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ANDREW BURNETT

THE ENNA HOARD AND THE SILVER COINAGE OF THE SYRACUSAN DEMOCRACY

In the Inventory of Greek Coin Hoards a brief notice appears about a hoard said to have been found near Enna in Sicily in 1966 (IGCH 2232). The exact find spot of the hoard is not known, but it is thought to have been a little north east of Enna, between Assoro and Leonforte. For convenience, however, I shall continue to refer to it as the Enna hoard.

The hoard is important for redating a number of Punic and Sicilian issues, and because it appears to create a problem for the dating of the Roman denarius. This problem is, however, more apparent than real. The hoard also throws some light on the scale of minting in Sicily during the Hannibalic War; it will be seen that the coinages of Acragas, the Sikeliotai and Syracuse are all relatively small. Today we get a false picture of their size due to the sheer number of surviving specimens, but it can be shown that there are in fact very few dies involved, and we may suppose that the coins are common today because so many hoards containing them were deposited in the War and subsequently recovered in modern times. The pattern of dies reveals that the Siculo-Punic coinages are a little, but not very much, bigger, and that all are tiny in comparison to the quantity of Roman coins entering Sicily and being minted there.

I propose to list the hoard with a fairly brief commentary on each group of coins, then discuss the problem of the date of the hoard's deposition, and finally treat more fully the coinage of the Syracusan democracy¹.

I. Catalogue of the hoard

ACRAGAS

Obv.: Laureate head of Zeus, right

Rev.: Eagle standing left; ΑΚΡΑΓΑΝΤΙΝΩΝ; variable symbol

1. 3.38 T on reverse

2. T on reverse

As 1-2, but eagle facing right

3. 3.34 A on reverse²

4. A on reverse

5. 3.56 A on reverse

6. 3.36 B on reverse³

¹ I am particularly grateful for the help and advice of Mrs. S. Hurter and P. Strauss; in addition, information has been given to me by A. Walker, C.A. Hersch, M.J. Price, H.A. Cahn, G.K. Jenkins, C. Boehringer, P. Kinns and B. Tsakirgis. I should also like to thank M. Amandry (Paris) and Mrs. N.M. Waggoner (New York) for providing casts.

² Same dies as BMC 31, Copenhagen 105.

³ Same dies as Paris (Luynes 865), Copenhagen 106.

	7.	Γ on reverse ⁴
]	8. 3.28	Δ on reverse ⁵
	9. 3.20	Δ on reverse ⁶
	10. 3.24	E on reverse ⁷
]	11.	E on reverse
	12.	E on reverse
]	13. 3.15	E on reverse
	14.	E on reverse (obv. die in different state).

The coins in this hoard account for nearly the whole die sequence of Acragas. The only other varieties I have noted are

Obv.	Rev.	Example
[ΦI	eagle l. T, Φ, I	BMC 84, Cahn 71, 139
	eagle l. T, ΦI, I	Cambridge SNG IV.928
	eagle l. T	ANS SNG 1136
and the half pieces		
-	eagle l. Punic letter Η	ANS SNG 1137, Copenhagen SNG 108
-	eagle r. A	BMC 85

The rarity of these issues may account for their absence from the hoard; the great bulk of the coinage, with the eagle facing right and the first five letters of the Greek alphabet as control marks, is completely represented in the hoard.

The appearance of the Punic letter on the half piece, the same Punic letter that one finds on contemporary Siculo-Punic issues (nos. 132–147, below), together with the weight standard (a half and quarter shekel: compare nos. 116–152), show that the coinage was produced during the Punic occupation of the city in 213–210. Whether the coinage continued throughout that period is uncertain: it may well have, as the head of Zeus is very close stylistically to the Jupiter head of Roman victoriatas minted in Sicily⁸, presumably also at Acragas from 210.

SYRACUSE: Agathocles

Obv.: Helmeted head of Athena, right; behind, trophy (?)

Rev.: Pegasus left; ΣΥΡΑΚΟΣΙΩΝ; below, triskeles

15. 8.53

⁴ Same dies as Lockett SNG 720 = Weber 1215, Copenhagen 107.

⁵ Same dies as BMC 83, Münzhandlung Basel 4, 426, Baranowsky IV 279, Ars Classica IV 209.

⁶ Same dies as Pozzi 395, ANS 1135.

⁷ Same dies as BMC 82, Cahn 60, 178, Cambridge (McClean 2051), Oxford 1684.

⁸ M.H. Crawford, RRC no. 70 and page 16.

This type was minted during the reign of Agathocles, and Jenkins⁹ has suggested that the group of full weight Agathoclean pegasi belongs at the beginning of the reign (317–ca. 310 B.C).

SYRACUSE: the reign of Hieron II

Obv.: Veiled head of Philistis, left

Rev.: Nike in quadriga, right; ΒΑΣΙΛΙΣΣΑΣ ΦΙΛΙΣΤΙΔΟΣ

	Obv.	symbol	Horses	Rev. symbol(s)
	16.	13.98 palm	galloping	below hooves, E
	17.	14.14 wreath	walking	before, A
[	18.	wreath	walking	above Φ
	19.	wreath	walking	above Φ
[]	20.	wreath	walking	above Φ
	21.	wreath	walking	above Φ
	22.	wreath	walking	above Φ
	23.	wreath	walking	above Φ
]	24.	wreath	walking	above Φ
	25.	13.56 wreath	walking	above Φ
	26.	13.60 wreath	walking	above Φ
[]	27.	wreath	walking	above Φ
	28.	13.56 wreath	walking	above Φ
	29.	13.61 wreath	walking	above Φ
[]	30.	wreath (?)	walking	above, ✱; before, K
	31.	wreath (?)	walking	above, erased; before, K
[	32.	13.59 none	galloping	above, crescent; before, A
	33.	none	galloping	above, crescent; before, A
[	34.	13.57 star	walking	above, star; before, K
	35.	13.53 star	walking	above, star; before, K
	36.	13.56 star	walking	above, star; before, K
[	37.	13.49 star	walking	above, star; before, K
	38.	13.41 star	walking	above, star; before, K
	39.	star	walking	above, star; before, K
	40.	star	walking	above, star; before, K
	41.	star	galloping	above, crescent; before, ΚΙΣ; below, grain
[	42.	grain	galloping	above, ΚΙ; below, thunderbolt
	43.	13.54 grain	galloping	above, ΚΙ; below, grain
	44.	grain	galloping	above, crescent; before, ΚΙΣ; below, grain
[	45.	13.59 thunderbolt	galloping	below hooves, E
	46.	thunderbolt	galloping	above, ΚΙ; below, grain

⁹ In (eds.) C.M. Kraay and G.K. Jenkins, *Essays in Greek Coinage presented to Stanley Robinson* (1968), 151.

	47.	torch	galloping	below hooves, E
[]	48. 13.58	torch	galloping	below hooves, E
	49.	torch	galloping	below hooves, E
	as 16–49, but Nike in a biga, left			
	50.	palm	galloping	before, E
]	51. 4.53	palm	galloping	before, E

Obv.: Diademed head of Gelon, left (52–53, 55–56) or right (54)

Rev.: Nike in a biga, right; ΣΥΡΑΚΟΣΙΟΙ ΓΕΛΩΝΟΣ

52. 6.74	none	walking	before, Φ; BA above
53. 6.79	trophy	walking	before, H; below hooves, Σ(?); BA above
54. 6.72	none	galloping	below, Σ(?)
55.	star	galloping	before, K; BA above
56. 6.75	bow	galloping	below, E; BA below horses

Obv.: as 52–55

Rev.: Eagle facing r.; inscription as on 52–56

57. 3.31	none	to r., K (BA on l.)
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Obv.: Head of Artemis, right

Rev.: Owl; ΣΥΡΑΚΟΣΙΟΙ

58. 1.09	none	to. l., A
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The small coins like 58 probably belong to the reign of Hieron rather than the period of the democracy, since they have the same form of the ethnic as is found on the coins of Gelon (the coins of the democracy have the genitive). The control letters which occur (A, E, K and Φ) can be found on coins of Hieron's reign, but not on those of the democracy.

The arrangement of the coinage of Hieron, and its chronology, is not certain, and I am grateful to B. Tsakirgis for allowing me to incorporate the initial results of her research into it. The excellent condition of many of the coins suggests that they were minted not long before Hieron's death in 215.

SYRACUSE: Hieronymus

The coins of Hieronymus' reign (215–4 B.C.) are arranged in accordance with R. Ross Holloway *The Thirteen-months Coinage of Hieronymus of Syracuse*.

	59. 8.48	MI	Holloway 6
	60.	MI	14
[]	61. 8.21	Λ/KI	40
	62. 8.27	Λ/KI	40
	63. 7.89	Λ/KI	
	64.	Λ/KI	
]	65.	Λ/KI	43

66.	X/KI	49
67. 4.21	KI	51
68. 8.51	IA	55
69. 8.36	IA	59
70. 8.48	ΔA	61

SYRACUSE: the democracy (214–212 B.C.)

The arrangement is that proposed in section III (p. 18).

Obv.: Laureate head of Zeus, 1.

Rev.: Nike in walking quadriga, r.; ΣΥΡΑΚΟΣΙΩΝ

71. A under neck ΣΩ D2 (see Section III)

Obv.: Helmeted head of Athena, 1.

Rev.: Artemis drawing bow to l.; behind dog; ΣΥΡΑΚΟΣΙΩΝ

or

Thunderbolt; ΣΥΡΑΚΟΣΙΩΝ

(These two types are catalogued together, although they are of different denominations, since they share a number of obverse dies).

	Rev.		Rev. letters	
[	72. Artemis		ΔA	D7
	73. Artemis		MI	D9
[	74. Artemis		MI	D10
[	75. Artemis	10.21	MI	D11
[	76. Artemis		MI	D11
[	77. Artemis		MI	D11
[	78. Artemis		MI	D11
[	79. Artemis	10.14	MI	D11
[	80. Artemis	10.22	A on obv. ΣΩ	D13
[	81. Artemis	10.21	A on obv. ΣΩ	D13
[	82. Thunderbolt	6.80	A on obv. ΣΩ	D16
[	83. Thunderbolt		A on obv. ΣΩ	D16
[	84. Thunderbolt		A on obv. ΣΩ	D16
[	85. Thunderbolt		A on obv. ΣΩ	D16
[	86. Thunderbolt		A on obv. ΣΩ	D16
[	87. Thunderbolt	6.79	A on obv. ΣΩ	D17
[	88. Artemis		ΣΩ	D18
[	89. Artemis		ΣΩ	D18
[	90. Artemis	10.08	ΣΩ	D18
[	91. Artemis	9.91	IA	D20
[	92. Artemis	10.18	IA	D21
[	93. Artemis		IA	D24
[	94. Thunderbolt	6.80	IA	D25
[	95. Thunderbolt	6.76	IA	D25
[	96. Artemis		YA-Σ	D26

	Obverse	Reverse	No. of specimens	Example
[	A	a	5	BMC 653 ¹²
	A	b	3	Enna hoard 109 ¹³
	A	c	4	Enna hoard 110 ¹⁴

All the pieces of the smaller denominations seem to come from single obverse dies ¹⁵.

CARTHAGE

Mint of Carthage (?)

Obv.: Laureate head, 1.

Rev.: Elephant, r.; below, Punic letter A

	114. 7.06
	115. 6.13
[]	116. 3.55
	117.
	118. 3.17
[]	119.
	120. 3.20
	121.
	122. 3.38
[]	123.
	124. 3.12
	125.
[]	126. 3.35
	127. 3.53
	128.
	129.
	130. 3.61
	131.

This series of shekels and half shekels was tentatively assigned by E.S.G. Robinson to a date ca. 209 BC and a mint in Spain, perhaps Gades ¹⁶. The appearance of all these coins in a Sicilian hoard, together with the other

¹² Same dies: Jameson 885, Luynes 1375, BMC 564 and Oxford 2132 (retouched).

¹³ Same dies: BM ex Lloyd 1578, Lockett SNG 1030 = *Ars Classica* XII 1025.

¹⁴ Same dies: Berlin (W. Giesecke *Sicilia Numismatica* Taf. 27.7), MMAG 61, 79 and Gulbenkian 364.

¹⁵ The four litrai pieces come from one obverse and two reverse dies (a. Enna 112–114 b MMAG 61, 80). The two litrai coins all appear to be from the same dies: Munich (Giesecke 27.8), Paris (Luynes 1376) and MMAG 61, 81. There are also gold coins: see note 11 and MMAG 61, 78.

¹⁶ In (eds.) R.A.G. Carson and C.H.V. Sutherland, *Essays in Roman coinage presented to Harold Mattingly* (1956), pages 43 and 52-3, series 8a and 8b.

previous provenance (in Campania) led Jenkins¹⁷ and Villaronga¹⁸ to reattribute them to the period of the Punic expedition to Sicily (213–210 BC). There is, however, some doubt about the mint. The fixed die axis contrasts with contemporary Siculo-Punic coins (nos. 132–152), and is a feature of the mint of Carthage. The other series was probably minted at Acragas (see below), the main Punic stronghold in the island, so an attribution to Carthage seems most likely for these coins with the elephant. The coins were certainly struck for circulation in Sicily, as more unpublished hoards have come to light attesting their circulation there.

A half shekel like 117–132 has been found struck over a denarius, and has been published by Villaronga¹⁸.

Mint of Acragas(?)

Obv.: Male head, wearing corn ears, r.

Rev.: Prancing horse, r.; below Punic letter Ḥ; all in wreath

	132. 3.58
	133.
	134. 3.18
	135.
	136. 3.26
	137. 3.73
	138. 3.59
	139. 3.65
	140. 2.94
	141. 3.53
	142.
	143. 4.31
	144.
	145.
	146.
	147.
	as 133–148, but no wreath and letters ḤT
	148. 1.83
	149. 2.02
	150. 1.67
	151. 1.59
	152.

The presence of these half and quarter shekels in the hoard confirms the archaeological evidence from Morgantina¹⁹ for an attribution to Sicily and

¹⁷ SNG Copenhagen Vol. 42, nos. 382–3.

¹⁸ *Gaceta Numismática* 40, Mar. 1976, 15–16, cf. T.V. Buttrey, *Quaderni Ticinesi* 8, 1979, 156–7, who agrees that Villaronga's coin may have come from the Enna hoard.

¹⁹ R. Ross Holloway, *Atti dell' Istituto Italiano di Numismatica* 7–8, 1961, 35–7.

a date no later than 211 BC. The piece from Morgantina was struck from the same dies as no. 151.

The provenance of these coins and their variable die axis suggest a mint in Sicily. Acragas, traditionally the main Punic stronghold on the island²⁰, is an obvious candidate, and there is a direct link with one of the Zeus/eagle coins minted at that city at this time. Both coinages show the same peculiar obverse style, particularly in the treatment of the hair. Moreover, as well as the denomination in the Enna hoard (1–14), rare half pieces are known with the same types; the two control marks known to me are A (known on the larger denomination) and, significantly, the Punic letter H, just as we find on these pieces. This directly links the two coinages, which can then be seen to comprise the same denominations (half and quarter shekels).

MACEDONIA: Antigonos Gonatas (277–239 B.C.)

153. 17.03

Obv.: Head of Pan on Macedonian shield

Rev.: Athena Alkidemos, 1.; ΒΑΣΙΛΕΩΣ ΑΝΤΙΓΟΝΟΥ; to l., Macedonian helmet; to r., Π

The type belongs to Gonatas' reign, and belongs to the group attributed to Amphipolis after 271 by R.W. Mathisen²¹. The condition of this piece would suggest a date late in the reign. For coins of Gonatas in a contemporary Sicilian hoard, see IGCH 2230.

EPIRUS: Pyrrhus

154. 16.74

Obv.: Head of Zeus, 1.; behind, fulmen

Rev.: Dione seated left; ΒΑΣΙΛΕΩΣ ΠΥΡΡΟΥ; below, A.

This type was minted at Locri during Pyrrhus' expedition to S. Italy in 281–75 B.C.

THRACE: Lysimachus

155. 16.91

Obv.: Diademed head of Alexander, r.

Rev.: Athena Nikephoros seated left; ΒΑΣΙΛΕΩΣ ΛΥΣΙΜΑΧΟΥ (sic); symbols: to l., thunderbolt and below, fish.

²⁰ Polybius I. 17.5: τὴν τῶν Ἀκραγαντίνων πόλιν εὐφρεστάτην οὔσαν πρὸς τὰς παρασκευὰς καὶ βαρυτάτην ἅμα τῆς αὐτῶν ἐπαρχίας.

²¹ MN 26, 1981, 113–4.

Two other specimens are known with the same symbols, one in Paris (circulated as a Mionnet cast) and one in the Raby collection. All three have the same obverse die, and different reverse dies. The variety was attributed to Pella by Müller (M. no. 328), because of the thunderbolt²². The British Museum, however, has a coin of the same style but with a caduceus instead of the thunderbolt, so the fish symbol should be given priority and the issue attributed to Cyzicus. The absence of the issue from the Armenak hoard²³ suggests that the coin is posthumous, and its condition in this hoard suggests that it must be early posthumous.

AETOLIAN LEAGUE

156. 16.38

Obv.: Head of Heracles wearing lion skin, r.

Rev.: Aetolia seated right on Gallic and Macedonian arms; ΑΙΤΩΛΩΝ; to r., ☐ and ΣΕ²⁴.

The obverse die is one of the few known for the Aetolian tetradrachms, and occurred on at least two coins in the Corinth 1938 hoard (IGCH 187), which Noe dated to 215 B.C.²⁵. As Noe observed, the Aetolian tetradrachms should be dated much more tightly than Head's 279–168; the condition of the coin in the Enna hoard (like that of the coins in the Corinth hoard) supports Noe's suggestion that they were minted for the Social War; de Laix²⁶ has subsequently refined this dating to 220–218.

PERGAMUM: Attalus I

157. 16.94

Obv.: Diademed head of Philetairos, r.

Rev.: Athena seated left; ΦΙΛΕΤΑΙΡΟΥ; symbols: grapes and A

The Philetairos coins with these symbols have been attributed to the reign of Attalus I (241–197 B.C.) by U. Westermark²⁷, and, although she does not record this obverse die, the reverse seems to be that of her plate VII no. LXXVII. This

²² Die Münzen des Thracischen Königs Lysimachus (1859)

²³ IGCH 1423.

²⁴ As A.J. Reinach, JIAN 13, 1911, 177–239: no. 14 (same obverse die), but reverse also has ΣΕ.

²⁵ MN 10, 1962, 9.

²⁶ California Studies in Classical Antiquity 6, 1973, 59–60.

²⁷ Das Bildnis des Philetairos von Pergamon (1961)

worn coin belongs to group IVB of her chronology, which she places at the beginning of Attalus' reign. Pergamene coins occasionally travelled to the West, even to Spain (to Martos: see Coin Hoards VII, forthcoming).

EGYPT: Ptolemy II (285–246 B.C.)

158. 14.11

Obv.: Diademed head of Ptolemy, r.

Rev.: Eagle on thunderbolt 1.; ΒΑΣΙΛΕΩΣ ΠΤΟΛΕΜΑΙΟΥ; to 1., shield and Σ; between legs, E.

Svoronos 567, SNG Copenhagen 107. For Ptolemaic coins in contemporary Sicilian hoards, see IGCH 2217 and 2234.

ROME

Obv.: Laureate janiform head

Rev.: Jupiter and Victory in quadriga, r.; below, ROMA in incuse letters (159–175, 177) or relief letters on raised tablet (176).

The quadrigati are all listed in accordance with the classification of 1e Gentilhomme (RN 1934,1); 159–171 were minted at Rome, 172–177 elsewhere²⁸, probably in Sicily.

159.		1e Gentilhomme A 1 var.
160.	6.56	A *
161.	6.54	A 4
162.		A 4
163.	6.62	A 4
164.	6.56	A 4
165.		A 7
166.		A 8
167.		A 8
168.	6.71	A 11
169.		A 13
170.	6.68	B 1
171.	6.63	B 1
172.	6.23	E 1(?)
173.	6.72	E 1
174.		E 1
175.		E 1
176.	6.89	IV B 2
177.	6.78	II A 2

²⁸ Cf. A. Alföldi RM 78 (1971), 27ff.

II. The date of the hoard

The date of the hoard's deposition should be indicated by the terminal dates of the issues it contained. The Syracusan democracy was established in 214 B.C., and lasted until the fall of the city to the Romans in 212²⁹. The Enna hoard includes coins which account for virtually every issue (and even die) used, so it is hard to avoid the implication of a date of 212 for the hoard. The Punic issues can have reached Sicily no earlier than 213, the date of the Punic expedition to the island, particularly if it is correct to attribute the half and quarter shekels with a horse to Agrigentum, which was only captured by the Carthaginians in that year. The coins of Agrigentum similarly make 212 the earliest possible date for the hoard, with 211 more likely. I conclude that the hoard should probably be dated to 211.

The Roman coins in the hoard pose a problem for this date, as they were all quadrigati with the incuse form of the legend³⁰. So if the hoard were dated to 211, it would imply that the relief legend quadrigati are of subsequent date, and this causes obvious problems for the dating of the denarius' inception to 211. But there are good reasons for avoiding this difficulty by regarding the quadrigati as a lot of coins added to the hoard some years before its deposition. First, the hoard contained the two Punic issues which are thought to have been struck over a denarius and a victoriate³¹, so we can hardly imagine that the hoard was buried before the inception of the denarius coinage. Secondly a comparison of the quadrigati in the Enna hoard with those in the Syracuse hoard (dated by the absence of coins of the Syracusan democracy to 214 B.C.) reveals that there are no significant varieties of quadrigati represented in the Enna hoard which were not already present in the Syracuse hoard³². Conversely some recent hoards have exactly the same non-Roman coins together with Roman coins of both the quadrigatus (incuse and relief) and denarius coinages³³. So we can be reasonably sure that the quadrigati in the Enna hoard go no later than 214. This relieves the chronological problem outlined above and enables us to date the Enna hoard to 211 while preserving an acceptable Roman chronology. The hoarder acquired no Roman coins after 214.

III. The silver coinage of the Syracusan democracy

The coins in the Enna hoard allow one to make a virtually complete reconstruction of the coinage of the Syracusan democracy of 214–212 B.C. The scheme presented here is based on the material in the British Museum, the Bibliothèque Nationale, the Ameri-

²⁹ For the dating of the democracy to spring 214 to autumn 212 (rather than 215–212), see F.W. Walbank, *Historical Commentary on Polybius* 2, 7–8.

³⁰ Except for one coin (176) with a relief legend on a raised tablet; this variety also occurred in the Syracuse hoard, which otherwise contained only incuse legend coins.

³¹ For the overstruck denarius, see Villaronga, *op. cit.* (n. 18); for the allegedly overstruck victoriate, see the dust jacket of P. Marchetti, *Histoire économique et monétaire de la deuxième guerre punique*; I confess that I cannot make out a victoriate as an undertype.

³² M. Crawford, *Roman Republican Coin Hoards* (1969), 62.

³³ G. Manganaro, in *Proceedings of the 9th International Congress of Numismatics* (1982), 261; another similar, though larger, hoard has recently been found, also at Morgantina.

can Numismatic Society, the various major published collections (Copenhagen, Munich, Cambridge, Oxford and Glasgow) and sale catalogues. The record of dies seems almost complete, although no doubt more material might turn up some more varieties or die combinations, particularly of the smaller denominations. In this listing I ignore the small gold coins with the same types as the 12 litrai coins, as these were rightly condemned by Imhoof³⁴.

The coinage was struck in denominations of 16, 12, 10, 8, 6, 4 and 2½ litrai, using a litra of average weight 0.84 g³⁵. The great majority of the coins were struck in the 12 and 8 litrai denomination, particularly the former. The following «magistrates» or names³⁶ have been recorded so far³⁷, and they coined the following denominations (the numbers represent specimens noted by me):

	AV	16	12	10	8	6	4	2½ litrai
ΔA			9					
MI			19			2		
[Δ/ΣΩ	1	5	15		22	1		
[ΣΩ			11			1		
[O/IA			12					
[IA		1	4		16	7		
[YA-Σ			8		18	1		
[YA-Σ-Λ		6	14		19			
ΦI-ΔI			1					
ΛY			9					
XAP			9	2		2	4	1
	1	12	99	2	68	14	4	1

³⁴ Corolla Numismatica, (1906) 160-1; NZ 1915, 100-1. His view was not accepted by E. Seltman, NZ 1912, 157, or W. Giesecke, Sicilia Numismatica (1923), 142-3, but I think Imhoof was right on grounds of type, style, epigraphy, and also weight; the seven specimens known to me average 2.67 g, which is not a multiple of a litra of 0.84 g, and even Giesecke had to call it (implausibly) a 2.4 nummus coin.

³⁵ I use the traditional weight unit of a litra, although Giesecke argued for the use of a nummus, equal to the Roman scruple of 1.1 g. The problem then is the 10 litrai coins. The two specimens I know weigh 8.45 and 8.47 g, perfect fits for a system based on a litra of 0.84, but not expressible in nummi of 1.1 g. Giesecke was therefore forced to call them Attic didrachms, but this seems special pleading. There is no other evidence for the Attic standard at Syracuse (the «Attic gold drachm» is more easily a gold five litrai piece). For an implicit demolition of Giesecke's interpretation of the Hieronymus coinage in terms of Attic drachmae, see Holloway 22-4. terms of Attic drachmae, see Holloway 22-4.

³⁶ There is usually only one name on a coin, but sometimes more, e.g. ΔI and ΣΩ appear on different sides of the same coins, as do O and IA. There appears to be a division between ΦI and ΔI, and ΦIΔI... seems an unlikely name. Similarly there seems to be a division between YA, Σ and (when it occurs) Λ, suggesting the occurrence of three names. One name, MI, had previously occurred on the coinages of Hiero and Hieronymus, and three others, ΔA, ΣΩ and IA, on the coinage of Hieronymus. As was the case under Hieronymus, there is almost no die-linking between different names (I have found only three cases: ΔA and MI, IA and YA-Σ and YA-Σ and ΦI-ΔI). Consequently it seems most likely, as Holloway concluded, that the names represent people to whom the actual striking of coins was contracted out.

³⁷ Giesecke adds a) AP, which I believe he took from Hirsch 16, 324 where the initial X of XAP is off the flan; and b) ΣA which he cites from Hirsch 30: the piece (no. 432) is unillustrated and I suspect a cataloguing mistake.

CATALOGUE³⁸

Gold

1. Obv.: Female head, facing left, wearing diadem; behind, Λ
 Rev.: Nike in walking quadriga, to right; below, $\Sigma\Upsilon\text{PAKO}\Sigma\text{ION}$; above, $\Sigma\Omega$
 a. 4.25 g Paris (de Luynes 1390)

Silver

16 litrai

Obv.: Laureate head of Zeus, to right.

Rev.: Nike (sometimes holding whip) in quadriga, to right; $\Sigma\Upsilon\text{PAKO}\Sigma\text{ION}$;

2. Λ under head on obverse, $\Sigma\Omega$ above quadriga (horses walking, no whip)

- | | |
|--|--|
| | a. 13.54 Hess Leu 31, 164 |
| | b. 13.57 Enna hoard 71 |
| | c. 13.21 Weber = Jameson 890 («12.96») |
| | d. 13.53 Hirsch 14, 247 = Cambridge (McClean 2960) |
| | e. 12.55 Paris 2040 |

3. ΥA below horses (galloping; Nike holds whip)

- a. 13.57 Ars Classica VI, 560 = Gulbenkian 358 = Hirsch 32, 397

4. $\Upsilon\text{A}-\Sigma-\Lambda$ in exergue and below horses (galloping; Nike holds whip)

- | | |
|--|--|
| | a. 13.48 Hirsch 14, 246 = Jameson 889 |
| | b. 12.05 (Very worn) Cambridge (McClean 2959) |
| | c. 13.49 Boston 483 |
| | d. 13.63 London BMC 650 |
| | e. 13.31 Berlin (Giesecke, Sicilia Numismatica 26.8) |
| | f. 13.64 Munich SNG 1435 |

12 and 8 litrai

These denominations are listed together as they share a number of obverse dies.

Obv.: Helmeted head of Athena, facing left. The helmet may be decorated with a griffin (dies 1, 7 and 10) or a coiled snake (dies 2, 3, 8 and 14). A snake, representing the aegis, may sometimes be seen in front of the neck (dies 4, 5, 9, 10, 11, 12 and 13).

Rev.: (12 litrai) Artemis standing left in front of a hound, and firing a bow;
 $\Sigma\Upsilon\text{PAKO}\Sigma\text{ION}$

(8 litrai) Winged thunderbolt; above, $\Sigma\Upsilon\text{PAKO}\Sigma\text{ION}$

³⁸ Apart from the gold pieces discussed in n. 34, I have encountered only three forgeries (apart from a plated piece in the ANS). They are both 8 litra pieces: a) with ΞA in Hamburger 96, 68 = Hamburger 11.6.1930, 651 6.08 g; and b) with $\Upsilon\text{A}-\Sigma-\Lambda$ Schulman 21.x.1912 no. 30, and another piece from the same dies in the BM forgery trays.

Summary of die-linkage

	Obv.die		Artemis	Thunderbolt
5.	[1		a. ΔA	
6.	[1	]	b. ΔA	
7.	[2		b. ΔA	
8.	[2		c. ΔA	
9.	[2		d. MI	
10.	[3		e. MI	
11.	[3		f. MI	
12.	4		g. MI	
13.	[5 (\mathcal{A})		h. $\Sigma\Omega$	
14.	[5		i. $\Sigma\Omega$	
15.	[5		j. $\Sigma\Omega$	
16.	[5			A. $\Sigma\Omega$
17.	[5			B. $\Sigma\Omega$
18.	6		k. $\Sigma\Omega$	
19.	7		l. $\Sigma\Omega$	
20.	[8 o		m. $\mathbb{I} A$	
21.	[8		n. $\mathbb{I} A$	
22.	[8		o. $\mathbb{I} A$	
23.	[8		p. $\mathbb{I} A$	
24.	[9		q. $\mathbb{I} A$	
25.	[9			C. $\mathbb{I} A$
26.	[9	]	r. $\Upsilon A - \Sigma$	
27.	[10		r. $\Upsilon A - \Sigma$	
28.	[10			D. $\Upsilon A - \Sigma$
29.	[11			D. $\Upsilon A - \Sigma$
30.	[10			E. $\Upsilon A - \Sigma - \Lambda$
31.	[10			F. $\Upsilon A - \Sigma - \Lambda$
32.	[10		s. $\Upsilon A - \Sigma - \Lambda$	
33.	[12		t. $\Upsilon A - \Sigma - \Lambda$	
34.	[11		u. $\Phi I - \Delta I$	
35.	13		v. $\Lambda \Upsilon$	
36.	[14		w. XAP	
37.	[14		x. XAP	

	Obverse	Artemis	Thunderbolt
5.	1 (griffin)	a. ΔA	9.16 Hirsch 20, 202
6.	1	b. ΔA	10.13 London (Lloyd 1568)
			10.12 Jameson 891
			10.11 Carfrae 11
7.	2 (snake)	b. ΔA	Enna hoard 72
			9.84 Schulman 26.11.1913, 2074
8.	2	c. ΔA	10.24 London

9. 2 d. MI
10. 3 (snake) e. MI

11. 3 f. MI

12. 4 (aegis) g. MI

13. 5 (aegis, \mathcal{A}) h. $\Sigma\Omega$

14. 5 i. $\Sigma\Omega$

15. 5 j. $\Sigma\Omega$

16. 5 A. $\Sigma\Omega$

9.71 Copenhagen 876
10.21 Munich 1432
Enna hoard 73
Enna hoard 74
10.14 Ars Classica V 1247
10.12 Cambridge SNG 1435
10.21 Enna hoard 75
Enna hoard 76
Enna hoard 77
Enna hoard 78
10.14 Enna hoard 79
9.44 Copenhagen 877
9.00 London
10.00 Ars Classica XII 1033
9.84 Hirsch 21, 743
10.14 Ward 347
de Molthein 593
10.16 Auctiones AG, Basel 6,76
10.12 Paris 2043
10.25 Paris (Luynes 1392)
Hall 60
10.22 Enna hoard 80
10.21 Enna hoard 81
10.19 Glasgow 8
9.83 Pozzi 663
10.01 Hirsch 20, 201
10.17 Delbeke 71
10.20 Ciani 20.11.1935, 84
Hess 16.4.1957, 129
10.20 Munich 1433
10.07 Paris 2046
London BMC 651
9.82 Hirsch 26, 462
Glendining 1918, 74
10.09 Ars Classica XII 1031
10.20 Paris 2045
6.80 Enna hoard 82
Enna hoard 83
Enna hoard 84
Enna hoard 85
Enna hoard 86
6.06 Bourgey 15.10.1909, 79
6.43 Ars Classica V 1250
6.80 Carfrae 12
6.75 Hirsch 26, 463
De Nicola (Dec 1950), 145

			6.77 Cambridge 1438
			6.85 Cahn 80, 111
			6.73 London BMC 655
			6.79 Cambridge SNG 1439
			6.82 Oxford 2124
			5.88 ANS
			6.79 Paris 2052
17.	5	B. ΣΩ	6.79 Enna hoard 87
			6.77 Weber 1721
			6.80 Paris (Luynes 1393)
			6.80 Ars Classica IV 421
			6.50 Auctiones AG, Basel 11, 71
18.	6 (plain)	k. ΣΩ	Enna hoard 88
			Enna hoard 89
			10.08 Enna hoard 90
			10.09 London (Lloyd 1567)
			Egger 10.12.1906, 244
			Egger 26.11.1909, 290
			9.88 Paris 2047
			10.08 Auctiones AG, Basel 5,54
19.	7 (griffin)	l. ΣΩ	9.87 Lockett SNG 1022
			Egger 40, 448
			9.78 Copenhagen 879
20.	8 (snake, o)	m. Ξ A	9.91 Enna hoard 91
			10.14 London
			Aréthuse (Suppl. I, 1924) 244
21.	8	n. Ξ A	10.18 Enna hoard 92
			10.17 Hamburger 1929, 160
			10.16 Cambridge (Mc Clean 2957)
22.	8	o. Ξ A	Sambon & Canessa 1907, 442
			9.98 Egger 39, 115
			9.94 Hirsch 15, 1281
			9.86 Paris 2049
23.	8	p. Ξ A	10.11 Copenhagen 878
			9.42 Paris (Delepierre 713)
24.	9 (aegis)	q. Ξ A	Enna hoard 93
			10.18 Pozzi 664
			9.48 ANS
			10.03 Cambridge 1436
25.	9	C. Ξ A	6.80 Enna hoard 94
			6.26 Enna hoard 95
			6.78 Ars Classica X 346
			7.10 Ciani 20.11.1935, 85
			6.49 London (Lloyd 1569)
			6.72 London
			Münzhandlung Basel 10, 145

			Rollin 1910, 225
			6.80 Hamburger 11.1909, 352
			6.70 Hirsch 32, 402
			6.45 Jameson 893
			6.81 Oxford SNG 2122
			6.60 London BMC 654
			6.80 Berlin
			6.78 ANS
			6.79 Paris 2053
26.	9	r. YA-Σ	Enna hoard 96
			10.23 Cambridge (Mc Clean 2956)
			Merzbacher 2.11.1909, 2650
			10.10 ANS
27.	10 (griffin, aegis)	r. YA-Σ	
			10.10 Hirsch 14, 249
			10.08 Hirsch 32, 399
			Sambon & Canessa 1907, 443
			10.25 Helbing 31.1.1930, 156
28.	10	D. YA-Σ	6.81 Enna hoard 97
			6.58 Stockholm 626
			6.29 Ars Classica V 1251
			6.79 Lockett SNG 1023
			6.78 Cambridge SNG 1437
			6.73 London BMC 656
			6.70 Hirsch 32, 403
			Egger 26.11.1909, 291
			Egger 46, 94
			6.82 Headlam 176
			6.26 Ars Classica V 1252
			Hess 27.10.1932, 705
			6.76 Paris 2056
			6.75 Copenhagen 880
			6.78 ANS
			6.81 Munich 1437
29.	11 (aegis)	D. YA-Σ	Vienna
30.	10	E. YA-Σ-Λ	Enna hoard 98
			6.74 Enna hoard 99
			6.82 Cambridge (McClean 2958)
			6.80 London
			6.53 Hirsch 18, 9
			6.75 Hirsch 31, 234
			Hirsch 8, 1047
			6.75 Locker Lampson 112
			6.52 Hirsch 34, 250
			Martinetti 1907, 783
			6.81 Paris 2054

			6.76 Gulbenkian 359
			6.75 Munich 1436
			6.77 MMAG 61, 72
			6.82 MMAG 52, 100
31.	10	F. ΥΑ-Σ-Λ	Enna hoard 100
			6.73 Hirsch 14, 251
			6.38 Ars Classica XII 1035
			6.72 London BMC 657
32.	10	s. ΥΑ-Σ-Λ	Enna hoard 101
			Enna hoard 102
			Enna hoard 103
			10.16 Cambridge (Corpus Christi)
			SNG 412
			10.22 Ars Classica VI 562
			10.22 Jameson 892
			9.82 Merzbacher 15.11.1910, 282
			10.15 Sandeman 76
			10.06 Schulman 31.5.1938, 106
			10.10 MMAG 61, 71
33.	12 (aegis)	t. ΥΑ-Σ-Λ	10.16 London BMC 652
			Sambon & Canessa 1922, 261
			9.80 Hirsch 32, 398
			10.20 Berlin
34.	11	u. ΦΙ-ΔΙ	Sambon & Canessa 1907, 444
			= Bourgey 7.6.1909, 172
35.	13 (aegis)	v. ΛΥ	Enna hoard 104
			10.14 Enna hoard 105
			9.72 Ars Classica V 1248
			Egger 40, 447
			Collignon 124
			10.20 Hirsch 14, 250
			10.08 A. Hess (Frankfurt) 194, 163
			Glendining Apr. 1955, 225
			10.18 Munich 1434
36.	14 (snake)	w. XAP	10.22 Enna hoard 106
			10.17 Weber 1720
			10.25 Hirsch 16, 324
			10.15 London BMC 653
			10.02 Hamburger 98, 446
			10.18 Ars Classica X 345
			10.21 Paris 2050
37.	14	x. XAP	9.85 Benson 397
			10.04 ANS

10 litrai

Obv.: Head of Kore, facing left; behind, torch

Rev.: Zeus standing with sceptre; to left, eagle; to right, ΣΥΠΑΚΟΣΙΩΝ
 38. XAP

- [] a. London BMC 661 8.47
 [] b. Paris Luynes 1394 8.45

8 litrai

See above under 12 litrai

6 litrai

Obv.: Head of Heracles wearing lion skin, facing left

Rev.: Nike, holding whip, in galloping biga, to right; ΣΥΠΑΚΟΣΙΩΝ

39. MI under horses

40. as 59 (same reverse die)
 [] a. 4.85 Hirsch 14, 254
 [] a. 4.53 Ars Classica XVII 301 = Hess Leu 1, 76 = Leu 15, 137
 41. Α on obverse, ΣΩ below horses
 a. 4.75 Cambridge (McClellan 2961)
 42. ΣΩ in exergue, below ethnic
 a. 5.02 Jameson 896 ex Hirsch 14, 253
 43. ΙΑ in exergue
 a. 5.08 Paris 204
 44. As 43, but ΙΑ below horses (same obverse die)
 [] a. 5.08 Enna hoard 107
 [] b. 5.09 London BMC 659
 [] c. 4.81 Ars Classica VI 564 = Hirsch 32, 404 = Lloyd 1570
 [] d. 4.93 Munich 1438
 45. As 44, but different dies
 [] a. 5.11 Weber 1722 = Ars Classica XV 898
 [] b. 5.07 Gulbenkian 361
 46. ΥΑΣ under horses
 a. 4.97 Hess Leu 31, 165 = Auctiones AG, Basel 3, 133
 47. XAP under horses
 [] a. 5.11 Copenhagen 881
 [] b. 5.04 MMAG 61, 74

4 litrai

Obv.: Head of Apollo, facing left

Rev.: Nike advancing left, holding palm and trophy; ΣΥΠΑΚΟΣΙΩΝ

48. XAP to right

- a. 3.84 Morgantina hoard 28

49. As 48, but different dies

- [] a. 3.35 Enna hoard 108
 [] b. 3.36 London BMC 660
 [] c. 3.22 Leu 18, 87 } all struck over Gelon/eagle

2½ litrai

Obv.: As 49 (same die)

Rev.: Aesculapius standing right, holding staff with snake; ΣΥΠΑΚΟΣΙΩΝ

50. XAP to right

a. 2.20 MMAG 61, 75.

Some other coins are also attributed to the period of the democracy, but the attribution does not seem certain as they stand apart from the other issues. They have different types and magistrates' names, and use symbols on the obverse (this is not a feature of the other Syracusan democracy coins). There is clearly no room for them before the coinage of the democracy, so they should be regarded either as coming at the very end of the Roman siege or even after the fall of Syracuse to the Romans.

Obv.: Head of Kore, facing left; behind, variable symbol

Rev.: Nike in quadriga; ΣΥΠΑΚΟΣΙΩΝ

51. Bee on obverse; Nike holds wreath in quadriga which walks to left; in front, AP; above, ΣΥ and ΑΙ

a. 6.78 Gulbenkian 360 ex Jameson 895

52. Owl on obverse; Nike holds whip in quadriga galloping right; above, Α; below, ΑΙ; on double exergual line, ΛΥ

a. 6.99 London BMC 658

b. 5.95 Jameson 894 ex O'Hagan 257

53. As 52, but different reverse die

a. 5.97 Paris Luynes 1395

b. 6.76 MMAG 61, 73

54. Obv.: Same die as 52–53.

Rev.: Winged thunderbolt; ΣΥΠΑΚΟΣΙΩΝ; below, ΜΕ and Α

a. 6.55 Paris Luynes 1396

Note on the illustrations

The illustrations fall into two groups. Plates 1–7 show coins from the hoard, except those of the Syracusan democracy. A specimen of every die is illustrated, together with its catalogue number from section I. Plates 8–10 illustrate the coinage of the Syracusan democracy, as listed in section III, and, wherever possible, I have used specimens from the Enna hoard. Thus, for example, the number D 2 (71) means that coin no. 71 of the Enna hoard illustrates no. 2 of the listing of the democracy coins. For the sake of clarity I attach a list of the sources for the illustrations on plates 8–10.

Plate 8

D 1 Paris Luynes 1390
D 2 Enna 71
D 3 Ars Classica VI 560

D 4 Jameson 889
D 5 Hirsch 20, 202
D 6 Jameson 891

D 7 Enna 72
D 8 BM(1896-7-3-39)
D 9 Enna 73
D 10 Enna 74
D 11 Enna 75

Plate 9

D 17 Enna 87
D 18 Enna 88
D 19 Lockett 1022
D 20 Enna 91
D 21 Enna 92
D 22 Egger 39, 115
D 23 Copenhagen 878
D 24 Enna 93
D 25 Enna 95

Plate 10

D 34 Sambon-Canessa 19.12.1907, 444
D 35 Enna 105
D 36 Enna 106
D 37 ANS
D 38 BMC 661
D 39 Hirsch 14, 254
D 40 Ars Classica XVII 301
D 41 McClean 2961
D 42 Jameson 896
D 43 Paris 2041
D 44 Enna 107

D 12 Hall 60
D 13 Enna 80
D 14 Hirsch 26, 462
D 15 Ars Classica XII 1031
D 16 Enna 82

D 26 Enna 96
D 27 Hirsch 32, 399
D 28 Enna 97
D 29 Vienna
D 30 Enna 98
D 31 Enna 100
D 32 Enna 102
D 33 Hirsch 32, 398

D 45 Ars Classica VI 564
D 46 Hess-Leu 31, 165
D 47 MMAG 61, 74
D 48 Morgantina hoard 28
D 49 Enna 108
D 50 MMAG 61, 75
D 51 Jameson 895
D 52 BMC 658
D 53 MMAG 61, 73
D 54 Paris Luynes 1396



A. Burnett, The Enna hoard and the silver coinage of the Syracusan democracy



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A. Burnett, The Enna hoard and the silver coinage of the Syracusan democracy



A. Burnett, The Enna hoard and the silver coinage of the Syracusan democracy



A. Burnett, The Enna hoard and the silver coinage of the Syracusan democracy



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