Oppenheim 1973, s. 9, lev.1

5. “Bibliyografya ve Kısaltmalar” bölümü makalenin sonunda yer almalı, dipnotlarda kullanılan kısaltmalar, burada açıklanmalıdır.

Bibliyografya (kitaplar için):

Richter 1977 Richter, G., Greek Art, NewYork

Bibliyografya (Makaleler için):

Corsten 1995 Corsten, Th., “Inschriften aus dem Museum von Denizli”, Ege Üniversitesi Arkeoloji Dergisi III, 215-224, Lev. LIV-LVII

6. Tüm resim, çizim ve haritalar için sadece “fig” kısaltması kullanılmalı ve figürlerin numaralandırılmasında süreklilik olmalıdır. Levha numarası tarafımızdan verilecektir. Bu sebeple levha, Resim, Çizim, Şekil, Harita ya da bir başka ifade veya kısaltma kullanılmamalıdır.
7. Kullanılacak fotoğrafların, daha iyi sonuç almak açısından, siyah-beyaz olması tercih edilmektedir. Dia gönderecek yazarlar dia çerçevesi üzerine mutlaka resim sırasını yazmalıdır. Bir başka kaynaktan alıntı yapılan figürlerin sorumluluğu yazara aittir, bu sebeple kaynak belirtilmelidir. Görsel malzeme eğer taranmış olarak gönderilecekse uzun kenar: 12 cm, çözünürlük: 300 pixel/inch (en az) olmalı. Eğer tam sayfa kullanılacak bir fotoğraf ya da çizim söz konusu ise uzun kenar: 18.5 cm olmalı. Ayrıca görsel malzeme başka bir programa (Microsoft Word, Power Point vs.) gömülü olarak değil, Adobe Photoshop tif formatında gönderilmeli.
8. Makale metninin sonunda figürler listesi yer almalıdır. Levhalardaki figürlerin (resim, çizim, harita vs.) altına açıklama cümlesi yazılmamalıdır.
9. Metin yukarıda belirtilen formatlara uygun olmak kaydıyla mümkünse 15 sayfayı geçmemelidir. Figürlerin toplamı 10 adet civarında olmalıdır.
10. Makaleler Türkçe, İngilizce veya Almanca olabilir. Türkçe yazılan makalelerde yaklaşık 200 kelimelik İngilizce ya da Almanca özet kesinlikle bulunmalıdır. İngilizce veya Almanca yazılan makalelerde ise 200 kelimelik Türkçe özet kesinlikle bulunmalıdır.

THE ORGANIZATION AND UTILIZATION OF THE BURIAL GROUNDS IN KLAZOMENAI

Bilge HÜR MÜZLÜ*

ÖZET

Klazomenai'de Gömü Alanlarının Düzenlenmesi ve Kullanımı

Klazomenai ve İonia'nın diğer merkezlerinde açığa çıkan mezar grupları, Protogeometrik ve Geometrik Dönemlerde bebek ve çocukların yerleşme içerisinde gömüldüğünü ortaya koymaktadır. İonia merkezlerinden elde edilen veriler, yedinci yüzyılın ortalarından itibaren ise yerleşme içerisinde gömüye izin verilmediğini göstermektedir. Klazomenai'de de yerleşme alanının çevresinde yer alan ve kent için bir sınır oluşturdukları gözlenen nekropolis alanları yedinci yüzyılın başından itibaren kullanılmaya başlamıştır. Uzun dönemler boyunca ve çağdaş olarak kullanılmış olan bu nekropolis alanlarının her biri kentin içerisinde yer alan büyük aile gruplarından (phyle?) birine ait olmalıdır.

Bu çalışmanın amacı, Klazomenai'de mezar grupları ve nekropolis alanlarından elde edilen verilerden hareketle, mezarlık alanlarının organizasyonunu ve kentin tarihsel süreci boyunca yerleşme alanıyla ilişkisini irdelemktedir. Bu amaçla öncelikle Klazomenai antik kentinin yerleşme alanlarına ilişkin veriler özet halinde sunulmuştur. Çalışmalar, antik kentin dağınık yerleşme alanlarından oluşmadığını ve onbirinci yüzyılın sonuna tarihlenen kuruluşundan itibaren, ihtiyaç ölçüsünde, batıya doğru genişlemiş olduğunu ortaya koymuştur. Protogeometrik Dönemden itibaren iskan edilmiş olan alanların Arkaik ve Klasik Dönemler boyunca da kullanılmış oldukları anlaşılmaktadır. İkinci aşamada, Klazomenai'de açığa çıkan mezar grupları, nekropolisler ve tümülüsler tanıtılmış, diğer İonia merkezlerinden elde edilen verilerle karşılaştırmalar yapılmıştır. Son olarak da, Klazomenai'de nekropolis alanlarından elde edilen verilerin antik dönemde sosyal örgütlenmeye yansımaları ve aile mezarlıklarına ilişkin veriler değerlendirilmiştir.

Keywords: Klazomenai, burial grounds, settlement, necropolis, burial customs

* Dr. Bilge Hürmüzlü, Süleyman Demirel Üniversitesi, Fen-Edebiyat Fakültesi, Arkeoloji Bölümü, Isparta.

The aim of this paper is to examine the organization of the Clazomenian burial grounds and their relationship to the settlement area throughout the history of the city¹. It begins with a chronological summary of the settlement areas of the ancient city of Klazomenai². This is followed by presentation of the burial clusters, the necropolis areas and the tumuli uncovered in Klazomenai, and a comparison with findings from other Ionian centers. The paper concludes with reflections on ancient social organization based on data from the burial grounds, and evaluation of the characteristics of the family burials.

Habitation Areas in Klazomenai

Since 1979, annual excavation seasons have revealed habitation areas dating from the foundation of the city in the Protogeometric period until its final abandonment in Roman Imperial times (fig.1 and 2). The curvilinear planned structures revealed in sector A (fig. 1) show that the city was founded as an Ionian settlement at the end of the 11th century in the area of the Prehistoric Mound (Liman Tepe)³. Findings obtained from deep soundings carried out in various areas demonstrate that in the Middle and Late Protogeometric periods the original settlement expanded towards the west (fig.1: A, B and C).

By contrast with the Protogeometric period, however, our knowledge of Geometric Klazomenai is rather limited. Nevertheless, fill and floors belonging to the Geometric period have been found in the areas of the Protogeometric city that lie beneath houses of the Archaic period. These finds

¹ The results which form the subject of this study are based on finds uncovered in excavation work carried out at Klazomenai since 1979 under the directorship of Prof. Dr. Güven Bakır. I thank him for his kind permission to publish the results of the excavations and to Yaşar Ersoy and Catherine Morgan for their suggestions and criticism. My special thanks are due to the Organizing Committee of the workshop at Mersin. All dates are BC unless otherwise stated.

² Data concerning the settlement area of Klazomenai and the history of the city have been published in detail in previous papers. For this reason the present study includes only a summary designed to help understanding of the use of the burial grounds over time. For studies discussing the findings and the historical events at Klazomenai from the Protogeometric period onwards, see Ayaçlar 2004; Ersoy 2004; Ersoy 2005; Güngör 2004 and Özbay 2004.

³ Concerning the first founding, the expansion and the houses of Klazomenai, together with the finds retrieved from these areas of the city, see Ayaçlar 2004, p. 17-41; Bakır et. al. 2001, p. 27-33, fig. 2-7; Bakır et. al. 2002, p. 41-44, fig. 2-5; Bakır et. al. 2003, p. 205-207, fig.1.

show that in the Geometric period the city continued to exist in areas previously settled during Protogeometric times (fig.1: A, B and C)⁴. Architectural remains and floors from the second half of the seventh century onwards also suggest that the same areas were in use during Archaic period⁵. However, dwellings dated to around 600 BC, to the west of these areas (fig. 1: D), prove that in the Archaic period the city of Klazomenai expanded even further in this direction⁶. Houses belonging to the first half and to the last quarter of the sixth century came to light in the sectors in question (fig.1: A, B, C and D). They yield important data on the architectural plans applied at Klazomenai in the Archaic period, and on the coarse pottery in daily use at the settlement.

Apart from the areas set aside for houses, two industrial areas of the Archaic period have been identified. South of the residential areas located in sector D (fig. 1), and in an area which was probably within the fortification walls⁷, sixth century workshops were uncovered for the extraction of olive oil and iron-working (fig.1: H)⁸. Besides these, there are pottery kilns on the south-eastern and south slopes of the Acropolis (fig. 1: F and H) dating to the second half of the seventh and first half of the sixth century

⁴ For the Late Geometric data and finds from Klazomenai, see Ersoy 2004, p. 43-52. For the Late Geometric floor and its finds in sector C (fig. 1), see also Bakır et. al. 2002, p. 45, fig.9.

⁵ For a detailed discussion of the architectural and small finds in Archaic houses of Klazomenai, see Ersoy 2004, p. 52-60.

⁶ On the houses and finds from sector D (fig.1), see *ibid.* p. 52-55. Besides this, the underwater researches of the Liman Tepe excavation, carried out under the directorship of Prof. Dr. Hayat Erkanal, show that one portion of the Archaic city of Klazomenai is under water. This suggests that in the seventh and the early sixth century the city was concentrated on the western side of the Prehistoric mound, near the sea shore. The sinking happened as the result of an earthquake, which caused important changes to the city's topography. For an evaluation of this situation, see *ibid.* p. 53; Erkanal et. al. 2003, p. 171-174, figs 1-3; Artzy 2001, p. 3-4.

⁷ The faint traces of fortification walls surrounding Klazomenai consist of large monoliths which came to light in the course of road construction south of the areas labelled B and H in fig. 1. It is clear that at Klazomenai, besides the necropolis areas, the sanctuary of Athena that was located on the hill called the Acropolis (fig.1: F) was also left outside the city's fortification walls. The wall formed of large stones that surround the summit of the Acropolis hill shows that this area outside the city's defence system was in fact protected by a wall of its own. For the fortification walls surrounding the Acropolis, see Bakır 1984, p. 224-225, plan 2, fig. 3; Bakır et. al. 2005, p. 4-5, fig. 10 and 11.

⁸ For an evaluation of the working system and the relevant archaeological finds of the olive oil workshop at Klazomenai, see Koparal – İplikçi 2004, p. 221-234. For the iron workshop identified to the north of this in the same area, see Bakır et. al. 2001, p. 33, fig. 8.

respectively⁹. These workshops clearly indicate that the areas to the south-west of the settlement of Klazomenai (fig.1: F and H) were reserved for industrial activities during the Archaic period.

The Archaic residential and industrial quarters (fig.1: A, B, C, D, F and H)¹⁰ were occupied until the end of the sixth century, except for certain interruptions which can be explained by historical events¹¹. Towards the end of the sixth century there is a hiatus in a major portion of the settlement area which lasts until the beginning of the fourth century: this is evident as a lack of both architectural and small finds. It is clear that after the Ionian revolt was harshly suppressed by the Persians, a large portion of the extensive Archaic city was abandoned, at least for a period of time. There are also finds which show that the mainland was not completely abandoned but was settled probably in the first quarter of the fifth century¹². However, soundings carried out on the island of Karantina (fig.1: E), immediately opposite Klazomenai, revealed traces of the city's fifth century settlement. This indicates that, to a great extent, life in this period continued on the island¹³.

The areas used in the Archaic period (fig. 1: A, B, C and D) were re-occupied after intensive leveling and re-planning on Hippodamian lines¹⁴. However, the areas which had formerly been set aside for industrial activity

⁹ For the pottery production and the potters' kilns at Klazomenai, see Bakır et. al. 2003, p. 207-2008, figs 4-7; Ersoy 2003, p. 254-257.

¹⁰ The houses uncovered in sector D at Klazomenai (fig.1) were abandoned in the middle of the sixth century due to flooding by a nearby stream. This area was not inhabited again until the fourth century, see Ersoy 2004, p. 53.

¹¹ Thus far, excavations at Klazomenai show that there is a hiatus in the settlement between the years 550 and 520. This was probably caused by the Persian invasion around 546 and shows itself as a lack of both architectural and pottery finds. The hiatus has been extensively evaluated by Y. Ersoy, see *ibid.* 60-64. In all quarters of the city (including the industrial and necropolis areas) occupation only begins again around 520. It has been established that from this date onwards, there is again construction activity and that the various areas were expanded. On the residential parts of the late sixth century city and the relevant finds, see *ibid.* p. 55-60.

¹² For an evaluation of archaeological data relevant to the hiatus at Klazomenai after the Ionian revolt, and for the finds obtained from the mainland settlement of the fifth century, see *ibid.* p. 64-67, fig.23 and 24.

¹³ For the finds uncovered in the soundings carried out on the island of Karantina in 1990, and for an evaluation of the history of fifth century Klazomenai in the light of ancient sources, see Güngör 2004, p. 121-131.

¹⁴ For the phases of Hippodamian plan of the Classical city, see Özbay 2004, p. 133-159.

were either (sector H)¹⁵ cleared for another purpose or (sector F) abandoned (fig. 1). The mainland settlement at Klazomenai was abandoned around the year 350, as is shown by the potter's kiln uncovered in sector C (fig. 1), and the land was then used for other purposes¹⁶. This area was probably used for agriculture purposes at the end of the fourth century, and several burials have been unearthed there as will be seen below.

At the beginning of the Hellenistic period, the population largely moved to the Karantina island (fig. 1: E)¹⁷. Excavation carried out on the island has uncovered peristyle houses, and these and other finds demonstrate that the settlement here continued up to the beginning of the fifth century A.D. For the same period on the mainland faint traces of walls belonging to Roman farm houses have been excavated (fig. 1: H). The latest dated pottery retrieved here belongs to the sixth and seventh centuries A.D.

Burial Groups and Burial Grounds at Klazomenai

Besides burials exposed within the settlement, six different burial grounds (at some distance from the city) and numerous tumuli, have been identified at Klazomenai (fig.1: ns 1-7). Setting aside the Early Iron Age burials from the settlement, the earliest burials are found in the necropolis areas belonging to the beginning of the seventh century. These cemeteries went out of use as the city was abandoned in the middle of the sixth century, at least until the re-occupation c.a. 520¹⁸. It is clear that some of the burial grounds were used again in Classical and Hellenistic periods. But at Klazomenai, evidence for Classical and Hellenistic graves is more limited than that for Archaic burials.

¹⁵ This area where the sixth century olive oil extraction came into light had been cleared for a Basileia complex contemporary with the Hippodamian plan. For a preliminary report on the basileia structure, see Bakır et. al. 2002, p. 46-47, fig. 10-11. For the plan of the building in question, see also Özbay 2004, p. 146, fig. 17.

¹⁶ For comprehensive information on the abandonment of the city and on the potter's kiln, see *ibid.* p. 147-149, fig. 20.

¹⁷ Though faint, there are traces of Hellenistic settlement on the mainland (fig.1: H). At the beginning of this period, after Alexander the Great's liberation of Asia Minor from the Persians through a series of military victories, the causeway (fig.1: G) linking the island of Karantina to the mainland was built and the settlement must have moved from the mainland to the island, see *ibid.* p. 149. For finds of the Hellenistic period uncovered on the island of Karantina and for Roman villas here, see Beek – Beelen 1991, p. 37-45; Beek – Beelen 1999, p. 424-425.

¹⁸ For the phases of the Akpınar necropolis, see Hürmüzlü 2004, p. 83-89.

1) Protogeometric and Geometric Burial Groups

The earliest burials uncovered up to now belong to the Late Protogeometric period. Sector A (fig.1) has yielded a pithos burial of a child and a cist grave of an infant (fig. 3) between the curvilinear buildings of the Protogeometric period. Based on their grave goods, these graves are dated to the end of the tenth or the beginning of the ninth century¹⁹. They indicate that intramural burial for infants and children was customary at Klazomenai during this period. So far, there is no evidence to indicate that adults were also buried in the settlement. Nor has any Protogeometric grave yet been identified in the necropolis areas. However, an amphora of the second half of the tenth century, which was used as a burial urn, was found on the southern slopes of the Yıldız Tepe hill (fig.1: n.2)²⁰. This find suggests that the adult burials of the period may be in a locality different from the known necropolis areas, probably on the southern slopes of the same hill.

Up to now, our knowledge of Geometric graves at Klazomenai has been extremely limited. However, a few cremation burials from the Yıldız Tepe (fig.1: n.2) and the Akpınar (fig.1: n.6) cemeteries provide evidence for the adult graves of the Late Geometric period²¹. These burials indicate that at the beginning of the seventh century adults were cremated in the necropolis areas. Apart from these graves, two kitchen pots used for infant burials at the end of the eighth century were found in sector A (fig.1)²². These indicate that the custom of intramural burial for infants, and probably children too, continued well into the Geometric period²³.

¹⁹ The pithos grave produced a trefoil oinochoe, a round-mouthed jug and two one-handed cups, see Aytaçlar 2004, p. 27-28, ns 22-25, figs 13 and 14. Inside the cist grave a high rimmed skyphos with a conical foot has been found, see Bakır et. al. 2004, p. 103, fig.3.

²⁰ For the Late Protogeometric amphora see Aytaçlar 2004, p. 26-27, no.12, fig.12.

²¹ For the cremation burial of the first half of the seventh century uncovered in the Akpınar necropolis, see Hürmüzlü 2004, p. 83-84, fig. 12-13. For the cremation of the end of the eighth century uncovered in the Yıldız Tepe necropolis, see Bakır 1984, p. 228.

²² For the coarse kitchen ware vessels see Bakır, et al. 2005, p. 2-3, fig.4. For similar examples uncovered at Athens and dated to the end of the eighth century, see Brann 1962, p. 54, pl. 11: 195 and 196.

²³ One also encounters intramural burials in other Ionian cities such as Smyrna and Samos. Infant burials have been found in the settlement area of Smyrna in vessels dated to the end of the eleventh century. For intramural burials from this period in Smyrna, see Nicholls 1958/1959, p. 85, 126, fig. 25. Additionally, R.V. Nicholls states that infant burials were retrieved from the temple area in kitchen pots dated to the Late Geometric Period see *ibid.* p. 77, fig. 21. Also, for a child

2) Necropoleis of the Late Geometric and Archaic Periods

The earliest necropolis identified at Klazomenai is that of Monastirakia, located on the northwestern slope of the Cankurtaran Tepe hill (fig.1: n.1). Burials and scattered pottery fragments suggest that the Monastirakia necropolis was in use at least from the end of the seventh century and throughout the sixth century²⁴. The area was intensively used and the burials were irregularly placed one on another.

The second necropolis is located to the south of Monastirakia, on the western slope of Yıldız Tepe (fig. 1: n. 2). Excavations between 1979 and 1982 produced over a hundred graves, which show that the area remained in use from the first half of the seventh and throughout the sixth century²⁵. A considerable number of these burials are of infants placed in sarcophagi or amphorae. As in the Monastirakia necropolis, there was a high concentration of burials, and they were made one on top of the other with no particular order in the arrangement of the graves (fig.4).

burial in an amphora from the beginning of the seventh century, see *ibid.* p. 126, footnote 77, Pl. 9; Cook – Nicholls 1998, p. 53, pls B, 4c. Samos has also yielded a Geometric intramural infant burial, but the existence of a contemporary necropolis to the west of the Roman baths, beneath the Hellenistic gymnasium, suggests that only the infant burials were intramural as in Klazomenai. For the Geometric Period graves, see Tsakos 1996, p. 121. One should not, however, forget that in the Protogeometric and Geometric periods in the Aegean world the burial customs, grave rituals and the place of burial mostly show variations even in the same centre. On burial customs in the Aegean world in the Protogeometric period, see Lemos 2003, p. 151-190; Whitley 1991, p. 23-34. In Athens the Kerameikos was used as an extramural burial ground from the Protogeometric period onward, see Kraiker – Kübler 1939. Besides this, wells in the surroundings of the Acropolis and graves around the Acropolis are clear indications of intramural burials, see Whitley 1991, p. 61. On mainland Greece intramural burial is also encountered at Argos, Nea Ionia (Volos), Asine and Corinth. For intramural burials at Argos in the Protogeometric period, see Hägg 1974, p. 87-91; Lemos 2003, 157-158. The intramural infant burials beneath the Geometric house in Argos are dated to Late Geometric by their grave goods and indicate that the practice continued in this period, see Hägg 1973, p. 31-37. For burials made within the Protogeometric settlement at Volos, see Lemos 2003, p. 154. For intramural burials in Asine, see Lemos 2003, p. 158-159. In Corinth, Geometric graves have been found on the north edge of the city and between the potters' quarter and the city centre, see Williams 1982, p. 11. In contrast, at Lefkandi the burial ground is outside the settlement from the sub-Mycenaean period onwards. For discussion of the cemetery of Lefkandi, see Lemos 2003, p. 161-168.

²⁴ The Monastirakia necropolis was excavated in the years 1921 and 1922 by G. P. Oikonomos, see Oikonomos 1921, p. 63-74. The excavation reports, sarcophagi and small finds conserved in the Athens National Museum have been thoroughly examined and published by M.C. Tzannes, see Tzannes 2004, p. 97-120.

²⁵ For the preliminary reports of Yıldız Tepe, see Bakır 1983, p. 66-67; Bakır 1984, p. 227-229.

Another cemetery is the Akpınar necropolis, located northwest of the settlement of Klazomenai (fig.1: n.6)²⁶. This is located on sandy terrain near the shore, and the site was leveled and cleared before use. To date, 262 burials have been identified here, indicating that the cemetery was used from the seventh century onwards and throughout the sixth century. From the time of its first use, the necropolis area was organized in rectangular parcels measuring 7.0 x 4.5 m., and separated from one another by narrow passageways 1.00-0.50 m wide and covered by a marl layer (figs. 5 and 6). After the middle of the seventh century and before ca.630, the burial plots came to be surrounded by stone walls²⁷. These dividing walls were built sometimes of dressed and sometimes of rough river stones in two courses and their masonry resemble that of Archaic period houses in the settlement area. It is clear that until the middle of the sixth century, the placement of graves in the Akpınar necropolis within defined plots conforms to a certain order, in contrast to the necropoleis of Yıldız Tepe and Monastirakia. But this arrangement was abandoned when burials resumed in around 520, after the mid-sixth century hiatus that confronts us everywhere at Klazomenai.

All of the necropoleis so far discussed lie to the west of the ancient city of Klazomenai: turning to the east, three further sites have been identified to the east. The first is the Çayır necropolis, in a sandy area immediately east of the city (fig.1: n.7). The graves retrieved in the course of a short rescue excavation indicate that this cemetery too was used from the seventh century onwards. East of the Çayır necropolis is located the DSİ necropolis (fig.1: n.4), which was uncovered in a rescue excavation of 1985. This also is situated in a sandy area. Thirty-six graves were retrieved, ranging in date from the middle of the seventh to the end of the sixth century²⁸. As in the Akpınar cemetery, graves in the DSİ necropolis were situated within rectangular sectors separated by narrow pathways.

²⁶ For comprehensive information on the Akpınar necropolis, see Hürmüzlü 2004, p. 77-95

²⁷ The fact that the cremation burials belonging to the first phase in the Akpınar necropolis, dated to the years 670-650, extend about 10 cm. beyond the stone walls shows that these walls were constructed sometime after 650. On the other hand, graves dated to around 630 and placed in the corners of the plots prove that the walls were built before 630, see *ibid.* p. 79-80.

²⁸ Concerning the DSİ necropolis, see Bakır 1986, p. 4-5; Hürmüzlü 2004, p. 78, fig. 1.

Furthest east of the settlement is located the Kalabak necropolis, again in a sandy area (fig.1: n.3)²⁹. In contrast to the other necropoleis, this was not extensively used as a burial area. Work carried out here in 1982 yielded only a few graves, among them a cremation burial dated to the sixth century and some Clazomenian sarcophagi. Its situation, quite far from the settlement of Klazomenai, and its short period of use suggest that this necropolis was mostly used by the rural population rather than urban dwellers.

Finally, we should note that on the hills surrounding the ancient city of Klazomenai (Duba Tepe, Nalbant Tepe and Değirmen Tepe) numerous tumuli have been identified (fig.1: n.5 and fig. 8). Findings to date indicate that the custom of tumulus burial was used at Klazomenai only in the Archaic Period, and that in some cases, tumuli contained more than one burial. Clazomenian or stone sarcophagi were placed in the rock-cut pits (fig. 7). The cremations or sarcophagi in the tumuli of Klazomenai are covered with heaped-up earth and surrounded by a peribolos wall³⁰.

Findings indicate that the Clazomenian necropoleis began to be used for adult burials from the seventh century onwards. Evidence from the Akpınar necropolis shows that from the beginning of the seventh century, cremation was the standard rite for adults. On the other hand, those Clazomenian sarcophagi and pithoi in the necropoleis of Akpınar and DSİ which contained closely datable grave goods show that the inhumation of adults began around 630 and gradually took the place of cremation through the sixth century³¹. In the Akpınar necropolis, the absence, so far, of any infant burial earlier than 650 supports the view that before this date infants and children were buried within the settlement³².

²⁹ Concerning the Kalabak necropolis, see Bakır 1983, p. 67-68; Hürmüzlü 2004, p. 78.

³⁰ For the tumuli in Klazomenai, see *ibid.* p. 78, fig. 2. At Smyrna, which had a tumulus tradition similar to that of Klazomenai, this practice continued even into the fourth century, see Akurgal 1987, p. 37-38.

³¹ With the help of Corinthian vases it has been determined that the Clazomenian sarcophagi began to be produced in this period in various forms. Among the early Clazomenian sarcophagi there are besides examples of the apsidal and deep, and the rectangular forms, other specimens that imitate wooden cases; on these finds which changed the chronology of Clazomenian sarcophagi, see Bakır et. al. 2000, p. 47-49, fig. 1; Hürmüzlü 2004a, p. 195-198.

³² For amphorae used for infant burials retrieved in the Akpınar necropolis, see Hürmüzlü 2004, p. 82 and 84.

We therefore conclude that the intramural tradition was abandoned in the mid seventh century and thereafter the dead, including children and infants, were buried far from the city and sanctuaries of Klazomenai. Findings from the necropoleis of other Ionian centers show that, as at Klazomenai, burial clusters were moved outside settlements in the seventh century, and that more than one cemetery was used³³. At Smyrna the custom of intramural burial for infants and children, which had continued throughout the Protogeometric and Geometric periods, changed at the beginning of the second quarter of the seventh century³⁴. From this time onwards, infants and children were also buried outside the settlement area, albeit as near to it as possible. A sandy area on the eastern slope of the city was set apart as a children's cemetery. From the seventh century onwards, two cemeteries began to be used in Smyrna. The first lies on the slopes of the Yamanlar Mountain, facing the Bayraklı Mound, and the second is on the southeastern slope of the settlement³⁵. One should note that, in contrast to Klazomenai, the cemeteries for adults and children were separate at Smyrna.

³³ The Archaic necropolis areas of Erythrai and Teos were partially identified in the course of surface surveys. The Clazomenian sarcophagi retrieved at Teos show that the necropolis was situated on the western slope of the city at a point near the sea. For the Archaic cemeteries to the east and west of the Hellenistic-Roman city, see Béquignon-Laumonier 1925, p. 291; Boysal – Ögün 1962, p. 13; Boysal 1963, p. 7. Graves of the Archaic period have been found in surveys carried out in recent years at Erythrai under the directorship of Prof. Dr. Coşkun Özgünel and under the management of Dr. Kutalmış Görkay. These graves were found to the east of the city, along the road leading to Klazomenai and also on the north of the city. Dr. Kutalmış Görkay has indicated that necropoleis were encountered at more than one point in the surroundings of the city. I thank Dr. Görkay for sharing this information with me. Concerning the surveys carried out at Erythrai, see Özgünel 2004, p. 245-250. As for Phokaia, the necropolis area of the Archaic period has come to light in recent years. It lies outside the Archaic fortification walls and south of the city, see Özyiğit – Erdoğın 2000, p. 14-15; Özyiğit 2001, 3-5, drawing 2; Özyiğit 2003, p. 118-119, fig.9. For the settlement area revealed at Phokaia, which dates to the Protogeometric period and to the seventh century, see also *ibid.* p. 115-116. Outside Ionia, in other centers of the East Greek world as well, burial clusters in the form of piled-up burials, situated far from each other, have been encountered. For such a burial cluster found at Grynaion, see Özkan 1993, p. 1-15. The Ialysos and Kamiros necropoleis also have burial clusters scattered over a large area. For different burial clusters at Ialysos, see Gates 1983, p. 19-21. Kamiros has burial clusters extending over a large area, see *ibid.* p. 21-22, plan 9. Besides these, I.Morris has stated that at Vroulia, clusters of cremation burials belong to family plots, see Morris 1992, p. 179. For discussion of the burial customs at Vroulia, see Sørensen 2002, p. 243-252.

³⁴ R.V. Nicholls has stated that the cemetery for children and infants may have been used until the city was abandoned at the end of the fourth century, see Nicholls 1958/1959, p. 44, 126.

³⁵ Numerous graves in the necropolis area of Yamanlar show that the area was used from the beginning of the sixth until the last quarter of the fourth century. In this area Clazomenian sarcophagi belonging to the sixth century were retrieved from tumuli. In a manner reminiscent of the tumuli of Klazomenai, they were placed in pits hollowed out of the bedrock, surrounded with a single

At Miletos, the grave monument located on the Kazartepe hill outside the Archaic fortification wall, known as “the Lion Tomb”³⁶, and the stone sarcophagi³⁷ uncovered in the village of Balat, are rare burial groups of the Archaic period. These graves show that at least one part of the Archaic necropolis of Miletos was situated along the sacred road leading to Didyma³⁸. At Ephesos, burial groups of the late Archaic and Classical periods have been found at two separate points outside the settlement. East of the Ayasoluk hill, where the early settlement of Ephesos was located, eight graves revealed in the course of a rescue excavation indicate that one of the city’s Archaic and Classical necropoleis was in this area³⁹. Furthermore, burial groups of the Archaic and Classical periods have been uncovered at a point near one of the Archaic neighborhoods and beneath the Roman agora and the Tetragonos Agora⁴⁰.

course of stones and covered with stones and earth. This necropolis, identified in 1931, was excavated between 1948 and 1951, but has unfortunately remained unpublished except for brief information, see Miltner 1932, p. 149; Cook 1958/1959, p. 3, pl.1; Cook 1974, p. 55-60; Akurgal 1983, p. 58-59. In a necropolis area identified immediately outside the city’s fortification walls, pithos and stone sarcophagus graves belonging to adults have come to light. On the basis of the grave gifts retrieved from them, this cemetery must have been used from the last quarter of the seventh century onwards and throughout the sixth century, see Akurgal 1999a, p. 33-47; Akurgal 1999b, p. 52-57; Akurgal 2002, p. 217-218, pl. 22.

³⁶ The Lion Tomb of Miletos is located 500 m. south of the sacred gate and on the sacred road, see Forbeck – Heres 1997. Concerning the Archaic settlement of Miletos, and its fortification wall, see von Graeve 2000, p. 170-180.

³⁷ On stone sarcophagi belonging to the end of the sixth century and retrieved from a sandy area in the village of Balat, see Mellink 1977, p. 306-307; Müller-Wiener et. al. 1988, p. 253-278.

³⁸ Our knowledge of the early necropolis areas of Miletos is extremely limited. Outside the sacred gate and along the sacred road leading to Didyma, pithos and amphora burials of children and infants were retrieved in soundings carried out in the early 1900’s. E. Forbeck states that this area, from which mostly infant and child burials were retrieved, is probably a necropolis reserved for children, like the one at Smyrna. She also notes that the sacred road was not used as a necropolis area until the middle of the sixth century and that other points south of the city may also have been used as burial grounds, see Forbeck – Heres 1997, p. 51. For comprehensive information on the Archaic necropolis area of Miletos, see Philipp 1981, p. 149; Forbeck – Heres 1997, p. 47-51.

³⁹ The graves that came to light on the east of the Ayasoluk hill probably belong to the early city of Ephesos, identified on the top of the hill. Work done on the hill of Ayasoluk yielded finds from the second millennium onwards and belonging to the Protogeometric, Geometric, Archaic and Classical periods. For finds uncovered on the Ayasoluk hill and for the early settlement of Ephesos, see Kerschner 2005. For the graves retrieved from east of the hill, see also İċten – Evren 1988, p. 85-110.

⁴⁰ The graves in question must belong to the Smyrna settlement of ancient Ephesos. For data relevant to these settlements, see Scherrer 2001, p. 59-61. For the burials, see Langman 1967, p. 103-123; Scherrer et. al. 2000, p. 47; Scherrer et. al. 2000-01, p. 159-179.

On Samos, two cemeteries used during the Archaic period have been identified outside the northern and western sections of the city wall. Graves uncovered through excavation in the western necropolis proved that the cemetery was used from the end of the seventh century onwards, into the Hellenistic period. Both adults and children were buried here. The northern necropolis yielded graves of the sixth century⁴¹.

3) Necropoleis of the Classical Period

As noted, in the fifth century, after the suppression of the Ionian revolt, the ancient city of Klazomenai was largely abandoned and the settlement moved to the island of Karantina. However, a few graves of the first half of the fifth century have been found in the Yıldız Tepe and Akpınar necropoleis (fig.1: ns.2 and 6)⁴². These show that these cemeteries were used alongside the settlement of the first half of the fifth century. That the mainland was in this period mostly abandoned is probably the reason for the other cemeteries remaining unused.

Graves uncovered in the Monastirakia, Yıldız Tepe, Akpınar and Çayır necropoleis (fig.1: no.1, 2, 6 and 7) show that these burial grounds were used throughout the late Classical period. So far the Akpınar and Çayır necropoleis appear to be the most intensively used in this period. On the other hand, the DSİ and Kalabak necropoleis, which had been used in the Archaic period, were now abandoned. Outside Klazomenai, the Archaic cemeteries of Ephesos, Smyrna and Samos were also used throughout the Classical period⁴³.

Graves from those necropoleis at Klazomenai which remained in use during the fourth century show that simple inhumation was the rite used

⁴¹ On the necropoleis of Samos, see Boehlau 1898. Numerous adult and child burials have been uncovered in recent excavations in the west necropolis of Samos, see Tsakos 1996.

⁴² The amphorae retrieved from the Akpınar necropolis and dated to the first half of the fifth century were used for infant burials. In the Yıldız Tepe necropolis we uncovered a sarcophagus that, with the help of an Attic lekythos, is dated to the first quarter of the 5th century. For the Akpınar and Yıldız Tepe graves, see Hürmüzlü 2004, p. 88, footnote 43.

⁴³ For Classical Period graves retrieved at Ephesos, see Langman 1967, p. 103-123; Mitsopoulou-Leon 1972-75, p. 252-265; Scherrer et. al. 2000, p. 47; Scherrer et. al. 2000-01, p. 159-179. Concerning the use of the western necropolis at Samos throughout the Classical and Hellenistic periods, see Tsakos 1996, p. 124. At Smyrna, among the tumuli identified on the Yamanlar Mountain one encounters some that were used in the fourth century, see Akurgal 1987, p. 37-40.

for adults and children in this period⁴⁴. In some cases, graves of this period were covered with roof tiles. Infants continued to be buried in amphorae, as in the Archaic period. In the Classical period, the custom of burial within a sarcophagus or some other receptacle was abandoned for both adults and infants.

4) Burial Groups of the Hellenistic and Roman Periods

The latest of the graves found so far in the Yıldız Tepe and Akpınar necropoleis at Klazomenai date to the end of the fourth or early third century⁴⁵. In the other burial grounds no grave that might belong to this or any later period has been found. However, in sector C (fig. 1) early Hellenistic graves covered with Corinthian-type roof tiles were found set partially among the ruins of fourth century houses. After the settlement was largely removed to the island of Karantina this area was used for agricultural purposes; yet this evidence shows that it was, if only occasionally, also used as a burial ground.

Aside from Hellenistic graves, burial groups of the Roman period were retrieved in the northern section of the Liman Tepe mound (fig.1: A), at a point near the shore and at the beginning of the causeway leading to the island of Karantina⁴⁶. These graves were designed as chambers, their walls constructed of roughly worked flagstones, bricks or Hellenistic water pipes. In a greatly damaged grave complex retrieved from close beneath the surface, the existence of two phases was detected. These grave clusters must belong to Klazomenians who lived on the island of Karantina until the beginning of the fifth century A.D.⁴⁷.

It is understood that, with the complete abandonment of the mainland settlement at Klazomenai, the former necropolis areas also fell into disuse

⁴⁴ Concerning the burial customs of the Classical period at Klazomenai, see Hürmüzlü 2004, p. 82-83, 88, fig.11.

⁴⁵ For Akpınar necropolis graves dated to the end of the fourth – beginning of the third century, see *ibid.* p. 88-89, fig. 23.

⁴⁶ For Roman Period graves retrieved at Klazomenai, see *ibid.* p. 89; Erkanal et. al. 2003, p. 168-169, drawing 1; Beek – Beelen 1991, p. 35-36, fig. 6 and 7.

⁴⁷ Among the burial gifts from a grave uncovered in 1987 in the course of a rescue excavation was a figurine dated to the third century A.D., see *ibid.* p. 36, fig. 7.

and in the Hellenistic and Roman periods points (fig.1: A and C) close to the island of Karantina were chosen as burial grounds⁴⁸.

The Custom of Family Burial Plots

The burial clusters of Klazomenai and other centers which have been considered above show that in the Ionian settlements, multiple necropolis areas were used throughout long periods and at the same time. One should note that in the necropoleis of Klazomenai there is no differentiation in the burial customs or in the repertory of grave goods⁴⁹. This situation brings to mind the question of why people preferred to use numerous necropolis areas situated at considerable distance from each other.

As noted, at Klazomenai and in other Ionian centers burial clusters began to be relegated to places outside the city settlement areas in the seventh century, and from the middle of this century onwards burial within the settlement was evidently not permitted⁵⁰. One clearly sees that, as in the other Ionian cities, there was in Klazomenai from the beginning of the seventh century onwards an effort to improve the settlement area and organize the cemeteries⁵¹. As one result of this each of the tribes (phylai?) must have

⁴⁸ When the city of Smyrna moved from Bayraklı Mound to the heights of the Pagos at the end of the fourth century, the necropolis areas of the former city were also abandoned. The latest burials in the necropolis on the slopes of Yamanlar mountain belong to the fourth century. Concerning the abandonment of the Bayraklı mound, see Akurgal 1983, p. 57-58. In contrast, one sees that at sites such as Miletos, which continued to flourish in the Hellenistic and Roman periods, the Archaic necropolis areas continued to be used. At Miletos, where Archaic graves were retrieved on the sacred road leading to Didyma, Hellenistic and Roman burials were also uncovered, see Henninger – Kossatz 1979, p. 174-186; Forbeck 2002, p. 97-105. For graves of the Roman period, see Kleiner 1968, p. 124-125.

⁴⁹ This situation probably holds true in the other Ionian necropoleis as well. But only a few of the graves retrieved from the other centers have been published, which hinders any comparison. However, the data obtained from the necropoleis of Samos support our conclusion, see Löwe 1996, p. 94.

⁵⁰ I. Morris states that in the Greek world the custom of intramural burial for adults ends before the year 700, and that after about 600 one rarely encounters intramural child burials, see Morris 2000, p. 287.

⁵¹ At the beginning of the seventh century, a new period dawned in the Greek world, a period that manifests itself in the definite separation of sacred areas and of the worlds of the dead and the living, and in the re-structuring of settlement areas. This change has been linked to the birth of the concept of the “polis”. For a comprehensive discussion of the change and its causes, see Welwei 2000, p. 12-21; Morris 1987, p. 192; Whitley 2001, p. 98-101; Morris 1991a, p. 25-57. Because

used a different necropolis⁵². The fact that, except for periods when the settlement areas were abandoned due to historical events, the necropoleis of Klazomenai were used without interruption from the beginning of the seventh century to the end of the sixth (or, in the case of the Akpınar and Yıldız Tepe necropoleis, to the end of the fourth century) supports this view. One should note that in Abdera, a colony of Klazomenai, there are again burial grounds in different locations but used at approximately the same periods, as in the mother city. The necropoleis of Abdera are important in that they show that the desire to demonstrate membership of an extended family was also carried to the colonial cities⁵³.

Besides the use of different necropolis areas at Klazomenai, the burial groups in the Akpınar and DSİ cemeteries are located within regularly placed rectangular plots (fig. 5 and 6)⁵⁴. In particular, findings from the Akpınar necropolis show that, from the very first phase of use, the area was

of the limited nature of relevant archaeological data, the question of just what kind of re-arrangements in civilian settlements were caused by the changes in Ionia from the end of the eighth century onwards is very much in need of discussion. In Ionia, if we except Ephesos and Samos, one encounters the first findings relevant to cult areas at the end of the eighth century. Smyrna, Erythrai and Miletos built their first temples at this time. Contact with the orient began. Prosperity increased, and there was probably a growth in population. Besides such changes, it is clear that this period, called "the Golden Age of Ionia", also had its effects on the structuring of cities' settlement areas. J.N. Coldstream states that with the building of the city's first fortification wall, together with the construction of its first temple shortly before 700, it becomes possible to speak of the "polis" of Smyrna, see Coldstream 1984, p. 39. For a comprehensive explanation concerning sacred precincts, the building of temples and their separation from settlement areas at the end of the eighth century, see also Simon 1997, p. 125-143.

⁵² At Klazomenai there is no evidence to indicate the tribes that formed the city. However, Herodotos states that the four phylai of the Athenians were valid for the Ionians as well, see Herodotos V, 66 and 69. He gives the names of all four: Geleontes, Aigikoreis, Argadeis and Hopletes. For Miletos, in addition to the four mentioned by Herodotos, the names of two other Phylai (Boris and Pinups) are known. For a comprehensive discussion of the data obtained concerning the Ionian phylai in Miletos and her colonies, see Ehrhardt 1983, p. 98-112. We know of the existence of five phials at Ephesos up until the Roman period. For a discussion concerning phylai and chiliarities in the light of sources obtained at Ephesos from the Early Hellenistic period onwards, see Engelmann 1996, p. 94-100. Our knowledge of phials in Ionia is mostly dependent on findings from southern Ionia. In contrast, the existence of phylai is clear from a sixth century inscription retrieved on Chios known as the Chian Constitution, but the names of these phylai were not uncovered. See Huxley 1966, p. 33-34. For a comprehensive and recent discussion of this subject, see Walter 1993, p. 89-97.

⁵³ For the different necropolis areas uncovered at Abdera, see Koukouli-Chrysanthaki 1994, p. 36, fig. 4; Kallintzi 2004, p. 271-289.

⁵⁴ For the burial plots in the Akpınar and DSİ necropoleis of Klazomenai, see Hürmüzlü 2004, p. 78-80, fig. 1, 3 and 4.

divided into plots for different grave groups, and each was soon surrounded with stone walls. This parcel system was regularly used in the Akpınar necropolis until the abandonment of Klazomenai around the year 550. Burials made until this date respected the limits defined by the walls. One should note, however, that as the burial plots filled up, especially from about 600 onwards, graves were placed one on top of the other. In each of the twelve sections that have been defined to date in the Akpınar necropolis, an average of ten or fifteen burials have been identified, some of them contemporary with each other. One sees that the plots were used through approximately four or five generations. The Akpınar necropolis was again used around the year 520, as mainland reoccupation began. But in this second period, the parcel system was abandoned and graves were irregularly placed with no attention to definite borders and even on top of the former dividing walls.

The surrounding of burial plots by peribolos walls that we see in the Akpınar and DSİ necropoleis of Klazomenai is a practice found in many centers of the Greek world, and particularly in Athens⁵⁵. Nevertheless, the surrounding of burial groups with peribolos walls that is seen in the necropoleis of Klazomenai must, as has been pointed out by Y.Ersoy, be evaluated in a different way from the Athenian examples⁵⁶. In Athens, burial areas were surrounded with peribolos walls at a later date, as part of the respect shown to graves and to the cult of the dead⁵⁷. In contrast, the parcel

⁵⁵ Burial plots surrounded by peribolos walls are also encountered in Ionia and in other western Anatolian centers. In the necropolis area identified at Phokaia, burial clusters of the sixth century were retrieved inside rectangular rooms, see Özyiğit 2001, p. 3-5, drawing 2; Özyiğit 2003, p. 127, fig. 9. In the western and northern necropoleis on Samos, some graves are surrounded by rectangular and others by circular peribolos walls, see Boehlau 1898, p. 27-28, 33, fig. 18 ve 20. In the necropolis of Pitane, the burial clusters in the form of piled-up graves show that each family group preferred a distinct place. E.Akurgal states that graves were situated inside circular family plots measuring about 3.5 m. in diameter and surrounded by stone walls, see Akurgal 1961, p. 5-6; Akurgal 1993, p. 60, pl. 110.

⁵⁶ For an explanation of how the system of the Akpınar necropolis burial plots is based on a mentality different from the “ancestor cult” and also of the findings obtained from mainland Greece, see Ersoy 2005, p. 12, footnote 55.

⁵⁷ Concerning the surrounding of Athenian grave clusters with peribolos walls, see Antonaccio 1995, p. 207-220. For discussion and explanations related to Athenian family graves, see also Humphreys 1980, p. 96-126; Morris 1991, p. 147-169; Colsterman 1999, p. 25-72. On the ancestor cult and votive offerings made to it, see Antonaccio 1998, p. 46-70; Antonaccio 1995, p. 243-268. In contrast to I.Morris and J.Whitley, C.M.Antonaccio emphasizes that burial grounds cannot be defined by relations of parentage. For the views of Morris and Whitley on family burial plots, see Morris 1987, p. 52-54, 61-69, 72-96; Whitley 1991, p. 64-67.

system seen in the Akpınar and DSI necropoleis was applied from the very first phase of use and for the purpose of emphasizing the borders of the graves belonging to each family having a place in the tribal system.

Conclusions

Work done at Klazomenai has established that the ancient city was not formed of scattered settlement areas but rather, from its foundation at the end of the eleventh century onwards, expanded westwards as the need arose. The areas occupied at the beginning of the Protogeometric period were also used throughout the Archaic and Classical periods (fig. 1).

The burial groups uncovered at Klazomenai and in other Ionian centers show that in the Protogeometric and Geometric periods infants and children were buried inside the settlement. Findings from Ionia, particularly from Klazomenai and Smyrna, indicate that from the middle of the seventh century onwards intramural burial was not permitted. It is seen that from this time onwards, the dead, including infants and children, began to be kept outside the city in an area particular to them. At Klazomenai one observes that the necropolis areas were located around the settlement and formed a border to it; these areas began to be used from the beginning of the seventh century onwards. It is clearly seen that the areas set aside for necropoleis and houses existed in parallel to each other, or fell into disuse at the same time. From this time onwards, the limits of the residential areas and of the industrial neighborhoods containing workshops were clearly defined and that these areas were arranged in an organized way. Settlement and cemetery organization at Klazomenai thus parallel each other.

In choosing locations for necropoleis when they were moved outside settlement areas, the particular topographic features of the cities were doubtless of importance. Yet one also observes that care was taken in choosing sites for cemeteries to see that they were easy to reach and far from land that could be used for agriculture. The necropoleis of Klazomenai were sited on the slopes of hills or in sandy areas. A similar situation holds true for the other Ionian centers. In periods when agriculture was extremely important it is clear that the dead were kept apart from land that was agriculturally useful to the city.

Finally in Ionia from the seventh century onwards one encounters the use of multiple necropoleis. Each of these necropoleis was used at the same time and throughout long periods; each must have belonged to one of the tribes (perhaps phylai?) within the city. The many tumuli identified at Klazomenai and Smyrna belonged to people of high social standing; it is clear that such persons were not buried in the necropoleis of the common people.

To conclude, as this paper has shown, the necropoleis of Ionia provide important information about the arrangement of the cities, the organization of their settlement areas and their social structure.

Abbreviations and Bibliography

- Akurgal 1961 Akurgal, M., “Çandarlı (Pitane) Kazısı”, *TürkAD* 10, 1961, 5-6.
- Akurgal 1983 Akurgal, M., *Alt-Smyrna I. Wohnschichten und Athenatempel*, Ankara.
- Akurgal 1987 Akurgal, M., “Bayraklı Nekropolis Çalışmaları”, *KST* 9, 37-40.
- Akurgal 1993 Akurgal, M., *Eski Çağda Ege ve İzmir*, İzmir.
- Akurgal 1999a Akurgal, M., “Bayraklı Kazısı 1997”, *KST* 20, 33-47.
- Akurgal 1999b Akurgal, M., “Bayraklı Höyüğünde Arkaik Döneme Ait Küçük Bir Mezarlık ve Bazı Buluntular”, *TÜBA-AR* 2, 52-57.
- Akurgal 2002 Akurgal, M., “Smyrna- Kent Devlet”, *İzmir Kent Kültürü Dergisi* 5, 208-220.
- Antonaccio 1995 Antonaccio, C. M., *Archaeology of Ancestors. Tomb Cult and Hero Cult in Early Greece*, Lanham, Maryland.
- Antonaccio 1998 Antonaccio, C., “The Archaeology of Ancestors”, in: C.Dougherty-L. Kurke (eds.), *Cultural Poetics in Archaic Greece. Cult, Performance and Politics*, Cambridge, 46-70.
- Artzy 2001 Artzy, M., “Liman Tepe 2001”, *R.I.M.S. News. University of Haifa Leon Recanati Institute for Maritime Studies* 28, 3-4.
- AST Araştırma Sonuçları Toplantısı
- Aytaçlar 2004 Aytaçlar, N., *The Early Iron Age at Klazomenai*, in: *Klazomenai, Teos and Abdera: Metropoleis and Colony*, 17-41.
- Bakır 1983 Bakır, G., “Urla/Klazomenai Kazısı 1981 Yılı Çalışmaları Raporu”, *KST* 4, 63-68.
- Bakır 1984 Bakır, G., “1982 Yılı Urla/Klazomenai Kazısı Sonuçları Hakkında Rapor” *KST* 5, 221-229, fig 1-10.
- Bakır 1986 Bakır, G., “Klazomenai Lahitleri Üzerine Yeni Görüşler”, *X. Türk Tarih Kongresi*, 22-26 Eylül 1986, Ankara, 4-5.
- Bakır et. al. 2000 Bakır, G. – Y. Ersoy – B. Hürmüzlü – N. Aytaçlar – İ. Hasdağlı, “1998 Yılı Klazomenai Çalışmaları”, *KST* 21.2, 47-52.
- Bakır et. al. 2001 Bakır, G. – Y. Ersoy – İ. Fazlıoğlu – N. Aytaçlar – H. Cevizoğlu – B. Hürmüzlü – Y. Sezgin, “1999 Klazomenai Kazısı”, *KST* 22.2, 27-38.
- Bakır et. al. 2002 Bakır, G. – Y. Ersoy – İ. Fazlıoğlu – N. Aytaçlar – B. Hürmüzlü – F. Özbay – Y. Sezgin – G. Özbilen, “2000 Klazomenai Kazısı”, *KST* 23.1, 41-54.
- Bakır et. al. 2003 Bakır, G. – Y. Ersoy – İ. Fazlıoğlu – F. Özbay – B. Özer – M. Zeren, “2001 Yılı Klazomenai Kazısı”, *KST* 24.1, 205-218.
- Bakır et. al. 2004 Bakır, G. – Y. Ersoy – M. Zeren – F. Özbay – B. Hürmüzlü, “2002 Yılı Klazomenai Kazısı”, *KST* 25.2, 101-110.

- Bakır et. al. 2005 Bakır, G. – Y. Ersoy – B. Özer – K. Uzun – M. Zeren, “2003 Yılı Klazomenai Kazısı”, KST 26.2, 1-12.
- Beek – Beelen 1991 van Beek, R. – J. Beelen, “Excavations on Karantina Island in Klazomenai: A Preliminary Report”, *Anatolica* 17, 31-57.
- Beek – Beelen 1999 van Beek, R. – J. Beelen, “Excavations on Karantina Island (Klazomenai)”, in: R. F. Docter – E. M. Moormann (eds.), *Proceedings of the XVth International Congress of Classical Archaeology*, Amsterdam, July 12-17 1998, Amsterdam, 424-425.
- Béquignon – Laumonier 1925
Béquignon, Y. – A. Laumonier, “Fouilles de Téos (1924)”, *BCH* 49, 281-321.
- Boehlau 1898 Boehlau, J., *Aus ionischen und italischen Nekropolen*, Leipzig.
- Boysal – Ögün 1962 Boysal, Y. – B. Ögün, “Teos Kazısı 1962 Kısa Raporu”, *TürkAD* 12, 12-13.
- Boysal 1963 Boysal, Y., “1962 Senesi Teos Kazıları Hakkında Kısa Rapor”, *TürkAD* 13, 5-7.
- Brann 1962 Brann, E. T. H., *The Athenian Agora Volume VIII. Late Geometric and Protoattic Pottery, Mid 8th to late 7th Century BC*, Princeton, N.J.
- Coldstream 1984 Coldstream, J. N., *The Formation of the Greek Polis: Aristotle and Archaeology*, Opladen.
- Colsterman 1999 Colsterman, W. E., *The Self-Presentation of the Family: The Function of Classical Attic Peribolos Tombs*, (UMI 9927039, Ann Arbor), Baltimore, Maryland.
- Cook 1958/1959 Cook, J. M., “Old Smyrna 1948-1951”, *BSA* 53-54, 1-34.
- Cook 1974 Cook, R. M., “Old Smyrna: The Clazomenian Sarcophagi”, *BSA* 69, 55-60, pls.8-13.
- Cook – Nicholls 1998 Cook, J. M. – R. V. Nicholls, *Old Smyrna Excavations. The Temples of Athena*, The British School at Athens Supplementary Volume no. 30, London.
- Ehrhardt 1983 Ehrhardt, N., *Milet und seine Kolonien*, Frankfurt am Main.
- Engelmann 1996 Engelmann, H., “Phylen und Chiliastyen von Ephesos”, *ZPE* 113, 94-100.
- Erkanal et. al. 2003 Erkanal, H. – M. Artzy – O. Kouka, “2002 Yılı Liman Tepe Kazıları”, *KST* 25, 165-178.
- Ersoy 2003 Y. E. Ersoy, “Pottery Production and Mechanism of Workshops in Archaic Clazomenae”, in: B. Schmaltz – M. Söldner (eds.), *Griechische Keramik im kulturellen Kontext. Akten des Internationalen Vasen-Symposiums in Kiel vom 24. bis 28.9.2001* veranstaltet durch das Archäologische Institut der Christian-Albrechts Universität zu Kiel, Padeborn, 254-257.
- Ersoy 2004 Ersoy, Y. E., “Klazomenai: 900-500 BC. History and Settlement Evidence”, *Klazomenai, Teos and Abdera: Metropoleis and Colony*, 43-76.

- Ersoy 2005 "Notes on History and Archaeology of Early Clazomenae", in: Frühes Ionien: Eine Bestandsaufnahme. Symposium Panionion 26 September - 1 Oktober 1999 (in print).
- Forbeck – Heres 1997 Forbeck, E. – H. Heres, "Das Löwengrab von Milet", 136. BWPr, Berlin, 1-59.
- Forbeck 2002 Forbeck, E., "Gräber des hellenistischen und kaiserzeitlichen Milet", in: G. Berns – H. von Hesberg – L. Vandeput – M. Waelkens (eds.), *Patris und Imperium. Kulturelle und politische Identität in den Städten der römischen Provinzen Kleinasien in der frühen Kaiserzeit*. Kolloquium Köln, November 1998, 97-105.
- Gates 1983 Gates, C., *From Cremation to Inhumation: Burial Practices at Ialysos and Kameiros During the Mid-Archaic Period, ca. 625-525 B.C.* (Occasional Paper 11, Institute of Archaeology, University of California), Los Angeles.
- Güngör 2004 Güngör, Ü., "The History of Klazomenai in the Fifth Century and the Settlement on the Island", in: *Klazomenai, Teos and Abdera: Metropoleis and Colony*, 121-131.
- Hägg 1973 Hägg, I., "Report on the Field-Work in the Levandis Sector 1970-72", in: Inga and R.Hägg (eds.), *Excavations in the Barbouna Area at Asine, Upsala*, 22-82.
- Hägg 1974 Hägg, R., *Die Gräber der Argolis*. 1. Lage und Form der Gräber, Upsala.
- Henninger – Kossatz 1979 von Henninger, F. J. – A. U. Kossatz, "Milet 1977. Zwei hellenistische Gräber der milesischen Nekropole", *IstMitt* 29, 174-186.
- Humphreys 1980 Humphreys, S. C., "Family Tombs and Tomb Cult in Ancient Athens: Tradition or Traditionalism", *JHS* 100, 96-126.
- Huxley 1966 Huxley, G. L., *The Early Ionians*, London.
- Hürmüzli 2004 Hürmüzli, B., "Burial Grounds at Klazomenai: Geometric through Hellenistic Periods", in: *Klazomenai, Teos and Abdera: Metropoleis and Colony*, 77-95.
- Hürmüzli 2004a Hürmüzli, B., "A New Type of Clazomenian Sarcophagus: The Alteration of the Burial Customs in Clazomenae", in: R. Bol – D. Kreikenbom (eds.), *Sepulkral- und Votivdenkmäler östlicher Mittelmeergebiete (7.Jh.v.-1.Jh.n.Chr.). Kulturbegegnungen im Spannungsfeld zwischen Akzeptanz und Resistenz. Akten des Internationalen Symposiums vom 01-03. November 2001 in Mainz, Mönchsee, Paderborn, 2004*, 195-198.
- İçten – Evren 1988 İçten, C. – A. Evren, "Selçuk-Efes 3447 Parsel Kurtarma Kazısı", *MKKS* 8, 85-110.
- Kallintzi 2004 Kallintzi, K., "Abdera: Organization and Utilization of the Area Exta Muros", in: *Klazomenai, Teos and Abdera: Metropoleis and Colony*, 271-289.

- Kerschner 2005 Kerschner, M., "Die Ionische Wanderung im Lichte neuer archäologischer Forschungen in Ephesos", in: Olshausen-H.Sonnabend (eds.), "Trojaner sind wir gewesen." Migrationen in der antiken Welt. Akten des 8. Internationalen Kolloquiums zur Historischen Geographie des Altertums, Stuttgart 8.-12. Mai 2002, 1-13 (in print).
- Klazomenai, Teos and Abdera: Metropoleis and Colony
Moustaka, A. – E. Skarlatidou – M. C. Tzannes – Y. Ersoy (eds.), Klazomenai, Teos and Abdera: Metropoleis and Colony. Proceedings of the International Symposium held at the Archaeological Museum of Abdera. Abdera, 20-21 October 2001, Thessaloniki.
- Kleiner 1968 Kleiner, G., Die Ruinen von Milet, Berlin.
- Koparal – İplikçi 2004
Koparal, E. – E. İplikçi, "Archaic Olive Oil Extraction Plant in Klazomenai", in: Klazomenai, Teos and Abdera: Metropoleis and Colony, 221-234.
- Koukouli-Chrysanthaki 1994
Koukouli-Chrysanthaki, C., "The Cemeteries of Abdera", in: J.de La Genière (ed.), *Nécropoles et sociétés antiques. Grèce, Italie, Languedoc. Actes du Colloque International du Centre de Recherches Archéologiques de l'Université de Lille III*. Lille, 2-3 décembre 1991 (Chaiers du Centre Jean Bérard 18), Naples, 33-77.
- Kraiker – Kübler 1939
Kraiker W. – K. Kübler, Die Nekropolen des 12. bis 10. Jahrhunderts, Kerameikos I, Berlin.
- KST Kazi Sonuçları Toplantısı
- Langmann 1967 Langmann, G., "Eine spätarchaische Nekropole unter dem Staatsmarkt zu Ephesos", in: Festschrift für Fritz Eichler zu dessen achtzigstem Geburtstag am 12. Oktober 1967, Wien, 103-123.
- Lemos 2003 Lemos, I. S., *The Protoegeometric Aegean. The Archaeology of the Late Eleventh and Tenth Centuries BC*, Oxford.
- Löwe 1996 Löwe, W., "Die Kasseler Grabung 1894 in der Nekropole der archaischen Stadt", in: Samos. Die Kasseler Grabung 1894 in der Nekropole der archaischen Stadt von Johannes Boehlau und Edward Habich, Kassel 1996, 24-119.
- Mellink 1977 Mellink, M. J., "Archaeology in Asia Minor", *AJA* 81, 305-306.
- Miltner 1932 Miltner, F.-H., "Bericht über eine Voruntersuchung in Alt-Smyrna", *ÖJh* 27, 129-188.
- Mitsopoulou-Leon 1972-75
Mitsopoulou-Leon, V., "Ein Grabfund des vierten vorchristlichen Jahrhunderts aus Ephesos", *ÖJh* 50, 252-265.
- MKKS Müze Kurtarma Kazıları Semineri
- Morris 1987 Morris, I., *Burial and Ancient Society. The Rise of the Greek City-State*, Cambridge.

- Morris 1991 Morris, I., "The Archaeology of Ancestors: The Saxe/Goldstein Hypothesis Revisited" *Cambridge Archaeological Journal* 1:2, 147-169.
- Morris 1991a Morris, I., "The Early Polis as City and State", in: J. Rich – A. Wallace-Hadrill (eds.), *City and Country in the Ancient World*, London and New York, 25-57.
- Morris 1992 Morris, I., *Death-Ritual and Social Structure in Classical Antiquity*, Cambridge.
- Morris 2000 Morris, I., *Archaeology as Cultural History. Words and Things in Iron Age Greece*, Oxford.
- Müller-Wiener et. al. 1988 Müller-Wiener, W. – D. Göksel – V. Von Graeve – R. Biering – M. Heinz – H. Svenshon, "Milet 1987. Vorbericht über die Arbeiten des Jahres 1987", *IstMitt* 38, 251-290.
- Nicholls 1958/1959 Nicholls, R. V., "Old Smyrna: The Iron Age Fortifications and Associated Remains on the City Perimeter", *BSA* 53-54, 35-137.
- Oikonomos 1921 Oikonomos, G. P., "Ανασκαφαι εν Κλαζομεναις" *Praktika*, 63-74.
- Özbay 2004 Özbay, F., "The History and Archaeology of Klazomenai in the Fourth Century BC and the Settlement at Chyton", in: *Klazomenai, Teos and Abdera: Metropoleis and Colony*, 133-159.
- Özgünel 2004 Özgünel, C., "Erythrai Antik Yerleşimi 2003 Sezonu Yüzey Araştırmaları", *AST* 22.2, 245-250.
- Özkan 1993 Özkan, T., "1992 Yılı Gryneion Kazısı Çalışmaları", *MKKS* 4, 1-15.
- Özyiğit – Erdoğan 2000 Özyiğit, Ö. – A. Erdoğan, "Les sanctuaires de Phocée à la lumière des dernières fouilles", *Les Cultes des cités phocéennes. Actes de colloque international organisé par le Centre Camille-Julian, Aix-en-Provence/Marseille, 1999, Aix-en-Provence*. 11-23.
- Özyiğit 2001 Özyiğit, Ö., "1999 Yılı Phokaia Kazı Çalışmaları", *KST* 22, 1-15.
- Özyiğit 2003 Özyiğit, Ö., "Recent Work at Phokaia in the Light of Akurgal's Excavations", *Anatolia* 25, 109-127.
- Philipp 1981 Philipp, H., "Archaische Gräber in Ostionien", *IstMitt* 31, 149-166.
- Scherrer et. al. 2000 Scherrer, P. – M. Kerschner – M. Lawall – E. Trinkl, "Ephesos in archaischer und klassischer Zeit. Die Ausgrabungen in der Siedlung Smyrna", in: F. Krinzinger (ed.), *Die Ägäis und Westliche Mittelmeer. Beziehungen und Wechselwirkungen 8. bis 5. Jh. v. Chr.*, Wien 24. bis 27. März 1999, Wien, 45-54.
- Scherrer et. al. 2000-01 Scherrer, P. – G. Forstenpointner – S. Fabrizio-Reuer – E. Trinkl, "Bestattung eines Lyrspielers in Ephesos aus dem 5. Jh. v. Chr.", *Archaeologia Austriaca* 84-85, 159-179.
- Scherrer 2001 Scherrer, P., "The Historical Topography of Ephesos", in: D. Parrish (ed.), *Urbanism in Western Asia Minor. New Studies on Aphrodisias, Ephesos, Hierapolis, Pergamon, Perge and Xanthos*, Portsmouth, Rhode Island, 57-87.

- Simon 1997 Simon, C. G., "The Archaeology of Cult in Geometric Greece. Ionian Temples, Altars and Dedications", in: S. Langdon (ed.), *New Light on a Dark Age. Exploring the Culture of Geometric Greece*, Columbia, London, 125-143.
- Sørensen 2002 Sørensen, L. W., "The Archaic Settlement at Vroulia on Rhodes and Ian Morris", *Acta Hyperborea* 9, 243-253.
- Tsakos 1996 Tsakos, K., "Stadt und Nekropolen: Samos in der archaischen Epoche (6. Jh.)", in: Samos. Die Kasseler Grabung 1894 in der Nekropole der archaischen Stadt von Johannes Boehlau und Edward Habich, Kassel 1996, 120-131.
- TÜBA-AR Türkiye Bilimler Akademisi Arkeoloji Dergisi
- Tzannes 2004 Tzannes, M. C., "The Excavations of G.Oikonomos at the Archaic Cemetery of Monastirakia in Klazomenai, 1921-22", in: Klazomenai, Teos and Abdera: Metropoleis and Colony, 97-120.
- von Graeve 2000 von Graeve, V., "Miletos", *Der Neue Pauly* 8, 170-180.
- Walter 1993 Walter, U., *An der Polis teilhaben. Bürgerstaat und Zugehörigkeit im archaischen Griechenland*, *Historia* 82, Stuttgart.
- Welwei 2000 Welwei, K. W., *Polis und Arché. Kleine Schriften zu Gesellschafts- und Herrschaftsstrukturen in der griechischen Welt*, *Historia* 146, Stuttgart.
- Whitley 1991 Whitley, J., *Style and Society in Dark Age Greece. The Changing of Face Pre-literate Society 1100-700 BC*, Cambridge.
- Whitley 2001 Whitley, J., *The Archaeology of Ancient Greece*, Cambridge.
- Williams 1982 Williams, C. K., II, "The Early Urbanization of Corinth", *ASAtene* 60, 9-19.

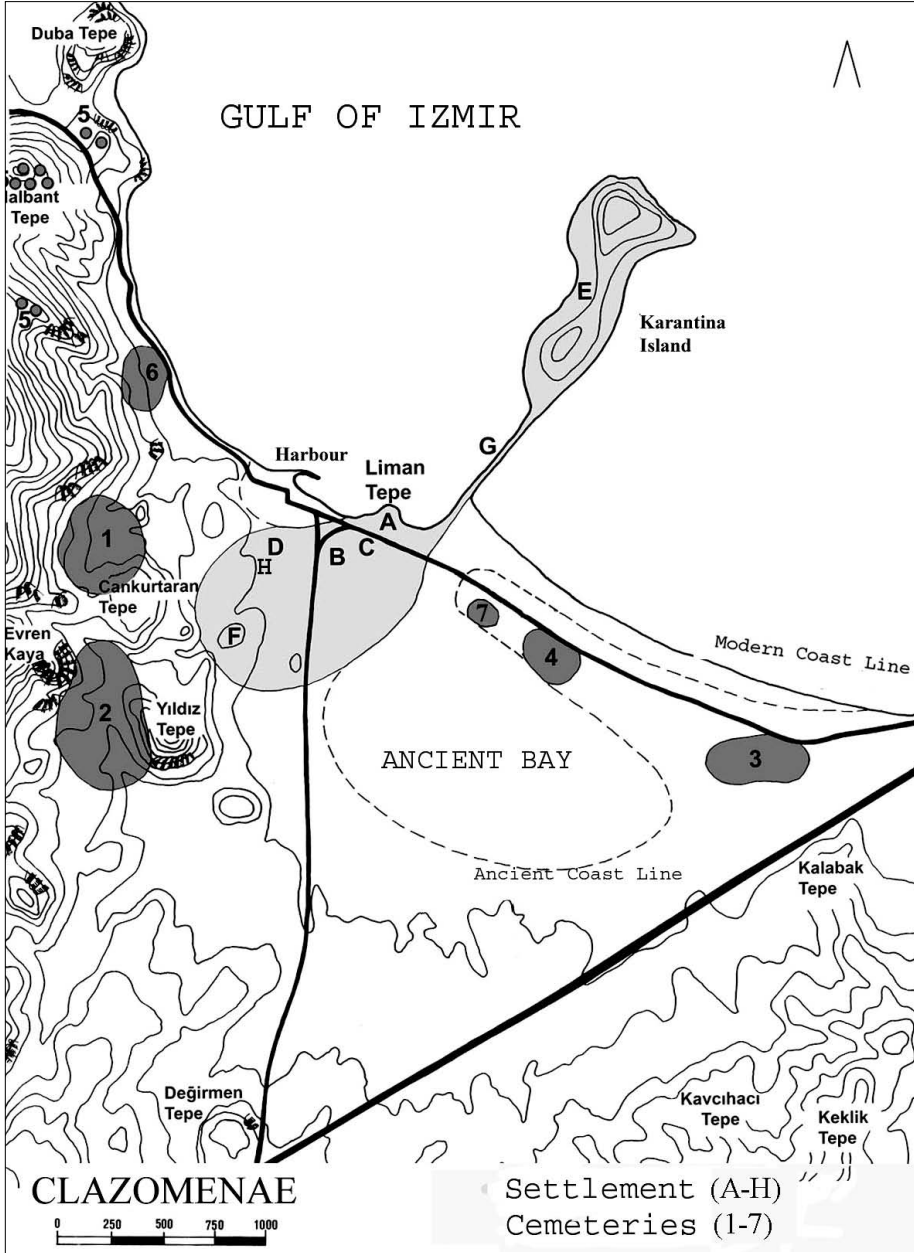


Fig. 1 Topographical Plan of Klazomenai



Fig. 2 General View of Klazomenai



Fig. 3 Cist Grave at Sector A in Klazomenai



Fig. 4 Yıldız Tepe Necropolis



Fig. 5 Burial Plots at the Akpınar Necropolis

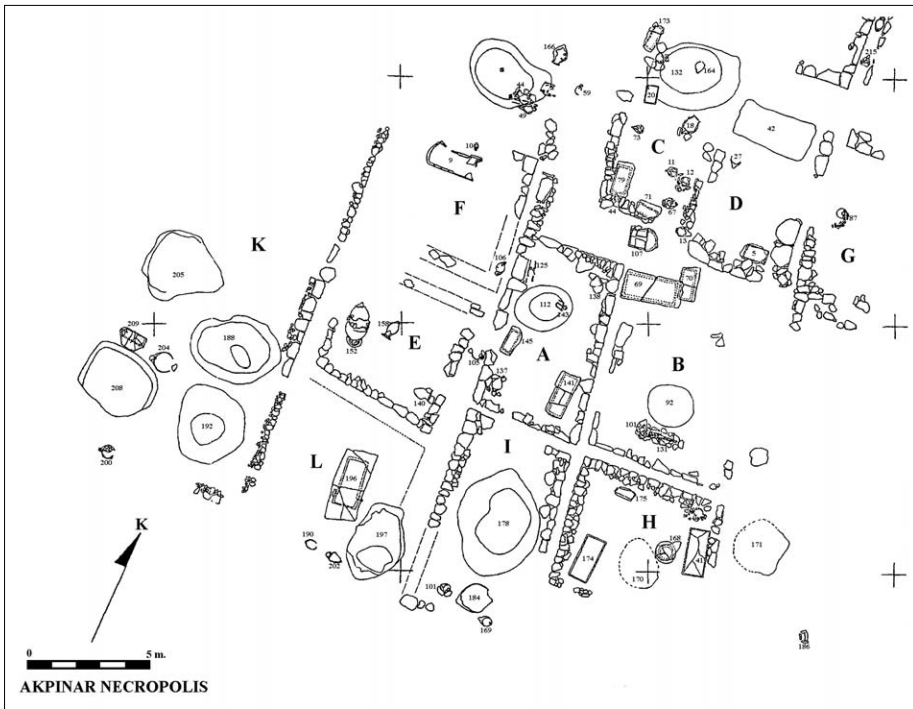


Fig. 6 Ground Plan of the Burial Plots at the Akpınar Necropolis



Fig. 7
Tumulus at Nalbant Tepe

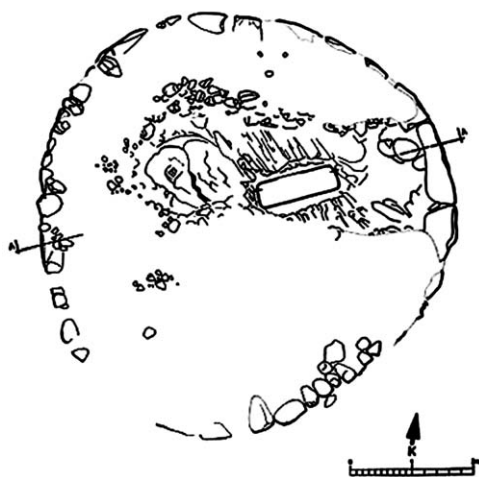


Fig. 8 Tumuli at Nalbant Tepe and Duba Tepe