

IL MEDITERRANEO E LA STORIA III

DOCUMENTANDO CITTÀ PORTUALI – DOCUMENTING PORT CITIES

a cura di

LAURA CHIOFFI, MIKA KAJAVA, SIMO ÖRMÄ



ROMA 2021

IL MEDITERRANEO E LA STORIA III

DOCUMENTANDO CITTÀ PORTUALI – DOCUMENTING PORT CITIES

a cura di

LAURA CHIOFFI, MIKA KAJAVA, SIMO ÖRMÄ

Convegno organizzato con il sostegno di /
The conference was organized with the support of



INSTITUTUM
ROMANUM
FINLANDIAE



ISTITUTO SVEDESE
DI STUDI CLASSICI
A ROMA



RIKSBANKENS
JUBILEUMSFOND

STIFTELSEN FÖR HUMANISTISK OCH
SAMHÄLLSVETENSKAPLIG FORSKNING



UNIVERSITÀ
di **VERONA**

IL MEDITERRANEO E LA STORIA III

DOCUMENTANDO CITTÀ PORTUALI - DOCUMENTING PORT CITIES

Atti del convegno internazionale
Capri 9-11 maggio 2019

a cura di
LAURA CHIOFFI, MIKA KAJAVA, SIMO ÖRMÄ

Acta Instituti Romani Finlandiae,
rivista internazionale open-access sottoposta a peer review

Acta Instituti Romani Finlandiae,
an international peer-reviewed open-access series

Direttore / *Director*

MIKA KAJAVA, Helsinki

Redazione / *Editing*

SIMO ÖRMÄ, Roma

Comitato scientifico / *Editorial board*

MARJO KAARTINEN – MIKA KAJAVA – ARJA KARIVIERI

Comitato editoriale internazionale / *International editorial advisory board*

John Bodel (Providence, USA), Alfredo Buonopane (Verona), Irene Bragantini (Napoli),
Michel Gras (Paris – Roma), Klaus Herbers (Erlangen), Sybille Ebert-Schifferer (Roma)

In copertina / *Cover illustration*

Mosaico a tessere bianche e nere dalla Villa Grande. Nettuno, Antiquarium del Museo Civico
(foto cortesia di Maria De Francesco).

ISBN 978-88-5491-147-5

ISSN 0538-2270

© Institutum Romanum Finlandiae

Roma 2021

www.irfrome.org

Finito di stampare nel mese di maggio 2021

Sommario

<i>Prefazione</i>	7
MIKA KAJAVA, <i>I porti del Mediterraneo. Introduzione</i>	9
MICHEL GRAS, <i>Approccio al litorale. Litorale e potere</i>	19
CHRISTOPHE MORHANGE – MARIA GIOVANNA CANZANELLA-QUINTALUCE – DAVID KANIEWSKI – NICK MARRINER – MARINELLA PASQUINUCCI – ELDA RUSSO ERMOLLI – MATTEO VACCHI, <i>Perché studiare l'ambiente dei porti antichi?</i>	27
PEKKA NIEMELÄ & SIMO ÖRMÄ, <i>Shipworms (Teredinidae) and ancient Mediterranean harbours</i>	41
SIMON KEAY †, <i>Reflections upon the Challenges in Documenting Portus Romae, the Maritime Port of Imperial Rome</i>	51
ARIJA KARIVIERI, <i>Scientific Methods in the Research on the Harbour City of Ostia: Recent Developments</i>	71
LENA LARSSON LOVÉN, <i>Male and Female Work in Images and Inscriptions from Ostia and Portus</i>	79
LAURA CHIOFFI, <i>Antium romana e i suoi porti, tra epigrafia ed iconografia</i>	93
MARCO BUONOCORE, <i>Porti e commercio sul litorale medio-adriatico della regio IV Augustea in età romana</i>	111
GIANFRANCO PACI, <i>Ancona e il suo porto: gli scavi 1998-2002 e le nuove conoscenze</i>	125
ALFREDO BUONOPANE, <i>Vivere e morire in un porto militare: aspettativa di vita e anni di servizio dei classarii della Classis Ravennas</i>	137
FULVIA MAINARDIS, <i>Aquileia (Regio X) nelle reti commerciali mediterranee: persone e merci dalla documentazione epigrafica</i>	153
FABRIZIO OPPEDISANO, <i>L'amministrazione dei porti nell'Italia ostrogota</i>	177
ANTONIO IBBA, <i>Porti (e non approdi) in Sardinia</i>	197

MARC MAYER I OLIVÉ, <i>Algunos aspectos de los puertos de la costa de la Hispania citerior (conventus Tarraconensis y Carthaginiensis)</i>	229
LÁZARO GABRIEL LAGÓSTENA BARRIOS – JOSÉ ANTONIO RUIZ GIL, <i>El puerto romano de Gades: nuevos descubrimientos y noticias sobre sus antecedentes</i>	249
EMILIO ROSAMILIA, <i>Quando una città non parla del suo porto: Leptis Magna</i>	265
KRISTIAN GÖRANSSON, <i>Port cities in ancient Cyrenaica</i>	291
EUGENIA EQUINI SCHNEIDER, <i>Le ricerche a Elaiussa Sebaste: studi multidisciplinari su una città portuale dell'Anatolia sud-orientale</i> ; ANNALISA POLOSA, <i>Ricerche recenti a Elaiussa Sebaste</i>	299
<i>Indici</i>	313
<i>Elenco dei contributori</i>	323

Prefazione

Il Mediterraneo e la Storia è giunto alla sua terza edizione, realizzando l'auspicio, formulato in occasione dell'ormai lontano primo incontro, di ritrovarsi in successivi appuntamenti "nei quali far convergere i comuni interessi di studiosi esperti, giovani promesse, nuove speranze della ricerca storica". E ancora una volta specialisti di varie discipline, di diversa formazione e provenienza, si sono incontrati per confrontarsi su questo tema e per riflettere su talune vicende del passato, in qualche modo condizionate dalla presenza di quello che i Romani chiamarono *mare nostrum*, in un momento in cui questo *mare* è tornato prepotentemente e tragicamente alla ribalta.

Il primo colloquio, sottotitolato *Epigrafia e archeologia in Campania: letture storiche*, si svolse a Napoli il 4 e il 5 dicembre 2008 presso il Palazzo Serra di Cassano. Gli interventi toccarono aspetti della vita e dell'organizzazione sociale di città famose, quali *Cuma, Capua, Puteoli, Paestum, Herculaneum, Pompeii*. Gli *Atti* uscirono nel 2010 per l'Editore Luciano. L'esperienza fu ripetuta nel 2015 con altre tre giornate di studio su: *Naviganti, popoli e culture ad Ischia e in altri luoghi della costa tirrenica*. Si parlò della principale isola dell'arcipelago Campano e di altre importanti realtà costiere, lasciando spazio ad ulteriori approfondimenti su problematiche legate alla vita sul mare. I lavori si tennero ad Ischia dal 9 all'11 ottobre presso l'Hotel Miramare di Sant'Angelo. Gli *Atti* vennero accolti nel volume 45 degli *Acta Instituti Romani Finlandiae*, pubblicato da Edizioni Quasar nel 2017.

Nel terzo *meeting*, dal sottotitolo *Documentando città portuali - Documenting port cities*, i partecipanti hanno relazionato su alcuni dei principali porti marittimi del Mediterraneo romano, non tanto, e non solo, per descriverne le strutture, ma anche, e soprattutto, per ricreare suggestioni di vita reale. Svoltosi dal 9 all'11 maggio 2019 presso il Centro Caprense Ignazio Cerio, quest'ultimo simposio è stato reso possibile grazie al sostegno di Riksbankens Jubileumsfond, Istituto Svedese di Studi Classici di Roma, l'Institutum Romanum Finlandiae di Roma e l'Università di Verona. Ancora una volta gli *Atti*, liberalmente accolti nella collana degli *Acta Instituti Romani Finlandiae*, sono stati pubblicati da Edizioni Quasar.

L'isola di Capri, perla di pietra incastonata nell'azzurro, è stata prescelta come terza ed ultima sede per essere preziosa meraviglia di quell'*enclave* partenopea, culla della nostra civiltà cosiddetta "occidentale" intorno alla quale hanno ruotato le diverse storie mediterranee di questa triplice iniziativa, con la quale si è inteso dare un senso a quel principio di ospitalità che ha alimentato per secoli – e speriamo alimenterà ancora – il vitale incrocio di esperienze spirituali dissimili che hanno trovato in questo mare il loro crogiolo culturale.

Durante la preparazione del libro è mancato Simon Keay. Dedichiamo la pubblicazione alla sua memoria.

L.C.

Port cities in ancient Cyrenaica

KRISTIAN GÖRANSSON

Introduction

From the beginning of the Greek settlement in Cyrenaica in the seventh century BC, ports were of crucial importance to the economy of the region and a prerequisite for its import and export of a wide range of commodities. Archaeological excavations have widened our knowledge of these ports and together with the fragmentary information provided by ancient sources, they give interesting insights into the port activities in Cyrenaica. The purpose of this paper is to sketch a brief overview of Cyrenaican ports, especially during the transition from Hellenistic/Ptolemaic to Roman rule, and to look at the relationship between the ports and the cities they served.

Background

As was noted by JONES and LITTLE in their study of archaeological evidence in relation to climate and geography in Cyrenaica, settlement in the region is really only suitable on the coastal strip – the *sahel* – between Benghazi in the west and Derna in the east, together with the Jebel Akhdar (the Green Mountain), formed of a limestone plateau which rises in two escarpments up to 800 metres above sea level.¹

Cyrene was the first of the Greek colonies in Libya, founded according tradition in 631 BC by colonists from Thera with Battus as their *oikistes*.² It is interesting to note that this colony is not located on the coast, which – as is well known – was often what the Greeks opted for when settling overseas. Herodotus tells the story of how the colonists from Thera indeed did begin with a small settlement on an island called Platea, near the Libyan coast. After a new consultation with Delphi, they found out that this was not in accordance with the will of Apollo, so they moved to the Libyan mainland and founded a settlement at a place named Aziris. They were, however, not completely happy with this location either and Libyan tribesmen led them up to a plateau of the Green Mountain. When they arrived there, the Libyans said “Here, ye Greeks, it befits you to dwell; for here is a hole in the sky.”³ In saying so the Libyans meant that this place was well-watered due to the abundant rainfall. This was where the city of Cyrene was founded (**Fig. 1**).

The Greek colonists laid out their new city on an easily defensible hill on the plateau near good arable land and pasture. The fountain that brought freshwater to the city was named the Fountain of Apollo. On the coast lay the harbour, which was named Apollonia after the chief god of Cyrene.⁴

¹ JONES – LITTLE 1971, 64.

² Hdt. 4, 150-58.

³ Hdt. 4, 158.

⁴ It is however uncertain when the harbour settlement was given this name. See discussion in COHEN 2006, 385.



Fig. 1: View of Cyrene with the sanctuary of Apollo. (Photo: Kristian Göransson).

The *Stadiasmus maris magni*, written by an anonymous writer in the late second or third century AD, lists the harbours along the entire North African coast from Alexandria to Tunis. In the *Stadiasmus* nine harbours are named in Cyrenaica and they are called differently, mainly *hormos* and *panormos*.⁵

Hormos means ‘collar’, i.e. denoting a harbour that is a land-locked bay that provides shelter and access to the sea. *Panormos* is the ideal, natural harbour of which two examples are listed for Cyrenaica: Bomba and Apollonia. The distances and sailing times recorded by ancient authors are listed in Arnaud’s excellent study, which also includes the mapping out of maritime trade routes.⁶ As Jones & Little observed,⁷ the Gulf of Bomba is one of the finest natural harbours on the entire North African littoral. This is where the island of Platea is located, where the colonists that went on to found Cyrene first settled. In the following, we shall look at the harbours that served as ports for the major settlements in Cyrenaica, from east to west.

Apollonia

Apollonia is described by the early fourth-century BC author Pseudo-Skylax in the *Periplus* as “harbour of the of Cyrene”.⁸ As Cyrene grew in importance so did its harbour. It was artificially developed with moles

⁵ The *Stadiasmus maris magni*, translated by Brady Kiesling and Leif Isaksen in 2014 from the 1855 Karl Müller edition in *Geographi Graeci minores*, is freely available as an online source on the ToposText website: <https://topostext.org/work/217>. Translations of the *Stadiasmus* referred to in this article are from ToposText.

⁶ ARNAUD 2005.

⁷ JONES – LITTLE 1971, 76.

⁸ Ps.Skylax 108, 2. On Pseudo-Skylax, see SHIPLEY 2019.



Fig. 2: An overview of the ancient site of Apollonia. (Photo: Kristian Göransson).

and quays. However, when one looks at the ruins of ancient Apollonia today one sees as good as nothing of the harbour (**Fig. 2**).

This is due to the rise in relative sea level of around two metres since antiquity. Apollonia was explored by the University of Michigan excavations in the 1960s.⁹ André Laronde did a lot of work exploring the submerged remains of Apollonia's harbour.¹⁰ Sadly, this work was cut short with his passing and under the current situation in Libya no underwater archaeological excavations or surveys are undertaken. It seems that the prosperity of Apollonia was such as to give it autonomy during the Roman period when it was recognized as one of the five cities of the Pentapolis. By the sixth century it had succeeded both Cyrene and Ptolemais as the principal city in the province.¹¹

Ptolemais

Described by Pseudo-Skylax as “the harbour by Barce”,¹² much as Apollonia was the harbour of the harbour of Cyrene. The *Stadiasmus* says: “From Nausis to Ptolemais 250 stades; it is a very large city; the anchorage is rough, and it has an island called Ilos; take care.”¹³

⁹ GOODCHILD – PEDLEY – WHITE 1976.

¹⁰ See for example LARONDE 1996.

¹¹ For a recent study of Apollonia in Late Antiquity see BARTHEL 2017.

¹² Ps.-Skylax 108.3.

¹³ *Stadiasm.* 55.

Not much is known of the harbour that is likely to have been on this location before Ptolemy I founded Ptolemais and gave it its royal name.¹⁴ Ptolemais was a large Hellenistic city that continued to prosper throughout the Roman period. With the reforms of Diocletian, Cyrenaica was reorganized and Ptolemais was made the capital of the province. The ruins of the ancient city were surveyed and excavated by Kraeling in the 1950s, but the harbour was not explored in any detail.¹⁵ A valuable survey of the harbour by Yorke, Davidson and Little in 1972 demonstrated that Ptolemais had a sophisticated Hellenistic harbour installation.¹⁶ In 2017 a more detailed publication of this survey was published with plans and photographs.¹⁷ With the addition of the important archaeological work undertaken by the Polish mission to Ptolemais in the early 2000s, we know much more about this now submerged harbour.¹⁸ In short, Ptolemais had a two-basin harbour based on sandstone reef elements with inshore islets.¹⁹

As was the case with Apollonia very little is left to see above sea level and this is for the same reason, i.e. the rise of sea level by two metres. The harbour was important at the time of Bishop Synesius, who in his letters mentions the life and trade at Ptolemais in the early fifth century AD.²⁰ But Wilson has pointed out that “the impression gained from Synesius’s *Letters* is of a province somewhat remote from the main currents of Mediterranean trade and communication.”²¹ Yorke and Davidson suggest that the submergence of the harbour happened as a result of the earthquake of AD 796 after which we hear nothing of the harbour.²²

Taucheira

There is not much information in the sources on the port facilities of this important city other than that the harbour is mentioned in the *Stadiasmus*,²³ but coastal erosion and rising sea level have removed all traces of it.²⁴ In the *Stadiasmus* the journey westward is described as follows:

“From Teuchira to Bernikide (Berenike?) 350 stades. The sailing voyage turns. After sailing 90 stades you see a promontory stretching out toward the west. Shoals lie on the surface beside it; keep watch as you sail past. You will see a low, dark island. The promontory is called Shallows (Brachea), on the left is an anchorage for small boats. All in all, from Apollonia to Bernikide is 1150 stades.”²⁵

Euesperides–Berenice

The precursor to Berenice was Euesperides, the westernmost of the Greek cities in Cyrenaica, founded in the early sixth century BC and abandoned in the third century BC due to the foundation of Berenice.

¹⁴ I agree with K. Mueller that Ptolemais was probably founded by Ptolemy I. See MUELLER 2004 for a discussion of this and MUELLER 2006 on Ptolemaic city foundations.

¹⁵ KRAELING 1962.

¹⁶ YORKE 1972. This is the preliminary report of the survey undertaken that same year.

¹⁷ YORKE – DAVIDSON 2017.

¹⁸ See ZELAZOWSKI 2012 and JAWORSKI – MISIEWICZ 2015 for an excellent overview of the results.

¹⁹ YORKE – DAVIDSON 2017, 48.

²⁰ E.g. *Letter* 134

²¹ WILSON 2004, 150.

²² YORKE – DAVIDSON 2017, 69.

²³ *Stadiasm.* 56-57.

²⁴ The serious coastal erosion at Taucheira/Tocra has gone on for a long time, but it has accelerated in recent decades as a report from 2004 highlighted (BENNETT et al. 2004), with severe damage to the ancient ruins.

²⁵ *Stadiasm.* 57.

As the northwesterly wind is the prevailing wind in Cyrenaica, sailing in either direction along the North African coast is difficult. Fulford has suggested that ships sailing from Tripolitania to Cyrenaica "...would have needed to strike out across the head of the gulf [of Syrtis], out of sight of land, to Berenice and ports beyond."²⁶ Euesperides is perfectly positioned for this and it is the first harbour encountered by ships heading east from Tripolitania or southeast from Sicily.²⁷

The full extent of the city of Euesperides is unclear, but coring work undertaken in the Society for Libyan Studies excavations at the site in the early 2000s has confirmed that the location of the ancient harbour was to the south-west of the Lower City, by the protected lagoon, which later became the salt-marsh Sebkha Es Selmani.²⁸ Immediately north-west of the harbour the streets and city blocks are differently orientated from those of the later periods of the Lower City. This irregular area of houses by the harbour is explained by Wilson as "...an early harbour-front development predating the layout of successive phases of regularly planned city blocks in the lower city."²⁹

In the *Periplus* Pseudo-Scylax speaks of the city of Euesperides and its harbour.³⁰ The silting up of the lagoon was long believed to be the main reason for the abandonment of Euesperides and the subsequent foundation of Berenice in its place.³¹ The Society for Libyan Studies excavations 1994-2006 at the site have somewhat altered this picture. As the city relied heavily on its port any silting up must have caused a serious problem, but both the abandonment of Euesperides and the foundation of Berenice had political reasons.³² Excavations conducted at the site in the 1960s suggested that the Lower City had been constructed in the mid-fourth century BC over an early harbour, which had started silting up already in the mid-sixth century BC.³³ Around 250 BC Berenice was founded right at the waterfront (**Fig. 3**). Strabo writes that the harbour of Berenice is located on the promontory between the lagoon and the sea.³⁴ In the *Stadiasmus* it is noted that the harbour behind Berenice was good only for small vessels, indicating that it is likely that the Sebkha Es Selmani was not completely silted up in Roman times.

The excavations at Euesperides demonstrated that there are no signs of a slow abandonment of the city, which one might have expected had the gradual silting up of the harbour been the prime reason for the move. Instead, one sees construction of buildings in the latest phases of the city's history, including a house with elaborate mosaic floors, constructed after 261 BC. The abandonment of the city around 250 BC appears to have been sudden and unforeseen by its inhabitants.³⁵

From Berenice no remains of the ancient harbour are visible, but from the Society for Libyan Studies excavations at Sidi Khrebish in the centre of Benghazi in the 1970s we know that Berenice was a very important city in the commercial trade networks of the late Hellenistic and Roman periods.³⁶

²⁶ FULFORD 1989, 171.

²⁷ For recent studies of the trade across the Syrtis see QUINN 2011 and WILSON 2013 – both to a large extent based on the results of the Society for Libyan Studies excavations at Euesperides.

²⁸ WILSON et al. 2004, 169-71; GÖRANSSON 2007, 29-32.

²⁹ WILSON et al. 2004, 188.

³⁰ Ps.-Scylax 108, 5.

³¹ E.g., JONES – LITTLE 1971, 65-67.

³² For a detailed discussion on the abandonment of Euesperides see GÖRANSSON 2007, 32-35.

³³ JONES 1985.

³⁴ Str. 17, 3, 20.

³⁵ See GÖRANSSON 2007, 33-34 for a general discussion of this and WILSON 2006, 145-46 on excavation results related to the abandonment of the city.

³⁶ See above all the publication of the coarse pottery by RILEY 1979.



Fig. 3: Ruins of ancient Berenice in the foreground with the modern port of Benghazi in the background. (Photo: Kristian Göransson).

Conclusions

To sum up, the location of the settlements in Cyrenaica and their harbours is completely conditioned by what we can call the geographical factor, something that has been pointed out by Jones.³⁷ There is no shortage of good harbours along the coast.³⁸ The difficulty lies in the communication between the littoral and the cities and towns up on the plateaux of the Green Mountain. Apollonia and Ptolemais, originating as the ports of the important cities of Cyrene and Barce respectively – both located inland – were in contact with the wider Mediterranean world and massive port installations were constructed there. Gradually these ports eclipsed the cities they were built to serve and became port cities in their own right. They remained important well into Late Antiquity, both serving as capitals of Cyrenaica, and Ptolemais also as a bishopric.

In the case of Euesperides–Berenice we have a different situation. Here are two cities (or rather, one after the other) placed on the coast from the beginning, each with a harbour attached to it. The city and harbour of Euesperides lay protected by the lagoon linked to the sea, but with the foundation of Berenice the city was moved from the lagoon to the seafront.

With these examples I hope to have shown the difference in origin and development of the port cities of ancient Cyrenaica. The physical remains of port installations in those cities are few and fragmentary due to ancient earthquakes and coastal erosion, but one can hope that in the future underwater archaeology along

³⁷ JONES 1985.

³⁸ See the surveys undertaken along the Cyrenaican coast (on land and underwater) by the Italian mission, most recently BUCCELLATO – TUSA 2016 and TUSA – BUCCELLATO 2019.

the Libyan coast will change this picture and provide us with more solid evidence of the infrastructure of the maritime trade on which the region so depended throughout antiquity.

Bibliography

ARNAUD 2005 = P. ARNAUD, *Les routes de la navigation antique: itinéraires en Méditerranée*, Paris: Éditions Errance, 2005.

BARTHEL 2017 = C. BARTHEL, 'Apollonia-Sozousa in late antiquity: some remarks on the *caput provinciae* of Libya Superior', *LibSt* 48: 159-68.

BENNETT et al. 2004 = P. BENNETT et al., 'The effects of recent storms on the exposed coastline of Toca', *LibSt* 35: 113-22.

BUCCELLATO – TUSA 2016 = C.A. BUCCELLATO – S. TUSA, 'Missione archeologica costiera e subacquea in Cirenaica', *Libya Antiqua* IX: 41-66.

COHEN 2006 = G.M. COHEN, *The Hellenistic Settlements in Syria, the Red Sea Basin, and North Africa*, Berkeley – Los Angeles: University of California Press, 2006.

FULFORD 1989 = M.G. FULFORD, 'To East and West: The Mediterranean trade of Cyrenaica and Tripolitania in Antiquity', *LibSt* 20: 169-91.

GOODCHILD – PEDLEY – WHITE 1976 = R.G. GOODCHILD – J.G. PEDLEY – D. WHITE, in J.H. HUMPHREY (ed.), *Apollonia, the port of Cyrene: Excavations by the University of Michigan, 1965-1967*, Tripoli: Dept. of Antiquities, 1976.

GÖRANSSON 2007 = K. GÖRANSSON, *The Transport Amphorae from Euesperides: the Maritime Trade of a Cyrenaican City 400-250 BC* (Acta Archaeologica Lundensia, ser. prima in 4°, 25), Stockholm: Almqvist & Wiksell International, 2007.

JAWORSKI – MISIEWICZ 2015 = P. JAWORSKI – K. MISIEWICZ (eds.), *Ptolemais in Cyrenaica. Results of non-invasive surveys* (Ptolemais II), Warsaw: University of Warsaw, Institute of Archaeology, 2015.

JONES 1985 = G.D.B. JONES, 'Beginnings and endings in Cyrenaican cities', in G. BARKER (ed.), *Cyrenacia in Antiquity* (Society for Libyan Studies Occasional Papers 1, BAR Int. Ser. 236), Oxford 1985: 27-41.

JONES – LITTLE 1971 = G.D.B. JONES – J.H. LITTLE. 'Coastal Settlement in Cyrenaica', *JRS* 61: 64-79.

KRAELING 1962 = C.H. KRAELING, *Ptolemais: City of the Libyan Pentapolis*, Chicago: University of Chicago Press, 1962.

LARONDE 1996 = A. LARONDE, 'Apollonia de Cyrénaïque: archéologie et histoire', *JSav* 1996: 3-49.

MUELLER 2004 = K. MUELLER, 'Dating the Ptolemaic city-foundations in Cyrenaica: a brief note', *LibSt* 35: 1-10.

MUELLER 2006 = K. MUELLER, *Settlements of the Ptolemies: City Foundations and New Settlement in the Hellenistic World* (Studia Hellenistica 43), Leuven: Peeters, 2006.

QUINN 2011 = J.C. QUINN, 'The Syrtes between East and West', in A. DOWLER – E.R. GALVIN (eds.), *Money, Trade and Trade Routes in Pre-Islamic North Africa*, London: British Museum Press 2011: 11-20.

RILEY 1979 = J.A. RILEY, 'The coarse pottery from Berenice', in J.A. LLOYD (ed.), *Excavations at Sidi Khrebish Benghazi (Berenice)*, Vol. 2 (Supplements to Libya Antiqua 5), Tripoli: Dept. of Antiquities 1979: 91-467.

SHIPLEY 2019 = G. SHIPLEY, *Pseudo-Skylax's Periplous. The Circumnavigation of the Inhabited World: Text, Translation and Commentary*, 2nd ed., Liverpool: Liverpool University Press, 2019.

TUSA – BUCCELLATO 2019 = S. TUSA – C.A. BUCCELLATO, 'Coastal archaeology of East Cyrenaica between sea and land', in S. DI LERNIA – M. GALLINARO (eds.), *Archaeology in Africa. Potentials and perspectives on laboratory & fieldwork research* (Arid Zone Archaeology Monograph 8), Sesto Fiorentino: All'Insegna del Giglio 2019: 47-62.

WILSON 2004 = A.I. WILSON, 'Cyrenaica and the Late Antique economy', *Ancient West and East* 3: 143-54.

WILSON 2006 = A.I. WILSON, 'New Light on a Greek City: Archaeology and History at Euesperides', in E. FABBRICOTTI – O. MENOZZI (eds.), *Cirenaica: studi, scavi e scoperte. Atti del X Convegno di Archeologia Cirenaica, Chieti 24-26 Novembre 2003: nuovi dati da città e territorio* (BAR Int. Ser. 1488), Oxford 2006: 141-52.

WILSON 2013 = A.I. WILSON, 'Trading across the Syrtes: Euesperides and the Punic world', in J.R.W. PRAG – J.C. QUINN (eds.), *The Hellenistic West: Rethinking the Ancient Mediterranean*, Cambridge: Cambridge University Press 2013: 120-56.

WILSON et al. 2004 = A.I. WILSON et al., 'Euesperides (Benghazi): preliminary report on the spring 2004 season', *LibSt* 35: 149-90.

YORKE 1972 = R.A. YORKE, 'A survey of ancient harbours in Cyrenaica', *LibSt* 3: 3-4.

YORKE – DAVIDSON 2017 = R.A. YORKE – D.P. DAVIDSON, 'The Harbour at Ptolemais: Hellenistic City of the Libyan Pentapolis', *IJNA* 46: 48-71.

ZELAZOWSKI 2012 = J. ZELAZOWSKI (ed.), *Ptolemais in Cyrenaica: studies in memory of Tomasz Mikocki* (Ptolemais I), Warsaw: University of Warsaw, Institute of Archaeology, 2012.