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COIN TYPES THEIR ORIGIN AND DEVELOPMENT

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COIN TYPES

THEIR ORIGIN AND DEVELOPMENT

BEING

THE RHIND LECTURES FOR 1904

 \mathbf{BY}

GEORGE MACDONALD, M.A., LL.D.

HONORARY CURATOR OF THE HUNTERIAN COIN CABINET
UNIVERSITY OF GLASGOW

WITH NUMEROUS PLATES

GLASGOW

JAMES MACLEHOSE AND SONS

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PREFACE

These lectures, delivered on the invitation of the Council of the Society of Antiquaries of Scotland, were addressed to a general audience. In compliance with a wish to which strong expression was given at the conclusion of the course, they are now printed just as they were originally written. The book is thus meant primarily for the ordinary cultivated reader. In the circumstances, it would be idle to pretend that it is exhaustive. At the same time, as the first systematic attempt to marshal the main facts, it may fairly claim the attention of numismatists. It will, I believe, be found that the results are to some extent fresh.

I have faithfully tried to acknowledge my obligations to earlier writers. But the footnotes hardly mention the work that has been most constantly beside me—the indispensable Historia Numorum. It should perhaps be added that my interest in this particular branch of the subject is due in no small measure to The Origin of Metallic Currency and Weight Standards. So conscious am I of its stimulating influence that I almost feel as if I owed its distinguished author an apology for being unable to accept his views. Yet, if I be a heretic, surely heresy may look hopefully for absolution to Professor Ridgeway.

Mr. Warwick Wroth and Mr. G. F. Hill, of the British Museum, who were good enough to read the proof-sheets, have been generous in helpful suggestion and encouragement. The task of preparing the illustrations has also been greatly lightened by their co-operation. I have not thought it necessary to indicate in detail the sources whence the coins shown on the Plates have been drawn. But I may say generally that the majority belong to the British Museum, while the great bulk of the remainder come from the Hunterian Collection. In the case of a few very rare or unique pieces, I have had to trespass on the kindness of others, notably the curators of the national collections at Berlin and Paris.

Three of the cuts that appear in the text (Figs. 5-7) have been reproduced from the Bulletin de Correspondance Hellénique. Permission to use already existing blocks has been courteously granted by the Trustees of the British Museum (Figs. 3, 4, 8-11, and 13-17), Messrs. Macmillan & Co. (Figs. 1 and 18), and the Council of the Society for the Promotion of Hellenic Studies (Fig. 12).

GEORGE MACDONALD.

November, 1905.

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ERRATUM AND ADDENDUM

Page 53, 1. 27, for iii read ii.

Page 186, l. 21, add footnote, The coin figured on the Plate is not the actual piece mentioned in the text, but a very similar one struck some 15 years later by a son of the moneyer who first used the design.

LECTURE I.

A conviction that the aim of any such course as this is, ought to be not merely exposition but enquiry, not merely the statement of results already arrived at by others but an endeavour to reach fresh results for oneself, has rendered it imperative to narrow considerably the scope of the subject originally proposed to me by the Trustees. Interpreted broadly, 'The History of Coins' would have opened up a vista so extensive that only the barest outline would have been possible. By taking proper account of an elementary distinction the difficulty can be reduced to less formidable dimensions. 'Money' and 'coin' are not interchangeable terms. As soon as man passed beyond the stage of simple barter, as soon as he began to employ a medium of any sort to make exchange easier, so soon did money come into existence. oxen, in terms of which values are reckoned in Homer, were money, just as much as were the "four hundred shekels of silver current with the merchant" that Abraham paid for the cave of Machpelah. But the shekels were not coins any more than were the oxen.

purchase was not concluded until Abraham had "weighed to Ephron the silver which he had named in the audience of the sons of Heth." And, where metals are the medium of exchange, such weighing is always liable to be required, unless each separate piece bears upon its face some easily recognized mark, impressed by a responsible authority and serving as a guarantee at once of weight and of quality. It is the presence of such a mark that constitutes a coin.

This rough-and-ready definition is not scientifically complete. But it is accurate enough and comprehensive enough to enable us to mark out certain limits for our subject. It justifies us in regarding as irrelevant any discussion of the history that attaches to coins in virtue of their character as money, and so frees us from all necessity of grappling with the problems of metrology or of economics. I propose also to take it as excluding from our purview such currencies as the spade-money and knife-money of China, or the fish-hook money and spear-money of other countries. We can thus concentrate our attention on a point that merits closer study than it has hitherto received. There is room for a systematic effort to investigate the origin and to trace the development of what has been indicated as the essential characteristic of all coins,—the easily recognized mark that serves as a guarantee of weight and of quality. Even when we have imposed upon ourselves such a limitation, we cannot hope to make our enquiry exhaustive and final. We shall have to deal with a great mass of material, produced in different ages and by different peoples. If we are to escape being overwhelmed by a weight of detail, we shall have to confine ourselves to an endeavour to arrive at a few broad general principles.

The mark whose presence constitutes a coin is spoken of by numismatists as a 'type,' while the word 'symbol' is used to denote any secondary device which may appear side by side with the main type without being linked to it by any organic connection. The oldest coins of all have but a single type. At a very early period, however, it became customary to have two types, one upon each side of the coin. We are thus called upon to distinguish between 'obverse' and 'reverse.' With every desire to avoid technicalities, it will be necessary to employ these terms freely. It will, therefore, be convenient to begin by getting a clear understanding as to their significance.

Literally, the 'obverse' of a coin is the side that is turned towards one, that is, the side that one naturally regards as the front. In other words, it is the side on which the principal type appears. 'reverse' is what presents itself when the coin is turned round. These definitions cover ancient and modern coins alike. But those who have handled ancient coins are familiar with a further distinction. classical or post-classical author has preserved for us any account of the manner in which types were originally impressed upon coins. A Pompeian wall-painting uncovered a few years ago has been with some probability interpreted as a representation of the various operations carried on in a mint. And the subject was occasionally dealt with on coins. Thus, a

Roman denarius (Plate vii. 12) preserves for us a picture of the chief implements employed, and a bronze piece of Paestum (Fig. 1) gives us a rude sketch of



FIG. 1.-PAESTUM: BRONZE.

the very process. Painting and coins alike, however, are some six or seven centuries later than the invention of the art. Consequently, for really reliable evidence, we have to fall back upon the actual specimens of ancient coins that have survived the wreck of ages.

Some interesting questions await solution at the hands of the first competent technologist who makes a full and thorough study of this branch of numismatics. But certain fundamental facts are already clear. If we leave aside the early bronze currency of Italy, we shall find that practically all Greek and Roman coins were struck, not cast. Thus the method was, in principle, identical with that which is employed to this day, although it goes without saying that the mechanical means available were much more rudimentary. A lump of metal that had previously been adjusted to the proper weight, was heated and then reduced by means of a mould to a form that was approximately round or oblong. While still hot, it was placed upon an anvil and held firmly in position by a punch, the upper end of which was struck sharply several times with a hammer. On or in the anvil there had previously been laid or embedded a die, that is, a piece of cold metal with a device of some kind cut upon it in intaglio. The result of the striking was to produce upon the heated metal a corresponding impression in relief, and so to provide the coin with a type upon its lower side. If there were a device in intaglio on the lower end of the punch, then the coin received a type upon its upper side as well.

In the case of the great majority of very archaic coins it was only on the lower side that any type appeared. It was, therefore, but natural that, when two types became customary, this side should be reserved for the more important,—should be, in fact, the obverse. Now, where early coins are concerned, it is usually easy to decide at a glance which has been the upper side, and which the lower, during the process of striking. The upper side, as being more directly exposed to the force of the hammer, tended to become The lower side or obverse showed a corresponding convexity. On archaic coins the concavity of the reverse is often very marked, the end of the punch having had a smaller surface area than the heated metal on which it was placed. The impression produced under these circumstances is said to be 'incuse.' Such incuse reverses furnish one of the most obvious marks of antiquity 1 (see Plate i. 1-5).

The view expressed in the preceding paragraphs is not universally accepted. It has been suggested that the obverse was always the uppermost side, i.e. that the original die was on the punch, the 'incuse' being produced by a projection on the anvil (Blümner, Technol., iv. p. 261, note 1). It is difficult to reconcile this suggestion with the appearance presented by the 'incuse' on many archaic coins. On the other hand it seems certain that during the Roman Republican period the obverse die was usually placed above and the reverse die beneath (Bahrfeldt, Antike Münztechnik, p. 9).

Coins, it should be observed, are not so antique as might on à priori grounds be expected. It may be taken as a well-ascertained fact that their invention dates from about 700 B.c. Among the ancients themselves there was a difference of opinion as to where the first coins were struck.1 In the light of the evidence furnished by the constant provenance of the most primitive specimens of the art, modern research has no hesitation in deciding in favour of Western Asia Minor. This was the view of Herodotus. "So far as I know," he says, "the Lydians were the first people to strike and use gold and silver coins." 2 There are some who would claim the honour for the Ionian Greeks. And it has been argued that the words of Herodotus are not unequivocal; they refer only to gold and silver, whereas the oldest coins of all were minted in electrum, a natural alloy of the two more familiar precious metals. It might be replied that to Herodotus electrum was nothing but a variety of gold; he calls it λευκὸς χρυσός. Interesting as it is, this question need not detain us. It is sufficient for us to be certain that, if coins were not invented by the Lydians, they were invented by some of their immediate neighbours. We may wonder that neither Assyrians nor Babylonians nor Egyptians should have hit upon so simple and obvious a contrivance. Probably the explanation lies, to some extent at least, in the fact that in these cases there were no abundant

¹ For example, Pollux, ix. 83. Τὸν ἐπὶ τῷ νομισματι λόγον ἐπιζητείν, εἴτε Φείδων πρῶτος ὁ ᾿Αργεῖος ἔκοψε νόμισμα, εἴτε κ.τ.λ.

² πρώτοι ἀνθρώπων τῶν ἡμεῖς ἴδμεν νόμισμα χρυσοῦ καὶ ἀργύρου κοψάμενοι ἐχρήσαντο (i. 94).

natural supplies of precious metal which could have been exploited for the benefit of the central government. And it must be borne in mind that the practical inconveniences were possibly much less serious than we are apt to imagine. We know from the cuneiform inscriptions that the system of letters of credit was highly developed among the Babylonians. Bars and rings of specified weight also helped to simplify the problem. Even bracelets and personal ornaments seem to have been employed as an auxiliary currency. In this connection, the long period that elapsed before coinage was introduced at Carthage, is exceedingly significant. It is certain that the Carthaginians did not begin to mint for themselves until three or four hundred years later than their Greek neighbours.2

The situation and circumstances of Lydia were entirely favourable for the invention and use of coins. It was the connecting link between the rich interior of Asia Minor and the flourishing Greek towns on the east of the Aegean. No small part of its own wealth consisted of the precious metals. Electrum was found in abundance in the beds of its streams, and was more easily wrought than either of its com-

¹ See Th. Reinach, L'Histoire par les Monnaies, p. 31, for the importance of this condition. The whole lecture is a luminous and instructive contribution to the discussion on the origin of coinage.

² For special reasons why the Phoenician peoples were slow to adopt the invention, see Lenormant, *La monnaie dans l'antiquité*, i. p. 123 f., and G. Radet, *Lydie au temps des Mermnades*, p. 156.

ponents. It thus presented itself as a ready medium for business purposes. The electrum currency, however, was of comparatively short duration. It was soon abandoned by the Lydians in favour of a double system, gold and silver. The name of Croesus is usually associated with this change. Its motive was probably a desire to steady the royal credit, for the intrinsic value of an electrum coin depended ultimately on the relative proportions of gold and silver that it might happen to contain, and analysis indicates that there was enormous variation. However that may be, the very fact that such a step was called for shows how rapidly the importance of the new medium of exchange was realised.

It is not difficult to trace the lines along which a knowledge of the invention radiated. The double system of Lydia was adopted by the Persian monarchy in the course of the sixth century B.C., and thenceforward gold darics and silver shekels were minted in vast quantities. Even before this, coins had reached European Greece. The Greeks on the coast of Asia Minor began to strike electrum so early that, as we have seen, there are some who incline to think that they even anticipated the Lydians. Their kinsmen in the islands were quick to imitate them, and to transmit the practice across the seas. There appear to have been two main routes by which coins made their way to Europe,—a northerly route by Euboea to Athens and Corinth, and a more southerly one, direct through the Archipelago to Aegina. Very ancient

¹ See Head, Num. Chron., 1887, pp. 277 ff., and B.M.C., Lydia, p. xxi.

coins of Cyrene prove that the Greek settlers in Northern Africa must have begun to mint almost as soon as their European brethren. They doubtless received their knowledge of the invention in the same way,—by commercial intercourse with the west coast of Asia Minor. From different centres in Greece Proper the torch was carried west and north until, by the beginning of the fifth century B.C., coins had become familiar objects throughout almost the whole civilized world.

If we leave out of account the iron money of the Peloponnesus and of Byzantium, the facts regarding which are exceedingly obscure, we find that for nearly two hundred years the Greeks of Europe minted in silver only. Until about 350 B.C., when Philip of Macedon began to develop the gold mines of Thrace, the supplies of the more precious metal were apparently too limited to justify any European state in making it the basis of its currency. Gold and electrum coins were indeed freely used in commerce. But they were coins that had been minted in Asia, and they circulated only as bullion. If gold was struck, it was either at some moment of exceptional prosperity, as at Syracuse after the great siege, or under pressure of dire necessity, as at Athens during the latter part of the Peloponnesian war. And in such cases the issue was so small as not to affect the truth of our general proposition. Macedonian supremacy changed all that. Alexander's conquest of Persia involved an economic as well as a political revolution. Having abundant supplies both of gold and of silver at his command, he did not hesitate to follow the example of the Persian monarchs

and make his currency bimetallic.1 Under his sway and that of his successors the area of mintage was widened considerably. Greek coins were struck as far east as India, while Egypt for the first time began to contribute her quota to the stream. A third metal had in the meantime come to be largely used. Copper had been the monetary standard in Italy and Sicily prior to the arrival of the Greek colonists. It long maintained its position, notably at Rome; but it does not appear to have been employed anywhere for coinage purposes until towards the close of the fifth century B.C. During the next hundred years its popularity grew rapidly. Its value for an auxiliary or token currency was recognized almost everywhere, and copper or, more strictly, bronze coins are plentiful from circa 350 B.C. onwards.

It seems probable that from the earliest period the right of striking money was vested in the state, although a monarch or a sovereign people might on occasion delegate the privilege to governors of distant provinces or to generals engaged on a campaign. It certainly came very soon to be looked upon as an indispensable attribute of political independence. Hence the remarkable variety of the Hellenic coinage, for in Hellas each city was a separate political entity, and its money was a visible token of its autonomy. It was essential that there should be no risk of confusion with the money of its neighbours. In other words, so soon as the custom of striking money was fairly

¹ See Th. Reinach, De la valeur proportionelle de l'or et de l'argent dans l'antiquité grecque (Rev. Num., 1893 and 1902: reprinted in L'Histoire par les Monnaies, pp. 41 ff.).

established, the use of a distinctive type (or its equivalent¹) for each minting centre became imperative.

The variety is so great that on first acquaintance it is bewildering. With a little experience, however, one learns to detect affinities between the issues of cities that lay within a given geographical area. The homogeneity now in question is something different from the direct imitation that will demand attention at a later stage; it depends upon subtler influences. Sometimes it betrays itself in fabric. Thus, at a particular epoch, the coins of Thrace and Macedon display a peculiar reticulation of surface, showing that the artificers in these districts were in the habit of striking the blank while it was still very hot. Again, after the defeat of Antiochus III. by the Romans, there was a great outburst of minting activity among the more prominent cities of Asia Minor. Under the rule of the Seleucid Kings their privileges had been in abeyance. Now that they were again in some measure independent, they began to strike silver money once more. Differences of type notwithstanding, the trained eye has no difficulty in singling out the pieces that belong to this period. They are large tetradrachms of a peculiarly thin spread fabric, which it is impossible to mistake. These issues were not called into being by any political union, nor sanctioned by any formal convention. The similarity between them is more or less fortuitous, being due to the coincidence that the mints concerned were near enough to be influenced

¹ Occasionally (e.g. in the case of the electrum coinage of Mytilene) there is no distinctive type. Probably the peculiar fabric and the weight were regarded as adequate marks of origin.

by each other and that all began to strike silver at about the same time. In this instance we have to do with historical circumstances that are fairly well ascertained. We may use the analogy to explain a kindred phenomenon, the historical setting of which is shrouded in obscurity.

During the sixth century B.C. the Greek cities of Southern Italy produced a series of silver coins that stand quite by themselves in point of fabric (see Plate i. 16 and 17, Plate iii. 7, Plate iv. 1, and Plate v. 11). Their date is fixed by the fact that among the mints were Siris and Sybaris, both of which were destroyed before 500 B.C. The obverse type is in relief as usual, but the reverse type is, so to say, in intaglio, and is generally, though not invariably, a mere repetition of the device that figures on the other side. The coins, it should be added, are very thin. Their peculiar characteristics have attracted much notice. Lenormant read in them the evidence of a great political confederation, at which history does little more than hint, but which embraced not only Achaean colonies like Croton and Sybaris, but also the Dorian Tarentum and the Chalcidian Rhegium.¹ Such a league would indeed be remarkable at so early a period, and Lenormant attributed its creation to the genius of Pythagoras. The suggestion was tempting, and it has found a good deal of acceptance. Even writers who are sceptical about the intervention of

¹ Since Lenormant wrote, Zancle has been added to the list of cities using this peculiar fabric (A. J. Evans in *Num. Chron.*, 1896, pp. 101 ff.)—an addition that is of itself almost sufficient to negative all idea of a political alliance.

Pythagoras, are apt to refer to the South Italian or Achaean Monetary Confederation as an institution of whose existence there can be no manner of doubt. But is the hypothesis either justifiable or necessary? It is open to at least three serious objections.

To begin with, the group is unusually rich in alliance coins, that is, in pieces which bear the names and even the types of two different cities, and which were evidently issued under joint authority. Such, for instance, are the tetradrachms struck by Croton and Sybaris (Plate i. 17), by Croton and Temesa, and by Siris and Pyxus. There would have been no room for such special alliances if all alike were members of a great confederation whose solidarity was symbolized in the uniform fabric of the coinage. In the second place it is in the fabric alone that there is any resemblance; in the types there is absolute variety. Now, identity of type is characteristic of practically all other coinages that we know with certainty to have been federal,—that is, to have been based upon a political union. The issues of the Achaean League and the Chalcidian League will suggest themselves at once. If it be urged that both of these belong to a much later age, one might reply by pointing to the Boeotian shield, which is the obverse type of the coins of all the cities of Boeotia from about 550 B.C., and which clearly marks their coinage as a federal one. if the two objections already stated could be overcome, there remains a much more serious difficulty.

For a federal coinage uniformity in weight would have been of vastly greater importance than similarity of fabric. Yet, of the cities concerned, Rhegium and

Zancle used one system, Poseidonia used another, while the whole of the rest followed a third. variation would be hardly conceivable, if the peculiarity of fabric had been the result of a monetary convention, the purpose of which was to facilitate exchange. Conventions of the kind did, of course, exist. possess, though unfortunately in a mutilated form, the actual text of an agreement made about 400 B.C. between Mytilene in Lesbos and Phocaea in Ionia. Its object was to arrange for the issue by the two states, in alternate years, of a uniform electrum currency, and the most stringent precautions were taken to secure that the coins of both cities should maintain the same level of purity.1 The natural conclusion that the weights were identical is completely borne out by the specimens that survive. This objection to Lenormant's view of the Italian coins is, indeed, so obvious that it is not necessary to enlarge upon it. But all difficulty regarding them disappears, if we are content with the prosaic view that they are merely one more instance of the homogeneity that frequently attaches to the money of particular districts. not impossible that the peculiar fabric was originally adopted because it had a practical advantage to recommend it. The coins could be more easily packed and stored.2 There is no such special explanation of the

¹ Any responsible official charged with debasing the quality of the metal was to be tried within six months by a board drawn from the magistrates of both cities. The penalty was death. The inscription was published, with a commentary, by Sir C. T. Newton in 1866 (Trans. of the Royal Society of Literature, second series, vol. viii. p. 549), and it has often been discussed since.

² See Hill, Handbook, p. 152.

smooth reverses that characterize the silver coins of Etruria and of Cyprus. There, at least, we have clear examples of local fashion.

But it is not in fabric merely that the principle of local homogeneity manifests itself. Often it is the type that is affected. The Sicilian Greeks, as is well known, had a special fondness for representing river-gods and chariot-races on their coins. orgiastic designs characteristic of the early money of Thasos are found on the coins of other states of north-eastern Greece, but they are found nowhere else. The flat octadrachms struck in the Macedonian district about the beginning of the fifth century B.c. bear the names of different tribes and dynasts. The type attaching to each group is different. But in the general scheme there is a strong family resemblance,-a man riding or guiding one or, more frequently, two draught animals. Cretan coins, again, as has often been pointed out,1 possess certain strongly marked artistic qualities that we do not find elsewhere in the Greek world.

These illustrations, selected at random, will suffice to show that we have here a principle which we cannot afford to lose sight of in any effort to determine the origin of coin-types. We may take it that, as a rule, even where no resemblance appears upon the surface, there is always a certain degree of homogeneity between the types employed in a given district at a given time. In these circumstances there must be a strong

¹ Eckhel, *Doctrina*, ii. 300; R. S. Poole, *Num. Chron.*, 1864, pp. 240 ff.; Gardner, *Types*, pp. 160 ff.; Wroth, *B.M.C.*, *Crete*, etc., pp. xxi. f.

presumption that the general motive underlying their adoption has been in every case the same. We cannot, therefore,—without very special reason shown—accept as satisfactory for any particular type an explanation that is obviously inapplicable to other types belonging to what we may call the same group. Bearing this in mind, we may proceed to a brief statement and examination of the two main theories of origin that have up till now been put forward. They are most conveniently described as the religious theory and the commercial theory.

That the influence of religion is to be traced in the types of Greek and Roman coins has long been recognized as an indisputable fact. But the first to propound the religious theory in its extreme form was Thomas Burgon, one of the staff of the British Museum, who published in the earliest volume of the Numismatic Journal (1837) a very suggestive paper entitled "Representations on Ancient Money."1 this paper Burgon discussed numerous examples, and endeavoured to make good the conclusion "that from the first striking of money, down to the extinction of the Byzantine Empire, religion was the sole motive of the types on coins; and that this is the invariable principle which is to guide our search in endeavouring to explain them." His proof reduces itself to the argument from analogy. In an immense number of cases (he says in effect) the significance of the type is undoubtedly religious; in many more it is probably

¹ Its scope is more clearly shown by the full title—"An Inquiry into the Motives which influenced the Ancients, in their Choice of the various Representations which we find stamped on their Money."

PLATE I.

I DATE 1.
I. Asia Minor (circa 700 B.C.): electrum, - 5, 46
2. Cnidus (circa 600 B.C.): silver, 8 - 1 1 VC F 55, 117
2 Asia Minor (circa 650 B C) · electrum
4. Asia Minor (circa 600 B.C.) relectrum, de Afficier 5, 81
5. Phocaea (circa 600 B.C.): electrum,
6. Cyzicus (before 500 B.C.): electrum, - 25, 40
7. Cyzicus (450-400 B.C.): electrum, - 40
8. Cyzicus (450-400 B.c.): electrum, 12-
9. Lampsacus (394-350 B.C.) gold, e, 101 1028 41 10. Lampsacus (394-350 B.C.): gold, 41
11. Tenedos (circa 500 B.C.): silver, 22. 22. 25, 64, 117
12. Abdera (500-450 B.C.); silver, and - 100 in 38
13. Abdera (450-430 B.C.): silver,
14. Abdera (450-430 B.C.): silver, 18 3 10 11 11 12 38
15. Abdera (430-408 B.C.); silver, In an 39
16. Metapontum (before 500 B.C.): silver, 12, 36, 65
17. Croton and Sybaris (before 510 B.C.): silver, 12, 13, 36



3	

so; we are therefore justified in concluding that it is so always. Burgon's attitude has the merit of being consistent and thorough-going. Its chief weakness is its failure to take full account of the relative ages of Archaic types are unhesitatingly explained by the analogy of those of a later epoch, whereas any satisfactory solution of the question of origins must have careful regard to chronological sequence, and must be applicable in the first instance to the phenomena associated with the earliest specimens. Burgon admits that there are many devices that are puzzling, and he is alive to the fact that the majority of these occur on But he believes that the task of the oldest coins. explaining them will be simplified if we postulate that all of them have necessarily a religious meaning. He accordingly classifies them indiscriminately as "symbolical representations of divinities," a group which thus assumes a singularly miscellaneous character.

The best illustration of the difficulties that are involved in such a proceeding, is supplied by the case of types parlants or 'canting badges,'—that is, devices that contain a punning allusion to the name of the issuing city or state. Consistency compels Burgon to regard even these as "religious symbols." Thus, the familiar rose $(\dot{\rho}\dot{\rho}\dot{\rho}\partial\rho\nu)$ on Rhodian coins is not to be "looked upon as indicative of the name of the island"; rather, we are to suppose "that the natural and uniform motive of religious belief influenced the choice of the rose, as the symbol of Venus." So with the leaf of wild celery $(\sigma\dot{\epsilon}\lambda\nu\rho\nu)$ at Selinus, the pomegranate $(\sigma\dot{\epsilon}\partial\eta)$ at Side, the apple $(\mu\bar{\eta}\lambda\rho\nu)$ at Melos, and the seal $(\phi\dot{\epsilon}\kappa\eta)$ at Phocaea,—"concerning which we would not be

supposed rigidly to assert, that there was absolutely on no occasion any allusion whatever to the name of the place; but the object I have in view, is, to show that even this allusion, if it exist, must still be viewed as connected with some unapparent or lost religious tradition or motive; the elucidation of which must be left to future researches."

This practically amounts to a denial of the existence of types parlants in the proper sense of the word. But the evidence on the other side is too strong to be gainsaid. The number of examples that can be culled from various periods of Greek history is sufficiently large to place it beyond doubt that, when a convenient occasion arose, the tendency to indulge in pictorial puns upon proper names had quite as free play among the Greeks as we shall find that it had later on among the Romans and among dignitaries and states in the Middle Ages. The instances cited from Burgon are all earlier than 400 B.C. Here are a few additional ones, some comparatively old, others more recent. Rhodes was not the only city that used the rose as a coin-type; we have it also on the money of Rhoda, a Greek settlement in Spain. Then there is a goat (αίξ) or a goat's head at each of the four cities called Aegae, and also at Aegira, Aegosthena, and Aegospotami; a fox (ἀλώπηξ) at Alopeconnesus; an anchor (ἄγκυρα) at Ancyra; a crayfish (ἀστακός) at Astacus; an elbow (ἀγκών) at Ancona; a horn of plenty at Copia; a barleycorn (κριθή) at Crithote; a two-handled vessel (κυψέλη) at Cypsela; a lion (λέων) at Leontini; a bee (μέλιττα) at Melitaea; the mid-day sun (μέση ήμέρα) at Mesembria; a head of Pan at Panticapaeum; the prow or stern of a galley ($\phi\acute{\alpha}\sigma\eta\lambda os$) at Phaselis; a deer ($\pi\rho\acute{o}\xi$) at Proconnesus; a bull ($\tau\alpha\imath\acute{\rho}os$) at Tauromenium; a table ($\tau\rho\acute{\alpha}\pi\acute{e}(\alpha)$) at Trapezus; the heavenly bodies at Uranopolis. This list could easily be extended. No doubt it includes cases where something more than a mere pun was involved. The object represented may often have been one which had originally had a real connection with the name of the city. Still, even when every allowance has been made for this, we cannot set the punning tendency aside, or allow it to be swallowed up in symbolism. And once we have recognized its influence, the universality of the religious motive is infringed,—an infringement which is fatal to the argument on which the whole religious theory is based.

A position more advanced than Burgon's was taken up by Professor E. Curtius in a paper which appeared in the *Monatsbericht* of the Royal Prussian Academy of Sciences in 1869.¹ Curtius pushed the enquiry a stage further back than Burgon had done. Assuming as axiomatic the religious view of coin-types, he set himself to discover, "upon what the religious character of coins rests, and especially what is their relation to religious worship." Money (he avers) was first struck in the temples of the gods; it was an invention of the priesthood, who were at once large capitalists and extensive retail traders. This being so, it was only natural that each set of coins should be marked by an emblem appropriate to the divinity within whose precinct it had been minted. The first indication of

¹ Translated by Head in the *Num. Chron*. for 1870. The quotations cited here are taken from this translation.

any change, the earliest symptom of the decay of priestly power and of the transference of monetary rights to the civil authorities, is to be detected in the appearance of inscriptions. "Writing," he says "occurs so sparingly, and in forms so constantly repeated that it becomes a sort of picture or coat-of-arms. It is the Government countermark to the priestly symbol which was left unchanged; its introduction marks the secularisation of the coinage." Curtius does not limit himself to generalities. He asserts that the oldest Lydian coins must have been "issued by the priesthood of the Sardian Mater Deûm." Similarly, founding on the interpretation of the tortoise type at Aegina as a sacred symbol, he attributes the first appearance of coined money in European Greece to the hierarchy of Aphrodite Urania, the Phoenician Astarte, a goddess whom he regards as "the central point of the history of ancient civilisation. Her sanctuary formed the kernel of every Sidonian factory, whence we find her worship on all the coasts of the Archipelago devoted to maritime intercourse."

This reasoning can only be described as in the highest degree speculative. If the invention of coinage was so intimately bound up with the cult of Astarte, it is pertinent to enquire why it did not originate among the Phoenicians, and why the great Phoenician city of the west was so reluctant to adopt it. Again, the only substantial fact adduced in support of the view that "the authorities of the Greek temples issued coins from their treasuries" is the fourth century silver piece of Miletus with the

¹ See supra, p. 7.

remarkable inscription, ΕΓ ΔΙΔΥΜΩΝ ΙΕΡΗ. Now, it is highly probable that this coin was struck under the direct authority of the priests of the Didymaean Apollo. But, even so, it does not lend adequate support to Curtius's general theory; the sacred character of the coin is indicated by the inscription, and yet inscriptions are ex hypothesi secular. Apart from this special objection, the late date of the coin renders it inadmissible as evidence on the question of origins. Were there any proof that archaic coins had been struck in temples, a fourth century example could have been very reasonably explained as an isolated survival. But a fourth century example, standing quite alone, can throw just as little light on the beginnings of coinage as can those bronze pieces of Imperial times which bear the name and title of a ίερεύς or ἀρχιερεύς, and which were doubtless issued at the celebration of special festivals.

Another point brought forward by Curtius is the association of the mint at Rome with the temple of Juno Moneta. Here again the same difficulty confronts us. The association dates only from 268 B.C. That is, its first beginnings belong to a period when, on the showing of Curtius himself, the control of the coinage had long ago passed into the hands of the civil authorities. We cannot fairly reason back from this to the seventh or eighth century B.C. As we shall see, it is perfectly true that at the time when the Romans borrowed the art of minting from their neighbours, a distinct connection did exist between coins and religion. But that this connection was not of the kind that Curtius believed, is surely sufficiently

proved by the fact that the most characteristic cointypes of the Roman Republic have nothing to do with Juno.

Speculative as they were, the views we have just been examining exercised a powerful influence in securing wide acceptance for the religious theory of origins. They were propounded at an epoch in the history of scholarship when the atmosphere was full of solar myths and solar worship. With the help of the sun it became possible to read a religious significance into types that had defied all previous attempts at explanation. If there were few numismatists who were able to adopt the extreme position of Curtius, the great majority acquiesced in the doctrine that underlay it,—the doctrine originally formulated by Burgon. What may fairly be called the orthodox attitude is admirably and concisely summed up in the Introduction to Head's Historia Numorum. The type was "a solemn affirmation on the part of the State that the coin was of just weight and good metal, a calling of the gods to witness against fraud. Such being its object it was of course necessary that the coin-type should consist of a generally intelligible device, which might appeal to the eyes of all as the sacred emblem of the god whose dreaded name was thus invoked to vouch for the good faith of the issuer. Hence the religious character of all early coin-types. Just as the word OEOI frequently stands at the head of treaties engraved on stone, so the emblems of the gods stand conspicuous on the face of the coins." Again, the gods were "invoked on the coins as the protectors

¹ Op. cit., p. lvi.

of the State, and their heads or emblems were alone deemed worthy of representation on the money." 1

The strength of this position is obvious. One of its weaknesses has already been indicated. If consistency is to be maintained—and consistency is really essential -all principles save the religious one must be rigorously excluded, even the punning principle being abandoned. And there is another difficulty of which Burgon himself seems to have been, to some extent, sensible. As I have already hinted, there are many types whose religious significance is far from being apparent. Even if we treat them as symbols, it is sometimes very hard to connect them with a deity at all. The seriousness of this objection is intensified when we reflect that the great majority of such types are found on the early coins, in other words, that the religious significance is most often obscure on the very pieces on which we should have expected it to be plain.

The most acute and formidable attack to which the religious theory has been subjected is that which was directed against it by Professor Ridgeway in his remarkable book on The Origin of Currency and Weight Standards. The main thesis of that work lies outside the limits of our immediate subject. Incidentally, however, the origin of coin-types is considered. While readily admitting that many of these have a religious significance, Ridgeway points out the forced nature of the explanations to which it is sometimes necessary to have recourse if religion is to be the only key. At least a certain number of types can, he holds, be much

¹ Ibid., p. lvii.

more rationally accounted for on an alternative theory, which is to be looked upon as a supplement rather than as a rival to the other. Before the introduction of a metallic standard the universal unit of value was the ox. Besides this universal unit, different districts had units peculiar to themselves, employed as submultiples of the ox. The article chosen by each district as a submultiple or subsidiary unit was naturally some animal or product that had a recognized local value. When this primitive system of currency was superseded by a metallic one, what more simple or obvious than that the pieces of gold and silver should be impressed with an actual picture of the articles that had formerly served as money? Such is, in brief, the commercial theory of the origin of coin-types. In support of it Professor Ridgeway appeals to the frequent appearance of an ox or an ox's head as a type upon early coins. But this is not all. He thinks it possible to find traces of "the old local barter-unit" on certain archaic pieces. In concentrating his efforts on the oldest coins, which "must date from a time when barter was just being replaced by a monetary currency," he is putting a sound principle into practice. We have already remarked that no theory can be accepted as satisfactory which does not adequately explain the phenomena associated with the earliest specimens.

Ridgeway's hypothesis is ingenious, and the skill with which he has defended it has added to its attractiveness. We are therefore called upon to examine it in some detail. More than one critic has already drawn attention to what seem to be faulty

joints in the armour. It has been pointed out, for instance, that the tunny-fish on the coins of Cyzicus (which is one of Ridgeway's most important illustrations) might with equal plausibility be claimed as evidence in support of an extreme religious theory. On the oldest coins it is shown decorated with sacrificial fillets (Plate i. 6), an ornament that can only have a religious significance.1 The reply that the tunny was offered to Poseidon simply as first-fruits, and not because it was sacred, does not quite meet the case. It may be added that a precisely similar difficulty arises regarding the double-headed axe on coins of Tenedos, another example on which Ridgeway relies. On one or two early specimens this axe appears as an unmistakable cultus-object (Plate i. 11),-placed upon a basis which is approached by steps, and having its edges resting on perpendicular supports. A very rare piece actually shows an amphora attached to the axe by a fillet.2 A second objection, urged from the same quarter, must also be regarded as weighty. Ridgeway reminds us of the fame of the wines of Thasos and of Chios, and seeks to connect the occurrence of a wine-cup or a wine-jar on the coins of those islands with the supposed employment of some measure of wine as a barter-unit in prehistoric times. In both cases, however, the vessel is merely an adjunct; on Thasian coins Silenus is represented seated with a winecup in his hand, and on Chian coins an amphora stands in front of a recumbent sphinx. More important

¹ Warwick Wroth, *Class. Review*, 1892, pp. 470 f. Cf. Ridgeway's reply and Wroth's rejoinder, *Ibid.*, 1893, pp. 79 ff.

² Imhoof-Blumer, Z.f.N., xx. p. 274, Pl. x. 8.

still, neither of these types is early; on archaic coins of Chios the sphinx figures alone, while the oldest type of Thasos represents Silenus carrying off a nymph.¹

Another critic has laid his finger on a third serious weakness.2 Assuming the correctness of the commercial theory, we should expect to find some systematic relation between the type and the denomination of the coin on which it is found. No evidence of this is forthcoming. The early Lycian staters show a whole boar and a half boar indifferently. A complete tortoise adorns not only the staters of the oldest Aeginetan series, but all the fractions down to the quarter-obol. An ear of corn is the type of the archaic staters of Metapontum and also of the corresponding thirds, while the distinguishing mark of the sixths is the head of a bull, the primitive ox-unit being thus relegated to a place far below its submultiple. Lastly, on the earliest coins of Thebes, the whole shield appears on the highest denominations and also on the lowest, while one of the intermediate denominations shows a half shield. Confusion of this sort could not possibly have reigned if the type had been in any real sense an "indication of the value."

All the examples cited in the last two paragraphs are among those which Ridgeway has himself selected as favourable to his theory. It will be only fair to follow the same principle in subjecting his views to a more general examination. According to his main proposition, the primitive ox-unit was everywhere equated to about 135 grains Troy of gold. That is, the coin that would most nearly correspond to it when a metallic

¹ See Wroth, l.c. ² Hill, Handbook, pp. 168 f.

currency was introduced, would be the gold stater. The ox ought, therefore, to be the most popular, if not the universal, type on the archaic staters of gold and electrum. As a matter of fact, the earliest Lydian coins have no recognizable type at all. The first devices to make their appearance are a running fox and a stag's head, both upon the same coin. And an impartial survey of the primitive currency of Asia Minor yields results that are hardly more promising. Here is a list of the best known types—a lion or part of a lion, the forepart of a lion back to back with the forepart of a bull, the forepart of a winged boar, a bee, a seal, a griffin, a sphinx, the forepart of a bull looking back, a bull's head, a stag, an owl, the forepart of a winged horse. It is surely significant that there should be so few which it would be possible to connect in any way with a primitive ox-unit. Nor can we for a single moment admit as evidence "these beautiful types such as the cow suckling her calf (Dyrrachium), the cow with the bird on her back (Eretria), the cow scratching herself (Eretria), the two calves' heads seen on the coins of Mytilene, and the magnificent charging bull on the coins of Thurii." At least one of these designs is, as we shall learn in a future lecture, far older than the invention of coins. But, as coin-types, none of them are archaic. They all occur on pieces of silver (or billon), which are certainly not the equivalents of the ox-unit. If it be urged that they belong to a period when "the connection between ox and coin was only traditional," and that in these instances "the ox was put on coins simply as symbolical of money," 2

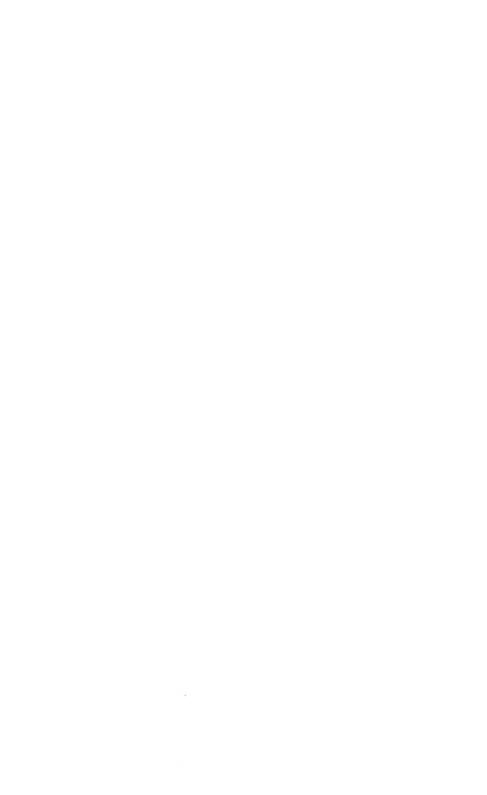
¹ Ridgeway, op. cit., p. 322.

it may be replied that types with a bull or a cow form but a small proportion of the great variety of devices that belong to this epoch. On the same showing, at least as strong a case could be made out for regarding either the horse or the lion or the eagle as being "symbolical of money."

At first sight it would seem as if the Italian cast bronze were destined to provide a more serious basis for establishing a connection between coin-types and the primitive ox-unit. Pliny, writing in the first century A.D., attributes the introduction of coined money at Rome to Servius Tullius. "It was marked with the impressions of animals (nota pecudum), whence it was termed pecunia." Now certain brick-shaped pieces of bronze or copper decorated with the figure of an ox have actually come down to us (Fig. 2). Specimens are to be found in more than one collection of aes grave. Although this illustration was not specially developed by Ridgeway, it is calculated to make a strong appeal to the popular mind, and it is therefore desirable to discuss it. As evidence for a commercial theory of types, these pieces do not differ materially from the silver coins of Dyrrhachium, Eretria, and Thurii which we had occasion to mention above. They do not represent the primitive bronze currency that directly superseded the ox-unit. Pliny quotes Timaeus as authority for the statement that the earliest bronze had no types, a statement which is amply confirmed by the existence of specimens of what is known as aes rude. The advanced style of art exhibited in the aes signatum, as the decorated pieces are called, is, however, absolutely inconsistent



Fig. 2.—CENTRAL ITALY: BRONZE.



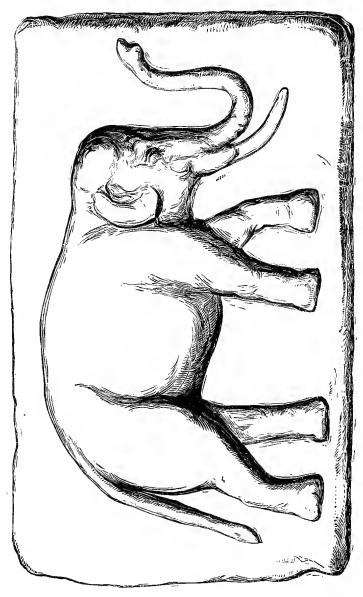


Fig. 3.—Central Italy: Bronze.

with Pliny's attribution of it to the regal period.1 It can hardly be earlier than circa 350 B.C. Indeed, the occurrence of the elephant as a type (Fig. 3) suggests that it is considerably later. There is no reason to believe that the elephant was known in Italy before the campaign of Pyrrhus. In any case we are once more brought face to face with the dilemma that confronted us above. At the best, the connection between ox and coin, if we are justified in calling these pieces coins, which is doubtful,—can have been but traditional. Even so, the ox enjoys no position of privilege on the bronze 'bricks.' It supplies but one type out of many, and we are not entitled to interpret it on any different principle from that which we apply to the eagle, the Pegasus, the elephant, the sow (Fig. 4) or any of the other devices characteristic of the group of which we are speaking.

So far, then, as the ox-unit is concerned, there is no satisfactory evidence to support a commercial theory. How does it stand with the submultiples or subsidiary units? Here there is an added difficulty. Let us concede that it is possible, or even probable, that at some time or other in some portion of the Greek world values were reckoned in terms of fish, shields, tortoises, wine and all the other articles represented on the coins that Ridgeway has chosen as examples. Let us further concede that the tunny would be a natural

¹ Prof. Ridgeway (op. cit., p. 379 and p. 382) credits Timaeus with the statement that the change from plain to decorated bronze took place during the regal period. This is a possible, but not a necessary, inference from the words of Pliny—"Servius rex primus signavit aes: antea rudi usos Romae Timaeus tradit" (xxxiii. 3, 13).



FIG. 4.—CENTRAL ITALY: BRONZE.

barter-unit with the fishermen and fish-merchants of Cyzicus, as wine would be in Chios and Thasos, silphium in Cyrene, and the pig in Lycia, which was famous for its hams. But what ground is there for associating a shield currency with Boeotia, an axe currency with Tenedos, a tortoise currency with Aegina, or a cuttle-fish currency with Eretria and with Croton? None, unless we are prepared to accept the coin-types as evidence, and this we cannot do without assuming what has to be proved.

Indeed, if we scan the various cases carefully, we shall be tempted to go back so far upon our concession. There is solid reason for believing that axes were once current as money in Cyprus.¹ But does not the view that the Greeks used tortoises (or their shells) and cuttle-fish as barter-units anywhere, rest only on the slenderest of surmises? Is the evidence for some of the other articles much stronger? Take the shield, for example. The fact that, as Homer tells us, the ox-hide shield was wont to be a prize for the feet of men certainly proves that the value of shields was generally appreciated in Homeric times. But it does not prove that they were an actual currency. Such a conclusion would involve as a major premise the theory that all Homeric prizes were money. We should thus be compelled to class as money the "mixing-bowl of silver chased," which Achilles offered as the first prize for the foot-race at the funeral games of Patroclus. Yet nothing could have been less well-suited than this mixing-bowl to serve as a unit of currency. It is true that we are told it held "six measures." But the

¹ Six, Rev. Num., 1883, pp. 261 f.

poet mentions this merely because he wishes to make his picture as vivid as possible. The bowl owed its real value, not to its capacity, but to its uniqueness as a work of art. "In beauty it was the best in all the earth, for artificers of Sidon wrought it cunningly, and men of the Phoenicians brought it over the misty sea."

Another of Professor Ridgeway's lines of argument calls for a caveat. The highest class in the Solonian constitution were called 'Five-hundred-measure-men' (πεντακοσιομέδιμνοι), and were rated at 500 drachmae, a drachma being in Solon's days (as Plutarch tells us) the average price of a sheep or a measure. This is, of course, not inconsistent with the supposition that the measure of corn or oil was the original barterunit in Athens,2 but it cannot be looked upon as a proof of that supposition. It need mean no more than that, at the stage of development which Athenian society had reached in the time of Solon, it was still convenient, for certain public purposes, to reckon a man's wealth in kind. A similar explanation may quite well apply to the mention of kettles $(\lambda \epsilon \beta \eta \tau \epsilon s)$ and pots (τρίποδες) on the famous Cretan inscriptions that embody the ancient laws of Gortyna. That the kettles and pots indicate money is beyond all doubt. But are we justified in holding it proved that actual kettles and actual pots are intended, and that these utensils were the barter-units of the primitive Cretan currency?3 Is it not at least equally likely that 'kettles' and 'pots' may have been used to describe

¹ Iliad, xxiii. 741 ff. ² Ridgeway, op. cit., p. 325. ⁸ Ibid., pp. 314 f.

certain recognized measures which these vessels contained? If so, the mention of them in the Gortynian laws need not imply that either they themselves or the articles they were usually employed to measure had ever been regarded as a currency. Scotland furnishes an analogy so exact as to be worth recalling in detail.

Time was, of course, when in Scotland, as elsewhere, the labour of the parish priest was requited by contributions in kind from his flock. Coined money existed. But the primitive method of payment was simpler. To this day the marks of that primitive method are deeply ingrained in the ecclesiastical law of Scotland. In all parishes which are parishes in the full sense ('quoad omnia'), the stipends of the clergy are officially reckoned in measures of meal and of grain. standards used vary somewhat in the different counties, but everywhere except in Shetland (which has a quaint set of measures peculiar to itself) a prominent place belongs to the otherwise practically obsolete Scottish 'boll' or bowl, with its multiple the 'chalder' or cauldron. The actual money payments which fall to be made are calculated by means of the 'Fiars' prices,' an institution one of whose earliest objects was to fix the conversion into money of rents payable in kind. Since the reign of George III. it has been applied to ministers' stipends, it being the duty of the Sheriff of a county, with the aid of a jury, to 'strike Fiars' before March 1st in each year, that is, to fix what may fairly be regarded as the market prices of meal and grain within the area under his jurisdiction. If a parish minister feels that, owing to a change of circumstances that promises to be permanent, his annual income in money is less than his parishioners might reasonably be called upon to provide, it is open to him, under certain limitations, to seek redress by petitioning the 'Court of Teinds' for an 'augmentation.' If the Court decides that an increase is justified, it proceeds to fix in 'chalders' the amount of augmentation allowed. There would be just as much justification for making this curious survival the basis of a theory that meal and grain or bowls and cauldrons were once 'barter-units' in Scotland as there is for drawing corresponding deductions from what may have been kindred survivals in ancient Athens or in Crete.

It may be urged that the caution for which I have been pleading is unscientific, that it ignores the value of the comparative method, and takes no account of the wealth of illustration that Professor Ridgeway's learning has garnered from so many fields. But it must be remembered that it is not his general theory of weights and measures that is in question here; we are concerned merely with his explanation of coin-types. And, so far as that particular portion of his argument goes, no objection hitherto brought forward is stronger than that which the comparative method itself provides. We cannot admit as applicable to one or two types in any homogeneous archaic group a principle of interpretation that would be grotesquely inapplicable to the remainder. The early electrum currency of Asia Minor has already been referred to. Only a little later in time are the silver staters minted on the islands and coasts of the Aegean about the sixth century B.c. On these we find types, like a wine-jar and a goat, which might be plausibly accounted for in some such way as Ridgeway has proposed. But what are we to make of an eagle upon the wing, the forepart of a lion, or the head of a satyr? As a final example we may take a group already discussed in another connection—the coins of the so-called South Italian Monetary Confederation. Ridgeway claims the Metapontine ear of corn (Plate i. 16) as an instance of a barter-unit turned coin-type. The tripod at Croton (Plate i. 17) would fit well into his scheme, and so (except for the fact that the coinage is of silver) would the bull at Sybaris (Plate i. 17), the progenitor of the charging bull of Thurii. But the theory breaks down completely when we reach the man-headed bull at Laus, the figure of Poseidon at Poseidonia, Taras (or Phalanthus) on his dolphin at Tarentum (Plate iv. 1), and the enigmatic 'Apollo' at Caulonia (Plate iii. 7). Judged by the comparative method, the commercial explanation of coin-types proves to be beset with difficulties at least as serious as those which stood in the way of the religious one, whose deficiencies it was originally brought forward to supplement.

Is it possible to find a third explanation more worthy of acceptance than either?

In endeavouring to answer this question we must bear in mind two conditions that have already emerged incidentally. No explanation can be regarded as satisfactory which is not applicable to all coins of a homogeneous group, or which fails to account for archaic types. And there is a further point that must be kept in view. Any adequate theory of types must

be equally a theory of 'symbols.' Symbols, it will be remembered, were defined as secondary devices which may appear side by side with the main types without being linked to them by any organic connection. There was no uniformity of practice with regard to the employment of these. On the money of some cities they are almost unknown. On the money of others they are regularly used from the opening of the mint down to the advent of the imperial age, when they disappear practically everywhere. As a rule, however, they are sporadic, occurring with great frequency at certain epochs and then vanishing again. Evidently they are the result of a practice which was more or less regulated by fashion, and in regard to which there was no fixed law. It is generally agreed that, in the great majority of instances, these symbols denote the magistrates responsible for the issue. This might have been readily inferred even in the absence of direct proof. But direct proof is not lacking, since there are series on which the name of the magistrate accompanies the symbol, the variations of the two being concomitant. The symbol thus stands to the magistrate in the same relation as the type does to the city. One indicates the individual, and the other the state. So far as function is concerned, they are identical. It is natural to suppose that in character they are identical also. How far is this supposition borne out by the facts?

In the first place, there is absolutely no difference in kind between the devices chosen for types and those chosen for symbols. Thus if (to take an example at random) we turn to the list of the coins of Aenus in Thrace preserved in the British Museum, we find among the magistrates' symbols an eagle, a lyre, a caduceus, a bunch of grapes, and a figure of Hermes. All of these occur elsewhere as types, and every one of them has, in that capacity, been claimed as an illustration of the religious theory. We find also a wine-jar, a tripod, an ear of corn, and a double-headed axe,four of the most important objects that figured in the very limited group of types on which Ridgeway's commercial theory was based. This single instance should suffice to show the need for caution, and, in particular, to prove that we cannot afford to ignore the analogy between types and symbols. Their fundamental identity will be made more strikingly evident if we turn to certain series where the distinction between the two is obliterated.

In the same region of Greece as Aenus lay the city of Abdera. Its characteristic type was a griffin, seated or rearing. This device occupies the obverse of its coins throughout practically the whole of its history. The reverse passes through several stages of development. At first it presents simply a shallow quadripartite incuse square (Plate i. 12), a conventionalized reflection of the rude mark of the punch which has been mentioned as distinctive of the most archaic coins. Presently the name of a magistrate comes to be written round the edges of this square (Plate i. 13). Then, about 450 B.C., a notable innovation is introduced. The space enclosed by the magistrate's name on each coin is filled by a device that cannot be called secondary, inasmuch as it occupies the entire field (Plate i. 14) and is often more elaborate than the

griffin of the obverse. Yet it is not a type in the proper sense of the term. Its significance is personal. That this is so is proved not merely by the fact that it varies with the name of the magistrate, but also by the circumstance that in some cases it is clearly of the nature of a 'canting badge,' a precise parallel to the 'speaking types' of which we have already heard. Thus NIKO ETPATO Echooses for his device an armed warrior charging to victory, ΓΥΘΩΝ has a laureate tripod (Plate i. 15) suggestive of the Pythian Apollo, and EYAΓΩN a prize amphora on a stand, while under the régime of THΛEMAXOΣ we see Heracles discharging a shaft against a distant foe, under that of $\Gamma P \Omega T H \Sigma$ we have three ears of barley, possibly intended to represent first-fruits, and under that of ΜΟΛΓΑΓΟΡΗΣ we find a dancing girl, doubtless executing the μολπή.

It has already been said that, in the great majority of instances, symbols denote the magistrates responsible for the issue of the coins. The prominence accorded to them at Abdera, a prominence that fairly entitles them to rank as types, has been held to imply that the magistrates were of higher dignity than the officials who exercised immediate supervision over the mint. It may be that, as has been suggested, they were the annual 'eponymi' of the city. But this does not affect our point. The difference is one of degree, rather than of kind. In their essence the devices we have been discussing are symbols, in the sense that their significance is secondary; it is personal, not civic. And yet, so far as appearances go, there is nothing to distinguish them from types properly so called.

If we cross the Aegean, we encounter an analogous phenomenon at Cyzicus. The oldest type of this city has already been referred to in another connection. It was a tunny-fish decorated with fillets. But the ordinary series of Cyzicene staters—two characteristic examples of which are figured on Plate i. (Nos. 7 and 8)—presents us with an astonishing variety of devices. The reverse remains unchanged, a conventionalized incuse square of what is known as the mill-sail pattern. On the obverse the tunny—the true type, seeing that it contains the direct reference to the city—has been relegated to a subordinate position. It is constantly present, but the place of honour is accorded to a design that seems to have changed once a year or oftener. The issue of these staters cannot, on grounds of style, be allowed to have covered much more than one hundred and fifty years, while more than one hundred and seventy distinct types are known. Here there is no means of establishing a direct connection between the changing devices and individual magistrates, since the staters of Cyzicus bear no inscription, not even the name of the town. But all the circumstances are most simply explained if we suppose that the analogy of Abdera holds good. The Cyzicene types are really glorified symbols. Had it been otherwise, had they been meant to testify to the responsibility of the city, the presence of the tunny would have been superfluous. As it is, however, the fish is always there, sometimes worked into the main design with admirable skill, more often placed beneath or in the field, an adjunct that has invariably a certain prominence accorded to it but is never permitted to interfere with the balanced beauty of the whole.

The electrum of Phocaea in Ionia furnishes a close parallel to that of Cyzicus. Its oldest coins have as their type a seal (Plate i. 5). But about the beginning of the fifth century B.C. there commences a series with constantly changing types, the one unchanging element being a small seal which is a never-failing adjunct. Varying types are characteristic also of the electrum of Mytilene, issued, as we have seen above, under agreement with Phocaea. And on the fine series of gold staters struck at Lampsacus in the first half of the fourth century B.C. a similar principle prevails. There the type proper, the forepart of a winged horse, always occupies the reverse. The obverse of each issue has a device peculiar to itself. Two good illustrations will be found on Plate i. (Nos. 9 and 10).

Most instructive of all, perhaps, is the evidence to be gathered from the Athenian coinage of the 'new style,' that is the money issued at Athens after circa 220 B.C. It consisted of silver and copper or bronze. In a considerable number of cases the device used for the reverse type of the bronze is precisely the same as that which serves as a symbol on the corresponding silver.² That is, when it was a question of a purely local currency, the responsible officers at Athens acted exactly as those at Abdera, Cyzicus, Phocaea, Mytilene and Lampsacus had done. We have the curious result that devices like the statue of Apollo Delios, a tripod,

¹ In this case there is no common element in the design: see supra, p. 11, footnote.

² For a list see Head, B.M.C. Attica, p. lviii.

a sphinx, an eagle on a thunderbolt, and a cicada, are made to do duty in two distinct capacities on the money of the same city in one and the same year. On the silver they are only symbols; on the bronze they attain to the dignity of types. A more convincing proof of the fundamental identity of symbol and type it would not be easy to imagine. It must be evident that any theory which is to explain the one must also explain the other. In the next lecture, therefore, I propose to accept this identity as a starting-point.

LECTURE II.

THE opening lecture contained a short sketch of the first beginnings of coinage. It also passed in brief review the two most important theories that have been propounded as to the origin of types, drawing attention to certain difficulties that stood in the way of the acceptance of either. Finally, ground was shown for holding that types and symbols were substantially identical in character and in function, and consequently that no explanation could be regarded as applicable to the one which did not also admit of being applied to the other. The proposition I have now to put forward is If types and symbols be essentially identical, and if the symbol be the badge of the magistrate, it follows that the type of a coin is simply the badge of the issuing town or state. Various modifications of this broad statement will suggest themselves as we proceed. But, taken as it stands, it provides us, I think, not merely with a working theory of types, but also with a real clue to the origin of coinage.

The custom of using signets, or devices to be impressed as seals upon clay or wax, can be traced back to

a very early period. Herodotus,1 speaking of the Babylonians of his own day, tells us that each man carried a signet. The importance attached to these signets becomes clearer if we bear in mind that (as is proved by many surviving specimens) they were not associated with any form of personal ornament such as rings. They were cut on the ends of cylinders which were worn suspended round the neck or wrist by a cord. The testimony of Herodotus refers to the fifth century B.c. But there is every reason to believe that throughout the great monarchies of the East the state of things which he describes had prevailed from immemorial antiquity. Recent discoveries on Mycenaean sites in Crete, for instance, have brought to light an extraordinarily rich and varied series of impressions in clay, proving how common the process was during the Mycenaean age.² It must certainly have been perfectly familiar to the Lydians and other peoples of Western Asia Minor in the eighth century B.c. At a rather later period we have evidence that it played a prominent part in the social and business life of early Athens. One of Solon's laws expressly prohibited a seal-cutter from retaining in his possession a copy of any seal that he sold to a customer.3 If we now recall for a moment the primitive method of striking coinsthe softening of the metal, the impression of a mark

¹i. 195.

² See, for example, D. G. Hogarth, *The Zakro Sealings* in *J.H.S.*, xxii. pp. 76 ff (Plates vi-x).

 $^{^3}$ Δακτυλιογλύφωη έξείναι σφραγίδα φυλάττειν τοῦ πραθέντος δακτυλίου (Diog. Laert. i. 57). The phraseology shows that the Greeks, unlike the Babylonians, attached the seal to the finger ring.

by direct force exerted from above,—we cannot fail to draw the inference that there is a very close connection between sealing and the striking of money, that, in fact, the one was directly suggested by the other.

The conclusion just arrived at, was reached long ago by Burgon. He started from somewhat different premises, and he continued the argument along a line where we cannot follow him. But, granted his point of view, his statement of the case is so admirable that it deserves to be quoted at length: "As the act of impressing a seal or signet was an understood sign of solemn compact from the most early periods; and as engraved seals and signets were undoubtedly in general use long anterior to the invention of coining, it appears highly probable that the original idea of impressing a stamp on the uncoined lumps of gold or silver, was most probably derived from the common application of a seal to wax. The earliest coins may therefore be looked upon as pieces of sealed metal, which in fact, they are; it being well known that, at first, coins were impressed only on one side. No device that could be imagined, was so well adapted to the peculiar necessity of the case, or so likely to satisfy the public mind, as the impress, by public authority, of the symbol of the tutelar divinity of the city."1

The whole of this argument, and more particularly the last sentence, is of course an endeavour to discover a logical basis for the religious theory of types. Into that we need not enter further at this stage. It is more important to deal with a technical difficulty. It has been already explained that by the 'obverse' of

¹ Burgon, Numismatic Journal, vol. i. p. 118.

These jars were apparently made to regulation sizes, and customers seem to have insisted on having an official guarantee of their capacity. Accordingly, while they may or may not bear the maker's name, they always carry that of a magistrate, accompanied usually by an official stamp. At Rhodes this official stamp is either the facing head of Helios, or a half-blown rose, obviously the badges of the city, as they occur constantly on its coinage. Elsewhere the device on the stamp varies with the name of the magistrate, and must, therefore, be regarded as his private signet.1 If we apply this analogy to coins, we shall see that the question as to which seal it was appropriate to use might have been answered in different ways in different parts of the Greek world. And so I believe it was. I believe, further, that a proper apprehension of this would simplify the solution of some of the problems that surround the attribution of the early electrum of Asia Minor.

In Lydia, just as afterwards in Persia, the question we have been discussing did not really arise. These were monarchies, and the emblem used must be a royal emblem. In Lydia it was the lion, in Persia a

¹ A mass of evidence regarding the marks on this class of pottery will be found in Albert Dumont's Inscriptions céramiques de Grèce (Paris, 1872). In the case of the Black Sea jars the private signets are beyond all doubt those of the magistrates, not of the makers; see the lists given by Brandis, Z.f.N., i. pp. 51 ff. I agree with Brandis (to whose article I would here acknowledge obligations) in thinking it demonstrable that the same rule holds good at Cnidus and Thasos, and also (in the exceptional instances in which a private signet is used) at Rhodes. But this last point is not really material to the argument.

PLATE II.

	·		SEE P.	AGES
ı.	Athens (before 500 B.C.): silver,			86
2.	Athens (450 B.C. or later): silver,		t	86
3.	Athens (second century B.C.): silver,	-1,	- 53	, 86
			`- àI	
5.	Athens (before 175 B.C.): silver,	-11		55
6	Athens (circa 88 B.C.) · silver -		-	-55
7.	Athens (circa 90 B.C.): silver,	~_	-	56
	Teos (second century B.C.): silver,			56
9.	Argos (circa 400 B.C.): silver,	74,	124,	144
0.	Itanus (circa 400 B.C.): silver			74
ı.	Philip II. (359-336 B.C.): gold,		:	87
2.	Britain (first century B.C.): gold,			87
3.	Syracuse (circa 400 B.C.): silver,	·81,	101,	130
4.	Opuntian Locrians (after 400 B.C.): silver,	- 3 :	J	82
5.	Carthaginians (fourth century B.C.): silver, at	πī	410.	82



figure of the Great King himself speeding through his dominions with spear and bow (Plate vi. 6). In the case of the free Greek cities on the coast there was room for doubt, and there, just as in the case of the jars, there appears to have been variation in practice. We have seen that at Cyzicus and at Phocaea respectively the earliest types were a tunnyfish and a seal, but that the use of these was presently abandoned in favour of a system of changing devices. The same thing appears to have happened at Lampsacus, although there the changing devices were not introduced until the city began to strike gold staters somewhere about 400 B.C. If we set aside the electrum coinage of these three cities, and also that of Mytilene, which attaches itself readily to the later Phocaean series, and if we further leave out of account the pieces with the forepart or the head of a lion, as being most probably Lydian, we find that the rest of the electrum money of Asia Minor supplies us with a most miscellaneous array of types. Formerly it was the custom to assign each type to a different town, with the result that even such distant centres as Eretria, Athens, and Aegina were believed to have minted in electrum. Observations as to weight, provenance, and fabric have rendered this position untenable, and of late years numismatists have tended more and more to the view that the primitive electrum currency was all produced within a comparatively limited area.

A good deal that is puzzling would be made plain if we could suppose that in the early days of the art, when mints were few in number, there was a period

during which the magistrate's signet was systematically employed. Cyzicus and Phocaea, which started on the opposite principle, presently came round to this one. It is not unreasonable to suppose that in so doing they were conforming to a general practice. Subsequently the minting of silver and the spread of coinage towards the west brought about a general reversion to the policy they had abandoned. But to the end the old tradition of changing types clung to the direct descendants of the primitive staters: witness the fourth century electrum coins of Cyzicus, of Mytilene, and of Phocaea, the last representatives of the original currency. And it was probably this tradition that affected both the gold of Lampsacus and the silver of Abdera. Lampsacus and Cyzicus lay not far from one another on the coast of the Propontis, and Ionian influences were strong at Abdera, which had been colonized from Clazomenae and recolonized from Teos

The hypothesis just put forward accords perfectly with the scanty evidence that can be gleaned from inscriptions. For the most part the electrum coinage is uninscribed, and of the few legends that do occur there are perhaps not more than two that can be interpreted with any approach to certainty. On the oldest coins of Phocaea (Plate i. 5) the seal is accompanied by the letter \odot , a very archaic form of Φ . This is the initial letter of the city's name, and—in the light of later usage—it is clear that it is employed here to interpret or explain the device. It says in effect, 'This is the badge of Phocaea.' The second inscription to which I have alluded has given much

occasion for discussion (Plate i. 3). It runs round the figure of a grazing stag, and the forms of the letters are extremely early. There is some doubt about the reading of the first of the three words of which it consists. But the differences of opinion are not material to our point, and we may safely adopt Head's version, which is AMMRIMARONAAO. Passing from right to left, we get Φαενος ἐμὶ σῆμα, 'I am the badge of—, and now we are confronted by a difficulty. The word $\Phi \alpha \epsilon \nu \sigma s$ is obviously a genitive. What is its nominative? Sir Charles Newton, in first publishing the coin 2 (which is, by the way, unique), suggested Φαενώ, a possible epithet of Artemis, 'the bright one,' whose association with the deer is well known. Fränkel has also argued in favour of this view, basing his opinion on etymological grounds.3 The majority, however, suppose that an ordinary human being is meant, and say that he must have been a potentate or 'tyrant' either at Halicarnassus or at Ephesus, the coin having been found at Halicarnassus and the stag being a common type at Ephesus in later times. In view of the parallel that can be quoted from an archaic engraved gem, Θέρσιός είμι σᾶμα, μή με ανοιγε, 'I am the signet of Thersis; open me not,' 4 we must (I think) agree that he was a man. But the inference as to his position is hardly justifiable. If our hypothesis regarding the character of many of

¹ B.M.C., Ionia, p. 47.

² Num. Chron., 1870, p. 237.

³ Arch. Zeit., 1879, pp. 27 ff.

⁴ O. Rossbach, Arch. Zeit., 1883, p. 337, Pl. xvi. fig. 19.

the types on the early electrum be accepted, Phanes—if that be the proper form of his name—takes his place quite naturally as an ordinary magistrate. The presence of the name beside the badge is certainly exceptional, but so was the presence of the name beside the townarms at Phocaea. An incidental consequence of the conclusion reached is that the attribution to Ephesus is rendered quite doubtful. If the stag is a personal signet, its interpretation as a type of that town becomes inadmissible.

Originally, then, coins were simply pieces of sealed metal impressed with the emblem either of the issuing city or of the responsible magistrate. Whatever special influences may have come into play subsequently, types were at the outset no more than signets. In their essence they were heraldic rather than religious. Heraldry, it must be remembered, is far older than the Middle Ages. The warriors in the Seven Against Thebes carry shields with devices every whit as elaborate as those that figure in the tournament at Ashby-de-la-Zouche. Sometimes these devices were hereditary, like a mediaeval or modern crest. Pausanias says that on the grave of Epaminondas there "stands a pillar bearing a shield on which is wrought in relief a dragon. The dragon is meant to signify that Epaminondas was of the race called the Sparti."1 On the other hand, an individual might choose a special emblem. The Gorgon on the shield of Lamachus in the Acharnians looks like something of the kind, and Plutarch explicitly tells us that Alcibiades discarded anything approaching a family coat-of-arms,

and placed upon his shield instead a figure of Eros hurling a thunderbolt.¹

In the case of magistrates we have no means of knowing for certain that the devices used on shields were identical with those employed for public purposes as signets. There is, however, a strong presumption that they were so sometimes. Interesting evidence to that effect can be gathered from the Tabulae Heracleenses. Before the name of each of the magistrates mentioned on these Tables there occur one or more letters denoting his tribe and also a word descriptive of the object that served as his official symbol—a flower, a caduceus, a bunch of grapes, a ship's beak, and so on. A comparison shows that the official symbol is often common to members of a tribe.2 Again, on the Euxine pottery which was referred to earlier in the lecture, the occasional addition of a patronymic to the name of the ἀστυνόμος enables us to see that the right to use a signet might be transmitted from father to son. There are several instances where the same device is employed by both.3

It is therefore quite probable that some of the magistrates' symbols which we meet with on coins may be hereditary crests. It can, however, be shown positively that they were frequently of the nature of specially selected emblems. The later series of Athenian tetradrachms (Plate iii. Nos. 3, 5, 6, and 7), which we have already found helpful in another connection, is particularly valuable for the light it throws

 $^{^1}$ ἀσπίδος τε διαχρύσου ποίησιν οὐδὲν ἐπίσημον τῶν πατρίων ἔχουσαν, ἀλλ' Ἔρωτα κεραυνοφόρον (Alcibiades, xvi.).

² See Brandis, Z.f.N. i., pp. 45 f.

³ Ibid., pp. 53 f.

upon this question. The obverse type of these coins is a head of Athena Parthenos, copied from the famous chryselephantine statue by Pheidias. On the reverse a wreath of olive encloses an owl perched upon an overturned amphora, the blank parts of the field being occupied by the magistrates' names 1 and by a symbol. The magistrates' names are never less than two in number. Often we find three. The connection between the first two magistrates and the symbol is so clearly established by their 'concomitant variations' that no one has ventured to question it for a moment. But when we come to enquire to which of these two the symbol really belongs, we find considerable difference of opinion. Beulé, Brandis, and Lenormant give their voices in favour of the second. Cavedoni, Grotefend, Head and Köhler have all pronounced for the first. There need be no hesitation in associating ourselves with the latter view. So far as the argument from joint variation is concerned, the weight of evidence is about equally balanced,2 and any difficulty in the way of either hypothesis can readily be got over by assuming the possibility of re-election—a possibility which is demonstrated for the first magistrate by the series with ΔΙΟΚΛΗΣ, ΔΙΟΚΛΗΣ TO ΔΕΥ, and ΔΙΟΚΛΗΣ ΤΟ ΤΡΙ. The really decisive thing is that, wherever a relation between symbol and name can be traced, it is always with the first name that the

¹ It should be noted that it is quite doubtful what the nature of this magistracy was. Mr. Hill has suggested to me that the names may record a λειτουργία. If this view could be substantiated, it would remove several difficulties that have always beset the discussion of these coins.

² See Hill, Handbook, pp. 122 f.

association exists. Two or three examples of this are familiar to numismatists, and I think we may be able to point to others that are fresher. A review of the circumstances will be helpful, if it enables us to determine the motives by which the selection of an emblem for the purpose was determined, for the selection of types was in all probability regulated by the same general principles.

It will be simplest to begin with the three best known cases of association. On the series in which Antiochus Epiphanes appears as first magistrate the symbol is the Seleucid elephant (Plate ii. 5). Similarly in 87-86 B.c. when Athens espoused the cause of Mithradates the Great, the name of Mithradates stands first upon the coins and the symbol shown is a sun with crescents, a combination that at once recalls the sun and crescent on the money of the king himself. Lastly, on a series that must belong to the same period, in all probability to the year immediately preceding, the first magistrate is Aristion, known to history as one of the doughtiest champions of the Pontic monarch, while the symbol is a figure of Pegasus drinking (Plate ii. 6), familiar as a favourite coin-type of Mithradates.

Aristion's choice of a symbol was obviously dictated by political considerations. With a more intimate knowledge of the history of the period, we might find

It will be convenient to refer to the various series by the numbers prefixed to them in Head's conspectus (B.M.C. Attica, pp. xxxviii. ff.). I need hardly say that this admirable summary has been of the greatest service. The series with the name of Antiochus is No. xxviii.

² Series No. xcv.

³ Series No. lvi.

goddess; that on the former is her head-dress. Particular interest in this respect attaches to Series lxxx.-lxxxiii., all of which bear the name Diocles as that of first magistrate. The Diocles of the first three is certainly one and the same individual, seeing that, as we have mentioned, $\tau \delta$ $\delta \epsilon v$. is appended to his name on the second series, and $\tau \hat{o} \tau \rho \hat{i}$ on the third. Good cause has been shown for identifying him with Diocles (Cephisieus), father of a son of the same name whom we know from epigraphic evidence to have been archon in 58-57 B.C., and to have held the priesthood of Asclepios and Hygieia.1 There is no difficulty in our supposing that the priesthood was hereditary, as so many priesthoods were. If we do so, the motives that prompted the father's choice of symbols for the tetradrachms are thrown into clear relief. His first series has a figure of Asclepios. His second has a figure of Hygieia. We have still to speak of Series lxxxiii. The Diocles mentioned there is quite a different personage. On the coins he is distinguished by the epithet MEAI, which indicates his deme. is Diocles (Meliteus) a member of a family from which the ranks of the monetary magistrates were more than once recruited, and regarding the genealogy of which we are fully informed by Plutarch.2 This Diocles

¹ C.I.A., ii. 630, and 489b, p. 420. See Head, Attica, pp. l. f. Köhler (Z.f.N., xii. 106 ff.) assigned the coins to the younger Diocles, an attribution that would remove all shadow of doubt as to the meaning of the symbols.

² Vit. decem Orat., 843 B. For a table see Head, Attica, p. li. Köhler (l.c.) would attribute the coins, not to this Diocles, but to his son, who presumably inherited from his mother the priesthood she had held.

married Philippe, priestess of Athena. The symbol on his coins is the statue of Athena Parthenos.

The example just cited would of itself have sufficed to show that the symbols were not always hereditary And almost the whole of the rest of the crests. evidence points in the same direction. Indeed, where re-election was possible, and where (as we know to have been the case at Athens) the monetary magistracy was apt to run in families, a system of special devices was demanded by the circumstances, if the various issues were to be kept heraldically distinct. desire for such distinction would naturally spring up wherever the symbols formed a prominent part of the decorative scheme of the coin. It would, therefore, be reasonable to suppose that the types of the Cyzicene electrum were specially chosen, and that is precisely what we should infer from their character. Many of them are obvious adaptations of the cointypes of other towns. On the other hand, at some other cities, such as Dyrrhachium, the symbol is much less conspicuous than the name, and there it is not uncommon to find the same device repeated in association with different names—a repetition that is explained at once if we interpret the emblem as a family crest.1

It would seem, then, that there are two possible kinds of symbol—the family crest and the specially selected device. It is important to note that the only real difference between them is that in the case of the latter the man does for himself what in the case of the former was done for him by an ancestor. This means that the ultimate motives of choice are identical

¹ See Brandis, Z.f.N., i. pp. 59 ff.

in tendency. What the Athenian symbols have taught us in regard to motives is therefore capable of universal application. Such is a brief summary of the leading truths that have emerged from our survey of magistrates' symbols. If the analogy insisted on at the close of last lecture is to hold good, they ought to provide us with a solid basis for investigating the nature of types.

To begin with, we should expect to find that some types are heraldic in character, the part of the family crest being played by the town-arms. I may say at once that I look upon this as by far the most likely explanation of all those archaic types that are not the symbols of individual magistrates. The causes that encouraged magistrates to seek for special devices would not be operative where a city seal was concerned. Is it possible to confirm such a view by reference to actual cases where coin-types are identical with the badges or emblems employed by cities upon other occasions?

Athens may, I think, be taken as a first example. An owl forms the usual reverse type of her silver coins. There are clear indications that an owl was also the device upon the city-seal. It occurs as a stamp on many of the dicast's tickets that have been brought to light. Again, according to Aelian and Photius, the Athenians during the Samian war branded their prisoners with the mark of an owl, while their enemies branded theirs with the mark of a galley. In Plu-

¹ Aelian, V.H., ii. 9, and Photius, fr. 59 (Frag. Hist. Graec., ii. p. 483).

tarch's account 1 the symbols are reversed, which makes the story unintelligible, for the galley was a Samian coin-type, just as the owl was an Athenian one. real significance of the anecdote is revealed by a casual remark of Xenophon, who tells us, in quite another connection, that public slaves were usually branded with the impress of the public seal.2 The Athenians and the Samians on this occasion did not sell their captives; they kept them for the public service. are directly indebted to Xenophon for two further illustrations. His narrative of the stratagem practised by the Argives on the Corinthians makes it clear that the Sicyonian soldiers had a large Σ blazoned on their shields.3 Among the earliest coins of Sicyon are drachms whose reverse shows nothing but a large Σ. Similarly we learn from another passage that the device which the Theban hoplites bore upon their shields was a club,4 while contemporary silver staters of Thebes have the Boeotian shield on their obverses decorated with a club. Less certain, but still sufficiently likely, is the suggestion that the cuttle-fish, which occupies the reverse of fifth century Eretrian tetradrachms, was the town-arms of Eretria. We find Themistocles, at the momentous council of war that preceded Salamis, silencing a protest of the Eretrian admiral by the sneer that the Eretrians were veritable cuttle-fish-they had a sword to strike but no heart to use it,5—a gibe, the sting of which can only have

¹ Pericles, xxvi.

 $^{^2}$ σεσημασμένα $au\hat{\psi}$ δημοσί ψ σημάντρ ψ (De Vectigalibus, iv. 21).

³ Hellenica, iv. 4, 10. ⁴ Op. cit., vii. 5, 20.

⁵ Plutarch, Themistocles, xi.

lain in some special and well-understood connection between Eretria and the cuttle-fish. Nor would it be reasonable to seek an explanation in the coin-type, for the tetradrachms that have the cuttle-fish as a device are later than the Persian wars.

The dialogue in which Plutarch discusses the question as to why the Pythian priestess had ceased to give responses in verse contains a passage that will further illustrate our point. In the Treasury of the Corinthians at Delphi the hand of the spoiler had spared but a single votive offering. The solitary survivor was a bronze palm, round the root of which frogs and watersnakes were wrought in relief. The group was doubtless symbolical of Delos, where Leto had given birth to Apollo,

φοίνικος βαδινής χερσὶν ἐφαψαμένη, ἀθανάτων κάλλιστον, ἐπὶ τροχοειδέι λίμνη.

This simple interpretation did not occur to the speakers. It is incredible that they should have forgotten the Delian palm. But they evidently did not remember what the poets almost always couple with the palm—the Delian lake,

λίμναν είλίσσοισαν ΐδωρ κύκνειον, ένθα κύκνος μελφδδς Μούσας θεραπεύει.

They were therefore quite at a loss to account for the frogs and snakes. The palm, they argued, was not a water-plant, and so why should it be associated with water-animals? Again, the presence of swans, wolves, hawks, or any of the other creatures specially

¹ De Pythiae Oraculis, xii.

favoured by the god would have been intelligible, but who ever heard of frogs being sacred to Apollo? What particularly interests us is the third possibility, which is mentioned only to be set aside. "Frogs have no special connection with Corinth such as would render the figures appropriate as the emblem or arms $(\sigma \dot{\nu} \mu \beta o \lambda o \nu \dot{\eta} \pi a \rho \dot{\alpha} \sigma \eta \mu o \nu)$ of the city, as the Selinuntines are said to have once upon a time dedicated a golden selinon plant (or leaf), and the people of Tenedos the axe, from the crabs that have their habitat at a place in the island called Asterion, these crabs being unique in having a mark like an axe upon their shells."

The Greek is awkward.² But the general drift, I think, is clear. Plutarch indicates that the selinon plant (or leaf) and the axe were the $\pi a \rho \dot{\alpha} \sigma \eta \mu a$ or arms of Selinus and of Tenedos respectively. That he was right as to Tenedos we shall be able to prove presently on other grounds. And there is no good reason for hesitating to accept his first example. The Selinuntines could not have found a more appropriate device. The

¹ A bronze frog in the Berlin Museum bears the inscription "Αμων Σωνόου Βοάσουι. It was found in the Peloponnesus, and Fränkel (Arch. Jahrb., i. 50 ff.) connects it with the passage of Plutarch now under discussion and interprets Boάσων as a name of Apollo. This is accepted by Wernicke in Pauly-Wissowa's Real-Encycl. (ii. 45) where Boάσων duly makes its appearance among the fully accredited ἐπικλήσειs!

² Plutarch, De Pythiae Oraculis, xii., οὔτε Κορινθίοις τι βάτραχοι προσήκουσιν, ὥστε σύμβολον ἢ παράσημον εἶναι τῆς πόλεως · ὥσπερ ἀμέλει Σελινούντιοί ποτε χρυσοῦν σέλινον ἀναθεῖναι λέγονται, καὶ Τενέδιοι τὸν πέλεκυν, ἀπὸ τῶν καρκίνων τῶν γιγνομένων περὶ τὸ καλούμενον 'Αστέριον παρ' αὐτοῖς · μόνοι γὰρ ὡς ἔοικεν ἐν τῷ χελωνίῳ τύπον πελέκεως ἔχουσι.

plant grew in great abundance in their territory. Its close association with the Isthmian games must have caused it to appeal with peculiar force to the earliest settlers when they found it growing on the banks of the stream beside which they were to make their home. Whether, as the ancients averred, the name (which was common to river and to city) was derived from the plant, or whether, as some modern scholars believe, it is rather of Semitic origin, the selinon leaf would furnish an excellent 'canting badge.' If Plutarch's assertion be taken as correct, it gives us two good illustrations of heraldic types, for the $\pi a \rho \acute{a} \sigma \eta \mu o \nu$ is prominent on the coins of both the cities concerned (Plate i. 11, and Plate iv. 7).

Possibly the extract quoted may carry us even farther. Plutarch seems to imply that cities sometimes dedicated representations of their arms as votive offerings-very much, we may suppose, as individuals sometimes dedicated statues of themselves. If that be so, instances where votive offerings correspond to the coin-type of the city or state responsible for their presentation, may conceivably give us additional examples of agreement between coin-type and παράσημον. The lion that surmounted the piles of ingots with which Croesus dowered the sanctuaries of Delphi and Branchidae1 is usually explained as a symbol of Apollo. It need be no more than the royal crest or emblem, whose presence on the Lydian coinage has already been spoken of. Again, we read in Strabo that the Metapontines sent a golden ear of corn (θέρος χρυσοῦν) as an offering to Delphi.2 Some hold that this was

¹ Herodotus, i. 50 and 92. ² Strabo, vi. 264.

dedicated as symbolical of the principal source of the city's wealth. Others prefer to see in it a manifestation of special devotion to the cult of Demeter. But, in the light of the fact that an ear of corn was the most characteristic of Metapontine coin-types (Plate i. 16 and Plate v. 7 f.), it is at least as easy to believe that it was dedicated as a $\pi \alpha \rho \acute{\alpha} \sigma \eta \mu o \nu$. Once more, Pausanias saw at Delphi a bronze goat which had been set up by the citizens of Elyrus in Crete. When we remember that the coins of Elyrus show either a goat or a goat's head, it is not easy to resist the conviction that here again we have to do with a $\pi \alpha \rho \acute{\alpha} \sigma \eta \mu o \nu$.

Further search might be expected to increase the number of such coincidences. It is not, however, necessary to trespass on the domain of speculation. As has already been hinted, we are in a position to prove directly that some coin-types were identical with the arms or παράσημα of the cities at whose mints they were cut. Antigonus of Carystus in his Collection of Marvels has the following passage: "They say that in Crannon in Thessaly there are only two crows: that is the reason why on the honorific decrees which. according to universal custom, have inscribed upon them the arms (παράσημον) of the city, there are figured two crows on a bronze car."2 The bronze car, he subsequently explains, is a sort of fetish which is kept in a temple and which in times of drought is shaken to the accompaniment of prayers for rain. On some of the bronze coins of Crannon we see the παράσημον exactly as Antigonus describes it. But the chief importance of his statement lies in the remark as to

¹ Pausanias, x. 16, 5. ² Antigonus, Hist. Mirab., 15.

a "universal custom." What he says is fully confirmed by epigraphic evidence. During the fourth and third centuries B.c. it was usual, when a city published a decree in honour of a foreigner, to carve at the head or foot of the inscription the arms or $\pi \alpha \rho \acute{\alpha} \sigma \eta \mu o \nu$ of the state to which the person honoured belonged. In all known cases this $\pi \alpha \rho \acute{\alpha} \sigma \eta \mu o \nu$ is identical with a coin-type.

In the majority of recorded examples the inscriptions concerned are decrees of προξενία, that is, decrees conferring upon foreigners the privileges and obligations attaching to a relationship of public hospitality with the city that passed the decree and within whose bounds the inscription enshrining it was set up. The object of adding the $\pi \alpha \rho \dot{\alpha} \sigma \eta \mu o \nu$ was to exalt the particular city of which the person honoured happened to be a native. Where it appears in other epigraphic documents, the motive is the same. Thus, an Attic decree in honour of the Clazomenians is decorated with a ram; 1 a fragment of an inscription found at Assos shows a goat's head within a laurel-wreath, surmounted by the word AIΓAEΩN; 2 and a slab from Thespiae, which bears a decree honouring certain judges sent to Thespiae by the Delphians, has a lyre, a tripod, and the omphalos.8 In the first two of these cases the correspondence with contemporary coin-types is exact. It is less so in the case of the Thespian decree; that is, we cannot point to a precise parallel. But there is a special reason for this. Delphi struck no money from the middle of the fourth

¹ Ath. Mitt., vii. pp. 175 f.

² Papers of the American School, i. 27.

³ Bull. Corr. Hell., xv. p. 659.

century until the Imperial age. The reverse type of her latest autonomous coins is, however, the omphalos.

The facts regarding the use of the $\pi \alpha \rho \dot{\alpha} \sigma \eta \mu o \nu$ in decrees of $\pi \rho o \xi e \nu i \alpha$ have been carefully collected by Perdrizet who has made a special study of the whole subject.¹ Noteworthy among his illustrations are three found at Delphi,—a decree in favour of Charidamos of Cleitor, having carved beneath it the figure of a butting



FIG. 5.-CITY-ARMS OF CLEITOR.

bull (Fig. 5), another in favour of Amphiklos (apparently a Chian poet), surmounted by a sphinx seated with its forepaw resting on a tall amphora, and yet another in favour of Euares of Thebes, the $\pi\alpha\rho\dot{\alpha}\sigma\eta\mu\sigma\nu$ in this last instance being a gigantic club. The club as a badge of Thebes was referred to above in another connection. The butting bull of Cleitor and the sphinx and amphora of Chios are well known from coins. Another of Perdrizet's examples comes from Corcyra.

¹ Bull. Corr. Hell., xx. pp. 549 ff.

This is an inscription recording the conferring of the προξενία on an Athenian named Dionysius. It shows as the παράσημον of Athens an owl between two olive branches.1 The parallel here does not need to be pointed out. A mutilated slab from Cyzicus, now in Constantinople, has been proved by Perdrizet to be a decree in honour of some citizen of Antandros. At the head of it is a goat standing to right, exactly as on the silver coins issued by the Antandrians in the fourth century B.C.2 Among the spoils of the great excavations at Olympia was a decree in honour of one Damocrates of Tenedos.3 It is embellished with two double axes and a bunch of grapes, an absolute confirmation of the statement we deduced from Plutarch. To judge from Plutarch and the earlier coins, the double axe alone was the παράσημον proper of Tenedos. the presence of the grapes is not surprising, seeing that, from the beginning of the fourth century B.C. onwards, a similar bunch regularly appears beside the double axe on the reverse of the coins. It may be that the coat of arms itself had been modified since the older coins were struck. Or it may be that the παράσημον as it appears on the inscription is copied from the fourth century coin-type. Either alternative is probable. Epidaurus was another of the centres where the use of $\pi \alpha \rho \alpha \sigma \eta \mu \alpha$ on inscriptions was customary. At the head of a decree found there and passed by the Senate and people in favour of a certain Theognotos there is carved in relief the very figure that forms the constant

¹ Newton, Ancient Greek Inscriptions, ii. p. 30 (Plate iii.).

² Perdrizet in Num. Chron., 1899, pp. 1 ff.

³ Ausgrabungen zu Olympia, i. Pl. xxxi.

reverse type of the famous Lampsacene staters (Fig. 6; cf. Plate i. 9 f.). The stone is broken in such a way that nothing is legible after the name of Theognotos, but it is impossible to doubt the inference that he was a citizen of Lampsacus.

It is to be observed that in almost all known examples it is to the reverse type of the coin that the epigraphic παράσημον corresponds. The only exception among those cited above is the sphinx of Chios, and this exception can be readily accounted for, since it was not



EDOZEBOYNAIKAIDAMAI EDIDAYPIAHOEOFRATON

Fig. 6.—CITY-ARMS OF LAMPSACUS.

until the days of the Roman dominion that the Chians used a reverse type on their coins at all. The point is an important one, and we shall have occasion to return to it. In the meantime we must notice two cases where (so far, at least, as contemporary coins are concerned) the correspondence is with the obverse. The more remarkable is a very fragmentary slab from Epidaurus. The letters that survive suffice to show merely that the inscription commenced in the ordinary form of a decree. The description of the nature of the honour conferred is gone. So, too, are the name and city of the individual honoured. It is, however, practically certain that he was a Syracusan, for at the head of the decree

there is cut in relief a female head looking to left, and surrounded by a ring of dolphins (Fig. 7). Perdrizet's interpretation will not be questioned by anyone who has ever seen a Syracusan 'medallion.' It is true that there is but little real resemblance to the Persephone of Euainetus or the Arethusa of Cimon. There is more affinity with the head of Artemis which appears, unaccompanied by dolphins, on the bronze



FIG. 7.—CITY-ARMS OF SYRACUSE.

money of the time of Agathocles. Nevertheless the suggestion is unmistakable, and what lends it particular interest is the conclusion that here the παράσημον seems to be borrowed from the coin-type. Of this we shall speak later. An even more striking example of a παράσημον directly modelled on a coin-type is found on a Cyzicene decree, preserved in the Museum at Constantinople and first properly published by Lechat.¹ It is a facing head of Pan, and we cannot doubt but that the inscription was in honour of a citizen of Panticapaeum, since a facing head of Pan is the most usual

¹ Bull. Corr. Hell., xiii. pp. 514 ff.

fourth century coin-type there. But the device is not shown in relief against the flat background of the stone. It is enclosed in a circular setting which produces the impression of a coin or medallion, as if the workman had actually had such an object before him.

The occasional use of the city-arms as a coin-type is thus beyond all question, and such types, whatever their origin, must be strictly heraldic in character. It may be further pointed out that some towns appear to have had more than one recognized παράσημον. On a decree in honour of Alketas of Syracuse, for example,1 the Athenians carved a horse, not a female head surrounded by dolphins. Again, although the Gorgon's head is not to be found on Athenian coins, it was used as an alternative to the owl on the tickets issued to the dicasts. Elsewhere the evidence of cointypes points in the same direction. At Cyme in Aeolis, for instance, the forepart of a horse, an eagle, and a one-handled vase are all employed separately as types in a manner that might be taken to indicate that each was a $\pi \alpha \rho \alpha \sigma \eta \mu o \nu$.² It must not, however, be supposed that this explanation can be extended to cover the whole field of types. Once again the analogy of symbols holds good. The great majority of coin-types are undoubtedly specially selected devices. It is easy to understand how such a state of things was brought about. In countries to which the invention was transmitted in fully developed form, the intimacy of its connection with sealing would not

¹ Perdrizet, B.C.H., xx. p. 550, Fig. 1.

² See Wroth, B.M.C. Troas, etc., p. li.

necessarily be realized, and greater freedom as to the choice of an emblem or emblems would certainly be felt. Everywhere variation would be facilitated by the development of two factors—an increase in the number of metals and denominations minted, and the employment of inscriptions to differentiate the issues of one town from those of another.

In endeavouring to discover the chief motives that have governed the selection of types, we are not called on to discriminate between παράσημα and specially chosen devices. Like the corresponding groups of symbols, the two are so essentially similar that we may regard them as subject to the same laws. As for the motives, we must be prepared to find them complex and various. I propose to group them under four main heads—the decorative influence, the imitative influence, the commemorative influence, and the religious influence. The order of enumeration is probably the exact reverse of the order of importance, but it is the one in which it will be most convenient to deal with them. I shall endeavour, as far as possible, to discuss them separately. There is a certain advantage in so doing; but at the same time it cannot be too clearly stated that the separation is an artificial one, and that we shall not be able to prevent the streams from intermingling freely.

In its broadest sense the influence of the decorative instinct is always present upon ancient coins. At some epochs it is always paramount. The Greek genius was quick to avail itself of the artistic opportunities that die-engraving presented. When the possibilities were

fully appreciated, immense pains were lavished on the production of coins that should be really beautiful. The highest level was reached about the end of the fifth century B.c. It is at this period that facing heads make their appearance (Plate iii. 1 and 3). And it is to this period, and to the fifty years or so that followed, that there belong the great majority of the dies that bear an artist's signature. Signed coins come chiefly from Sicily and from the Greek cities of Southern Italy, but Arcadia, Crete, and Ionia also furnish examples, to say nothing of possibilities that have been detected elsewhere. In estimating the significance of this phenomenon it must be borne in mind that coins were public documents, a characteristic that distinguishes them from vases, gems, and statues. The custom of admitting an artist's signature can only have come into vogue when the nature of the object represented had ceased to be of more than secondary importance, and when people had learned to regard the method of treatment as the thing that really mattered. It meant that state and engraver were alike proud of what they considered to be a successful design.

This aspect of the decorative influence really belongs to the general history of Greek art. It is intimately bound up with the progress of sculpture and painting. Here we must be content to pass it over with the merest mention, and we may do so all the more readily because it has already been made the subject of careful and admirable study. Our business is to indicate the effect of the decorative impulse, not upon the handling

¹ See particularly Gardner, Types of Greek Coins, and Head, Coins of the Ancients.

of a given subject, but upon the choice of a subject to be handled. In certain cases we can discern its working in the tendency to arrange objects in pairs or in groups of three. The lion and the bull which balance one another on the money of the Lydian kings, the two dolphins at Argos (Plate ii. 9), the two seamonsters heraldically opposed at Itanus (Plate ii. 10), the triskeles and tetraskeles in Lycia—all of these are types whose very character stamps them as being largely decorative.

Few groups betray the tendency to subordinate type to design in so marked a fashion as do the heavy oblong pieces of bronze that come from Central Italy. The shape in which they were cast was doubtless determined by considerations of convenience. Bronze was the standard in Italy at the epoch to which they belong, and, where bullion has to be stored, the advantage of bars is evident. All of the various types that occur have been chosen with a direct eye to their suitability for filling the space available. The so-called 'fish spine' is an ornamental pattern pure and simple (Fig. 8). But even the devices which are types in the proper sense are equally well adapted for decorating an oblong field. Some pieces, for instance, have on the one side a sword, and on the other its scabbard. Again, we find a trident, a tripod, a caduceus, a branch, a parazonium, an amphora, an anchor, a club (Fig. 9) and an elongated shield. Human heads and heads of animals-common enough on other series of aes grave—are conspicuous by their absence. Where animals do appear, the full figure is shown, placed lengthwise on the bar so as to stretch almost

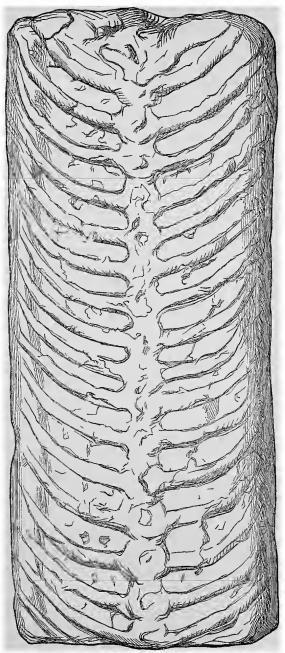
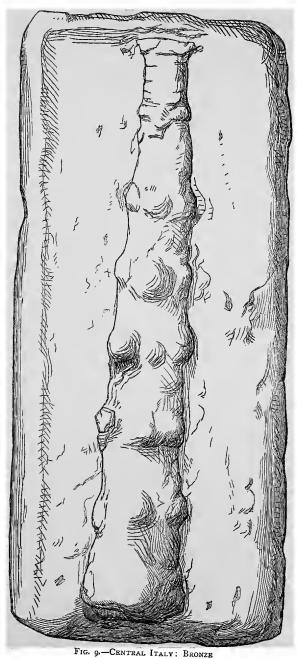


Fig. 8.—Central Italy: Bronze.

from end to end. In this attitude we find an elephant, a sow, a bull, and a figure of Pegasus in full career. In one case the type is an eagle, and here the pose is significant. The bird, which is also placed lengthwise, looks to the front. It grasps in its talons a conventional thunderbolt, while its wings stretch out on either side with a fulness that is less eloquent of fidelity to nature than of a desire to cover as extensive a sweep of background as possible. There are also specimens which betray the hand of the designer even more plainly through devices arranged in pairs. Thus, one piece has on its obverse two fighting cocks set in an attitude of symmetrical opposition, with a star above their heads, and a second star in the corresponding place beneath, while on the reverse there are two dolphins face to face in the centre, with a large trident pointing upwards beneath them, and a similar trident pointing downwards above them (Fig. 10). So elaborate a scheme supplies a key to the whole series of which it forms one. Whatever commemorative significance they may have had, the decorative motive dominates them all.

We have been discussing an illustration the meaning of which it would not be easy to mistake. Is it not possible that the same principle may have been operative in other cases where its working is less readily detected? No mysterious significance need attach to the cock-fight which is occasionally found on the coins of Dardanus. It may quite well be a decorative variation of the usual type, which is a single bird standing alone. Another device, round which there has been some discussion, is the double stellate square



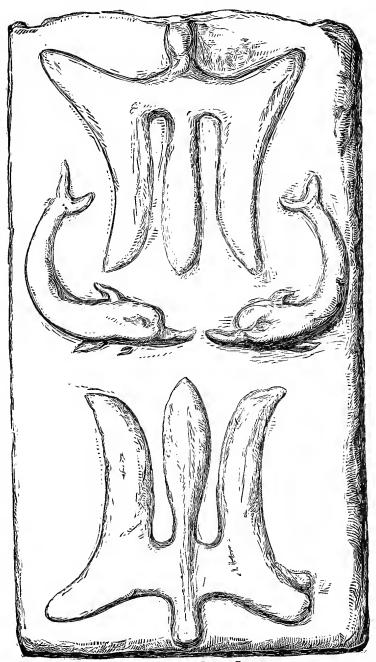


Fig. 10.—CENTRAL ITALY: BRONZE.

on the reverse of coins of Corcyra and its colonies Apollonia and Dyrrhachium. It used to be considered that this was a conventional representation of the gardens of Alcinous. The more recent view is that it is solar or floral in character, and that in either



FIG. 11.-CUMAE: SILVER.

event it is the symbol of a god—Aristaeus or Zeus Aristos or Apollo Nomios. It would be simpler to look upon it merely as a decorative scheme. Similarly the curious obverse type of the earliest coins of Cumae has called forth much learned and ingenious speculation. It is a lion's scalp facing, flanked on either side by the forepart of a boar downwards (Fig. 11). On the assumption that this must conceal some religious



FIG. 12.-MYCENAEAN SEALING.

meaning, many conjectures have been indulged in as to the divinity indicated or the myth alluded to. If, however, we compare it with the products of Mycenaean art, it becomes doubtful whether it is anything more than a formal composition. There are certain of the Zakro sealings, for instance, to which it has a strong general resemblance (e.g. Fig. 12).

And this brings us to think of another direction in which the decorative impulse asserted itself—the tendency to select as types animal groups, and creatures of fancy like winged boars and winged lions, or like griffins and gorgons. Devices of this sort are more common on the archaic electrum of Asia Minor than on any other class of coins. We can hardly doubt but that they are represented there, not because of any religious significance that might conceivably be read into them, but because they form a link in the chain that connects Greek art, as ordinarily understood, with the far older art in which it had its origin. Mr. A. J. Evans some years ago pointed out "the great indebtedness of the 'archaic' Greek coin-types to certain prevalent designs on the Mycenean lentoid gems," adding that the phenomenon should be "regarded as due to a deliberate revival, akin to the adoption of classical models by Quattro and Cinque-Cento Italian artists." 1 We shall limit ourselves to three examples. The type of the cow suckling her calf, which we heard of in connection with the commercial theory,² and which occurs not only at Corcyra and her colonies, but also in Euboea and elsewhere, is an exact reproduction of a design that can boast an antiquity far greater than the invention of coinage. Gems bearing it have been unearthed on Mycenean sites, and it is found on Egyptian and Assyrian monuments as well as in Persia, Lycia, and Phoenicia. From a kindred source comes the type of a lion leaping on a bull. This was peculiarly appropriate on the coins of Acanthus. We know from Herodotus that lions abounded in that region as late

¹ Num. Chron., 1899, pp. 364 f. ² See supra, p. 28.

PLATE III.

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ĩ.	Syracuse (circa 400 B.C.): silver, - 73, 81 Larissa (circa 400 B.C.): silver, 82, 99, 136
2.	Larissa (circa 400 B.C.): silver, 82, 99, 136
3.	Syracuse (circa 400 B.C.): silver, programmer of all 1.173. V
4.	Catana (before 476 B.C.): silver,
5.	Catana (before 476 B.C.): silver, Segesta (415-409 B.C.): silver,
6.	Aetna (476-461 B.C.): silver, - 15 211-6 NICT 194; 1
7.	Caulonia (before 500 B.C.): silver, an 12, 36, 97, 132
8.	Tarentum (420-380 B.C.): silver, 97
9.	Larissa (480-430 B.C.): silver, 444
10.	Larissa (circa 400 B.C.): silver, and S. 4 14 99 is
ıı,	Syracuse (before 500 B.C.): silver, 101, 129
12.	Syracuse (500-478 B.C.): silver, - 701, 130
13.	Syracuse (circa 479 B.C.): silver, - 100-1 a k; 109, 130
14.	Syracuse (circa 400 B.C.): silver, 101 Syracuse (circa 400 B.C.): silver, 101 Syracuse
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as the first half of the fifth century B.C., for they played havoc with the transport animals attached to the army of Xerxes.¹ The picture itself, however, was an old one. It figures, for instance, on gems from Mycenae and on an ivory tablet from Spata.² Our last example is a remarkable electrum stater in the British Museum (Plate i. 4). The obverse shows a heraldic arrangement of two lions, opposed, but with heads reverted, standing on their hind-legs as supporters to a pillar. The motive is a familiar one, particularly of course from its occurrence on the 'Lion-gate' at Mycenae.

Such transferences of designs from gems to coins might equally well have been classed as manifestations of the imitative instinct. But it seemed preferable to reserve that head rather for the discussion of a class of types where not merely the imitations but also the objects imitated were coins. In some cases the imitation was undertaken for what we may call decorative reasons. That is, a type was copied because it was recognized as being beautiful. Nothing shows more conclusively the widespread admiration that the Syracusan coins commanded in the ancient world than the extent to which imitations of their types appear on the money of other cities and states. Two in particular were extraordinarily popular—the facing head of Arethusa by the engraver Cimon (Plate iii. 1), and the head of Persephone in profile by his contemporary Euainetus (Plate ii. 13). That the coinages of Sicily itself and of Italy should furnish examples of copies from these

¹ Hdt., vii. 125.

² Figured in A. S. Murray's History of Greek Sculpture, i. p. 31.

splendid models is not surprising. But it is remarkable to find the Arethusa head as far north as Eurea and Larissa in Thessaly (Plate iii. 2), and as far east as Tarsus in Cilicia. The influence of the Persephone of Euainetus was even more far-reaching. It affected the drachms of Massalia in Gaul and of Rhoda and Emporiae in Spain. The Opuntian Locrians copied it closely on the very first money they struck (Plate ii. 14). The corresponding reverse is likewise imitated from a Syracusan coin, and there is considerable probability in the suggestion that these pieces were directly imitated from Syracusan money brought home to Locris by men who had served as mercenaries in the armies of Dionysius. A similar theory would account for the appearance of the head on coins of Pheneus in Arcadia, seeing that in the fourth century Arcadia was a favourite recruiting ground for soldiers of fortune. The Carthaginians, as we have had occasion to remark, issued no money of their own until a comparatively late period, not indeed until their second great invasion of Sicily in the end of the fifth century B.C. Their earliest coins were minted in that island, and were intended (as the legends show) to supply the needs of the armies in the field. The most usual obverse type is a slavish imitation of the Persephone head (Plate ii. 15). In course of time coins began to be struck in the Carthaginian capital, and thither the head of Persephone was at once transferred and used on the obverse of coins in all metals. Nor was it ever displaced. Though ultimately sadly degraded, it retained its position until Carthage herself was destroyed.

But it was not always an appreciation of beauty that roused the imitative impulse. More frequently it was called into play by considerations of commercial convenience. A conspicuous example is the coinage of the Corinthian 'colonies,' as they are conveniently, if rather erroneously, called. Corinth commanded a wide range of markets in the north-western portion of Greece Proper. Her staters, with the figure of Pegasus on one side and the head of Athena on the other, are found in Acarnania, Epirus, and Illyricum, and even as far west as Sicily and Southern Italy. They must have been practically an international currency. In course of time the cities that used them most freely in this way, began to strike coins that are indistinguishable from the true Corinthian pieces except in respect of the distinguishing letter or monogram or legend that they bear. In types, weight, and general appearance they are identical. During the fourth and third centuries B.c. at least twenty different states and cities were issuing these Pegasus staters more or less abundantly, in some cases side by side with a currency on which their own peculiar types were stamped. One class of coins was for home trade, the other for circulation abroad. In the same category we may place the silver tetradrachms with the name and types of Alexander the Great which were minted by many cities in Asia Minor. These continued to be struck, not only long after Alexander himself was dead, but long after his empire had crumbled into fragments. There are many specimens which cannot be earlier than the second century B.C. Similar considerations may have prompted the sudden appearance of Athenian types in Crete about 200 B.C., when six of the principal cities in the island abandoned their own types, even Cnossus giving up the labyrinth or, rather, suffering it to sink to the level of a symbol. Instead, there were struck coins that, but for the ethnic and the absence of magistrates' names, are practically the same as Athenian tetradrachms of the 'new style.'

So far we have been speaking of imitation that was more or less intelligent. But, if civilized states were prone to imitation, much more so were those barbarians who became acquainted with coins and realized their practical convenience, but lacked the originality and the technical skill to produce types of their own. Such peoples employed as a currency, in the first instance, the actual coins that came into their hands through the medium of the civilized nations with whom they did business. In all probability they learned to attach an almost superstitious reverence to the types most familiar to them; there are instructive modern parallels, such as the popularity of the Maria Theresa silver dollar in Abyssinia. And, when the stock of coins received was inadequate to meet their requirements, they did their best to turn out a home product that should resemble them.

There is good reason to believe that 'barbarous imitation' is almost as old as the first invention of coined money. Head has pointed out that, among the early pieces of electrum with Lydian types, there are a few which are marked off from the whole of the rest by a striking peculiarity of style. The type is shown in outline only, with no attempt at relief. This outlining,

¹ Head, B.M.C., Lydia, p. xx.

as he points out, "is not characteristic of early coin art, but seems rather to be the crude attempt of some unskilled barbarian engraver to copy the current coin." If this be so, he is doubtless right in connecting the pieces in question with the great Cimmerian invasion of Asia Minor, one of the earliest national migrations of which we have any historical record, when a host of 'mighty men' from the north-east swept over the land as far west as Lydia, 'eating up the flocks and herds, eating up the vines and fig-trees and beating down the fenced cities with the sword.' They captured Sardis about 650 B.c., and it is therefore to that epoch that the earliest 'barbarous imitations' are to be assigned. In this instance the imitation was brought about by the fact that the barbarians had penetrated to the centre of civilization. After a thousand years the same phenomenon was repeated on a vastly larger and more enduring scale. We shall have to deal with that by and by. Just now we are concerned with barbarous imitations that resulted from movements of a different kind.

Coins travelled from the centres of civilization across its frontiers into the barbarism that lay beyond. There, as has been indicated, they were first accepted and then imitated. There were various pieces that enjoyed a popularity of this sort, but the two most conspicuous were the silver tetradrachm of Athens and the gold stater of Philip II. of Macedon. The popularity of these was not due to their artistic beauty, but to the high reputation in which they were held as money. As Aristophanes tells us, the exceptional quality of the Athenian tetradrachm was universally recognized,—ἔν τε τοῦς ελλησι καὶ τοῦς βαρβάροισι πανταχοῦ (Frogs, 726).

The effect upon the types was curious. From the days of Hippias till the Macedonian conquest they remained practically unchanged. The coins of the fifth century betray no sign of the extraordinary development of art, no token that they were struck in the city of Pheidias and his school. The sole transition discernible is that from the truly archaic (Plate ii. 1) to the archaistic (Plate ii. 2). The explanation of this 'arrest' has often been stated. The Athenians were fully sensible of the commercial advantage of having so ready a market for the output of their silver mines. They were sensible also of the conservative spirit in which barbarians (and barbarians were among their best customers) are apt to regard the outward appearance of the unit of currency, and of the suspicion with which they are inclined to look upon a change. And so they refrained, as far as possible, from making any alteration in their coins. They would not risk the chance of their rejection. It is true that there is a very marked difference between the 'old style' and the 'new style' of Athenian tetradrachm (Plate ii. 2 and 3). But it must be remembered that they were separated by the gap of a century during which the mint was practically, if not entirely, idle. No doubt it is to this interval that a considerable number of the eastern imitations belong. But the coins of the 'new style' found their imitators too. Very interesting copies of both old and new come from the Himyarite kingdom in Southern Arabia (Plate ii. 4), some of the later Himyarite pieces showing a curious intermixture of Roman influence.

The fortunes of the gold 'Philippus,' as it was

called, have a peculiar interest for ourselves. It was the first gold coin minted in any considerable quantities in Europe, its types being a laureate head of Apollo on the obverse, and a two-horse racing chariot on the reverse (Plate ii. 11). In the ordinary course of commerce it reached the interior of Gaul either by way of the Greek colony of Massalia, the modern Marseilles, or, more probably, overland along the valleys of the Danube and the Rhine. Whatever the route may have been, it was through international trade that the natives were initiated into the use of coined money in general, and in particular came to be familiar with the Philippus. The country, it must be remembered, was not wholly given over to barbarism, as we understand the term. Caesar's story of his conquests shows plainly that, in some districts at least, there existed in his time a fairly advanced form of political and social organization. As early as the third century B.c. the people began to strike money of their own. Their oldest coins were of gold, and were direct imitations of the gold coin they knew best, the Macedonian Philippus. As Britain and Gaul were in constant communication with one another in those far-off days, it was but natural that our own forefathers should in due course follow the example of their continental neighbours. first specimens of British coinage can hardly be later than circa 150 B.C., and like their Gaulish prototypes they are descendants of the Philippus (Plate ii. 12).

More than forty years ago the coins of the ancient Britons were made the subject of a masterly study

COIN TYPES

Sir John Evans. 1 His book placed this branch umismatics once for all on a scientific basis. It not a little new light on the unwritten history ir island—the tribal divisions, the districts in which ous chiefs had held sway. But, more than this, orked out independently, in the sphere of art, a sophy that was strikingly consistent with the gical theory through which Darwin revolutionized modes of human thought. The story of the lopment, or rather the degeneration, of eate head and of the chariot is full of interest, only on its own account, but also as establishing principles by which barbarous imitation is regulated he world over. It is clear that before very long British engravers lost all idea of the meaning of objects they were attempting to reproduce. The ires of Apollo are gradually edged entirely off flan of the coin, while the chariot and horses nately become a mere unintelligible arrangement nes and pellets. And yet in the midst of this adation the decorative instinct was active. Where ing is left of the obverse type save an exaggerated I wreath, which leaves room for little except a curved lines representing locks of hair, there is ence of an effort to arrange the whole so that it ld form a definite and symmetrical pattern.

Thether the Philippus was the sole ancestor of the British coinage is matter of considerable doubt, sohn Evans has modified the pronounced opinion once held upon the point. But it is at least in that some of the gold coins of Gaul present Ancient British Coins, London, 1864. Supplement, 1890.

traces of other influences. Copies of Tarentine staters, for example, have recently been identified.1 Speaking generally, one may say that there were two distinct classes of coins that were apt to be made the subject of barbarous imitation—those which were so popular among civilized peoples that they might fairly take rank as an international currency, and those which were struck by states in close contact with semi-civilized peoples. None of the former class travelled so far as did the gold Philippi and the Athenian tetradrachms, although the silver coins of Philip were largely imitated in Central Europe, and those of Alexander were copied both there and in the East. Obvious examples of the latter class are the silver drachms of Massalia and of Rhoda, and the tetradrachms of Thasos and of Audoleon, king of Paeonia.

Intermediate between the two chief kinds of imitation—the direct but more or less intelligent, and the purely barbarous,—there are many varieties which it is not possible to separate by nice distinctions either from them or from one another. Some of the cases of local homogeneity discussed in the opening lecture were nothing but particular manifestations of the activity of the imitative instinct, working in a manner that was only half conscious. And local limits were merely accidental, and were often transcended. It would, indeed, be difficult to overestimate the extent of the influence that imitation in some form or other has exercised on the coinages of the world. Before the close of the course

¹ See Blanchet, *Monnaies gauloises* (1905), pp. 188 f., and also Anatole de Barthélemy, *Rev. Num.* 1883, pp. 7 f. Pl. i., 1 f.

we shall have occasion to notice the importance to which it attained in the West in the centuries that succeeded the fall of the Roman Empire. In the East it was equally potent, controlling the whole process by which the currencies of Parthia, Bactria and India developed out of the coinages of Alexander the Great and his successors.¹

¹ For details see Mr. C. F. Keary's illuminating monograph on "The Morphology of Coins" (*Num. Chron.*, 1885 and 1886), where all the main facts are recorded.

LECTURE III.

In the preceding lecture it was found that the analogy between types and symbols indicated that both alike were heraldic in their origin, and the invention of coined money was shown to be merely a special application of the practice of sealing. Judging by what happened in the case of other official documents, we concluded that coins might have been impressed either with the signet of the state itself or with that of the magistrate most directly responsible for their issue. This conclusion enabled us to put forward an explanation of some of the peculiar difficulties associated with the electrum coinage of Asia Minor. It was further shown that magistrates' signets might be either family crests or specially selected devices, and that there was every reason to think that a similar distinction would apply to coin-types. This distinction, however, did not affect the question of the ultimate motives determining a It was accordingly disregarded, and the choice. possible motives were grouped under four main heads. Two of these heads were dealt with briefly. We have now to take some account of the third and fourth.

What I have ventured to term the commemorative influence lies at the root of an immense variety of types. Interpreted widely, it may be defined as the tendency to employ devices closely associated with particular features of a city or with particular events in its history, the object being to secure something that would serve as a shorthand sign for the place itself and that could hardly fail to be so understood by those into whose hands coins bearing it might come. This broad definition would include types parlants or 'speaking types.' Whatever other significance they may have had, we cannot doubt but that they were intended to recall the name of the city on whose money they occur. Beside them may be placed types alluding to sites or to local characteristics. These were far less common on autonomous Greek coins than they were destined to become in the imperial age. Still a considerable number of examples can be cited. The majority of them are from Sicily and the West. Thus the type of the oldest coins of Zancle, the modern Messina, is a dolphin lying within a curved line (Plate v. 11). The line is a conventional representation of the sickle-shaped mole that enclosed her famous harbour, and the dolphin is intended to convey the idea of water. A very similar device was used a century or two later at Baletium in Calabria, no doubt with a similar significance. At Himera a gushing fountain is often introduced as part of the general scheme of the coin-types. This is a pointed allusion to the medicinal springs of the neighbourhood. Over and over again, more especially in Sicily and Acarnania, we meet with rivers as types. It is true that in such cases it is not the river itself that is

pictured. It is the god of the river. But it does not therefore follow that the types are religious. Selinos, Gelas, Crimisus, Achelous and the rest are employed in this way, not because they are gods, but because they water particular districts. So far as the coinage is concerned, their importance lies in their being local landmarks rather than in their being divinities. If they appear in human or in animal form, that is only because symbolism was the means of representation most open to the artists. It is difficult, indeed, to see what other course they could have taken.

The obverse of one of the earliest coins of Catana may be cited as a picturesque example (Plate iii. 4). The river Amenanus is shown as a man-headed bull, one of the most usual of the forms that river-gods are made to assume. His right foreleg is bent as if he were in the act of swimming. Above him is a water-fowl and beneath him a fish, suggestive respectively of the surface of the stream and of its depths. Another



FIG. 13.—SEGESTA: SILVER.

interesting instance is the treatment of the river Crimisus on coins of Segesta. According to local legend, it was in the shape of a dog that the river-god had wooed and won the Trojan maiden whose name was given to the town by its founder Egestus, the offspring of their union. On the earliest coins (Fig. 13) the obverse showed the head of Segesta

and the reverse the figure of a dog, a clear embodiment of the tradition just quoted. On later issues, when art was more advanced, simplicity gave way to elaboration. The beautiful tetradrachms struck towards the close of the fifth century B.C. present us with the river-god in human form (Plate iii. 5). A young huntsman, with conical cap slung over his shoulders, stands in an attitude of easy watchfulness with one foot resting on a rock. At his side are his two dogs. In front is a terminal figure, the usual symbol of a boundary, indicating apparently that in this admirable composition the river is brought before us as the guardian of the frontier.

As a still more notable illustration of the commemoration upon a coin of the natural features of a locality we may take a unique Sicilian tetradrachm now in Brussels (Plate iii. 6). In 476 B.c. Hieron of Syracuse cleared Catana of its inhabitants, to make way for a 'plantation' of his own adherents. At the same time he changed the name of the city, calling it Aetna after the great mountain at whose foot it nestled. To the period of fifteen years during which it remained in the possession of the Syracusan colonists the tetradrachm about to be described must certainly be assigned. On the reverse is a divinity enthroned. his left hand he grasps a thunderbolt, while his right rests on a knotted staff of what seems to be vine-wood. In front of him is a pine-tree, on the highest point of which an eagle is perched. The figure is without doubt that of Zeus. But it is hardly as a god who vouches for the currency that he is here represented.

¹ See Head in Num. Chron., 1883, pp. 171 ff.

It is rather as the god of the mountain, the Zevs Airvaios whose favour is invoked on behalf of the city in one of Pindar's most majestic passages. The vine-staff and the pine-tree are vivid touches of local colour. The obverse is almost equally full of meaning. The type is an ivy-wreathed head of Silenus, and there was a tradition which made Silenus dwell in the caves of Aetna as the slave of Polyphemus. That it is to his local connection that he owes his position on the coin is made plain by a gigantic Aetnaean beetle which is placed just beneath his neck.

In this example the local plants and the local animal appear as adjuncts only. Occasionally, however, they are employed as the leading types. So it is, for example, with the bee at Hybla, the goose at Eion, the wood-pigeon at Sicyon, the swan at Clazomenae, the boar in Lycia, and the dog among the Molossians. And it is perhaps here that we should class the mussel at Cumae, the crab at Acragas, and the tortoise at Aegina. In some of these instances, no doubt, a theory of religious symbolism would be quite admissible. But it is not necessary to have recourse to such an explanation in cases where we know, either from ancient writers or from modern travellers, that the animal used as a type was a conspicuous feature of the locality on whose coins it is found. Much the same may be said of the plants that are made to do duty as badges. We have spoken of the leaf of wild celery at Selinus and of the single ear of barley at Metapontum. An illustration that is perhaps better than either is the silphium of Cyrene (Plate iv. 3). Again, Homer

¹ Pythia, i. 56 ff. ² Euripides, Cyclops, 23 ff.

applies to Histiaea the epithet πολυστάφυλος, and a vine-tree or a vine-branch is a frequent emblem on its coins. The bronze coins of Tragilus in like manner have as a reverse type one of the 'hundred-leaved' roses of Mount Pangaeum. An analogous interpretation seems natural for the fir cone at Pale and Proni, and for the acorn at Mantineia. To this day pines are prominent in the landscape of Cephallenia; and, if the oak no longer flourishes in the plains of Arcadia, we know from Pausanias that it used to grow abundantly in the immediate neighbourhood of Mantineia.

At a later date, as we shall find, the practice of commemorating local features developed greatly. It was even extended so as to include buildings of various kinds. During the period with which we are at present mainly concerned architectural types are almost unknown. The sickle-shaped line on the oldest coins of Zancle occasionally shows slight protuberances, and these have been supposed to be crude indications of prominent structures on the harbour front.1 The suggestion is interesting and not without probability. But it cannot be definitely accepted as certain. century or so later we have unmistakable representations of a fortified city both at Tarsus and at Sidon. These, however, are quite exceptional, and they are besides so conventional that we cannot be sure that they had really a local significance. More intelligible, from our present point of view, is the seated dog on coins struck at Madytus on the Hellespont about

¹ Gardner, Types, p. 90, and A. J. Evans, Num. Chron., 1896, p. 107.

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PLATE IV. unrel types are aln

1. Tarentum (before 500 B.C.): silver,

2. Pyrrhus (295-272 B.C.): silver,

3. Cyrene (circa 500 B.C.): silver,

4. Mende (500-450 B.C.): silver,

5. Mende (450-424 B.C.): silver,

6. Mende (450-424 B.C.): silver,

7. Selinus (circa 500 B.C.): silver,

8. Selinus (circa 500 B.C.): silver,

9. Selinus (466-415 B.C.): silver,

9. Selinus (466-415 B.C.): silver,

10. Demetrius Poliorcetes (306-283 B.C.): silver,

11. Samos (circa 394 B.C.): silver,

12. Cyrene (circa 500 B.C.): silver,

13. Poseidonia (fifth century B.C.): silver,

14. Syracuse (circa 357 B.C.): electrum,

15. Zacynthus (circa 357 B.C.): silver (119)

17. Tarentum (before 500 B.C.): silver,

18. Syracuse (circa 357 B.C.): electrum,

19. Tarentum (before 500 B.C.): silver (119)

19. Zacynthus (circa 357 B.C.): silver (119)
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350 B.C. This is the $\kappa \nu \nu \delta s$ $\tau a \lambda a \ell \nu \eta s$ $\sigma \hat{\eta} \mu a$ of Euripides, —the tomb of Hecuba, which stood within the territorial limits of the city and was therefore very appropriate as a local type.

The occurrence of such a monument on coins suggests a question as to how far it was customary to employ reproductions of statues in a similar way. far as the archaic and early periods are concerned, no very confident answer can be given. It is highly probable that two which are specially mentioned by Herodotus²—the statue of Poseidon at Potidaea and that of Apollo in the agora at Metapontum-are to be recognized among the types of the cities they respectively adorned. And it is hardly likely that they are the sole examples. The seated Zevs Airvaios just described has features that make one think it may possibly be a copy of a real monument, and the same remark applies to the Poseidon at Poseidonia and the 'Apollo' at Caulonia (Plate iii. 7). This, however, is mere conjecture. More reliable illustrations of the influence of sculpture could be drawn from the coins of the period of finest art. But we should not be justified in referring further to such pieces here, since they belong to an age when the supremacy of the religious motive was fairly established.

Another class of types that may reasonably be regarded as commemorative are those which portray popular sports and pursuits. The 'horsemen' of Tarentum, which were minted in such vast quantities and in such extraordinary variety during the fourth and third centuries B.C. (e.g. Plate iii. 8), bear testimony

¹ Hecuba, 1273. ² iv. 15, and viii. 129.

to the pride taken by the citizens in the training that made the Tarentine cavalry so formidable in the field. An analogous case is that of Colophon, where the type of an armed horseman must refer to the prowess of the city's mounted soldiers. Their reputation stood so high that they were believed to be invincible. the same category may fall the wrestlers and slingers of Aspendus, Etenna, and Selge.1 And the footsoldier who is seen advancing to battle on the oldest staters of Aspendus cannot but have some connection with the esteem in which the hoplites of that town were once held. Very curious are the third century coins of Corcyra, which have on the reverse the forepart of a galley accompanied by the vessel's name. Sometimes the word NIKA, 'Victory,' is added, and then the suggestion that there is an allusion to regattas seems irresistible.2

In the same connection we may notice a remarkable set of types from Thessaly. Bull-fighting was a favourite form of amusement among the Thessalians for hundreds of years. Julius Caesar was the first to introduce the Roman public to Thessalian matadors, and we hear of a similar performance in the Circus Maximus in the reign of Claudius. Suetonius describing the Claudian spectacle tells how, when the bull had been thoroughly worn out, his tormentors used to leap from their horses, seize him by the horns and drag him

¹ The types of Selge may, however, be mere imitations of those of Aspendus.

² P. Gardner, J.H.S., ii. 96.

³ Pliny, vii. 45, 182.

to the ground. There could not be a more illuminating commentary on the fifth century coins of Crannon, Larissa, the Perrhaebi, Pharcadon, Pherae, and Tricca. They have on the obverse a youth seizing a struggling bull by its horns, while on the reverse is a bridled horse (Plate iii. 9). The meaning of the former type has never been doubted since it was first pointed out by Eckhel. But I do not think that the latter has yet been adequately explained. It is usually regarded independently and taken as a symbol of Poseidon. And it is certain that it did come to be looked upon as a thing by itself (Plate iii. 2). I strongly suspect, however, that the designer of the first of these coins-for all are copied from a common original—had a different idea in his mind. He intended the two sides to be complementary and the horse to be the horse from which the matador had just dismounted to despatch his victim. It must be remembered that the horse was an important actor in the drama, and that without him we should not have the whole picture. Nor would there be anything singular in so intimate a connection between obverse and reverse.2 We need not go beyond Thessaly itself for a parallel. A fourth century drachm of Larissa has on the one side a bull in full career and on the other a galloping horseman in Thessalian garb. Taken together, these two types present us with a sketch of the first stage of the ταυροκαθά ψια exactly as described by Suetonius (Plate iii. 10).

¹Praeterea [exhibuit] Thessalos equites, qui feros tauros per spatia circi agunt insiliuntque defessos et ad terram cornibus detrahunt (Sueton. Divus Claudius, c. 21).

² For other instances see Imhoof-Blumer, Kleinas. Münzen, p. 371.

It is sometimes said that the bull-fight has a religious significance on coins, inasmuch as performances of the kind were given at games held in honour of Poseidon ταύρεος. But at the best this would be a strangely indirect way of appealing to the god to bear witness to the soundness of the currency. And in any case the inference could hardly be admitted unless it were proved that it was only on the occasion of the games that the coins were minted. There is no evidence to support such a view. Under the empire it was certainly the custom in the provincial centres to signalize the periodical celebrations of great games by the issue of bronze coins, the types and inscriptions of which often alluded directly to the festival. That something of the same sort did occasionally happen in earlier times can also be proved. The inscription AXEAOIO AEOAON on a fifth century silver coin of Metapontum points to games in honour of the river god Achelous. Similarly, there is an early stater, having the ordinary types of Elis but reading simply OAYMPIKON, which may well have been struck by the Eleians in anticipation of an Olympic celebration. The whole of the money of Eleusis, too, is probably festival money, and good grounds have been advanced for holding that the splendid Syracusan medallions were struck—in the first instance, at anyrate, -in connection with the games held to celebrate the Athenian discomfiture.1 Even in such cases, however, the motives for the issue must have been mixed. On the one hand, there would be a desire to meet the convenience of the crowds who flocked in from neighbouring districts; on the other, there

¹ A. J. Evans, Num. Chron., 1891, pp. 214 f.

would be a wish to provide some memorial of the occasion.

Best known of all the 'agonistic' types, as they are called, are the chariots which were so popular on Sicilian coins and which also occur elsewhere,-at Cyrene, for instance, and on the gold staters of Philip of Macedon. It is quite certain that these are meant to allude directly to the sport of chariot-racing. difficult, perhaps, to associate the idea of rapid movement with the earliest examples (Plate iii. 11). But that is merely because at the beginning of the fifth century B.c. the die-engraver was not yet fully master of his craft. The first indication of the real nature of the type is the appearance, before 480 B.C., of a flying Victory placing a wreath on the heads of the horses (Plate iii. 12). Very soon technical difficulties are overcome, and then we get the horses in full career (Plate iii. 14). Occasionally during the period of finest art the representations are positively sensational, the broken wheel and the trailing rein conveying a vivid suggestion of catastrophe befallen or impending. On their largest coins Cimon and Euainetus show us what was the prize of victory at Syracuse. In the exergue,—that is, the small segment of the coin-surface that is cut off by the line on which the main type rests, -we have a complete suit of armour, with the legend AOAA (Plate ii. 13 and Plate iii. 14).

The meaning of the chariot type being absolutely clear, it is worth while asking what was the feeling that prompted its selection. Was it chosen because games were religious celebrations, or because chariot-racing was a favourite form of sport in the regions where the

to the city by Empedocles when he delivered it from the scourge of pestilence. Diogenes Laertius 1 relates that it was by connecting the channels of two streams that the philosopher cleared away the stagnant waters where the germs of the plague had bred. The whole anecdote is admirably illustrated by the coins. The obverse of the larger pieces (Plate iv. 8) shows a chariot in which Apollo and Artemis are standing side by side. The former is in the act of discharging an arrow, directed, no doubt, against the powers of evil. The latter symbolizes the relief conveyed to women labouring of child, for Diogenes tells us that on all such the scourge fell with special severity. The reverse is more striking still. The river-god Selinos, holding a lustral branch in his hand, is offering sacrifice, possibly to Asclepios, god of healing. The didrachms form an appropriate pendant (Plate iv. 9). The reverse is almost identical, except that here it is the second river, the Hypsas, that is sacrificing. The obverse is quite different. The type is Heracles struggling with the bull. The analogy of the tetradrachms justifies us in concluding that the group is symbolical in this particular connection. At the same time it must have been familiar to every Selinuntine, seeing that it forms the subject of one of the most recently discovered of the metopes that once decorated the great temples of the town.

In the fourth century, commemorative types that allude directly to historical occurrences tend to become more common. The gold and silver pieces struck by Agathocles after he had defeated the Carthaginians on

¹ viii. 2, 70.

their own ground, make obvious reference to his cam-In the critical moments that preceded the opening of the decisive battle, he is said to have let loose a number of owls which flew through the ranks of his soldiers and, perching on their shields and helmets, gave them confidence that Athena was on their side. The gold staters have as a reverse type an armed figure of Athena with an owl at her feet. On the reverse of the silver tetradrachms is a representation of Victory erecting a trophy. Similarly, when Demetrius Poliorcetes, acting as the admiral of his father Antigonus, inflicted a crushing defeat on the fleet of Ptolemy (306 B.c.) he struck coins having on the reverse a figure of Poseidon, and on the obverse Victory standing on a prow and blowing a long trumpet (Plate iv. 10). latter type, it may be added, is identical in its general scheme with the commemorative statue erected at the same time in Samothrace.1 The federal coinage of the Aetolians provides a parallel instance. The reverse of gold and silver alike shows at one period a figure of Aetolia, armed with sword and spear, seated on a pile of Gaulish and Macedonian shields. Sometimes there is a Gaulish war-trumpet under her feet. The whole pose suggests a statue, and we need not hesitate to agree with Millingen² in recognizing a reproduction of the thankoffering which Pausanias saw at Delphi-"an image of an armed woman, Aetolia no doubt "-dedicated, along with a trophy, by the Aetolians after they had driven back the Gaulish invaders.3

¹ See Th. Reinach, L'Histoire par les Monnaies, pp. 12 f.

² Récueil de quelques Médailles grecques, p. 39.

³ Pausanias x. 18, 7.

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Best known of all the 'agonistic' types, as they are called, are the chariots which were so popular on Sicilian coins and which also occur elsewhere,—at Cyrene, for instance, and on the gold staters of Philip of Macedon. It is quite certain that these are meant to allude directly to the sport of chariot-racing. difficult, perhaps, to associate the idea of rapid movement with the earliest examples (Plate iii. 11). But that is merely because at the beginning of the fifth century B.C. the die-engraver was not yet fully master of his craft. The first indication of the real nature of the type is the appearance, before 480 B.c., of a flying Victory placing a wreath on the heads of the horses (Plate iii. 12). Very soon technical difficulties are overcome, and then we get the horses in full career (Plate iii. 14). Occasionally during the period of finest art the representations are positively sensational, the broken wheel and the trailing rein conveying a vivid suggestion of catastrophe befallen or impending. On their largest coins Cimon and Euainetus show us what was the prize of victory at Syracuse. In the exergue,—that is, the small segment of the coin-surface that is cut off by the line on which the main type rests, -we have a complete suit of armour, with the legend AOAA (Plate ii. 13 and Plate iii. 14).

The meaning of the chariot type being absolutely clear, it is worth while asking what was the feeling that prompted its selection. Was it chosen because games were religious celebrations, or because chariot-racing was a favourite form of sport in the regions where the

coins were minted? All the evidence points to the latter alternative. It is very significant that we find the type, not at the great centres of the Panhellenic celebrations, but in the countries whence successful competitors in the chariot contests were most largely drawn. Fifteen of the surviving odes of Pindar are in honour of victories with the chariot. In eleven instances the winners come from Sicily and in two instances from Cyrene, while Athens and Thebes can claim but one triumph each,—a distribution of honours out of all proportion to that found in connection with, say, wrestling and boxing. Chariot-racing was a princely sport. It required a lavish expenditure of money. This was no doubt one main reason why it flourished among the Sicilian τύραννοι and the wealthy oligarchs of Cyrene. But, at Cyrene at least, it survived the establishment of a democratic form of government. Indeed, it was probably not until after the overthrow of the Battiadae that coins with agonistic types were struck in Cyrene at all. The beautiful gold staters with the chariot were issued soon after 400 B.C. We have still to speak of Philip of Macedon. His devotion to the sport is well known. Tidings of a victory gained by one of his teams at Olympia is said to have reached him on the very day on which his son Alexander was born.1

Even more distinctly commemorative are the types that bear directly on the origin of a city or a dynasty. A colony, for example, sometimes adopted as its

¹ It has often been suggested that the chariot on Philip's gold staters and the horseman on his silver tetradrachms may conceal an allusion to his name $\Phi i \lambda \iota \pi \pi \sigma s$, 'lover of horses.'

own the type of its mother-city. There being no political connection, such an act could only be a tribute inspired by sentiment. Thus Abdera, which was founded in 544 B.C. by refugees from Teos, placed upon its very earliest coins a seated griffin, the type employed at Teos in the sixth century B.C. The analogy with Apellicon's symbol 1 is remarkable.

Similarly Olynthus borrowed from Chalcis a flying eagle, and Dicaea from Eretria the figure of a cow scratching herself. In this form of reminiscence it was not necessary that the type should be an exact copy. The Ionian Magnesia was said to have been founded by Magnetes from Thessaly, and one of its coin-types is a Thessalian horseman. An analogous impulse can be traced in the coin-types of Thurii, the great colony founded under Athenian leadership on the ruins of Sybaris. The obverse of the first coinage shows the head of Athena, patron goddess of the city whence the colonists went forth; the reverse has the figure of a bull, a revival of the characteristic type of the city they were to rebuild. Again, when Thurii in her turn sent out colonists, and joined with Tarentum to found Heracleia, the union of Ionian and Dorian was suitably commemorated on the money of the new city. The obverse type was the head of Athena, exactly as she appeared on contemporary Thurian coins, while on the reverse was the Dorian hero Heracles, wrestling with the Nemean lion.

The type just mentioned suggests a reference to yet another aspect of the commemorative influence,—the tendency to make allusion to the founder of the city

¹ See supra, p. 56.

or to some legendary hero or heroine with whose adventures it was closely connected. Here again there is risk of confusion. We may be sure that in all such cases divine honours were paid to the individuals in question. But their use as types is not due to their divinity, but to their intimate association with the city or district concerned. The west, to which we are already largely indebted for illustrations, furnishes many examples. None is better known than Taras (or Phalanthus) founder of Tarentum, whom we find riding over the waves on his dolphin as early as the sixth century B.C. (Plate iv. 1). At Croton, rather more than two hundred years later, we get the seated Heracles, accompanied by the legend OIKISTAS or 'the founder.' About the same time we have the hero Pheraemon at Messana, and his counterpart Leucaspis at Syracuse, both represented in much the same attitude,—as armed warriors, charging with spear and shield. Rather later there appears at Metapontum the head of Leucippus, leader of the band who first formed the settlement. Contemporary coins of the same town display the head of another local hero, Tharragoras, while from Syracuse there come bronze coins with the head of the oekist, Archias.

It was in the same spirit that Pyrrhus of Epirus struck coins having Achilles and Thetis as types (Plate iv. 2). We know on other grounds that it was from them that he claimed to be descended. Naturally we find the heroes of the Trojan cycle on the coins of the cities with which they were most closely associated—Odysseus at Ithaca, Ajax son of Oïleus in Locris, Diomede at Argos. More remarkable

than any of these is Aeneas carrying off Anchises on a sixth century tetradrachm of Aeneia in Macedonia. Crete can boast of a rich series of mythological types. The coins of Phaestus alone provide us with Europa riding on the bull, with Heracles slaying the hydra, with the giant Talos hurling stones, as well as with other groups representing subjects less familiar. Nor was the association always a personal one. The gold staters of Panticapaeum (Fig. 14) have as their obverse type a head of Pan; on the reverse is one of the gold-guarding griffins who were fabled to keep watch





FIG. 14.—PANTICAPAEUM: GOLD.

over the precious stores whence the Greeks on the north of the Euxine derived so much of their wealth.

An interesting group of fourth century Arcadian coins deserves a passing notice. It is a curious example of local fashion in types. At Methydrium, and also at Orchomenus, we see the nymph Callisto falling in her death agony, pierced by the shaft of Artemis. At Tegea we have the young priestess Sterope holding out an amphora into which Athena lays the hair of the Gorgon Medusa, which was to protect the city from capture for all time to come. On the contemporary silver coins of Pheneus Hermes is shown rescuing Arcas, child of Callisto, from the fate that had overtaken his mother. Some of the corresponding bronze pieces have on the obverse a

head of Artemis and on the reverse a horse feeding. The clue in this, as in so many other cases, is given by Pausanias.1 Odysseus lost his mares and searched vainly for them up and down Greece. At last he recovered them in the territory of Pheneus. Recognizing to whom he owed his good fortune, he founded a sanctuary of Artemis, whom he surnamed 'Heurippe' - 'finder of steeds.' At the same time he resolved to make the land of Pheneus a feeding ground for horses. Pausanias actually saw an inscription which purported to embody the instructions given by Odysseus to the herdsmen told off to superintend the grazing! At Thelpusa, again, the usual fourth century reverse type is a galloping horse, whose identity is explained by the legend EPION. It is "divine Arion, the swift steed of Adrastus," the offspring of Poseidon and of the nymph from whom Thelpusa took its name. Once more, a tempting conjecture has recognized on drachms of Mantineia a representation of the fufilment of the injunctions laid upon Odysseus by Teiresias.² The hero, bearded and wearing a conical cap, has reached the land where "men know not the sea nor season their food with salt when they eat." He is shown in the act of fixing his oar in the ground before offering "goodly sacrifices to Poseidon the King." On the other side of the coins is the altar of the god.

The interest of this particular group lies in the tendency it displays to choose subjects that are mythological rather than purely religious. There is not one

¹ viii. 14, 4 ff.

² Svoronos, Études Arch. et Num., i. (Paris, 1889).

of them but suggests a story. The tendency is exceptional, but it was not new. An archaic tetradrachm of Cyrene, now in the Paris collection, has as one of its types the silphium, the familiar badge of the city, and, as the other, Heracles in the garden of the Hesperides (Plate iv. 3). The hero is standing with club and lion's skin, looking towards the tree with its load of golden fruit. Beyond the tree, facing him, is one of the nymphs who guarded the apples. The whole picture is so obvious that no one could fail to recognize what it represents. But it should be observed that it is intelligible only because we happen to know the story. Is it not possible that some of the more puzzling of the other early types may also be mythological, and may illustrate local legends of which no literary record has survived?

Dr. Imhoof-Blumer has employed this principle to throw light on certain of the types in use at Etenna in Pisidia.¹ And there are other coins to which we can easily conceive that it might be applicable. The curious designs so prevalent on the archaic issues of Thasos and the mainland opposite—centaurs or satyrs carrying off nymphs, and the like—may well have a more definite reference than it is now possible to discover. It must not be forgotten that several of the Arcadian types that were mentioned would have seemed every whit as meaningless but for the happy accident that we possess an early traveller's gossiping impressions of his journey through the Peloponnesus. Moreover, the connection with the lore recorded by Pausanias would not always have been obvious

¹ Kleinas. Münzen, pp. 370 ff.

without the aid of the descriptive titles that the engravers sometimes added. Such descriptive titles are hardly to be looked for before the fifth century. Even then they occur very sparingly. Not until the fourth century do they become really common, their increased use being closely connected with the increase in the variety of devices adopted by one and the same town.

Some lost legend must, I think, lie behind the strange types that occur at Mende in the fifth and fourth centuries B.C. The central figure is an ass. If he had always been alone, as he occasionally is, we might have accepted him as a symbol of Silenus. Silenus and the ass are often associated. But at Mende there are variations that point clearly to a mysterious connection with a crow, the crow being usually seated on the ass's back pecking at his tail (Plate iv. 4). The action is not so common as to render it a fit subject for a genre picture. That it is an illustration or epitome of a story is made probable by the fact that the relationship is maintained even when circumstances alter. There is a set of tetrobols which show on the obverse Silenus standing holding his ass by the ears, and on the reverse a crow (Plate iv. 6). The corresponding set of tetradrachms has a vine on the reverse, while the obverse type is very elaborate (Plate iv. 5). Silenus, to all appearance 'tolerably drunk,' reclines on the ass's back, waving a wine-cup in his hand. On the ground, between the ass's legs, is a dog, and in front grows a tree, on the topmost branch of which is seated our crow. The whole arrangement strongly suggests that there must be a clue if only we could find it. It

may have been the tale told to Pausanias by the people of Nauplia when they explained why they had the figure of an ass carved on a rock. Unfortunately he did not think it interesting. "The story," he says, "is not worth repeating, so I omit it." 1

As time goes on, we begin to meet, not merely with mythological, but with historical references on coins. The custom of minting money to celebrate particular events, much in the spirit in which medals are struck nowadays, does not appear to have been very prevalent among the Greeks. One of the most famous and best authenticated instances is the issue of the "Damareteion,"—the earliest Syracusan dekadrachm -minted after the great victory won over the Carthaginians at Himera in 480 B.C. (Plate iii. 13). cumstances are related by Diodorus.² We need not dwell on them, however, because the types have not been influenced by the occasion,—unless, indeed, as has often been suggested, the crouching lion in the exergue of the obverse may fairly be taken as a symbol of defeated Africa. But there are cases, even in the fifth century, where the types actually give us a direct reflection of a historical incident. There is, for example, no good reason to doubt the truth of Aristotle's statementpreserved for us by Pollux-that the reason why Anaxilas, tyrant of Rhegium, introduced a mule-car as a coin-type was because he wished to signalize the victory he had won at Olympia in the race for mule-cars.

Very interesting are the tetradrachms and didrachms of Selinus which bear witness of the salvation brought

¹ ii. 38, 3. ² xi. 26.

to the city by Empedocles when he delivered it from the scourge of pestilence. Diogenes Laertius 1 relates that it was by connecting the channels of two streams that the philosopher cleared away the stagnant waters where the germs of the plague had bred. The whole anecdote is admirably illustrated by the coins. obverse of the larger pieces (Plate iv. 8) shows a chariot in which Apollo and Artemis are standing side by side. The former is in the act of discharging an arrow, directed, no doubt, against the powers of evil. latter symbolizes the relief conveyed to women labouring of child, for Diogenes tells us that on all such the scourge fell with special severity. The reverse is more striking still. The river-god Selinos, holding a lustral branch in his hand, is offering sacrifice, possibly to Asclepios, god of healing. The didrachms form an appropriate pendant (Plate iv. 9). The reverse is almost identical, except that here it is the second river, the Hypsas, that is sacrificing. The obverse is quite different. The type is Heracles struggling with the bull. The analogy of the tetradrachms justifies us in concluding that the group is symbolical in this particular connection. At the same time it must have been familiar to every Selinuntine, seeing that it forms the subject of one of the most recently discovered of the metopes that once decorated the great temples of the town.

In the fourth century, commemorative types that allude directly to historical occurrences tend to become more common. The gold and silver pieces struck by Agathocles after he had defeated the Carthaginians on

their own ground, make obvious reference to his campaign. In the critical moments that preceded the opening of the decisive battle, he is said to have let loose a number of owls which flew through the ranks of his soldiers and, perching on their shields and helmets, gave them confidence that Athena was on their side. The gold staters have as a reverse type an armed figure of Athena with an owl at her feet. On the reverse of the silver tetradrachms is a representation of Victory erecting a trophy. Similarly, when Demetrius Poliorcetes, acting as the admiral of his father Antigonus, inflicted a crushing defeat on the fleet of Ptolemy (306 B.c.) he struck coins having on the reverse a figure of Poseidon, and on the obverse Victory standing on a prow and blowing a long trumpet (Plate iv. 10). latter type, it may be added, is identical in its general scheme with the commemorative statue erected at the same time in Samothrace.1 The federal coinage of the Aetolians provides a parallel instance. The reverse of gold and silver alike shows at one period a figure of Aetolia, armed with sword and spear, seated on a pile of Gaulish and Macedonian shields. Sometimes there is a Gaulish war-trumpet under her feet. The whole pose suggests a statue, and we need not hesitate to agree with Millingen 2 in recognizing a reproduction of the thankoffering which Pausanias saw at Delphi-"an image of an armed woman, Aetolia no doubt "-dedicated, along with a trophy, by the Aetolians after they had driven back the Gaulish invaders.3

¹ See Th. Reinach, L'Histoire par les Monnaies, pp. 12 f.

² Récueil de quelques Médailles grecques, p. 39.

³ Pausanias x. 18, 7.

Nor was it war-like triumphs alone that were celebrated thus. We have similar records of political friendships. About 280 B.c. the Epizephyrian Locrians, who had been forced into alliance with Pyrrhus, succeeded in freeing themselves and joined the Romans. During the vicissitudes that followed they struck coins having on the reverse a seated figure of Roma being crowned by Loyalty. Each of the two has her name attached, $P\Omega MA$ and $\Pi I \Sigma T I \Sigma$, so that there is no question as to the correctness of the interpretation. The personifications are interesting as anticipating a variety of type that we shall afterwards find very frequent on Roman coins proper. More symbolically expressed are the allusions on Sicilian coins to the expedition of Timoleon. The success of his mission was marked by the appearance, all over the island, of types that were evidently regarded as the badges of liberty—the head of Zeus the Deliverer, and the free horse. We are entitled to conclude that the cities where these types came into use made common cause with Timoleon against the Carthaginian oppressors.

Even more noteworthy is the numismatic memorial that constitutes almost the only record of what must have been an anti-Spartan confederation formed about 394 B.C.¹ The 'allies,' whom the result of the Peloponnesian war had transformed into a Spartan 'empire,' were not long in shaking off the yoke. With the aid of Conon, the Athenian admiral, the oppressors were driven out of most of the cities on the coast of Asia Minor. So much we know from history, Ephesus and Samos being specifically mentioned. Other prominent

¹ Waddington, Mélanges de Num., ii. pp. 7 ff.

members of the league must have been Rhodes, Cnidus, Byzantium, and Iasus. For just about this time, all the six cities mentioned issued silver coins having on the reverse the name and the characteristic type of the place of issue, and on the obverse the letters SYN, for SYMMAXIKON or 'federal money,' written round a representation of the infant Heracles strangling two serpents (Plate iv. 11). The symbolism of this subject is easy of interpretation. It is interesting to note that it must have been borrowed from the money of Thebes, where, however, it had no special significance, but was merely one of a series portraying the national hero in various attitudes. We find it again at Croton, and there, as in Asia, it was probably symbolical, seeing that it made its appearance at the very time when the Italian Greeks were defending themselves desperately against the aggression of Dionysius.

In the illustrations just discussed we have been dealing with types deliberately chosen to convey a particular



FIG. 15.-HIMERA: SILVER.

meaning. Where the event to be commemorated was a political union, there was a simpler way of proceeding. The union might be expressed by merely combining the ordinary badges of the states concerned. We know, for instance, that in 482 B.C. Theron of Acragas extended his sway over Himera. The types previously in use at that city had been a cock (Fig. 15) or a

cock and a hen. The coins that belong to the period of Theron's domination have the cock of Himera on the obverse and the crab of Acragas on the reverse (Fig. 16). It is in all probability to a union of a more voluntary and more temporary sort that we owe a remarkable tetradrachm of Cyrene now in the British Museum (Plate iv. 12). On the obverse, side by side with the silphium plant and certainly not less prominent than it is, we get a lion's head with open jaws. This second device might refer to any one of several cities. But it would appear to be Lindus in the island of





FIG. 16.—HIMERA: SILVER.

Rhodes that is really intended, since the reverse shows the badge of another Rhodian town, the eagle's head of Ialysus. Of the particular circumstances attending the issue of the coin in question we know nothing. And there are other cases equally obscure. Why, for example, should Metellus Creticus have used the Ephesian Artemis as a type at Gortyna?

Sometimes, however, history helps us. Thus, the oldest coins of Poseidonia have for their type, as we already know, Poseidon brandishing his trident. Their fabric is that described in the first lecture as characteristic of the 'South Italian Monetary Confederation.' In weight they do not agree with the issues of the other Achaean colonies, such as Sybaris. Instead, they follow the Campanian standard, employed by their neighbours

of Velia. About the beginning of the fifth century B.c. there occurs a sudden change by which fabric, weight, and type are all alike affected (Plate iv. 13). The coins become smaller in diameter and thicker; there is a type in relief on both sides; and the weight is now Achaean. The alteration in fabric calls for no remark: it is in sympathy with what was taking place elsewhere. But that in type was, I think, due to a discoverable cause. The new device was a bull, and the current view is that it appears here as a symbol of the worship of Poseidon. The bull, however, was the coin-type of Sybaris. When Sybaris was destroyed in 510 B.c., its surviving inhabitants fled to other towns in Magna Graecia. It is highly probable that Poseidonia was one of these cities of refuge. I would suggest that the numbers that went thither were large enough to make the settlement something like a συνοικισμός, and that it was their arrival that occasioned the introduction of the new type and also, by opening up fresh commercial connections, led to the adoption of the Achaean system of weight. This conjecture is strongly confirmed by the fact that fifty years later Poseidonia was used as a base for an attempt to rebuild Sybaris. The restored city struck coins during the five years of its brief existence. The types employed on these are the bull and Poseidon with his trident.

The type of Poseidon at Poseidonia furnishes an exact parallel to the use of the figure of Dionysus as a symbol by the Athenian magistrate Dionysius. It shows how inextricably the commemorative and the religious influences might be united. It was inevitable

that it should be so. It could not but happen that the most striking characteristic of a city, that by which she was most anxious to be known among her neighbours, was often an intimate connection with a divinity. Whether we believe with some that Athena was called after the town she loved so well, or hold with others that the δαιμόνιον πτολίεθρον took its name from its protectress, we cannot but recognize it as appropriate that the Athenians should use as a device on their public seal the owl which, as the favourite bird of the goddess, would serve as a perpetual reminder of the relation in which she stood to their city. The point in regard to which their coins differ markedly from earlier pieces struck elsewhere, is that (so far as we can judge) they were the first to bear a well-marked type on each side. While the $\pi\alpha\rho\dot{\alpha}\sigma\eta\mu\sigma\nu$ is placed on the reverse, the obverse is occupied by the head of the goddess for whom, after all, the $\pi \alpha \rho \dot{\alpha} \sigma \eta \mu o \nu$ was but a shorthand sign. As the many examples that could be cited from later periods clearly prove, such a connection between obverse type and reverse type appealed to the Greeks as a natural one. Zeus and his thunderbolt, Apollo and his lyre, Heracles and his club are among the commonest combinations. And it seems simplest to seek in this principle the key to the types on the money of Tenedos. There the reverse type is the double-axe, which was also, as we saw, the city-arms or παράσημον of the island, just as the owl was at Athens. The association of the double-axe with religion is clearly proved by the fifth century pieces on which it figures as a cultus-object. It is natural to infer from the analogy of Athens that it was the emblem of the divinity whose

janiform head is used as the type of the obverse (Plate i. 11).

The owl and the double-axe are only two out of a number of devices that must have been chosen as παράσημα on religious grounds, that is, because they formed a convenient shorthand sign for the patron god or goddess of the town. The bee and the stag on early coins of Ephesus speak unmistakably of the great goddess whom all Asia and the world worshipped. Later representations show her cultus-image standing between two stags, and Pausanias tells us that her priests were called 'King Bees.'1 One great reason for the use of such emblems lies, of course, in the limitations of the older artists. At Larissa, for instance, it was obviously a far easier thing for the engraver to draw a sandal than it would have been for him to draw a head or a full figure that would have suggested Jason anything like so readily as the sandal must have done to all who handled the coins, for all who handled the coins would know the legend. The first attempt to represent the human head on a coin was made, in all probability at Cnidus in Caria, as early as circa 700 B.C. (Plate i. 2). Fully two centuries elapsed before such types became Some study of the process by which they acquired their ultimate pre-eminence will, I think, show that the religious element in coin-types did not spring full-grown into being. Nor did it originate in any feeling as to the sacrosanct nature of the art of minting money. Rather, it was through the promptings of the commemorative instinct that religious types first found a place upon coins. In the course of centuries

^{1&#}x27;Eσσηνες (Paus., viii. 13, 1).

the commemorative influence, where it survived at all, sank to a level of secondary importance, and for a time religion held undisputed sway as the most potent factor in determining the character of the devices that cities, states, and princes were to use upon their money.

Let us begin by glancing at a group which is beyond all question religious, but which still remains in a certain sense commemorative. It is typical of many others. Collectors of Sicilian coins are familiar with the electrum series of Syracuse. The three highest denominations are pieces of 100, 50, and 25 litrae respectively, and their types are as follows:

Obverse.

Reverse.

Head of Apollo

Head of Apollo

Tripod

Head of Apollo

Lyre

As this is the earliest appearance of Apollo or his emblems on Syracusan money, it can hardly be as a local deity that he is invoked. When we realize this, we are struck by the suddenness of the invasion and the completeness of the conquest. The style of the coins points to the middle of the fourth century B.C., and the series has usually been attributed to Timoleon (circa 345 B.C.). This attribution throws no light upon the types. On the other hand, all is satisfactorily explained if we accept the view (which has been advocated by Reinach and Holm) that the electrum coinage was issued by Dion, who in 357 B.C. drove out the younger Dionysius and subsequently himself assumed the role of tyrant. The island of Zacynthus was the

rendezvous where Dion mustered the seven or eight hundred men who formed his expeditionary force. There Apollo was the chief local god. His temple, as we learn from Plutarch's narrative, was the scene of a splendid sacrifice which Dion offered prior to embarkation, marching to the sanctuary with all his retainers in full armour. The sacrifice was followed by a no less splendid feast, marked by a most profuse display of wealth.1 Possibly we ought to connect with this very festival certain silver staters of Zacynthus on which the name of Dion actually occurs (Plate iv. 15) and which, be it noted, are identical in their types with the 50 litrae piece of Syracuse (Plate iv. 14). But the main point is that the 'liberator,' when he started on his enterprise, evidently placed himself and his companions under the protection of Apollo. If the types of the coins issued after he had gained his end were to be religious, as established custom demanded that they should be, it was only natural that they should be connected with the worship of the god to whose favour he must have ascribed some share of his success.

It is not, however, the obviously commemorative character of the group that is of importance for us at present. It is the suggestion conveyed as to an established custom,—as to a well-understood connection between religion and the minting of money. This suggestion is fully borne out by a wider survey. At Populonia in Etruria, for instance, we find the following bronze pieces issued within a very short time of one another.

¹ Plutarch, Dion, xxiii.

Obverse.	Reverse.
Head of Athena	Owl
Head of Hermes	Two caducei
Head of Heracles	Club, bow and arrow
Head of Hephaestus	Hammer and tongs

At the Bruttian town of Vibo Valentia practically the whole Olympian pantheon was drawn upon. Here is a list of the types used on the various denominations during the second century B.C., each denomination being, as it were, reserved for a particular divinity.

	Obverse.	Reverse.
•	Head of Zeus	Thunderbolt
	Head of Hera	Double cornucopiae
	Head of Athena	Owl
	Head of Demeter	Cornucopiae
	Head of Heracles	Two clubs
	Head of Apollo	Lyre
	Head of Artemis	Hunting dog
	Head of Hermes	Caduceus

Or take the bronze coins issued at Centuripae in Sicily after circa 241 B.C.

Obverse.	Reverse.
Head of Zeus	Winged thunderbolt
Head of Apollo	Lyre
Head of Artemis	Tripod
Head of Demeter	Plough
Head of Heracles	Club
Head of Apollo	Laurel-branch

In such cases as these there can be no question of commemoration. The only conceivable motive is the

religious one. It looks as if there had been a desire to honour as many as possible of the gods and goddesses by assigning them a niche in the gallery of types. the same spirit the welcome extended to the worship of Sarapis and Isis in Sicily is reflected in the appearance of these deities as coin-types at Catana and Syracuse. It is worth our while to note in passing how admirably the lists given above serve to illustrate the principle we found operative on the archaic tetradrachms of Athens, —the obverse of a coin reserved for a divinity, the reverse occupied by his or her special emblem. And it is curious to observe that, sometimes at all events, the relative value of a coin in a series would seem to have varied with the importance of the deity who supplied the types. We have no other means of gauging the degrees of veneration paid to the different Hellenic gods and goddesses at Vibo Valentia and Centuripae. But it is significant that on the money of both towns Zeus occupies the highest place, while Apollo ranks above his sister Artemis. perhaps, justified in thinking that the others may stand in 'order of merit' also.

Examples such as those that have been cited are more numerous among the bronze series of Italy and Sicily than they are anywhere else. For that there were special reasons which we shall have occasion to refer to by and by. But it may be observed now that the convenience of varying types to indicate value was recognized at an early stage in the history of coins. Although it was not always acted upon, it was the outcome of a tendency which, as has already been stated, must have operated powerfully against the continued use of any

one device or παράσημον as the sole type on the money of a city. At Syracuse, for instance, soon after 500 B.C. the tetradrachm shows a four-horse chariot, the didrachm a horseman leading a spare horse, and the drachm a horseman riding alone. On the gold pieces struck at Pisa in 364 B.C. the thunderbolt marks the obol, while the piece of one and a half obols has three half thunderbolts for its type. At Argos in the fifth century B.C. we get a wolf on the drachm, a half-wolf on the hemidrachm, and the head of a wolf on the obol. It would be easy to multiply examples.

Returning to our main argument, we may, I think, regard it as proved that, at least from the fourth century B.c. onwards, there was a more or less close connection between coin-types and religion. The contrast between this later period and the earlier one can best be shown by taking a particular case. The archaic coinage of the Aegean consisted, it will be remembered, of staters of Aeginetic weight, having an incuse square on the reverse. The following are the more important of the obverse types-amphora, cuttle-fish, bunch of grapes, one-handled vase, pomegranate, head of satyr, kantharos, goat kneeling, eagle (or dove) flying. The whole of these pieces are earlier than the invasion of Xerxes. After the Persian defeat the islands passed under the protection of Athens, when all of them except Siphnos underwent an eclipse that involved an almost complete cessation of independent mintage.1 Even after the overthrow of the Athenian Empire they

¹ The view that they were at once deprived of the right of striking coins cannot now be fully maintained. See R. Weil, Das Münzmonopol Athens im ersten attischen Seebund (Z.f.N., xxv. pp. 52 ff.).

struck but little money of their own. About 300 B.C., however, they seem to have recovered a full measure of financial autonomy. If we look at the types that came into vogue then, we can estimate the extent of the change that had taken place in the interval. A few of the earlier devices are still employed,—the grapes at Iulis, the pomegranate at Melos, the kantharos at Naxos, the goat at Paros,—but even these have lost the pre-eminence they once enjoyed. One or two emblems of a similar kind have been introduced, such as the star and the bee at Iulis. But the great majority of the new types are representations of gods and goddessesthe head of Zeus, the head of Aristaeus, the head of Dionysus, the head of Athena, the head of Artemis, the head of Demeter, Apollo enthroned, Athena fighting, Demeter seated.

Here the wide gap between two epochs helps to emphasize the difference. But it is almost more instructive to follow the fortunes of series that are continuous, and in particular to notice what happened at those cities where we have good grounds for recognizing some one type as the town-arms or $\pi a \rho a \sigma \eta \mu o \nu$. Occasionally this type persists, unmoved from the obverse on which it was originally placed. The sphinx at Chios and the griffin at Teos, for instance, remain undisturbed for centuries. Indeed, their position is never seriously disputed. As a rule, however, it was otherwise, and we may say broadly that, where a state began by employing its παράσημον as a coin-type, one of two things almost inevitably happened after a longer or shorter interval of time. Either the παράσημον was transferred to the reverse, and paled in importance

before the head or figure of a divinity,1 or it ceased to be used as a type at all, and was reduced to the rank of a mere symbol in the field. Thus, the eagle and the crab are the sole types of the earlier coins of Acragas. The splendid dekadrachm struck at the end of the fifth century displays much more elaboration. On one side is the famous group of two eagles devouring a hare—a type doubtless suggested by the single eagle of the older pieces. On the other side is a charioteer reining in his fiery steeds. Above the heads of the horses is an eagle; beneath their feet is a crab. The original types are no longer anything but subsidiary emblems. Their very survival in such a capacity is, it may be pointed out, an argument in favour of the view that they were παράσημα or badges of the city, for this is the only supposition on which their retention would be intelligible. So it was with the selinon leaf at Selinus (Plate iv. 7 and 8 f.), the pomegranate at Side (Plate v. 1 and 2), the wolf at Argos (Plate ii. 9), the triskeles at Aspendus, and probably also the amphora at Myrina.² At Himera entirely new types were introduced after the death of Theron and the expulsion of his son Thrasydaeus. But the cock which had been the constant type of the original didrachms, lingered on for a short time as a symbol on the tetradrachms by which these didrachms were replaced. Its function there can only have been that of a παράσημον. And it is probably in the same capacity that the lion is employed as a symbol on some

¹ Since the above was written this 'rule' has been discussed in some detail by Dr. K. Regling, Z.f.N., xxv. p. 40, footnote.

² See Wroth, B.M.C. Troas, p. lvi.

of the oldest tetradrachms of Leontini. If so, however, it is interesting to notice that its use as a symbol is the prelude rather than the sequel to its use as a full type, for a lion's head occupies the reverse of the tetradrachms, at least from the time of Hieron until the city lost its independence, while a lion is one of the many types introduced during the revival that took place under Roman dominion.

Coming back to the second alternative—the continued use of the $\pi\alpha\rho\dot{\alpha}\sigma\eta\mu\sigma\nu$ as a type—we can readily find examples of the loss of prestige that overtook it. Corinth is a striking exception. Probably it was due to the widespread popularity of her 'colts' that the Pegasus maintained its position on the obverse, even after the helmeted head of Athena had joined it as a companion (Plate v. 3 ff.) Elsewhere the παράσημον was almost as a matter of course transferred to the reverse as soon as a second type was placed upon the coins at all. This happened to the ear of barley at Metapontum, the lion at Velia, the tripod at Croton, the sea-eagle at Sinope, the anchor at Apollonia Pontica, the half-horse at Lampsacus, the eagle at Abydus, the lyre at Colophon, the crab at Cos, the eagle at Siphnos, and the silphium at Cyrene. It may be that the change was at first not a matter of principle, but a matter of mechanical convenience. Such is the conclusion suggested by a study of early Sicilian coins. The new type was more elaborate. Usually it was a head, and demanded treatment in higher relief. The die was therefore more

¹ At Metapontum there was an intermediate stage: see Plate v. 7 f.

liable to breakage, so that it was an advantage to give it the additional support it would derive from being imbedded in the anvil.\(^1\) If, however, it was originally a matter of convenience, it soon came to be an accepted convention that heads should be placed on the obverse. And there was a further consequence. The type on which most of the artist's care was lavished, could not but rise to the higher place in popular estimation. Where the use of the $\pi \alpha \rho \acute{\alpha} \sigma \eta \mu o \nu$ survives into the fourth or later centuries, it is usually on the reverse that we find it. In a sense it is true to say that its decline in importance measures the growth of the tendency to associate coins with religion.

The process just traced fully explains a circumstance to which attention was drawn in last lecture,—the fact that it was to the reverse types of coins that the epigraphic παράσημα there recorded were usually found to correspond.2 One of the three exceptions was accounted for at the time. We are now in a position to make a further advance. It will be remembered that the earliest coins were uninscribed. They circulated within a limited area, and the badge of the issuing city was sufficiently distinctive. But, as mints multiplied and coins travelled further, something more was felt to be required, and the alphabet was the obvious instrument. Now, it is surely not without significance that, after the use of inscriptions has become fairly established, it is, in the great majority of cases, on the reverse of the coin that the name of the city appears. In later times

¹ On the greater liability of the upper die to breakage see J.H.S., xxiii. pp. 99 f.

² See supra, p. 69.

this was, without doubt, a mere convention. But there was an intelligible reason underlying it.

Although the inscription ultimately came to be identified with the coin in cases like ANEIANAPEIOS $(\sigma \tau \alpha \tau \eta \rho)$ and AΛΕΞΑΝΔΡΕΙΑ $(\delta \rho \alpha \chi \mu \eta)$ on the money of Alexander of Pherae, it seems only natural to suppose that at first it was the accompaniment and interpretation of the town-arms. In other words, it was parallel to $\Phi \alpha \epsilon \nu o s \epsilon \mu \alpha \sigma \eta \mu \alpha$, and its proper place, therefore, was beside the $\pi\alpha\rho\dot{\alpha}\sigma\eta\mu\nu\nu$. This hypothesis agrees well with the fact that, when it is written at full length, it is usually in the genitive case, but at the same time it is in no way inconsistent with occasional nominatives like ΑΚΡΑΓΑΣ, ΤΑΡΑΣ, DANKLE, ΓΕΤΑΣ ΗΔΟΝΕΟΝ ΒΑΣΙΛΕΥΣ, and AΘE O ΔΗΜΟΣ. It also agrees well with the evidence furnished by the oldest coins. At Athens it is placed beside the owl; at Tenedos beside the double-axe. At Dardanus, Sinope, and Siphnos the same principle is illustrated. In all these cases there were two types to choose between. In some instances, however, inscriptions began to be employed before the introduction of a reverse type, and then both sides of the coin were open to the engraver. He might place the ethnic on the reverse by itself,—an alternative, as it were, to the $\pi \alpha \rho \alpha \sigma \eta \mu \rho \nu$. That is what we find on the archaic staters of Carthaea and, in later times, at Abdera, Acanthus, Argos, Chios, Sicyon and Teos. Or he might place it on the obverse beside the town-arms, and leave the reverse with nothing but the incuse. This latter alternative was adopted at Coressia, Corinth, Phocaea, and elsewhere. At Melos there was no fixed practice; there

¹ See supra, p. 51.

the legend is sometimes on one side and sometimes on the other. But the most convincing illustrations of the tendency to connect inscription and παράσημου are afforded by such series as those of Abydus, Apollonia Pontica, Croton, Metapontum, and Zancle, where the two at first stand together on the obverse but are subsequently transferred simultaneously to the reverse; see, for instance, Plate v. 7 f. and 11 f. On the whole, I do not think that, in spite of occasional variations, the truth of the general rule will be seriously disputed. One or two of the exceptions deserve special examination.

At Corinth the inscription is usually limited to the single letter o, the initial of the ethnic. This is placed at the outset beneath the Pegasus on the obverse. And on the obverse it remains, fashion notwithstanding, during the whole of the four centuries in which the city struck silver at all. Only on the later bronze issues does the inscription make its appearance on the reverse, and then its transference is simply the logical consequence of the transference of the Pegasus. If we turn now from the Corinthian staters proper to the corresponding pieces struck by the 'colonies of Corinth,' we see a notable difference. In weight, types, and general appearance, the two, as has been stated in another connection, were identical. But, as might have been expected, the o is omitted, being replaced by the name of the actual mint, sometimes written in full, sometimes more or less abbreviated. Occasionally this new name is engraved, as the o had been, on the obverse beneath the

¹ See supra, p. 83.





Pegasus. Much more often it is placed on the reverse, beside the head of the goddess Athena (Plate v. 6). The explanation is simple. The 'colonies' were making use for commercial convenience of types that were not their own. There was no special relation between their names and the Pegasus. Hence, while tradition sometimes led the engravers to place the ethnic on these 'colonial' staters in the precise position it had occupied upon the coins on which they were modelled, more frequently the dictates of what had now become the ordinary convention were followed, and the ethnic placed on the reverse. Let me prove the rule (if rule it can be called) by an exception. On the earliest series of Corinthian staters issued at Syracuse the legend ΣΥΡΑΚΟΣΙΟΝ or ΣΥΡΑΚΟΣΙΩΝ is on the reverse beside Athena's head. On the next it is beside the Pegasus. The apparent contradiction disappears at once if it be noticed that something else has been placed on the obverse also,—the triskeles, or 'Isle of Man' device, an emblem employed by Agathocles as a symbol of the Syracusan power in Sicily. It is with that, then, and not with the Pegasus that we must suppose the inscription on the latter series to be connected.

This leads us naturally to the point with which I particularly wished to deal,—the reason why it was to the obverse type of Syracusan coins that the epigraphic $\pi \alpha \rho \acute{a} \sigma \eta \mu o \nu$ of Syracuse was found to correspond. The oldest coins of the city have on the obverse a quadriga, and on the reverse a quadripartite incuse square, usually enclosing a small female head, perhaps that of Artemis (Plate iii. 11). These pieces are very

re, so that their issue can have continued only for a ort time. In the next stage the incuse square of the verse has disappeared and the whole field is occupied the head, now grown to be of normal size, with four lphins disposed round it so as to form a frameork (Plate iii. 12 f.). The most interesting feature, wever, so far as our present purpose is concerned, is at the inscription is moved from obverse to reverse. this case there can have been no question of convenn. It was too early for that yet. Besides, when the ad was transferred to the obverse-as, for reasons eady explained,1 it speedily was—the inscription companied it (Plate ii. 13). Thenceforward, until e time of Timoleon, it is usually with the head that ethnic is associated. How is this to be accounted ·? I would suggest the following explanation. When : Syracusans first began to mint money, they selected four-horse chariot as their distinguishing device. The be quickly caught the popular fancy in other Sicilian ies. Gela and Leontini, we know, imitated it almost mediately. It could no longer, therefore, be regarded characteristically Syracusan. What was originally a ondary device, the head, was accordingly promoted the first place, and to it—irrespective of the side of coin on which it might be placed—the inscription s naturally attached. When the union between the o was dissolved, its real meaning had been forgotten, I the inscription had come to be looked on as belong-, not to the παράσημον merely, but to the whole coin. It must be frankly admitted that suggestions such that now put forward are somewhat tentative in

¹ See *supra*, pp. 125 f.

It could not be otherwise when we are seeking to explain phenomena that were the result of a variety of motives the nature and force of which we can do little more than guess at. But, before leaving this part of our subject, I am tempted to point out one or two anomalies that would be rendered more intelligible by an acceptance of the theory on which we have been proceeding,—the theory, I mean, that coin-inscriptions originally belonged to the type. On the staters of the 'South Italian Monetary Confederation,'—the title is so convenient that it is difficult to abandon it,the type is, as we are aware, repeated on the reverse, and it is not at all uncommon to find the inscription repeated there too. At Poseidonia such repetition Elsewhere it is not carried out so is the rule. systematically. At Laus, however, two stages are observable. During the later the first three letters of the ethnic are placed both on obverse and on reverse, exactly as at Poseidonia. During the earlier the ethnic is written in full, the first three letters being placed on the obverse and the last three on the reverse. survey of the coin is thus incomplete until both sides have been looked at. Similar divisions of an inscription occur elsewhere. In some instances, as on the litrae of Abacaenum in Sicily, the division is probably due to lack of space. But when we find, as we occasionally do (Plate v. 9), early tetradrachms Acragas having AKPA on the obverse beside the eagle, and rax on the reverse beside the crab, in both cases with a wide expanse of blank field, we cannot help thinking that the engraver may have been prompted by the same impulse that led the artist of the famous

dekadrachm to place both crab and eagle as symbols on the obverse of his masterpiece, as if the two together were required for the full expression of the emblem of the town.

As a last example, I would take the mysterious type of Caulonia. We know next to nothing of the history of this city, except that it was one of the oldest Achaean settlements in Southern Italy, that it became a prosperous and populous centre, and that it was destroyed by Dionysius of Syracuse in 388 B.c. During the sixth century B.c. it struck coins marked by the usual local peculiarities (Plate iii. 7). The type may be described as follows: 'Naked male figure, standing with one foot planted in advance of the other; hair bound with diadem and falling in ringlets; in raised right hand a branch; on left arm, which is outstretched, a small figure running forward with head turned back, holding a branch in each hand; in front, stag standing on basis, with head reverted.' Behind the large figure is the ethnic in a more or less contracted form.

I have already suggested that the type may be modelled on a statue, and I have no further conjecture to offer as to its meaning. My point now is that the stag is not an integral part of the whole, and that there appears to be an intimate connection between it and the name of the town. It rests upon a basis apart, and is not so definitely attached to the divinity as are, say, the stags that stand beside the statue of Artemis on Ephesian coins. At Caulonia, of course, the type is at first repeated incuse on the reverse. Repetition of the inscription is, however, not very usual here. About 500 B.C. the peculiar fabric falls out of fashion, just as at

the neighbouring cities, and an independent type is placed on the reverse. This second type at Caulonia is a stag, and from the first moment of its appearance the ethnic is seen beside it. But it is no ordinary case of transference, because for a time the original legend and the original stag are still retained on the obverse. Presently both disappear, and leave the main figure in solitude (Plate v. 10). It cannot perhaps be said that their disappearance is absolutely simultaneous. But it is certainly true that, where one is wanting, the other is usually wanting too.1 It looks as if a stag had been (for what reason we know not-quite possibly through some connection with the 'Apollo') the town-arms or παράσημον of Caulonia, and as if it had originally been employed on the coinage as the symbol of the town, the statue being a specially selected device. This would be interesting as giving us an example of a παράσημον that developed out of a mere symbol into an independent type, a process which would be the reverse of the ordinary one, but for which something of a parallel could be got on the coins of Leontini.2 It would also furnish an apt explanation of the double inscription,a very unusual feature of Greek coins of any period.

¹ There are doubtless some exceptions, but there is a very strong body of evidence in favour of the view here suggested. The whole of the Cauloniate coins in the Hunter Cabinet, for instance, conform to the 'rule,' and so do nearly all of those in the British Museum, as I have ascertained by personal examination.

² See *supra*, pp. 124 f.

LECTURE IV.

Towards the close of last lecture so many incidental points of interest emerged that we were compelled to turn aside somewhat from the main line of argument. Probably, therefore, it will conduce to clearness, if I begin to-day with a brief re-statement of the general position I am anxious to make good. The distinctively religious character which was practically universal among coin-types from the fourth century B.c. onwards was not due to any quality inherent in the nature of coined money as such. Rather, it represented an encroachment on the earlier practice of employing as a type either the ordinary town-arms or else a specially chosen device that would easily be recognized as a shorthand sign for the city. The original types may often have been, in the nature of things, religious. But subsequently a specifically religious influence made itself felt. As this gathered strength, the earlier devices tended to disappear, or at least to be overshadowed in importance by the head or figure of a divinity that had been given them as a companion. the end there was established between coins and religion

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an association so intimate that, before the close of the Hellenic period, it had come to be regarded as a matter of course that the types of coins should be religious in subject.

The change was due to a combination of causes. has already been pointed out that the inscription served practically the same purpose as the original type, that it was more generally intelligible, and that at the same time the suitability of any mere single device must have been considerably impaired by the growing need for a variety of types such as would suffice to prevent confusion between the increasing number of denominations that were being struck. All this helped to accelerate the movement. But there must have been other forces at work determining its direction. It would be hopeless to try and distinguish these clearly at this distance of time. We shall not be mistaken, however, if we accord some weight to the operation of the imitative influence. As we saw, it was probably at Cnidus that the head of a divinity was first used as a type.1 This was exceptionally early. In the course of the sixth century B.C., however, we get a very archaic head at Calymna in Cos, and another at the Sicilian Naxos, while the satyr's head from the Santorin find can also lay claim to a remote antiquity. Then there are the Athenian tetradrachms, which are certainly among the very earliest pieces to have a type on both sides. set of coins last mentioned had an extraordinarily wide circulation; specimens are found, both in east and in west, far away from the country of origin. And there were two features that were bound to strike those who

¹ See supra, p. 117.

saw them for the first time,—the simplicity and obviousness of the relation between the head of Athena on the obverse and her owl on the reverse, and the peculiar fitness of a head for use as a type in a circular setting. Under these circumstances it is quite conceivable that they may have exercised a considerable effect in helping to introduce a fashion which, once introduced, could hardly fail to grow rapidly in popularity.

Sometimes, as at Metapontum, there is an intermediate stage, where the full figure rather than the head of a divinity was in favour (Plate v. 7 f.). But sooner or later the head wins its way to the first place. At Cumae the decorative obverse of the oldest coins is abandoned to make room for the head of Athena or of a nymph. Throughout Thessaly the bull-fighter with his bull disappears, leaving his horse unattended on the reverse (Plate iii. 2). In many other cases, as at Syracuse, Corinth, Argos, Sinope, and Siphnos, the head succeeds to a place that was vacant, only a single type having been in use there previously. The earliest money of Elis has an eagle, a thunderbolt, a figure of Victory with a wreath in her hand, and similar reminiscences of the connection between the district and the worship of Zeus, or his festival. By and by the head of Zeus becomes the most usual obverse type, the corresponding reverse being either a thunderbolt or an eagle. This illustrates what will be found to be a fairly general rule,-that, if the oldest type (or παράσημον) of any city has been chosen because it is the symbol of a particular divinity, then, when a head is adopted as an obverse type, it usually proves to be the head of the divinity in question. On the other hand,

we may perhaps infer that a παράσημον has no well-marked religious significance when we find it combined not with one head, but with a variety. Thus, had the ear of corn at Metapontum been simply the emblem of Demeter, we should have expected her head to become its constant accompaniment. As a matter of fact, the earliest divinities with which it is associated are the River Achelous, Apollo, and Heracles. After 400 B.c. the head of Demeter does indeed occur as an obverse type. But this is only when the religious influence has attained full development, and even so Demeter is but one out of a number.

While the popularity of the head as a type may have been, to some extent, the result of imitation, coupled of course with its extreme fitness for the purpose, this popularity was an effect no less than a cause of the growing influence of religion in guiding the choice of coin-types. It was not only that the type on which the artist bestowed most care would naturally tend to attract the largest share of public esteem. The very fact that coins were looked upon as works of art, and that consequently die-engraving could engage the attention of men who were real artists, was sufficient to give a religious bias to the selection of types. In the Greece of the historical period, just as in mediaeval Italy, the bond between art and religion was exceedingly close. So far, at all events, as sculpture was concerned-and it was to sculpture that die-cutting and gem-engraving were most nearly allied,—the activity of the earlier artists was mainly directed into what may fairly be called religious channels. The temples were the great storehouses of art treasures. Their decoration

absorbed the energies of the most gifted sculptors, and the subjects of sculpture were therefore drawn chiefly from the legends of gods and heroes. Not perhaps until the fourth century B.c. do we find any large proportion of attention being devoted to secular art-representations of every-day life.

Accordingly, when the fifth century engravers were not dealing with purely ornamental designs, they were usually working in an atmosphere coloured by the reflected glories of religious sculpture, a circumstance that cannot but have told upon themselves and that must also have affected the manner in which their contemporaries regarded the outcome of their handiwork. Above all must this have been so when, as with coins, their activities were exercised in the service of the state. Dignity of subject was then essential, and nowhere could that be more readily found than in the forms which the genius of great sculptors had invested with a majesty more than human. This means that the decorative influence and the religious influence joined hands. The effects of that union can be traced at many points. As a conspicuous instance, one might refer to the facing head of Hera Lacinia in Southern Italy,—a type, by the way, that occurs at several neighbouring cities and thus also provides an illustration of the working of the imitative influence. Why not, it may be asked, of the commemorative influence too? And the question would be fully justified, for it is impossible to keep the four apart. Yet it must be clear that there is a real difference between the facing head of Hera and such types as the statue of Hermes at Aenus or that of Aphrodite Aineias at Leucas. It will hardly be argued that it was for their beauty's sake that these latter were reproduced.

Passing from this, we may recall the fact that in our opening lecture we refused to accept the view of Curtius that coinage was intrinsically a sacred institution and that it owed its invention to the priesthood. Such a refusal did not amount to a denial of all connection between temples and minting. And to this point I would now return. It seems to be certain that the mint at Athens was located in the shrine of the hero Stephanephoros, who was probably identical Theseus. But we have no means of knowing whether or not this was its original home. The establishment of the Roman mint in the temple of Juno Moneta, the 'goddess of good counsel,' dates from 268 B.C., when silver was first struck in Rome. In other words, it belongs to an epoch when the religious influence already controlled the choice of types, and that was why we declined to admit it as evidence in regard to the question of origins. At the same time the coincidence that both at Athens and at Rome the mint was in a temple is too remarkable to be set aside as meaningless. It is symptomatic of a practice that was possibly widespread and the motive of which can hardly be misunderstood.

According to a tradition preserved by Suidas, the connection between Juno Moneta and the minting of money (to which she has given her name) was more or less of an accident. The Romans, he relates, in their war against Pyrrhus and the Tarentines, found themselves sadly hampered for lack of funds. They asked advice of the goddess of good counsel, who told them

that money would be plentiful enough, if only they wielded their arms with justice. The advice was followed, and it brought fulfilment of the promise. In their gratitude the Romans registered a vow to make the seat of their mint in the temple of their 'Adviser.' Whether this legend contains any substratum of truth, it is impossible to say. But it is not unlikely that it may be correct in so far as it represents the transfer to a temple as a secondary stage. The principles of political economy are not arrived at by intuitive methods, and it may be doubted whether the full significance of the invention of coins was appreciated by those who first struck them. But it cannot have been long before people realized the vital importance of maintaining the integrity of the state issues. And the greater the magnitude of the commercial interests involved, the more strongly would this be brought home to men of all parties.

In the Greek cities civil strife was apt to run to great, sometimes to violent, extremes. But there is no evidence that the public credit was allowed to suffer even in the bitterest of struggles. The existence of plated coins,—that is, coins consisting of a copper core covered with a thin skin of silver,—might be quoted as arguing the prevalence of a certain amount of duplicity. On the other hand, the facts show that the issue of such pieces was part of the recognized system, and that the number minted at one time was never so large as to have an adverse effect on the currency as a whole. It is with the names of autocratic rulers that the great monetary frauds and depreciations of history

¹ Suidas, s.v. Μονήτα.

or tradition are connected,—Polycrates of Samos, Hippias of Athens, Dionysius of Syracuse, Mark Antony, and, of course, certain of the Roman Emperors. It looks as if the public conscience had been sound on the question of tampering with the coinage, which is only another way of saying that men were alive to the dangers involved in such a proceeding and therefore took the necessary precautions against it. It will be recollected that the convention between Phocaea and Mytilene prescribed the death penalty for any magistrate convicted of debasing the quality of the electrum money which the cities were to issue in turn.1 When that was the spirit that prevailed, it is quite likely that the mint and the standards may often have been entrusted, by common consent, to divine protection, a move that, in its turn, would undoubtedly encourage the tendency to use religious types.

How far can we determine the date at which the change we have been discussing took place? It may be at once admitted that no approach to precise accuracy is possible. Still the chronology of the more important series of Greek coins has been sufficiently well ascertained to make it worth while trying to draw some broad conclusions. As we have seen, human heads and figures were excessively rare in the sixth century B.C. On the other hand, the close of that century and the commencement of the one next following mark a distinct epoch. It was about then that the head of Athena began to be placed on the reverse of the Pegasus staters at Corinth. It was about then, too, that a head was introduced as a type at Tarentum,

¹ See supra, p. 14.

to be banished soon afterwards probably as the result of a democratic revolution. This last example is interesting as one of the very few cases where a head, once introduced, failed to take a permanent hold. was succeeded by a seated figure, sometimes supposed to be a representation of the Tarentine democracy. Presently the 'horseman' appeared as a variant, and ere long it entirely displaced the 'seated Demos,' maintaining its position as the obverse type of the ordinary Tarentine didrachms for fully two hundred years. It is only from these, however, that the head is conspicuously absent. On the smaller denominations of silver a head is frequent. On the gold coins and on the 'Campano-Tarentine' didrachms—two classes which do not begin to be issued till after 350 B.C.—it is absolutely regular.

Tarentum, then, was slow to adopt the head. Another notable exception was Acragas. Elsewhere in the west, heads or figures of divinities gain a firm footing, as a rule, in the course of the fifth century B.C. In some cities, such as Naxos, Segesta, and Terina, heads appear even on the earliest coins. Others, like Camarina, begin with the figure of a god or goddess. More usually, as at Metapontum, Himera, and Croton, the original type is an animal or an inanimate object. Always, however, the general trend is towards the introduction of the head, which ultimately became the conventional obverse type. Occasionally the changes seem to take place gradually as at Syracuse. But often the stages can be dated by a political revolution, as at Himera (472 B.C.), Aetna (476 B.C.), Sybaris (443 B.C.), and Camarina (461 B.c.). The coinage of Zancle

furnishes an interesting and instructive illustration of the process.

The oldest type at that city was, it will be remembered, a dolphin lying within the sickle-shaped harbour (Plate v. 11). The first independent device to be placed on the reverse was a scallop shell (Fig. 17). All of the pieces bearing these types are earlier than 493 B.C., when the city was treacherously seized by the Samian and Milesian allies of Anaxilas of Rhegium. As a result of its capture, its name was changed to Messene,





Fig. 17.-ZANCLE: SILVER.

and a complete transformation of its monetary system was effected. First of all, Samian types were employed and then types specially associated with Anaxilas himself. The series of the latter is broken by a very remarkable coin that, from its style, must have been struck about 450 B.C. It is a tetradrachm (Plate v. 12), having on the obverse a figure of Poseidon, standing in front of an altar brandishing a thunderbolt in his right hand. The reverse shows the inscription DANKIAION, and has for type a dolphin in the attitude in which it appears on the oldest coins. There is no attempt to represent the harbour, but beneath the dolphin is a scallop-shell. Mr. A. J. Evans was the first to point out the historical importance of this piece. It indicates

that, about the middle of the fifth century, the Zanclaean elements in the population succeeded for a brief period in regaining their predominance, and that they took advantage of the situation to restore the former name of the town.¹ Naturally, the old coin-types were revived also, but with a significant difference. Dolphin and scallop-shell are placed together on the reverse, leaving the obverse clear for the figure of a divinity.

In the central and eastern parts of Hellas the process of development followed the same lines as in the west, although the rate of advance was perhaps a little more leisurely. In the series of the Macedonian kings, for instance, heads do not become common until the reign of Archelaus I. (413-399 B.c.), although at least one definitely 'religious coin' was struck by his predecessor Perdiccas II.,—a diobol with the head of Heracles on the one side and his club and bow on the other. In Thessaly the ταυροκαθάψια yields its place to a head about 400 B.C., and it is about 400 that the beautiful head of Hera is substituted for the wolf at Argos (Plate ii. 9), and that the heads of Zeus and Hera appear at Elis. In Crete a well-marked change is observable very much about the same period, heads—and especially the heads of Olympian deities—becoming popular at the expense of the earlier mythological subjects. In Asia Minor, too, 400 B.C. may be roughly fixed as an approximate date for the transition. Fifty years later the supremacy of the religious type was an accomplished fact throughout practically the whole Hellenic world.

There is something to be learned from the sharp contrast which the types of Jewish coins present, when

¹ Num. Chron., 1896, pp. 109 ff.

compared with the products of neighbouring mints. Israel and Judah had been carried into captivity before the practice of striking coins had reached the east of the Levant. After the remnant returned from exile, their poverty was great and their commercial enterprise correspondingly small. Besides, they were dependent on Persia, and could not have struck money without the consent of their suzerain. The same conditions prevailed after Alexander's conquest and under the earlier Seleucid kings. Until the reign of Antiochus VII. (Sidetes) they were content to make use of the currency issued by their neighbours. Under the Maccabees, however, national aspirations awoke once more, and a new order of things was inaugurated. Simon obtained from Antiochus the right to coin money with his own dies. He probably struck shekels and half shekels in silver, as well as a token currency of bronze. His successors were restricted to bronze. All the remaining silver coins were minted on one or other of the two occasions when Judaea made her desperate efforts to throw off the yoke of Rome.1

It is characteristic of the whole Jewish series that its types include no representations of animals. Human heads, so common on coins elsewhere, are unknown until the time of the Herods, some of whom place the imperial likeness on their money. Even the Roman procurators who took over the administration of the country after the banishment of Archelaus, refrained from using the portraits of the emperors,—a striking exception to what was customary in the provinces, and

¹ See Th. Reinach's highly interesting general sketch, *Jewish Coins*, (London, 1903).

one that is best explained as the manifestation of a desire to respect a national prejudice. Coin-types of the usual kind would have been regarded as 'graven images,' and the making of them would have meant a breach of the Mosaic Law as interpreted by Pharisaic orthodoxy and by its official exponents, the scribes. We touch here on one of the most difficult questions of Old Testament history. How is the existence of the Second Commandment to be reconciled with such facts as the Brazen Serpent and Jeroboam's Golden Calves? Would no place have been found in the Temple of the Restoration for Solomon's Molten Sea, which rested upon twelve brazen oxen and had the borders between the ledges of its bases decorated with oxen and lions and cherubim, or for the Cherubim that stood within the Holy of Holies and 'spread forth their wings over the Ark'? And what of the figures on the base of the Golden Candlestick as shown on the Arch of Titus? Or of the lion of the tribe of Judah sculptured on the façades of Galilean synagogues?

Such questions make one doubt whether, so far as coin-types are concerned, the prejudice would have operated as powerfully as it actually did, had there not been some special reason why human and animal figures upon coins were looked on as idolatrous. And a special reason lay ready to hand. Long before the rise of the Maccabees the religious character of coin-types had been definitely established. In beginning to strike money the Jews had to take special precautions to guard themselves against the suspicion of idolatry. Hence their rigorous avoidance of all representations that might have fallen under the ban of the Second

Commandment. The types they chose were comparatively colourless, and were sometimes borrowed from the coins issued by their neighbours. It is, however, exceedingly interesting to notice that, after all, even on Jewish coins the religious influence is brought into play, and that through the action of the very cause to which we have conjectured that its first connection with coin-types was due. During the great Revolts national feeling was at fever heat, and national emblems were sometimes placed upon the coins. In Judaea national emblems could not fail to be, to some extent, religious. Accordingly, among the types of the coins of the Revolts we get the Temple, the citron and the two bundles of twigs carried in the Feast of Tabernacles, and the two trumpets that are seen beside the Candlestick on the Arch of Titus,—devices that cannot be called idolatrous and that yet allude in the most pointed manner to the ceremonial of the national religion.

Coming back now to our sketch of the general development of types, we may note that the period to which we assigned the supremacy of the religious influence is also one that marks a momentous epoch in the history of the world. In 350 B.c. the Hellenic period was almost at an end, and Greece was on the threshold of the Hellenistic age. Philip of Macedon was maturing his plans, but he was still north of Thermopylae. The day of the city-state was not yet over, and every state that was free was busy exercising the freemen's privilege of minting money. Types were more varied than they had ever been, although the variety was so far unified by the religious influence

and by the conventions to which the development of that influence gave rise. At the same time the very spirit of Greek religion was itself undergoing a change.1 There were already signs of the near approach of a day when mortal men would be accorded seats in Olympus even in their life-time. Some forty years before this the Thasians had offered to make a god of the stout old Spartan Agesilaus, only to be contemptuously told that, if they wanted him to consider the proposal, they had better begin by making gods of themselves.2 All Spartans, however, had not been so scrupulous. It is said that, after the overthrow of Athens, Lysander accepted divine honours at the hands of the Samians and other Greeks of Asia Minor.3 If the story is authentic, it provides us with the earliest recorded example of the deification of a living man among the Greeks, a practice by which the religious conceptions of Hellenism were destined to be profoundly affected.

It had long been customary to offer sacrifice to departed heroes. This was possibly nothing more than an outcrop of the primitive stratum that underlay the whole mass of Greek ritual and religion. At all events the worship of the dead became the foundation on which the worship of the living was built up. The marvellous success of Alexander the Great's career was

¹ On the whole question now to be discussed I have learned much from E. Kornemann's Zur Geschichte der antiken Herrscherkulte (Beitr. z. alten Gesch., i. 51 ff.)—a very important contribution to the subject.

² Plutarch, Apophthegm. Laced. Ages., xxv.

³ Plutarch, Lysander, xviii.

responsible for much. There is no evidence that his own acceptance of divine honours in his life-time was ever more than half-serious. After his death, however, he became first a hero and then a god, his successors warmly approving. Ptolemy more particularly, with characteristic prudence, did all in his power to encourage the new cult, and greatly strengthened his own position by securing the body of Alexander and converting Alexandria into a sort of Hellenistic Mecca. The only one who stood aside was Antipater, whose share of the Macedonian heritage included no Oriental subjects. He flatly declined to recognize the dead Alexander as a god, on the ground that such a proceeding would amount to impiety.1 Elsewhere events took the course that might have been foreseen. From consecration of a monarch just dead to consecration of his living successor was little more than a step. Demetrius Poliorcetes and Ptolemy were among the earliest to be hailed as gods by cities they had benefited. But it was not until the next generation that the worship of the reigning monarch was formally established as the state religion. This was done almost simultaneously in Syria by Antiochus II. and in Egypt by Ptolemy II.2 In the interval there would seem to have been a transition period, during which some at least of the kings had given a certain amount of official sanction to their own investment with heroic or even divine attributes. The chief evidence for this is furnished by their coins.

¹ Μόνος δὲ τῶν διαδόχων θεὸν καλέσαι 'Αλέξανδρον οὐχ εἴλετο, ἀσεβὲς τοῦτο κρίνας (Suidas s.v. 'Αντίπατρος).

² Kornemann, l.c., pp. 70 ff. and 78 ff.

It may, I think, be safely said that almost till the close of the fourth century B.C. portraits are practically unknown upon money.1 From the sixth century onwards the standard type of the Persian darics had been the figure of the King of Persia, hastening through his dominions with spear and bow, and the same type is repeated on other coins struck within the immediate range of Persian influence. At Tarsus, Mallus, and Soli in Cilicia, and even at Cyzicus and Lampsacus in Mysia, we find the head or seated figure of a Persian satrap before 350 B.C. All such devices are symbolical of Persian rule. In the great majority of cases the heads and figures are certainly conventional, and it is very doubtful whether there is in any of them a suggestion of a real portrait.2 The daric type, for example, remained absolutely unaltered for centuries (Plate vi. 6). On the money issued by the kings of the dynasty that ruled in Sidon before Alexander's invasion, the royal person is also employed as a type, and here there are variations that may contain direct allusions to the triumphs of individual monarchs over particular enemies. Even here, however, it is the majesty of the royal house, not the person of the ruler, that is made the subject of display, and there is no attempt at portraiture. Again, if we turn from the east and glance at the kingdoms that drew their inspiration more directly from Hellas, we find no sign of any types that represent the living ruler. The coins of

¹ The only exception I can recall is the curious head on a Cyzicene stater, which Six would identify with Timotheus (N.C., 1898, pp. 197 ff.; B.M.C., Mysia, Pl. viii. 9).

² See Imhoof-Blumer, Kleinas. Münzen, pp. 470 f.

the early Macedonian kings, of the kings of Cyprus, of the dynasts of Caria, of the monarchs of Epirus, of the Syracusan tyrants down to Agathocles do not give us a single example of a portrait. Heroes we do find as commemorative types on the issues of cities with which they were connected. But heroes were held as half-divine, so that their appearance was in no way inconsistent with the growing demands of religion.

The first historical personage whose portrait can be recognized on coins with absolute certainty is Alexander the Great. This is exactly what we should expect, in view of the fact that he was the first of the Hellenic kings to be deified. He was not, however, officially deified in his life-time, and it was not till after his death that his portrait was used as a type. The correspondence, it will be noted, is exact. Tradition, indeed, has it that Alexander's features are to be discerned in the head of Heracles as shown on the obverse of the tetradrachms that he himself was the first to strike, although their issue, as we have seen, continued long after he was dead (Plate v. 13).1 Even if we grant that this is so, the very circumstance that portraiture was introduced in covert fashion, lurking under the shelter of religion, is highly significant. It is equally significant that the earliest undoubted portraits of the king represent him as divinized. On some of the coins of Ptolemy I. he appears as a sort of Oriental Heracles, the lion's skin being replaced by the skin of an elephant so arranged that the trunk and tusks project above his brow (Plate v. 14). On the money of Lysimachus he figures as the

¹ See *supra*, p. 83.

son of Ammon, wearing the ram's horns as a mark of his divine descent (Plate vi. 1).

When we come to the portraits of living monarchs, we find all the evidence still pointing in the same direction. The earliest examples occur on the coins of the Ptolemies and of the Seleucid kings,—the two royal houses that most quickly and most decidedly adopted the principle of self-deification. From Seleucus Nicator downwards the series of portraits of the Seleucidae is practically complete. Nearly all of them can be certainly identified. In some cases, notably that of Seleucus himself, the head is so treated that the intention of deification is unmistakable. The portraits of the Ptolemaic kings and queens are also very numerous, but owing to special causes their identification is much more difficult. The lead given by Syria and Egypt was quickly followed elsewhere. In all the kingdoms that grew up under the shadow of the Seleucid monarchy—the Pergamene, the Pontic (Plate vi. 2-4), the Bithynian, the Cappadocian,—as well as in those that were actually its offshoots—like the Parthian and the Bactrian (Plate vi. 5)—a portrait was looked on as the natural obverse type for important coins. As will be seen from the Plate, some of these portraits are astonishingly realistic, contrasting strangely with the fixed conventionality of the daric (Plate vi. 6). Similarly, Ptolemy found an imitator in Sicily. In 270 B.C. Hieron of Syracuse assumed the title βασιλεύς and at the same time began to place his portrait on his coins.

How long portraiture and deification went hand in hand it is not possible to say. That the union lasted for a considerable period would seem to be indicated by the phenomena of the Macedonian regal coinage. On some of the pieces struck by Demetrius Poliorcetes after his great naval victory over Ptolemy in 306 B.C., his own head is used as a type. He is represented with bull's horns as a sign of his divinity, and we are thus reminded that in the year 307 he and his father Antigonus had been hailed by the Athenians as $\theta \epsilon o i = \sigma \omega \tau \hat{\eta} \rho \epsilon s$, and had had a special priesthood instituted to maintain their cult.1 With this exception, however, portraiture made headway on the Macedonian coinage much more slowly than it did further east. Nearly a century has to elapse before we find a definite portrait, for Philip V. (220-179 B.C.) was the first king to make 'image' and 'superscription' agree. The attitude of Antipater to the deification of Alexander may well have been characteristic of the European, as contrasted with the Oriental, way of looking at the whole matter. If so, the rarity of portraits on the royal issues of Macedon is easily accounted for.

The opposition (if we are right in supposing that it existed) must have been broken down by Philip's time. And it is a remarkable coincidence that it was in his reign and in what had been his dominions that there was struck the first coin that bore the head of a living Roman. This was a gold stater minted in Greece by Titus Quinctius Flamininus, the famous general who shattered Philip's power at Cynoscephalae (Plate vi. 7). On its obverse is the head of Flamininus, and on the reverse a figure of Victory modelled on one of the types of Alexander the Great. Here once more the

¹ Plutarch, Demetrius, x.; Diodorus, xx. 46.

evidence of deification is of the clearest. Plutarch tells, for instance, how the people of Chalcis made a god of the living Flamininus, ranking him with Heracles and Apollo, and appointing a priest to superintend his ritual. He quotes the refrain of an ode chanted at the sacrifices in his honour:

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μέλπετε κούραι
Ζήνα μέγαν 'Ρώμαν τε Τίτον θ' ἄμα 'Ρωμαίων τε πίστιν.
ἐήϊε Παιάν, ὧ Τίτε σῶτερ.
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Flamininus himself did not look on all this as idle flattery. He applies the epithet $\theta \hat{eios}$ to his own name in the inscription he attached to the gold crown dedicated to Apollo.¹ There can be little doubt, then, but that his exercise of the right of portraiture affords a fresh illustration of the connection between that right and deification.² The mention of the stater of Flamininus would naturally provide a fitting opportunity for passing on to the consideration of the coinage of the Romans and its types. But it will be more convenient to anticipate a little, and to follow the story of Greek coinage to its end before touching at all on that of Rome.

It has already been stated that the privilege of striking money was highly esteemed in the ancient world as a visible token of freedom. The Persian monarchs appear to have allowed the Greek cities under their suzerainty a certain amount of liberty in

¹ See Plutarch, Titus, xii.

² Burgon seems to have been the first to draw attention to this (Num. Journal, i. p. 125).

this respect. The right of coining gold was usually reserved for the sovereign power, but the vassal-states were often permitted to mint in silver. It was otherwise under Alexander the Great. He inaugurated an epoch of greater restriction. The Ptolemies seem to have left a large measure of autonomy to the cities of Asia Minor that were brought under their control. But, with this exception, the policy of Alexander was generally adopted by his successors. As a consequence the number of active mints in Asia Minor decreased very markedly in the third century The silver currency, and such gold as was required, were supplied by the coins of the various regal series. It should be observed, however, that these were not struck entirely at the different capitals. The symbols show that many of them were issued, as it were, by the cities themselves. We have no means of knowing what the conditions of issue were, but in any event the royal authority was adequately conserved by the use of the royal types, notably the king's own portrait.

Under the influence of this system, the natural tendency was towards uniformity. And the uniformity carried with it certain obvious advantages from the point of view of convenience of commercial intercourse. An interesting reaction towards variety was prompted by the political change that transferred the balance of power in Asia Minor to the hands of Rome. After the defeat of Antiochus the Great at Magnesia in 190 B.c. the Romans granted a larger autonomy to the cities they liberated from Seleucid domination. In our opening lecture we had occasion to refer to this and to

the consequent revival of monetary activity.¹ The interesting point to notice now is that, in nearly every case, the type that replaces the royal portrait on the obverse is the head of the patron god or goddess of the city. It is as if the first opportunity had been seized to degrade the king from the position he had usurped, and to restore in his stead the true divinity.²

The revival just spoken of was but temporary. As the hold of Rome over her subjects grew firmer, the privilege of minting money was more and more sparingly accorded. Only in one or two very exceptional cases was the striking of gold permitted. In regard to silver there was less strictness; but, as we approach the end of the Republican era, there is a steady diminution in the number of favoured cities and princes. It was only natural that the issue of bronze should be sanctioned much more readily. Even here, however, a special grant would appear to have been necessary. Without entering into details, we may say that in Italy, and in the West generally, the restrictions were very rigidly enforced. Within this part of the Roman dominions the cessation of autonomous local coinages was almost complete by the time of Julius In the East the needs of the population were greater, and the distance from the centre of gravity was more considerable. Consequently the resources of the Roman mint were hardly adequate to cope with the demand. That is no doubt the reason why the silver issues of certain states and vassal kings were allowed to

¹ See supra, p. 11.

² On this point see Pick, Die tempeltragenden Gottheiten, etc., p. 40 (Jahreshefte, vii.).

continue so long, and why in some districts a local coinage was organized under Roman supervision. A special system of this kind is found, for instance, in Macedonia after 146 B.C., while in the Province of Asia the cistophori—quasi-federal coins which the Romans did not interfere with when they took over the government—were ultimately converted into an official currency, and continued to be struck as such down to the middle of the first century B.C.

Matters, then, moved more slowly in the East. Move, however, they did, and always in the direction of making the money of Rome the money of the civilized world. The full story does not immediately concern us, because the process of decay did not sensibly affect the development of types. It is otherwise with the results of the change that Augustus introduced when he ordained that Roman weights, measures and coins were to be legal standards in all transactions within the bounds of the empire. It is from his reign that we must date the revival to which we owe the very important series known as 'Greek Imperial.' With the circumstances attending the issue of these coins we are but imperfectly acquainted. the facts are sufficient to admit of several inferences being drawn. The bronze pieces (I propose to leave the silver out of account meanwhile, seeing that it can be dealt with more appropriately in connection with the Roman coinage proper) are chiefly of two kindsimperial coins strictly so called, as having on the obverse the head of a member of the imperial family, and pseudo-autonomous coins, that is, pieces whose types make no direct allusion to the sovereignty of the

emperor. An intermediate class, struck almost entirely in the Senatorial Province of Asia, have on the obverse a personification of the Senate or of Rome. With some notable exceptions, as at Cyzicus, coins belonging to the pseudo-autonomous and to the intermediate classes are of smaller module and lighter weight than the others. It would seem that an imperial head was considered more appropriate for the larger denominations.

The first conclusion suggested by a survey of the available material is that the issue of a local bronze currency under the empire depended upon a privilege granted either by the emperor himself or by the provincial governor. On no other supposition is it possible to account satisfactorily for the exceptional activity displayed in particular districts under different emperorsin Lydia under Trajan, in the Peloponnesus under Septimius Severus and his family, in Lycia under Gordian III. The case of Athens is specially significant. The mint there was idle from the time of Sulla 1 until the second century A.D. Then all at once, in the reign of Hadrian, bronze begins to be minted freely, a phenomenon that is admirably consistent with Hadrian's wellknown enthusiasm for the city. And there is another point. All of these Athenian coins are pseudo-autonomous. The emperor's head is never employed as a type. This, taken in conjunction with similar indications at other towns, appears to show that local authorities attached a sentimental value to the right of striking pseudo-autonomous, as distinct from

¹ This is Head's view. Köhler and others have held that tetradrachms were issued until almost the beginning of the imperial epoch.

imperial, money, and also that the granting of that right was an exercise of special favour. Cyzicus and Smyrna may be noted in passing as instances of cities where the pseudo-autonomous element bulks largely in the coinage of imperial times.

A second conclusion is that the local issues of the imperial age were, in many cases at least, commemorative in their character. They were minted on some definite occasion—the opening of a new temple, the inauguration of an entente cordiale between two cities, the holding of a festival, the celebration of games. This is amply proved by the occurrence of inscriptions like ΣΜΥΡΝΑΙΩΝ ΚΑΙ ΕΦΕΣΙΩΝ ΟΜΟΝΟΙΑ, and of the names of festivals like ΑΚΤΙΑ ΠΥΘΙΑ, ΑΓΙΑ ΙΕΡΑ ΣΕΒΑΣΜΙΑ and many others. Even where the inscription contains no such direct reference, the occasion may often have been a special one. Thus, at Soli-Pompeiopolis in Cilicia the year 229 of the city (163-164 A.D.) gave birth to a remarkable group of coins doubtless struck in connection with some noteworthy event.1 Again, an examination of the small and insignificantlooking pseudo-autonomous pieces of Antioch on the Orontes has recently revealed the fact that the most interesting of the series they comprise was issued in the year of Hadrian's visit to the town.2 One benefit that followed in the train of Roman rule was a great increase in the facilities for communication between city and city. This in its turn must have helped to stimulate the development of local gatherings. We may suppose that at such times an excessive

¹ See Imhoof-Blumer, J.H.S., xviii. pp. 166 ff.

² Num. Chron., 1904, pp. 126 ff.

strain was imposed upon the limits of the normal currency, so that the relief afforded by an extra issue would be appreciable. It has also been suggested that those coins which are inscribed with the name of a particular festival, were minted to be given as prizes to successful competitors in the contests. I doubt whether this suggestion has much to commend it. It is more likely that they may have been sometimes distributed as largesse among the attendant crowds, and that visitors from a distance may have been meant to carry them away as souvenirs. Cases are on record where Greek imperial bronze pieces of large size have been discovered hundreds of miles away from the spot where they were minted. They could not possibly have travelled so far in the ordinary course of trade.

In confirmation of the view just stated we can point to a third general conclusion. The provision of the special issues was not infrequently an act of private munificence. This inference is fully justified by inscriptions such as ΘΕΥΔΙΑΝΟΟ CTΡΑΤηγὸς ΑΝΕΘΗΚΕ CΜΥΡΝΑΙΟΙΟ, ΙΕΡωΝΥΜΟΟ ΑΝΕΘΗΚΕ ΚΥΜΑΙΟΙς, ΟCΤΙΛΙΟΟ ΜΑΡ-ΚΕΛΛΟΟ Ο ΙΕΡΕΥΟ ΤΟΥ ΑΝΤΙΝΟΟΥ ΤΟΙΟ ΑΧΑΙΟΙΟ ΑΝΕΘΗΚΕΝ, and the like. Usually it is a magistrate who is the donor. In at least one instance, at Attuda in Caria, it is a woman—10Υλία Κλανδία ΚΛΑΥΔΙΑΝΗ ΑΝΕΘΗΚΕΥ¹, while at Siblia in Phrygia we seem to have husband and wife responsible for a joint gift, the inscription being ΠΑΡΑ ΜΗΝΟΔΟΤΟΥ ΚΑΙ ΑΙΛΙΑΝΗΟ.²

¹ Mionnet, Suppl., vii. p. 522, No. 206. I have had no opportunity of verifying the reading.

² Cf. Imhoof-Blumer, Griech. Münzen, p. 223 (747), No. 738.

PLATE VI. In confirmation we view just stated see rages po

[] I, ;	Withfallales IV. (250-190 b.c.) (511-0.)	152 152 S
Sol.	Pharhaces I. (190-157 B.C.) Silver, 310 act 201	Pri 1521 1
4.	Mithradates VI. (121-63 B.C.): gold, have here	152
è	Antimachus I. of Bactria (third century B.C.): silver	, 152

- 6. Persian 'Daric' (fourth century B.C.): gold, 40, 150, 152 N 7. Flamininus (circa 196-190 B.C.): gold, 100, 100, 1530
- 8. Colophon (Trebonianus Gallus): bronze, NOOY
 9. Ephesus (Antoninus Pius): bronze, 167 AX
 10. Caesarea Cappadociae (Geta): bronze, 119
 18. a 168
- FII. Caesarea Cappadociae (Macrinus): bronze, instar- 168 A 12. Sagalassus (Claudius II.): bronze, 170 13. Apameia Phrygiae (Sept. Severus): bronze, 171
- 14. Smyrna (Philippus Senior) : bronze, a of veat we 172 to 15. Ilium (Commodus): bronze, 15. Ilium (Caracalla): bronze, 173 1ft 17. Illum (Sept. Severus) Albronze, HNGAOTOV KAI 173

3 Williams North with more No and Thave had no



At Diocaesarea-Sepphoris we get an imperial donor, —TPAIANO Σ AVTOKPAT Ω P E $\Delta\Omega$ KEN.

Other interesting facts will probably become apparent when it is possible to make a complete classification and a careful study of the whole body of inscriptions. Thus, the argument for the existence of an imperial commission is greatly strengthened by the remarkable legend POΔIOI YΠΕΡ ΤωΝ CEBACTWN on bronze didrachms of Rhodes, with the head of Helios and a figure of Victory as types. Again, it sometimes seems as if the cost of an issue had been divided between a magistrate and the public purse. There are, for instance, coins of Pergamum having on the obverse Augustus in his temple, with the legend ΣΕΒΑΣΤΟΝ ΔΗΜΟΦΩΝ, and on the reverse M. Plautius Silvanus (proconsul of Asia in the year 4-5 A.D.) being crowned by the Demos of Pergamum, the inscription in the latter case being ΣΙΛΒΑΝΟΝ ΠΕΡΓΑΜΗΝΟΙ. In all likelihood the verb to be understood is ετίμησεν in the one case and ἐτίμησαν in the other. Do these inscriptions refer to the types? Or do they imply that Demophon and the Pergamenes contributed jointly to the issue, the former to honour the Emperor, the latter to honour the proconsul? And there are many other questions that might be asked. Why is IEPA CYFKAHTOC invariably in the nominative and GEON or GEAN CYFKAHTON almost as invariably in the accusative, even on contemporary coins of the same town, while ΘΕΑ PWMH and ΘΕΑΝ PWMHN seem to be used indifferently? The name attached to the imperial likeness is generally put in the nominative, although the accusative occurs fairly frequently, the dative rarely, and the genitive more rarely still. That such slight variations may have a real significance is plainly shown, I think, by the imperial coinage of Agrippa II., which was struck in three denominations during the reign of Vespasian. The highest denomination has the head of Vespasian himself on the obverse, the intermediate denomination has the head of Titus, and the lowest that of Domitian. The Emperor's own name is in the dative, those of his sons are in the nominative.

Lastly, there are a great many inscriptions which testify emphatically to the commemorative nature of particular series. Local patriotism leads neighbouring cities to vie with each other in the extravagance of the titles they parade, and one is occasionally irresistibly reminded of the methods of the American advertiser. Anazarbus, for example, describes the games celebrated in honour of Elagabalus as "the biggest show on earth "-ΠΡΩΤΑ ΤΗΟ ΟΙΚΟΥΜΕΝΗΟ, and revels in applying to herself such epithets as πρώτη, μεγίστη, καλλίστη, epithets, by the way, which she borrows from the coins of Tarsus. Then there are sentences that anticipate the mottoes we shall find at a later period. Thus, at Nicaea and at Caesarea in Cappadocia we get ΚΟΜΟΔΟΥ ΒΑΣΙΛΕΥΟΝΤΟΣ Ο ΚΟΣΜΟΣ EYTYXEI ('Commodus is emperor and so the whole world is happy '), and at Cius we have ΣΕΥΗΡΟΥ ΒΑΣΙΛΕΥΟΝΤΟΣ Ο ΚΟΣΜΟΣ ΕΥΤΥΧΕΙ ΜΑΚΑΡΙΟΙ ΚΙΑΝΟΙ ('Severus is emperor and so the whole world is happy. Blessed indeed are the people of Cius'). At

¹ See Greek Coins in the Hunterian Collection, vol. iii., p. 291, footnote.

Caesarea, at Pautalia in Thrace, and at Tarsus εια AΙωΝΑ ΤΟΥΟ ΚΥΡΙΟΥΟ is an echo of the formal acclamatio that bade the emperors live for ever.¹

It must not, however, be forgotten that it is with the types that our main concern lies. These reflect very clearly the circumstances under which the issues were made. The imperial head we shall deal with in next lecture. Setting it aside, and also personifications like the Senate and the Boule, the popularity of which is undoubtedly due to Roman influence, we may say broadly that the most striking feature of the rest is their commemorative character. The subjects, it is true, are often religious, but that is simply because the events to be commemorated were often of the nature of religious celebrations. The variety is so extraordinary that only the most general analysis can be attempted. Before we enter upon it, it is worth observing that the decay in artistic originality and skill affected not only the style of execution but also the choice of devices. It now became far more usual than it had ever been to copy actual objects.

The tendency just indicated was one reason why there is so marked an increase in the number of architectural types in the imperial age. But there was another. Gatherings at temple festivals were a common occasion for issues. No types would then be more suitable for commemorative purposes than representations of the temple concerned or of the statue of the divinity to whom it was consecrated. At Sebastopolis-Heracleopolis in Pontus by far the largest number of coins can be assigned to a single year (206 A.D.). A

¹ See Pick, Journ. Intern., i., pp. 455 ff.

few show a conventional figure of Tyche. The whole of the rest allude to the worship of Heracles, the god being frequently shown standing in a temple. Hence Dr. Imhoof-Blumer has concluded that, in the year referred to, there had been a festival held to celebrate the consecration, or the restoration, of the building we see on the coins.1 A similar inference is suggested by the Ephesian coin of Elagabalus which has as its reverse type four distyle temples, accompanied by the inscription ΔΟΓΜΑΤΙ CVNΚΛΗΤΟΥ ΕΦΕCIΩΝ ΟΥΤΟΙ ΝΑΟΙ ('These temples [were erected] in accordance with a decree of the Ephesian Senate'). A great group of architectural representations, which has recently been made the subject of an illuminating investigation,2 centres round the provincial worship of the emperors, with special reference to the 'Neocorate.' The coins concerned come entirely from Asia Minor. But the very scanty imperial issues of the Western part of the Empire provide a close parallel in the altar of Roma and Augustus at Lyons.

In the case of the 'Neocorate' pieces the city goddess is very frequently shown, seated or standing, with the temple of the emperor in her hand. Personifications of the Tyche or patron divinity of the city are, indeed, among the commonest of imperial types, and it would be difficult to imagine a more obvious local symbol. Such figures are, of course, specially well adapted for 'alliance coins,' where cities are shown shaking hands

¹ Griech. Münzen, p. 56 (580).

² Prof. B. Pick, Die tempeltragenden Gottheiten und die Darstellung der Neokorie auf den Münzen (Jahreshefte des Oesterreichischen Arch. Institutes, Bd. vii. 1904.).

or offering joint-sacrifice. But their use was by no means limited to alliance coins. It will suffice to recall the extraordinary popularity of the seated Tyche of Antioch, with the river-god Orontes swimming at her feet. This type, which was imitated over and over again elsewhere in the East, was itself a copy of a famous statue by Eutychides of Sicyon, one of the pupils of Lysippus. It is safe to say that many of the other personifications of towns were also modelled on works of sculpture.

Occasionally we meet with types that reproduce in the most direct fashion the actual ceremonies at festivals. Sacrifices, for example, occur with great frequency. Again, at Byzantium we have the strange-looking objects that were long supposed to be fish-baskets, but are now proved to be huge wicker-torches used in connection with the worship of Artemis Lampadephoros or Hecate. At Cyzicus an interesting type shows us an elaborate bonfire in process of erection. On a coin of Colophon we see, in the upper part of the field, a temple within which is a statue of Apollo, holding a lyre; beneath it is a bull, advancing towards a flaming altar, plainly symbolical of a sacrifice; lower down still, in a semicircle facing the temple, are thirteen female figures, each holding a wreath in her raised hand. The legend TO KOINON IΩNΩN puts it beyond question that this is a representation of the festival held in honour of Apollo by the thirteen cities of the Ionian League (Plate vi. 8). As we have indicated, games formed an important element in such gatherings. Contrary to what might be expected, attempts to delineate

the contests are rare.¹ We get wrestlers sometimes, chariot-races or gladiators hardly ever. The difficulty of subjects of the kind probably acted as a deterrent, for art had by this time sunk to a very low level. At all events, when athletes do appear, they are usually in an attitude where no suggestion of violent activity is required—drawing lots perhaps, or receiving the prizes they have won. A favourite type is an exhibition of the prizes themselves, generally laid out upon a table.

Architectural types are not confined to temples. One ambitious engraver, at Bizya in Thrace, presents us with a view of the whole town (Plate viii. 10).² The leading feature is the city wall with its towers and gates, but in the interior it is possible to discern temples, baths, and statues. There are also coins of Bizya showing simply the principal gate, a variety of device that occurs fairly often in Thrace. It is found in other districts too, and is probably always, as at Bizya, a shorthand sign for the whole city. A good example from Gangra in Paphlagonia has a curiously modern look, although it belongs to the reign of Caracalla (Plate vii. 3). The double gateway is flanked with

¹ An exception that proves the rule is the curiously unsuccessful representation on a coin of Gallienus struck at Synnada.

²This piece (now in Berlin) was formerly in the collection of Herr Loebbecke, to whose kindness I am indebted for the cast. He described the type at some length in Z.f.N., xxi. pp. 254 ff. It is interesting to note that the coin, which is in fine condition, was found near Rome. It thus provides an illustration of the remark made above (p. 160) as to the discovery of such 'medallions' at a distance from the city of their origin; for other examples see Pick, Num. Zeit., xxiii. pp. 84 ff.

square towers, each crowned by a row of battlements. Sometimes a characteristic 'bit' of the interior of a city is chosen for representation—the Acropolis at Athens, the Acrocorinthus at Corinth, or the bridge over the Maeander at Antiochia in Caria. The type last mentioned is particularly interesting (Plate vii. 2). The bridge has six arches, and it is approached by way of a triple gate. While the waters of the river rush tumultuously beneath, the river-god is seen reclining calmly above.

The river-god reminds us of the site of the town. This is a form of commemoration which was highly popular in imperial times just as it had been in Sicily in the fifth century B.c.¹ It is very common, for instance, in the same part of Thrace as the city-gate. At Pautalia we have the Strymon surrounded by four children, BOTPYC, CTAXYC, XPYCOC and APFYPOC-Vine, Corn, Gold, and Silver. At Laodicea in Phrygia the rivers Kapros and Lycos are represented by a boar and a wolf, a rare example of the tendency that had once found expression in types parlants. Mountains, too, occur with great frequency. In some cases the hill itself is pictured—the twin peaks of Mount Gerizim at Neapolis, or (most notable of all) the Mons Argaeus at Caesarea in Cappadocia. More often, however, it is personified, as is Mount Rhodope at Philippopolis, the gender of the name always determining the sex of the personification.2 One of the quaintest examples is Mount Peion at Ephesus. In the centre of the field of the coin (Plate vi. 9) is a rock, on which sits Zevs

¹ See supra, pp. 92 ff.

² Pick, Die antiken Münzen Nordgriechenlands, I. i. 342, footnote 5.

Ύέτως (Jupiter Pluvius) enthroned. He holds a thunderbolt in his left hand, while from his right a shower of rain descends upon the head of the recumbent divinity of the mountain. Here the allusion is, in all probability, more than merely geographical. So complex and uncommon a design looks as if it were meant for a special occasion. Mountains, of course, were often the objects of a regular cult. Argaeus, already referred to, was-in the words of Maximus of Tyre 1—őρος Καππαδόκαις, καὶ θεὸς, καὶ ὅρκος καὶ ἄγαλμα. And the description is fully borne out by the types of the coins of Caesarea. From these we may conclude that a temple of the god stood at the foot of the mountain (Plate vi. 11). One example shows through the portals of a temple a model of the hill set up as an object of veneration, an idea that is more usually and more simply expressed by the representation of an altar surmounted by such an 'agalma' (Plate vi. 10).

It is not, however, in the least necessary to suppose that the types where the Mons Argaeus appears, were associated with any special festivals of the god. They occur on the silver coins which, as we shall learn in the course of next lecture, were struck to supplement the ordinary Roman currency of the empire. It is best to regard them as illustrations of that aspect of the commemorative influence to which religion owed its first foothold among cointypes. Like the great mountain itself, which towered above the plain to a height of more than 13,000

¹ Diss., viii. 8.

feet, the cult of Argaeus dominated Caesarea in a way that rendered its emblems peculiarly appropriate as local symbols. A similar explanation probably holds good of many other religious types in the imperial series. Cases in point are those which reproduce cultus-statues, like the Artemis Ephesia or the Artemis Pergaia, or fetishes, like the sacred stone of Elagabal at Emisa. The great altar at Amasia, with the tree beside it, is another type which falls into the same category.

To return to copies of statues, it will be evident that various motives for their selection are conceivable, and that in particular cases we must often be content to remain in doubt as to which of these was really effective. When on a coin of Amastris in Paphlagonia, struck under Antoninus Pius, we get an equestrian statue of Marcus Aurelius with the inscription M AYPHAION KAICAPA AMACTPIANOI, we are justified in suggesting that the coin bearing it may have been issued in connection with a dedicatory festival. On the other hand, where the same statues are represented repeatedly and at different periods, no such suggestion can possibly be entertained. We must then conclude that their selection, if not due to their association with the leading local divinity, has been determined by their reputation as art treasures or by the fact that they represent local heroes or celebrities.

This latter alternative is the one that must, as a rule, be adopted with reference to the reproductions of sculpture on imperial coins struck in Greece Proper. Under the emperors Greece lived largely on her

¹ Greek Coins in the Hunterian Collection, vol. ii. Plate xlv., 12.

artistic reputation; and, where the privilege of striking money was enjoyed, the most ordinary type was some local monument of sculpture or of architecture. In this respect the issues of Corinth and of Athens are most remarkable for their variety, but the same principle was followed by the less important centres. A wealth of detailed illustrations has been gathered by Imhoof and Gardner in their Numismatic Commentary on Pausanias. It is not necessary to enlarge on the value of types of this sort for the history of sculpture. But, as a proof of the universality of the tendency, it may be pointed out that the not very abundant coinage of Sicily in the Roman period has preserved for us at Assorus, Enna, Himera, and Syracuse copies of statues to whose fame Cicero testifies in the Verrine Orations.

To the many cases where knowledge derived from literary sources enables us to identify types as copies of statues, we may add a few where, as in the example from Amastris quoted above, the evidence of the inscription is convincing. The most conspicuous of these is AIA IAAION IAIEIC at Ilium. In a much larger number of instances we may argue back to a sculptured original, whether relief or statue, through the pose or grouping of the figures. Amongst these I should be inclined to class a very interesting but somewhat puzzling type which appears at Sagalassus in Pisidia as late as the reign of Claudius II. A horseman, spear in hand, charges furiously on an infantry soldier who, half turning to fly, seems to raise his hand in vain supplication to a divinity, probably Zeus, who is standing in the background (Plate

vi. 12). A clue to the meaning is given by the legend AΛεΞΑΝΔΡΟC, for we know that Sagalassus was captured by Alexander the Great. But the exact interpretation is doubtful. The execution is remarkably good for the period. Even so, however, it is difficult to credit any engraver of the end of the third century A.D. with the creative talent that the whole design implies.

Paintings were copied as well as statues. The rescue of Andromeda by Perseus on a coin of Deultum in Thrace has been shown to correspond in detail with a Pompeian fresco, both no doubt being based ultimately on a common original. Such a discovery is, of course, exceptional. In the nature of things we are left largely to conjecture in attempting to identify types copied from paintings. We have little to guide us except the character of the subject and the method of treatment. A certain case is a coin of the Phrygian Apameia which represents Athena seated on a rock playing the double-flute, with the astonished Marsyas in the background (Plate vi. 13). At the foot of the rock is a pool in which the head of the goddess is mirrored, a feature that only a painter would have introduced into a composition. Kindred examples are, at Perinthus and elsewhere, the sleeping Ariadne surprised by Dionysus and his train,—a favourite subject on the wall-paintings at Pompeii; at Daldis in Lydia, Perseus slaying the three Gorgon sisters as they lie under a tree spell-bound by Sleep, whose winged figure hovers above them in the air in a manner impossible in sculpture; and, at Smyrna, the dream of Alexander the Great. In the last instance

(Plate vi. 14), Alexander has laid aside his helmet and is reclining in slumber beneath a plane tree, his head resting on his shield; the two Nemeses can be seen in the background just as they appeared to the king in his vision as described by Pausanias.¹

The story of the dream of Alexander was closely connected with the rebuilding of Smyrna, and we are thus brought back to the local legend, which we found hundreds of years before at Cyrene,2 and which is exceedingly common in imperial times. Sometimes, even when a name is affixed, we can only guess vaguely at the purport of the representation, the legend it embodies being unknown to us from any other source. In many cases, however, a schoolboy would find himself at home at once. On a coin of Bizya in Thrace Capaneus rushes forward with a scaling ladder to storm the walls of Thebes, while at Anchialus a pendant type shows Zeus defending the city against the impious onset. At Abydus we have Leander battling with the waves of the Hellespont; Hero stands in her tower holding a lamp over the waters, while a flying Love guides the swimmer with a touch. The same subject occurs also at Sestos. Ilium furnishes a series of quite exceptional interest. Very possibly, as has been suggested, they are the reflection of a group of actual monuments preserved within the city.3 For the most part, they represent the exploits of the Trojan heroes of the siege, and some are inspired

¹ vii. 5, 2 f. The original may, of course, be a relief.

² See supra, p. 107.

³ Kubitschek, Jahreshefte, i. pp. 184 ff. Cf. Von Fritze in Dörpfeld's Troja und Ilion, pp. 533 f.

directly by the *Iliad*,—Hector fighting from his chariot (Plate vi. 15), or dashing forward on foot with a burning brand to fire the Grecian ships (Plate vi. 16). Perhaps the most striking is the type dealing with the death of Patroclus (Plate vi. 17). Hector stands with his left foot planted on the dead man's body, out of which he is drawing his spear. As Head pointed out in publishing the coin, the artist must have had Homer's lines clearly in his mind:

ὧς ἄρα φωνήσας δόρυ χάλκεον ἐξ ὡτειλῆς εἴρυσε, λὰξ προσβάς, τὸν δ' ὕπτιον ὧσ' ἀπὸ δουρός. 2

The whole series recalls the sight that met the wondering gaze of Aeneas at Carthage:

'videt Iliacas ex ordine pugnas Bellaque jam fama totum volgata per orbem.'3

It is curious, by the way, to note that we may perhaps trace a reminiscence of this very passage of Virgil among other interesting types at Tyre. Plate vii. I shows us the scene where Dido moves majestically among her workmen, superintending the building of her new city:

'Talis erat Dido, talem se laeta ferebat Per medios, instans operi regnisque futuris.'

As a last illustration of the local legend we may take one of the most frequently discussed of all cointypes.⁴ On at least three separate occasions in the

¹ Num. Chron., 1868, p. 326.

² Iliad, xvi. 862 f.

³ Aeneid, i. 456 f.

⁴ Two of the most recent articles dealing with the subject are Th. Reinach, L'Histoire par les Monnaies, pp. 15 ff., and E. J. Pilcher, Proceedings of the Society of Biblical Archaeology, 1903, pp. 250 ff.

first half of the third century A.D. there were struck at the Phrygian Apameia (Apameia $K\iota\beta\omega\tau\delta$ s) large bronze pieces, having on the reverse a representation of Noah's Deluge (Fig. 18). Two figures, a man



Fig. 18.—Apameia: Bronze.

and a woman, are visible within a chest, on the top of the open lid of which a raven is seated. Another bird, the dove of course, is flying towards the ark with an olive-branch in its claws. By a naive device, not unfamiliar at various periods in the history of art, a second scene from the same story is pictured in close proximity to the first. The man and woman have quitted their chest, and are standing on dry land uplifting their arms in gratitude to Heaven for their deliverance. The execution is not above the level of mediocrity. As a matter of fact, we might have been in some doubt as to what it all meant, but for the key supplied by the legend NOE writ large across the front of the ark.

This is but one of many instances where we have reason to be grateful that the custom of adding explanatory titles was so prevalent in the imperial age. It is specially useful in enabling us to identify

the portraits of local celebrities. These appear occasionally as early as the second century B.C., but they do not become really frequent until the time of the empire. They are the legitimate descendants of the representations of founders and mythical heroes which, it will be remembered, occur as far back as the fifth century, and, like them, they are often copies of statues erected by cities to their great men of the past. No type of this kind is so popular as the head or the seated figure of Homer, one or other of which is found at no fewer than ten cities, while what was perhaps the commonest of bronze coins at Smyrna took the name of 'Ομήρειον from the type.¹ Other poets who are honoured in like fashion are Stesichorus at Himera, Sappho and Alcaeus at Mytilene, Anacreon at Teos, Arion at Methymna, and Aratus at Soli-Pompeiopolis. Of historians we get Herodotus Halicarnassus and Theophanes at Mytilene; philosophers, Pittacus at Mytilene, Bias at Priene, Pythagoras at Samos, Heracleitus at Ephesus, and Anaxagoras at Clazomenae; of physicians, Xenophon and Hippocrates at Cos.2 It will be observed that the great majority of the towns just enumerated lie within a comparatively limited area. Lesbos was the chief centre of the practice, and there we find the privilege of representation on coins extended so as to include citizens who cannot have been of more than local reputation.3

¹ Strabo, xiv. 646.

² See Bürchner, Z.f.N., ix. pp. 109 ff.

³ For lists see Wroth, B.M.C., Troas, pp. 1xx. ff., and Imhoof-Blumer, Z.f.N., xx. p. 286.

The only remaining variety of reverse type that calls for mention is that which alludes to the reigning emperor or his achievements. As might be anticipated, examples occur in various districts. On the whole, perhaps, they are less common than one would expect. Probably it was felt that there was not much reason why they should be introduced in specifically local issues, unless, indeed, the emperor visited the town in person or conferred some signal benefit upon it. The sojourn of Caracalla at Pergamum in 214 A.D. was the occasion of the issue of a group of very large coins, which portray subjects like the Emperor's arrival, his sacrifice to Asclepios, and so forth. Conventional types such as the emperor standing before an altar, or charging on horseback at a lion or a prostrate foeman, are by no means infrequent at many towns. It is quite likely that such devices often refer to definite victories, over which the populace would be expected to rejoice. The main interest they have for us here is the analogy they present to certain of the types of the Roman series itself, a series which will occupy our attention during the whole of the next lecture.

PLATE VII.

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LECTURE V.

THE Roman coinage was a direct descendant of the Greek. But it rapidly developed such well-marked characteristics of its own that it is advisable to discuss it as a separate entity. The evolution of its types cannot be properly understood without some knowledge of its history. I propose, therefore, to begin by indicating briefly a few of the more important landmarks. In an earlier lecture¹ mention was made of aes rude, the unmarked lumps of copper formed the oldest metallic medium of exchange among the Romans, and also of aes signatum, the stamped bars that constituted the next stage and that probably continued to be employed for some time after coins proper had been introduced into the national economy. It was about the middle of the fourth century B.C. that this last step was taken. The fact that copper was still the standard led to the minting of coins so large that they had to be cast, not struck. to the operation of various causes they decreased in weight and size until they became sufficiently small

¹ See supra, pp. 28 ff.

to admit of their being produced in the ordinary way. Silver was first issued in 268 B.C., the highest denomination being the denarius, which was equivalent to 10 copper asses. The story of the various reductions of the standard is too difficult and complex to enter upon here. The cardinal points for us to notice are that after 268 B.C. the minting of silver tended to die out everywhere else in Italy, and that after the passing of the Lex Plautia Papiria in 89 B.C. the Italian towns were not permitted to strike even bronze. In 74 B.C. the Roman bronze issues themselves ceased, and they were not resumed, except very spasmodically, until after the definite establishment of the empire. So far no gold at all had been struck.

Hitherto we have been speaking exclusively of the state coinage-money issued in the name of the central authority. This central authority could, however, delegate its functions. The military imperium, which played so important a part in the constitutional development of Rome was, in fact, such a delegation, for amongst other things it transferred to the magistrate who held it supreme control over the finances of the armies he might raise or might have at his disposal. It naturally followed that he was empowered to strike money in his own right when the exigencies of a campaign should demand it. The gold coin struck by Flamininus in Greece in the beginning of the second century B.C. is an example of this military coinage, for there is no doubt that, although the state restricted itself to silver and copper, there was no such limitation imposed upon an imperator. The stater of Flamininus was on the Attic standard, thus conforming to the

custom practically universal in the East. More interesting economically are the gold pieces struck some twenty years earlier in Southern Italy. They have the legend ROMA, but they are not, therefore, to be looked upon as state issues. They bear marks of value which give an exceptional ratio between gold and silver, indicating that they were minted in a period of financial stringency, possibly at some crisis in the course of the struggle with Hannibal.¹

It is not, however, until the first century B.c. that we find an imperator exercising his privilege on a really extensive scale. Sulla during his Eastern campaigns issued, through his quaestor Lucullus, large quantities of gold and silver coins for the use of his troops. These, of course, would pass current everywhere, side by side with the regular state issues of silver. During the civil wars out of which the empire was to emerge, Sulla's example was freely followed. Julius Caesar's invasion of Italy resulted in a very curious situation. The properly constituted authorities abandoned the capital, and the senatorial coinage was minted, for the time being, in the East under the protection of Pompeius. Caesar, on the other hand, when he had made himself master of the city, proceeded to exercise his imperium within its walls, striking in Rome itself the gold and silver pieces which, strictly speaking, he was entitled to mint only when outside of the gates. After he had finally defeated Pompeius and had secured

¹ Since the above was written, there has appeared a very important article by Dr. E. J. Haeberlin (Zum corpus numorum aeris gravis, Berlin, 1905), which throws a new light on the place of these gold coins in Roman numismatics.

the submission of the Senate, he placed the silver coinage once more on a constitutional basis, but still retained the issue of gold in his own hands as *imperator*. This was a transition stage which was not destined to last long. The year after the assassination of Julius gold pieces were, for the first time, struck by the Senate as a regular part of the state coinage.

The political confusion of the next few years is faithfully mirrored in the monetary arrangements. Gold and silver money was minted not only by the Senate but by quite a number of the leaders who played a part in the wars for supremacy. The victory of Octavian put an end to administrative as well as to political chaos. His organization of the principate, which covered every department of state, did not leave the mint untouched. His manner of dealing with it was thoroughly characteristic. Reserving to himself the sole right of striking gold and silver coins, he conferred upon the Senate the exclusive privilege of minting bronze and copper, for token money was now a necessity. This was the basis on which the Roman coinage remained for three centuries. It would be beyond our purpose to trace in detail the sorry story of the depreciation and degradation that brought about a collapse. In the end the silver coins came to be so heavily alloyed that they were of little more intrinsic value than the copper, and then the senatorial mint was formally closed. The same reason, it may be added, explains why the Greek Imperial series ceased to be issued. Only in a very few cases did it outlive the reign of Gallienus.

Bearing in mind the main facts of this short sketch,



FIG. 19.—ROME: AS.

we may now proceed to consider more specially that aspect of the coinage with which we are directly concerned. The original aes grave was cast in six denominations, the highest being the as. The whole idea of coined money was borrowed by the Romans from their Greek neighbours in Southern Italy, and borrowed too at a time when the religious principle had become universally accepted—that is, about 350 B.c. The types are exactly what we should look for under such circumstances. Each denomination has as its obverse type the head of a divinity. But there is a further point. For each denomination a special divinity is reserved. The as, for example, has always the head of Janus (Fig. 19), the semis the head of Jupiter (Fig. 20), and so on. We have here a clear testimony to Roman practicality. So long as such a rule was observed, there was no risk of confusion. The same tendency shows itself in the placing of a distinct mark of value upon each side. The convenience of these devices was so obvious that it is not surprising that they were largely imitated by smaller towns in Italy and Sicily. It will be remembered that it was from Italy and Sicily that we drew some of the most convincing illustrations of purely religious types. We can see now that the idea of a series of deities was a borrowed one.1

As for the Roman types themselves, it is worth while pointing out once more that Juno Moneta is conspicuous by her absence. For the rest, the only divinity calling for remark is Janus, who enjoys the position of honour on the highest denomination.

¹ See *supra*, p. 120.

Jupiter, whom (on the analogy of other Italian series) we might have expected to find first, comes second. While the others have been selected for reasons not now apparent, the priority of Janus over Jupiter can, I think, be accounted for. His head was no doubt placed upon the first coin of the series on the same principle as that which led to his name being given to the first month of the year: he was regarded by the Romans as the god of all beginnings. Turning to the reverse, we may observe that the type is invariable. It is always the prow of a ship. We cannot tell what the original significance of this emblem may have been. The enigma is at least as old as Ovid. In the Fasti² the poet represents himself as propounding it to the god:

'Multa quidem didici. Sed cur navalis in aere Altera signata est, altera forma biceps?'

Janus informs his questioner that the double head is his own. As for the prow, he reminds him that when Saturn reached Italy after his expulsion from heaven, it was by boat that he arrived; he concludes—

'At bona posteritas puppim servavit in aere Hospitis adventum testificata dei.'

This quotation is interesting chiefly because it shows how meaningless the type had become even in the days of Ovid. As the prow appears in conjunction with all the divinities impartially, it is probably not a specifically religious symbol. It is more likely to be commemorative. It is found occasionally on other

¹ Ad eum dicuntur rerum initia pertinere (Augustine, De Civ. Dei, vii. 7).

² i. 229 ff.

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Italian coins, but its association with the bronze coinage of the Roman Republic was peculiarly close. Down to the cessation of that coinage in 74 B.C. its presence was constant. When the revival took place under Augustus, it failed to regain its old position, and it is practically unknown on the bronze money of the emperors. Yet its memory was long kept fresh in the traditions of the playground. Macrobius, writing in the early part of the fifth century A.D.—five hundred years after the last of the coins with the prow was minted—tells us that even then the boys of Rome, when they 'tossed' denarii, used to call out 'Heads or ship!'

The silver coinage of Rome was originally struck in three denominations, the highest of which had precisely the same types as the others,-a notable difference from the plan followed with regard to the baser metal. On the obverse was the head of the goddess Roma, and on the reverse the 'great Twin Brethren' riding as if to battle (Plate vii. 4). Both types were religious. Both, it may be added, were borrowed from designs already in use on the currency of Southern Italy. And yet both had a reference which it is easy to detect. The eponymous goddess of the city had an appropriateness that scarcely needs to be pointed out. On the other side, Castor and Pollux were the patron divinities of the equites, the class of citizens that represented the capital and the business enterprise of Rome. As Mommsen reminds us,2 the temple of Castor was a favourite shrine in which to

¹ Pueri denarios in sublime jactantes 'capita aut naviam' lusu exclamant (Sat., i. 7). Cf. Aurelius Victor, Orig. Gent. Rom., iii.

² Histoire de la monnaie romaine, ii. 29.

deposit money for safe-keeping. It lay close to Janus Medius, the bourse of Rome.

Setting aside the so-called 'Victoriatus,'—a special class of coin which was issued for a limited time and with a definite purpose, and the types of which were conventional and unvarying,-we shall find much of interest in the story of the Republican silver. begin with the inscription, we may note that its appearance coincided with the first issue of the denarius. Hitherto the emblem of the prow had sufficed to distinguish Roman money as Roman. heavy copper pieces can have circulated only within a comparatively limited area, and the types were so well marked that there was no risk of confusion with other Italian series of aes grave. The silver coins were meant to travel further. They had a more serious rivalry to encounter and to overcome. Consequently, it was important that they should bear the name of the state, just as had been the case with those earlier coins, whether of gold, of silver, or of bronze, that had been minted outside of Rome itself, but in districts under Roman authority. In accordance with the now generally accepted convention, the origin of which I have endeavoured to establish,1 it was on the reverse of the silver that the legend ROMA took its place.

After the copper coinage had sunk so much in weight that it came to be struck, not cast, it would naturally pass more readily from hand to hand and so tend to follow in the train of the silver. This is perhaps why the struck bronze is inscribed, the

¹ See *supra*, pp. 127 ff.

word ROMA being engraved beneath the prow. In neither case was the inscription destined to be permanent. The facts regarding the changes in usage have been noted by Mommsen,1 but I do not know that any attempt has yet been made to account for them. The name of the city occurs regularly upon the silver money until about 114 B.C. From that date it tends to fall into disuse. After about 84 B.C. it is never employed at all. On the copper it exhibits much more persistence. It occurs on all the asses struck prior to 89 B.c., with a single exception. Thereafter, however, it rapidly disappears. I think these phenomena can be most simply explained if we connect them with that more or less gradual cessation of local issues to which I had occasion to refer in last lecture. The first striking of the denarius had been the signal for an immediate shrinkage in the number of silver-producing mints in Italy. By the end of the second century B.C. the silver money of Rome was in a fair way to become the silver money of the whole world. The distinctive legend was, therefore, no longer so necessary as it had been. The copper coinage was on a different footing, because copper continued to be struck at many towns in Italy and Sicily down to 89 B.C. In that year all rival mints in Italy and Sicily were finally closed by the Lex Plautia Papiria. The need for differentiation was over, and the inscription on the copper went the way of the inscription on the silver.

The very remarkable evolution which the types underwent has been so fully traced out by Mommsen,²

¹ Op. cit., ii. pp. 165 ff.

² Op. cit., ii. pp. 181 ff.

Lenormant, and Babelon, that it is only necessary here to recapitulate the results of their researches. For about half a century the original types—the head of Roma, and the Twin Brethren-held their own unchallenged. Then the first symptoms of change betrayed themselves, the type of Diana and afterwards of Victory, in a two-horse chariot, being occasionally substituted for the Castor and Pollux group. 134 B.c. we meet with a bold innovation. monetary magistrates, who had at first kept entirely in the background but had subsequently let their identity be known through the insertion of symbols or of monograms in the field, now venture sometimes to adopt for the reverse a type which is expressly intended to recall the glories of their own family history. This is the religious impulse giving way to the purely commemorative. Thus, about 129 B.C., C. Minucius Augurinus signs a coin on the reverse of which we get an Ionic column, surmounted by a statue,—the monument erected to the decemvir L. Minucius in front of the Porta Trigemina (Plate vii. 5). Its appearance corresponds to the descriptions given by Pliny and Dionysius of Halicarnassus, and the other details of the picture allude to the incident to which it owed its existence. The ears of corn that spring from the base remind us that it was in connection with the purchase and distribution of corn that Minucius won the gratitude of his countrymen, while the standing figure in augur's robes refers to his surname of Augurinus. Just about the same period the moneyer

¹ La monnaie dans l'antiquité, ii. pp. 240 ff.

² Monnaies de la république romaine, i. pp. xlvi ff.

Sextus Pompeius Faustulus issued a denarius which shows on the reverse the shepherd Faustulus in the act of discovering Romulus and Remus being suckled by the wolf underneath the fig-tree (Plate vii. 6). We have come back, it will be seen, to the condition of things that we found long ago at Abdera and Cyzicus.¹ These reverse types are merely exalted symbols.

For some thirty years matters continued in this transition stage, the head of Roma being almost always found on the obverse, and the variations from the traditional reverse type becoming more and more frequent. About 104 B.c. a great change supervenes. Henceforward Castor and Pollux are but rarely found. Even the head of Roma is often replaced by that of some other divinity or of one of the famous ancestors of the moneyer. The reverses are extraordinarily varied. Sometimes the new types have a local significance. Thus the head of Jupiter Ammon is used on coins struck in Africa by Q. Cornuficius as propraetor (44-42 B.c.), and by Pinarius Scarpus as legate of M. Antonius (30-27 B.c.). Similarly, when L. Cornelius Lentulus Crus, the consul of 49 B.C., issued denarii at Ephesus, he placed on the obverse the head of Jupiter Pluvius (Zevs 'Yéτιος),2 and on the reverse the cultus-statue of Artemis Ephesia. As a rule, however, the commemorative types, which are now usual, are of a directly personal kind.

Moreover, we sometimes find what we have, so far, hardly met with at all upon ancient coins,—direct

¹ See supra, pp. 38 ff.

² For Zevs 'Υέτιος at Ephesus, see supra, p. 167 f.

representations of contemporary events, such as, about 100 B.C., the quaestors Piso and Caepio making purchases of coin in pursuance of the Lex Frumentaria of L. Saturninus (Plate vii. 7). Another very interesting set of pieces combines ancient with contemporary history. I mean the denarii struck in the names of M. Aemilius Scaurus and P. Plautius Hypsaeus, curule aediles about 58 B.C. (Plate vii. 8).1 Four years earlier, Scaurus had crushed the Nabathaean Arabs and forced their king Aretas to surrender. One side of the coin belongs specially to Scaurus and this shows the defeated monarch, on his knees beside his camel, making formal submission. On the other side we have Jupiter in a four-horse chariot hurling a thunderbolt. The latter type is so conventional that it would have conveyed no special meaning to us, had it stood alone. But the accompanying inscription (C HVPSAE COS PREIVER CAPT) satisfactorily interprets it as referring to the triumph celebrated by the consul C. Hypsaeus—one of the ancestors of the curule aedile—in honour of his success in capturing Privernum (341 B.C.). Another form of device, which we have lost sight of for a long while, reappears on the Roman silver. This is the 'canting badge.' As a symbol we get it in the hammer of C. Publicius Malleolus, the pointed axe or pick of L. Valerius Acisculus, the deformed foot of P. Furius Crassipes (Plate vii. 9), and others. As a type we have it in the flower of L. Aquillius Florus, the Silenus of D. Junius Silanus, the Pan of C. Vibius Pansa, the Muse of Q. Pomponius Musa (Plate vii. 10), and The far-fetched character of many of these 1 See Borghesi, Oeuvres Numism., ii. 185 ff.

'speaking types,' is a strong testimony to the popularity of the principle.

A question that inevitably suggests itself, in thinking of these and the other devices we have been describing, is, How far can we suppose that they were the coats of arms of the magistrates that used them as coin-types? I think we may be fairly certain that the punning emblems at least were often nothing more than signets. The one fragment of positive evidence we possess is all the more convincing because it deals with a group so complex that, had we been left to ourselves, we should have felt bound to regard it as a special design. The coins struck about 64 B.c. by Faustus Cornelius Sulla have on the obverse a head of Diana. In the centre of the reverse the moneyer's father, the great dictator Sulla, is seen seated receiving an olivebranch from Bocchus, king of Mauretania, who kneels at his feet. Behind, also kneeling, but with head downcast and hands bound behind his back, is the captive Jugurtha (Plate vii. 11). Here, one would naturally be inclined to say, is a pious son showing a proper pride in his father's achievements. Both Pliny and Valerius Maximus, however, mention incidentally that a representation of the surrender of Jugurtha was the device which the elder Sulla had graven on his signet ring.1 Our type, then, would seem to be of the nature of a crest. It is very interesting to find this unconscious return to the primitive form of minting. And we may safely assume that the Roman series contains many more examples. A different but not less interesting motive is represented on Plate vii. 12, where T. ¹ Pliny, Hist. Nat., xxxvii. i. 9; and Valerius Maximus, viii. 14, 4.

Carisius uses on the obverse the head of Juno Moneta and on the reverse the chief implements employed in striking money—the tongs with which the heated metal was held, the dies between which it was placed, and the hammer with which the necessary force was applied.

The variations of which we have been speaking were confined to the silver money. The types of the Republican copper show no analogous development. In trying to account for this difference, we may perhaps appeal to the explanation that proved useful in the case of the inscription. Rival silver coinages were suppressed comparatively early. As they disappeared, the Roman denarius assumed more and more the character of a universal currency. When there was really nothing from which to distinguish it, distinctive types became less necessary and variety more possible. The copper coinage had to contend much longer with the issues of other Italian mints. And Rome herself ceased to strike copper within a very few years of the passing of the Lex Plautia Papiria. Thus there was not sufficient time to admit of variations being developed. It should, however, be noted that neither during the spasmodic revivals of bronze issues towards the close of the Republican era nor after the re-organization of Augustus which accorded them a permanent place in the Roman monetary system, do the original types reappear. Variety reigns supreme.

Coming back to the changing types of the denarii, I would draw attention to the interesting comparison which they suggested to Mommsen. He points out that the story of the coin-types reflects in a curiously exact way

¹ Histoire de la monnaie romaine, ii. 43.

the political development of the Roman state. At first 'none was for a party.' The types are absolutely invariable and impersonal. Presently the individual moneyers begin to assert themselves. A personal element obtrudes itself amongst the types, half shyly to begin with, and under the shadow, as it were, of the Republic. Gradually this personal element grows more and more pronounced, until finally the original types are altogether ousted. But, up to the middle of the first century B.C., individual aggression is, so to say, cloaked under constitutional forms. Although the head of Roma has fallen out of fashion as the obverse type, it is replaced, at the caprice of the moneyer apparently, by the head of another divinity or by some inoffensively conventional type of a religious kind. The great men of the past occasionally appear, but not until the days of Julius Caesar do we find the head of a living Roman placed upon money struck within the city itself.

From our particular point of view, the variations of type have an interest which has already been hinted at. Roma and the Twin Brethren were adopted at a time when the religious influence was at its zenith. By the end of the second century B.C. that influence appears to have declined considerably. As the personal element develops, we get a return to the purely commemorative, as opposed to the religious, form of type. The change was due to various causes. The commemorative motive was the original, perhaps we may say the natural, one. As the special reasons that led to its eclipse lost their force, the principle of reversion came into operation. The bonds between

art and religion, for example, were no longer so close as they had once been. And, in any case, Roman coins never reached the artistic level that Greek coins had attained. Again, the stability of the Republic must have lent to its magistrates, so far as a guarantee for the coinage was concerned, a prestige and an authority as high as that enjoyed in earlier times by the local divinities of states that were perpetually haunted by the spectre of possible revolution.

Nor must we forget the influence of example. As in literature, Graecia capta ferum victorem cepit. In the Hellenistic kingdoms which Rome was overthrowing, portraiture was universally employed. Portraits were originally introduced upon coins through the medium of religion. But once they had lost their religious associations, they must have seemed the most intimately personal of all types. And it is difficult to imagine that the Romans had any belief in the divinity of monarchs whom they so unceremoniously deprived of their crowns. Suetonius preserves an anecdote of Augustus at Alexandria that is highly significant. He had the body of Alexander the Great brought out of its tomb, placed a golden crown on its head, and did it solemn reverence. Being asked whether he cared to have a view of Ptolemy also, he promptly replied that it was the king he had wanted to see, not dead men.1 If that attitude was characteristic, then royal portraits can have appealed to the Romans merely as symbols of personal authority.

¹ Suetonius, Divus Augustus, xviii. Cf. Kornemann, Zur Geschichte der antiken Herrscherkulte, p. 98.

This brings us to the question of portraiture at Rome itself. Whether Julius Caesar actually placed his own head upon one of his gold issues, we cannot definitely say. It depends upon two or three pieces regarding the genuineness of which experts are not agreed. If he did do so, he was acting in virtue of his imperium, as Flamininus had done a century and a half before. We are, however, on safe ground when we come to the senatorial silver of the year 44 B.C. The numismatic evidence proves that it is to this year that we must assign the senatorial decree, recorded by Dio Cassius, to the effect that Caesar's portrait was to be placed upon the coinage (Plate vii. 13). What was the real significance of this decree? Was it a recognition of his political predominance pure and simple? Or did it carry with it the suggestion that he was divine? In other words, is the type personal or religious?

It is true that up till now no heads of living men had figured upon Roman coins at all. Actual events —legendary, historical, or even contemporary—had been frequently portrayed. But these had appeared only on the reverse. Now for the first time the obverse was to be invaded, and Caesar was to occupy a place hitherto reserved for divinities or for the great heroes of the past. It is also true that other honours heaped upon the dictator at the same time by the subservient Senate show plainly that they meant to make him a god. Yet, with it all, the balance of evidence is in favour of looking upon this particular decree as nothing more than a formal recognition of his position as $\beta a \sigma \iota \lambda \epsilon \dot{\nu} s$.

We may take leave to doubt whether the obverse type can have retained much sanctity at the close of the Republican period, when the reverse had so long been secularized. Further, the common occurrence of personifications, such as Fear, Honour, Courage, and the like, suggests that the head was largely conventional. Important testimony is also furnished by what happened after Caesar's murder. It has already been stated that the right of mintage was exercised independently by all the prominent leaders in the civil wars. choosing their types these leaders did not hesitate for a moment to follow the example the Senate had set them. They placed their own heads quite freely on the money that they issued. Such a policy was not confined to those who took on themselves the task of avenging the dead Caesar, and who therefore might be regarded as to some extent his political heirs. We have upon coins portraits of almost all the 'liberators,' including even Brutus. Cassius alone was absolutely faithful to the Republican tradition. This cannot mean that all these generals professed to be immortal, or even that they claimed divine descent, as Sextus Pompeius did when he posed as the son of Neptune. It rather means that the right of portraiture was no longer directly related to deification, but had come to be a mere token of personal authority.

This conclusion is fully borne out by what we know of the policy of Augustus. On his re-organization of the mint, he adopted, as a matter of course, the practice that had grown up during the civil wars. Henceforward, until the end of the empire, the normal obverse type is the head or bust of the reigning

emperor or, occasionally, of some member of his family. This rule holds good not only for the imperial mintage of gold and silver, but also for the senatorial issues of bronze and copper. For a few years a certain license was permitted to provincial governors. We have, for instance, at Achulla a portrait of Quintilius Varus struck during his tenure of office in Africa. This privilege, however, was soon withdrawn. Remembering the deification of the emperors, we might at first sight be tempted to recognize in the action of Augustus a revival of the association between portraiture and religion. Closer consideration suggests that, at least as regards the Roman money proper, such an inference would hardly be justifiable.

In Rome itself the living emperor was officially recognized as an object of worship.1 It was only among the provincials that the cult was sanctioned. The position of Augustus on this point was perfectly definite and unmistakable. That of Tiberius was declared with singular frankness in one of the most notable speeches that Tacitus has put on record. Ambassadors had come from Farther Spain to ask whether the people there would be permitted to erect a temple to the reigning Emperor and his mother Livia. As a precedent they might have cited the favourable reply given not long before to a similar petition from the cities in the Roman Province of Asia. But a concession that was politic in the case of a population saturated with Oriental ideas and modes of thought, was felt to be inappropriate in the West. Tiberius firmly refused and, in announcing his refusal to the

¹ See Kornemann, Zur Geschichte der antiken Herrscherkulte, pp. 95 ff.

Senate, uttered the memorable words in which he expressly repudiated all claim to divinity: 'Ego me, patres conscripti, mortalem esse et hominum officia fungi satisque habere, si locum principem impleam, et vos testor et meminisse posteros volo,¹—a declaration that is entirely consonant with the evidence from another, and an equally unprejudiced, source. Suetonius assuredly held no brief for Tiberius, and therefore we may fairly attach great weight to his assertion that the Emperor forbade all attempts to honour him by the building of temples or the institution of priesthoods, and that he only sanctioned the erection of statues to himself on the express condition that they should not be made the objects of religious veneration.²

The case of the soldiery stands by itself. The Roman Empire was essentially military in its origin, and the continuance of any emperor in power depended on his retaining the confidence and devoted attachment of the army. The bond was ultimately a personal one. Hirtius and Dio Cassius tell us that the soldiers of Pompeius had the name of their general blazoned on their shields.³ The sentiment to which this testifies was subsequently crystallized in the homage done to the standards (in itself an older thing than the Empire) and to the portraits of the emperor in all camps and military stations. Suetonius in his life of Caligula describes how Artabanus, the Parthian king, crossed the Euphrates to the Roman headquarters, and 'prostrated himself before the Roman eagles and

¹ Annals, iv. 38. ² Tiberius, 26.

³ Bell. Alex., 58; and Dio Cassius, xlii. 15. There are other cases on record, e.g. Dio, 1. 5, where the name is that of Cleopatra.

standards and the portraits of the Caesars.' From the same writer's biography of Tiberius we gather that like honours were sometimes paid to portraits other than those of members of the imperial house. Tiberius bestowed special rewards on the legions of Syria, 'because they were the only legions that had not kept a portrait of Sejanus among their standards for worship.' ²

It appears certain that the portraits to which the legions thus paid homage were often in the form of medallions which were let into the standards. suggestion of this must have come from coins. But the imitation was probably dictated by motives of convenience, and it must not be taken as indicating that any sanctity attached to coins as such. Whatever pretensions may have been advanced at a later date by emperors like Nero and Commodus, Augustus made no claim to be a god. Even when divinity was thrust upon him, he insisted that his worship should be conjoined with that of Roma.3 It is inconceivable that he should have gone out of his way to introduce the notion of his own godhead into a great civil instrument like the currency. Rather, the true significance of the appearance of his portrait as the obverse type is that the government was now de facto an absolute monarchy.

One further point before we leave the obverse. In the regal coinages of the Hellenistic period, the royal name, following the familiar convention, took its place naturally on the reverse. We may except certain gold

¹ Caligula, 14. ² Tiberius, 48.

⁸ Dio Cassius, li. 20. Cf. Kornemann, op. cit., pp. 98 ff.

coins of the Ptolemies which present a portrait on both sides, the portraits being then accompanied by descriptive titles. Something of the same sort took place during the civil wars of Rome, when we often find a portrait on the reverse as well as on the obverse. Antonius and Caesar, Caesar and Octavian, Lepidus and Antonius, Antonius and Octavian, Octavia and Antonius, Antonius and Cleopatra, Antonius his son, Antonius and his brother (Plate vii. 16)these are some of the combinations that occur. With such a wealth of portraits, it was inevitable that the custom of appending a name to each should be adopted as a convenience. Once introduced, it quickly gained a firm foothold. A considerable proportion of the coins of Augustus still shew his head unaccompanied by any name. On the majority, however, and on practically the whole of the money of later emperors the obverse is occupied by a head, with name and titles written round the margin. We have thus reached the prototype on which so much of our modern coinage is modelled.

What, in the meantime, had been the fortunes of the reverse? During the transition period, as we have seen, it sometimes bore a portrait like the obverse. Where other devices are employed, they can usually be classed as commemorative, unless they are merely conventional. Sextus Pompeius, for instance, as became an admiral, generally chose types alluding to naval warfare or to naval victories (Plate vii. 17). The most remarkable feature, however, is the growing fondness for allusions to contemporary events. In the turmoil of contending factions, the issue

of coins afforded the rival leaders a convenient medium for personal or political manifestoes. A very interesting denarius of Brutus (Plate vii. 14) brings vividly home to us the pride which the murderers of Caesar took in their achievement. On the obverse is Brutus's own portrait, with his name and that of the moneyer. The reverse presents us with the cap of Liberty, flanked by two daggers. The type speaks for itself. But, as if to prevent all possibility of misapprehension, the legend EID MAR has been added beneath, recording the very date on which the tyrant fell.

A denarius of Cassius (Plate vii. 15) is even richer in allusion. The obverse has the head of Liberty, one of his favourite types. Before we can interpret the reverse design, we must hear the story with which it is connected. In 43 B.c. Cassius gained a great victory over the Rhodian fleet, apparently within the territorial waters of Cos. The result was to place Rhodes at his mercy. When he captured the island, the terrorstricken inhabitants (Plutarch tells us) hailed him as king and lord. But he contemptuously rejected the proffered honour, exclaiming that 'he was neither king nor lord, he was one who had chastised and slain such.'1 On the reverse of our denarius we have a complete epitome of the events just related, an admirable confirmation of Plutarch's narrative. In the centre is a crab,—the well-known coin-type of Cos,—holding in its claws an acrostolium, an emblem which is a common symbol of supremacy at sea. Beneath is a

¹ Plutarch, *Brutus*, xxx. For a discussion of the type see Borghesi, Oeuvr. Num., i. p. 393.

regal diadem, unfastened, and beneath that again is the half-blown rose that figures so constantly on the reverse of Rhodian money. In its complexity the whole reminds one of some of the eighteenth century medals.

The epoch of political transition, then, is marked by a distinct development in the commemorative influence, -a development that promised to be full of interest, had it been allowed to continue unchecked. But the causes that led to the stereotyping of the obverse, had an effect on the reverse as well. Variation, it is true, was still the rule. In one sense, indeed, there was more room for the play of fancy than there had ever been, seeing that rival gold and silver coinages had been swept out of existence, while the adoption of an imperial head as the standing obverse type had done away with the necessity for a fixed design on the reverse. But, just as the portraits must now be imperial portraits, so too personal allusions, when they occur, have to centre round the emperor and his family. Within these limits there was a wide latitude. We may illustrate the possibilities from the coins of Augustus. On some of them we get the sphinx (Plate vii. 18) which was the device he carried on the signet ring with which state documents were sealed.1 The capricorn on others denotes the constellation under which he was born. On a third set we have the portico of his house in Rome, with a laurel-tree growing on either side of the door and a civic crown suspended above the entrance. The same idea is more simply expressed by a gold piece which has merely two laureltrees on one side and a civic crown on the other

¹ Pliny, Hist. Nat., xxxvii. i. 9.

(Plate vii. 19). Again, it might be more public events that were chosen for commemoration,—the subjugation of Egypt or Armenia, or the restoration by the Parthian king of the standards lost by Crassus and by Antony.¹ Temples, too, are not uncommon, and it seems probable that the coins on which they occur were minted on the occasion of some ceremonial of which they were the scene. Lastly, we meet with conventional figures of deities, like Mars and Diana, or of personifications like Peace and Victory.

These few examples will serve to prove how rich was the field that lay open to the die-engraver. first it seemed as if he was to rise to the full height of his opportunities. Under the early emperors there was a notable improvement in the style of Roman Are we to trace in this the hand of the Graeculus esuriens? Or are we to attribute it to the indirect influence of the masterpieces of Greek art that the rapacity of Roman generals had accumulated in the capital? At all events, the portraits are often excellent, while the reverse types too display considerable resource. By the end of the second century A.D. a change had set in. Thereafter deterioration was rapid. Two hundred years later, individuality is sadly to seek in most of the portraits, and monotony and lack of originality have cast a blight on the reverses. It would be hopeless to attempt to give even the most meagre outline of the process of development and degradation. But one or two salient

¹ As an example of this class, the reverse of the coin struck at a later period to celebrate the capture of Jerusalem by Titus is figured on Plate viii. 11.

features of imperial types may be singled out for remark.

Elaborate architectural representations appear much more frequently than they used to do. On earlier coins, whether Greek or Roman, such types had been extremely rare. The closest parallel is a device to which reference was made in an earlier lecture, the fortified city on the obverse of the large silver octadrachms struck at Sidon in the fourth century B.c.1 The analogy suggests that the popularity of architectural types was perhaps partly due to the increased superficial area which the introduction of 'large brass' put at the disposal of the artist. And it is certainly on 'large brass' coins that some of the most striking of them appear,—the picture of the harbour at Ostia with its fleet of ships (Plate viii. 8), the sketch of the Circus Maximus at Rome, and the representation of the Coliseum with the meta sudans beside it (Plate viii. 9). At the same time, this explanation is at the best a very partial one. The Forum of Trajan, for example, is found not only on large bronze coins but also, though in less detail, on gold pieces of ordinary size (Plate viii. 2). The real reasons must be sought for deeper down—in the weakness that made the artist anxious to have a definite subject to copy, in the prevailing admiration for architectural display, and in the many opportunities that consequently occurred for commemorating the erection or restoration of triumphal arches, temples, and the like.

References to actual events are commoner than at any other period, and they are such as to show that it was a

¹ See supra, p. 96.

regular practice to make a notable incident the occasion for an issue of money with appropriate types. At one time the Emperor Nero boasted that Rome was at peace with all the world. In celebration he struck coins showing the Temple of Janus with closed gates, surrounded by the legend PACE Populo Romano TERRA MARIQue PARTA IANVM CLVSIT (Plate viii. 7). In 114 A.D. Trajan set out from the capital for the Parthian War. Coins of that year supply a pictorial record of his departure. He is seen riding forth, spear in hand, preceded by a single soldier and followed by others (Plate viii. 1). The inscription AVGVSTI PROFECTIO explains the situation. This was a type that was often imitated afterwards. As a pendant to it, may be mentioned one that is specially frequent on coins of Hadrian—a representation of the emperor's arrival in any country, or rather of the sacrifices 1 with which he was welcomed (Plate viii. 4). The usual legend is ADVENTVS or ADVENTVI AVG. The CONSECRATIO or deification of dead emperors or empresses is commemorated in various types. The obverse has the head of the deceased with the title DIVVS or DIVA, while on the reverse we see some significant emblem, such as the funeral pyre, or the eagle that was let loose from its summit to carry the new deity to heaven (Plate viii. 6).

The increasingly large place occupied by personifications also calls for remark. On Greek coins these had been rare. Victory, indeed, is common from a very early period, and in the fourth century B.C. we have heads of Hygieia and of Homonoia at Metapontum.

¹Cf. Horace, Odes, iv. 2.

Tyche with her turreted crown was popular in the East from the second century B.c. onward. But it is only under the Roman emperors that the personification of abstractions rises to the first importance as a source of coin-types. Abundantia, Aequitas, Aeternitas, Clementia, Concordia, Fecunditas, Felicitas, Fides, Fortuna, Hilaritas, Honos, Laetitia, Liberalitas, Libertas, Justitia, Munificentia, Nobilitas, Pietas, Pudicitia, Salus, Securitas, Spes, Victoria, Virtus-all of these (and others) meet us over and over again on the reverses of Roman imperial pieces. The tendency to personify abstractions is very old; witness Dike and Adikia on the chest of Cypselus. But it obviously appealed with special force to the Roman mind. And there was an additional attraction for the designers and engravers of the mint. If they adopted any of the types enumerated above, their task was comparatively simple. They had only to produce a female figure in a conventional attitude with conventional attributes. She would be readily recognized. Victory above all, with her wings, her wreath and her palm, was quite unmistakable, and no type was more common. If any possibility of doubt was apprehended, a descriptive title could be added to make all plain.

With reference to the descriptive title a curious point may be noted. Such titles occur on an immense number of reverses in the Roman imperial series. As a rule, they are either in the nominative or in the dative. If the type is a male divinity, like Hercules or Jupiter or Sol, the title is almost always in the dative. If it is a female divinity or a personification,

the nominative is the most usual case. There are, of course, exceptions. ROMAE AETERNAE, for instance, is a practically invariable formula. On the other hand, MARS VLTOR and MARS VICTOR are much more often in the nominative than in the dative, in strange contrast with MARTI PACIFERO and MARTI PROPVGNATORI. With certain divinities, like Venus Victrix and Juno, the two cases appear to be used almost indifferently. In the face of so many contradictions, it would be rash to draw positive deductions, except on the basis of a complete and exhaustive analysis. Account would have to be taken of chronological considerations, and allowance would require to be made for the possibility that, in some instances, the variation in case had little or no real significance. But the broad fact that has been mentioned suggests that those who were responsible for the designs were perhaps conscious of a distinction between the personifications of qualities and the gods themselves.

The dative, it should be explained, is capable of various interpretations, although it must always indicate something of the nature of a dedication, a gift, or a wish. When a nominative and an accusative occur along with it, the sense is very plain. We may take as an example the curious bronze pieces-medals, probably, rather than coins—by which the Senate and People of Rome occasionally conveyed to their emperor their good wishes for the New Year. These bear no type on the reverse, but simply an inscription like SPQR ANNUM Novum Felicem Faustum OPTIMO PRINCIPI, enclosed within a wreath. Sometimes the place of the accusative is supplied by the type itself.

An interesting group of the coins of Augustus will provide an illustration.

Suetonius tells us 1 that one of the first important tasks to which the Emperor set his hand, after his supremacy was secured, was the improvement of the great public roads of Italy which had suffered severely during the civil wars. He himself undertook responsibility for the repair of the Via Flaminia as far as Ariminum. Other sections were assigned to his generals, the expenses to be paid out of money acquired from the sale of booty. Dio Cassius 2 has much the same story, and he adds that the completion of the work was celebrated by the erection of triumphal arches in honour of Augustus at Ariminum and also on the bridge by which the Via Flaminia crossed the Tiber. The coins in question have on the obverse a head of Augustus with SPQR CAESARI AVGVSTO or an inscription of similar purport, and on the reverse a bridge surmounted by a triumphal arch, on the top of which is the Emperor in a chariot (Plate vii. 20).3 This reverse type must be the object of the verb understood after the SPQR of the obverse inscription, for the reverse legend states the reason why the arch had been erected—QVOD VIAE MVNitae SVNT. A close parallel can be found in coins of Nero which display on the obverse the youthful bust of the emperor with the legend NERONI CLAVDIO DRVSO GERM COS DESIGN, and on the reverse a round shield

¹ Divus Augustus, 30.

² liii. 22.

³ Through inadvertence, a wrong obverse has unfortunately been figured on the Plate. For a correct reproduction of the piece, see Head, *Goins of the Ancients*, Plate 69, 33.

inscribed EQVESTER ORDO PRINCIPI IVVENTutis. Here again the two inscriptions must be taken as parts of one whole, and here again it is the actual type of the reverse that is the accusative of the sentence. These two examples are exceptional in having the obverse legend in the dative. It is normally in the nominative. This happens even in cases that are otherwise analogous to the preceding, as with those gold coins of Septimius Severus, where the reverse type is an equestrian statue of the Emperor accompanied by the inscription SPQR OPTIMO PRINCIPI.

I have said that the obverse legend is normally in the nominative. But there is one striking set of exceptions. All the coins of Trajan struck from 105 A.D. onwards, saving only a few belonging to his sixth consulship, have the obverse legend in the dative. How is this to be explained? If we turn to the reverse, we get the necessary nominative, for there the ordinary legend is SPQR OPTIMO PRINCIPI. the two sides are in close connection. Nor is it difficult, in view of the dative, to see what must be the general meaning of the verb that is to be understood. But what is the object of the verb? There can be no question here of the type, for the formula is found with types of the most diverse kind. The reference can hardly be to anything except to the issues themselves, although it is hard to understand what can be meant by representing Senate and People as dedicating coinages

¹ For an interesting parallel in the Greek Imperial series see the coins of Antioch described in *B.M.C.*, *Galatia*, etc., p. 167, Nos. 133 ff.

² In many cases, of course, the words are contracted, and may be either nominative or dative.

of gold and silver, the issue of which was always the prerogative of the emperor. Most probably it is an illustration of what was a characteristic feature of Trajan's general policy—his readiness to make empty concessions to Republican sentiment, so long as the real control remained in his own hands.¹

So far we have been speaking of datives accompanied by nominatives. Even when they stand alone they must denote dedications or gifts. But who is the giver or dedicator? And what does he give or dedicate? In some cases there is no reasonable room for doubt: the dative may be as purely descriptive as the nominative is when used by itself. Thus, on coins of Gordian III. we get what is evidently a statue of Jupiter, holding a thunderbolt and a sceptre. The accompanying legend is sometimes IOVIS STATORIS, and sometimes IOVI STATORI, that is, either 'This is the statue of Jupiter Stator,' or 'This statue is dedicated to Jupiter Stator.' There is no real difference in meaning. Both alike describe the type. Such is perhaps the most natural interpretation in all cases where an actual statue or an actual temple is the subject. But it can hardly be applied universally.

There are, for instance, coins of Trajan's sixth consulship where another explanation seems required. The obverse has the bust of the Emperor with his name and titles, these latter being in the dative according to what we have found to be the usual custom at this period. On the reverse is a figure of Jupiter sheltering Trajan under the shadow of his right hand (Plate viii. 3). In place of the ordinary SPQR OPTIMO PRINCIPI,

¹ See Schiller, Geschichte der Römischen Kaiserzeit, i. pp. 563 f.

PLATE VIII.

F 108 88 (F)

	SEE	PAGES-
ı.	Trajan (114 A.D.): gold,	203
2.	Trajan (circa 114 A.D.): gold,	202
3.	Trajan (112-117 A.D.): gold,	208
4.	Hadrian (after 128 A.D.): gold,	203.
5.	Hadrian (circa 128 A.D.): gold,	209
6.	Marciana (circa 114 A.D.): gold,	203
7.	Nero (54-68 A.D.): bronze,	203
8.	Nero (after circa 56 A.D.): bronze,	202
9.	Titus (80 A.D.): bronze,	202
ΙÓ.	Bizya (Philippus Senior): bronze, the	166
ĿI.	Titus (80 A.D.): bronze,	201
12.	Titus (80 A.D.): bronze, Commodus (192 A.D.): bronze,	210
13.	Constantine the Great (326 A.D.): bronze,	230 1
r10	eriod. On the reverse is a figure of Jur	mer si



we get the inscription CONSERVATORI PATRIS PATRIAE. In this example it is impossible to establish any connection between the legend of the obverse and that of the reverse. Although both are in the dative, they refer to different personages. Whatever sense we may attribute to the former, we must connect the latter with the type. If we could suppose that the type was a copy of an actual statue, we might fall back upon the view that the dative is descriptive. But the whole group gives the impression of being an imaginary picture. And, if this be so, it can only be the design itself that is dedicated.

The point may become clearer if we take another illustration. There are series of coins in all three metals struck to commemorate the journeys of Hadrian to the different provinces of the Empire. They bear on the obverse the Emperor's bust with his name and titles in the nominative, and on the reverse his full-length figure raising a suppliant female from her knees. The suppliant's identity is generally revealed by some characteristic attribute. Africa, for instance, has an elephant's skin as head-dress (Plate viii. 5). In any event, it is always made plain by the accompanying inscription, the normal form of which is RESTITYTORI ACHAIAE, RESTITUTORI AFRICAE, RESTITUTORI ARABIAE, and so on. It is obvious, I think, that the dative signifies here 'in honour of,' and that the place of the accusative is filled by the group or design. What, then, is the nominative? Not, certainly, the nominative on the obverse, for that refers to the same individual as the dative and cannot be conjoined to it. There is no alternative but to regard the responsible officers of the mint as the dedicators, and to conclude that they enjoyed considerable liberty in the selection of types.

The opportunity thus accorded to flatterers was taken advantage of only too frequently. The lowest depth was touched in the reign of Commodus, when coins were struck in all three metals representing the Emperor as Jupiter or as Hercules. Hercules was the deity with whom he was himself most anxious to be identified. If ancient historians are to be trusted, Commodus was no weakling. He fought with wild beasts at Lanuvium and elsewhere, and performed prodigies of strength and of valour at such contests. Dio Cassius 1 tells of his slaying as many as a hundred bears in one day,-a feat demanding some endurance, even Athough the killing was done with javelins from a position of absolute security. The club and the lion's skin were his favourite emblems. They were borne before him when he appeared in the streets, and were placed upon the golden throne during performances in the theatre, whether he himself were present or absent.2 He went so far as to assume the name of the Roman Hercules as one of his official titles. The truth of Dio's narrative is amply borne out by the coinage. Allusions to Hercules and representations of the Emperor as Hercules are very common. To take but one example, a bronze 'medallion' shows his head on the obverse wearing the lion's skin, while the corresponding reverse has his full length figure in the pose of the Farnese Hercules (Plate viii. 12). In this particular case an actual statue may be reproduced, for Dio

¹ lxxii. 18. ² *Ibid.*, lxxii. 17.

mentions that many statues were set up showing him as Hercules.

Under the empire, then, the coin-type occasionally degenerated—by a perfectly intelligible process—into a mere instrument of sycophancy. It must be admitted that, in this respect, Rome does not show to advantage as compared with the provinces. The imperial presence must have exercised a baneful influence. It is true that at Cyzicus we have Commodus with his lion's skin and his title of POMAIOS HPAKAHS. This, however, is exceptional, like the motto from Caesarea quoted in the course of last lecture. As a rule, the Greek Imperial coins show less tendency towards servility than the Roman. The most marked example they present of subserviency to the reigning monarch's whim is perhaps that which is afforded by the numerous pieces struck in honour of Antinous. And here the subserviency seems all the more striking if we remember that Antinous never appears upon Roman coins at all. The explanation of this anomaly probably lies, not in the region of morality as has sometimes been supposed, but simply in the fact that Greek Imperial coins were much more closely and definitely associated with religious celebrations than was the ordinary currency of Rome. The coins with the head of Antinous were almost certainly minted on the occasion of festivals or games held in his honour.

The contrast between the capital and the provinces can be brought out most clearly, and at the same time most fairly, by glancing briefly at the imperial coinage of Egypt. When Augustus formally organized the empire, he was careful to retain the administration of this rich province in his own hands. So strictly did he ban any interference on the part of the Senate that he even forbade senators as individuals to set foot in the country at all. It was placed under the direct control of an imperial procurator. Alexandria was the seat of the government, and it was doubtless there that the huge billon and copper currency was minted. Each coin bears upon its face the regnal year of the emperor under whose authority it was issued, a circumstance which renders scientific classification possible, and enables us to reconstruct the history of the mint in a way that we cannot do anywhere else.

Modifications in the inscription or in the treatment of the imperial head, on the obverse, and changes in the general character of the types employed on the reverse often occur at irregular intervals in the course of one and the same reign. Thus, the billon coinage of Nero falls into three quite distinct groups, which correspond to three successive periods of time, and which are differentiated partly by very slight alterations on the obverse and partly by the use of three well-marked varieties of reverse type. During the first period we chiefly find personified qualities such as are common on Roman coins, during the second it is Egyptian mythology and religion that is most largely drawn upon, during the third we get the heads of Greek gods and goddesses. Changes of this sort can have no political significance. Further, they generally

¹ See *Greek Coins in the Hunterian Collection*, Vol. iii. pp. 402-561, where these modifications and changes are made the basis of classification.

occur in the middle of a year. As the year used is the Alexandrian year, which commenced on August 29th, the inference is that they coincide with the beginning of the Roman year or, more strictly, with the date at which a new official would naturally enter on his duties. We may conclude that at Alexandria the tradition of the later Roman Republic was preserved and the moneyers allowed to select their own designs. The peculiarly close relation in which Egypt stood to the emperor justifies us in pointing to this as a confirmation of the deduction we drew from the inscriptions as to the persistence of a similar practice in imperial Rome itself.

The Alexandrian types are full of interest, more especially during the first two centuries of the Christian era. After about 200 A.D. there is a noticeable tendency towards monotony. While their detailed study is of high importance to the specialist, they do not illustrate any really new principle. some respects they are analogous to the types on contemporary Roman coins. There are no portraits save those of members of the imperial house. Hope, Peace, Justice, Concord, Victory and their sisters are great favourites—a circumstance that would of itself have sufficed to suggest that a particularly intimate connection subsisted between Egypt and the centre of the Empire, since, if we except the inevitable Victory, such personifications are comparatively seldom found on ordinary provincial issues. Their frequent occurrence at Alexandria lends a certain distinction to the Egyptian coinage, and marks it as at least a faint shadow of the imperial series proper. For the rest, conventionally religious types are exceedingly common. And here we get local colour in abundance. Alongside of the gods of Greece and Rome, we have all the leading Egyptian divinities—Sarapis, Isis, Apis, Harpocrates, and the others. Most characteristic of all, perhaps, is Nilus. Then there are a certain number of notable architectural types. These latter, however, must also be classed as religious. Even the Pharos, which is one of the most frequently employed and most interesting of the whole group, was closely associated with Isis Pharia and, as a matter of fact, generally appears as a mere adjunct, the goddess herself occupying the greater portion of the available space.

The vitality of the conventionally religious type in Egypt is remarkable. There is no question, it should be remembered, of a connection with special festivals of the divinities represented. The same types are reproduced reign after reign for centuries. It is difficult to suggest any explanation of this phenomenon; but the same influence, whatever it may have been, must be held responsible for the rarity of the commemorative form of type, so popular at Rome. We have, indeed, individual emperors sacrificing or riding on horseback or standing on triumphal cars, and latterly we get many obvious allusions to the vota decennalia. even about these there is a sameness that robs them of individuality. The galley that carried Nero to Greece has more human interest, while the references to Hadrian's visit to Alexandria are as direct and pointed as anything we could find at Rome. But such exceptions merely deepen the impression of conventionality which a review of the whole series produces. And it is only natural that, as time goes on, this conventionality should grow more and more pronounced. In the end the reverses are almost monopolized by figures of Victory and by eagles. The eagle at Alexandria, be it noted, is not a religious type but a military one. It is often shown standing between vexilla, and on coins of Carinus and Numerianus (circa 284 A.D.) it is accompanied by the legend AET B TPAI, indicating the legion that had garrisoned Egypt since the reign of Antoninus Pius, if not of Trajan.

Although specifically commemorative types are but little in evidence, it is clear that commemorative issues took place occasionally, and sometimes on a very large scale. There is no other reasonable explanation of the mintage, in particular years, of immense quantities of bronze coins bearing devices of an altogether special character. In the eighth (Alexandrian) year of Antoninus Pius, for instance, that is, between August 144 and August 145 A.D., there were struck a number of bronze pieces of large module whose reverses present us with a variety of astronomical pictures—the signs of the Zodiac, Venus in Taurus, Jupiter in Sagittarius, Mars in Scorpio, the Moon in Cancer, Saturn in Aquarius, and so on. That this was not due to the freak of an individual moneyer is proved by the abundance of the issue, and also by the fact that the same year produced one of the periodically recurring groups of so-called 'nome-coins.' The term is applied to bronze pieces which, though minted at Alexandria, had upon their reverses the name of one or other of the 'nomes' or districts into which Egypt was divided for administrative purposes, the type in each case being

also of a distinctively local character. Such groups were issued at least once under Domitian, and on several occasions under Trajan and Hadrian. The view that they are commemorative is fully borne out by the exceptional output of more strictly Alexandrian pieces which invariably accompanied them. The local colouring of the types—usually the figure or the symbol of a divinity specially associated with the 'nome'—suggests that they were probably intended for distribution at local festivals held to celebrate the great event that was being commemorated. They and the corresponding Alexandrian coins should thus be compared with some of the series which we discussed under the heading 'Greek Imperial,' although neither types nor inscriptions give any clue to the exact nature of the occurrences to which they owed their existence.

Besides Alexandria, the most important subsidiary mints in the Empire during the earlier part of its history were Antioch, Tarsus, and Caesarea in Cappadocia,—all three, it should be observed, great centres in the thickly populated East. They produced large quantities of silver and billon coins which were exchangeable at a fixed rate with Roman denarii and would thus form a useful supplement to the regular issues of the capital. The types are, for the most part, rather uninteresting. At Tarsus and at Caesarea they deal to some extent with local subjects. The Mons Argaeus at the latter town we have already heard of, and at Tarsus there was the god Sandan. At Antioch, on the other hand, the one local type of note—the statue of the Tyche of the city by

Eutychides—is early superseded by an eagle with spread wings which thereupon becomes the practically invariable reverse device not only on the billon coinage of Antioch, but also on that issued by the other chief cities of Syria when, after 214 A.D., they enjoyed for a brief period the privilege of striking money in a metal more valuable than mere bronze.¹

It was not the billon coinage alone that displayed monotony of type at Antioch. There was a senatorial mint there. Such at least is the natural inference from the fact that so many of its bronze coins bear the letters S C, exactly like the bronze issues of the capital. From the time of Augustus to that of Elagabalus, during whose reign the whole system was remodelled as the result of the establishment of a 'colonia,' the type of the senatorial coinage of Antioch was uniform,—nothing but a wreath, with the two letters just mentioned in the middle of it. Such deliberately colourless uniformity cannot be paralleled anywhere else during the imperial age. It would be interesting to know what it signifies,—sheer lack of originality, or conservatism rooted in pride at having been selected as a unique centre, a provincial capital, so to say, or a feeling that, in view of the distance from the real seat of power and the consequent impossibility of keeping in close touch with it, it was prudent to avoid all risk of giving offence either to Senate or to emperor by a choice that might conceivably prove to be ill-timed.

The class of types characteristic of Roman 'coloniae' has still to be mentioned. In some cases the cities

¹ See Imhoof-Blumer, Griech. Münzen, p. 234 (758).

so designated show a range of devices as richly varied as are to be found anywhere in the whole Greek Imperial series. The issues of Corinth, of Tyre, and of Alexandria Troas, for instance, are all exceptionally interesting from this point of view. But there is a small group of reverses peculiar to such settlements the founder ploughing out the primigenius sulcus with a team of oxen, the wolf suckling Romulus and Remus, and the statue of 'Marsyas,' as it stood in the Roman Forum, the last being regarded as symbolical of the Latin right. As we might expect, too, colonial coins have often a specially military colour,—eagles or standards, bearing in many cases the names and numbers of the legions whence were drawn the veterans whose settlement had been the occasion of the bestowal of colonial privileges. The types that we can definitely associate with the general idea of a 'colonia' are thus, one and all, obviously commemorative in their nature. With them, therefore, we may fittingly conclude our review of the Roman coinage, the most striking feature of whose story has been the great development of the commemorative influence. In our next lecture we shall see the commemorative influence, in its turn, give way to the imitative and to an exceedingly curious revival of religion.

LECTURE VI.

At the close of last lecture we dealt briefly with the more important of the subsidiary mints which, under imperial sanction, succeeded in maintaining a quasiindependent existence for two or three centuries. Ultimately they too, like the ordinary local mints, had to suspend operations and leave unchallenged the monopoly subsequently enjoyed by the regular imperial Alexandria held out longest, doubtless owing to the peculiar advantages open to Egypt as the private domain of the emperor. Even at Alexandria, however, the local coinage came to an end in 296 A.D., the closing of the mint being one of the results of the reforming energy of Diocletian, who made a strenuous effort to bring order out of the chaos into which the currency of Rome was drifting. The kings of the Cimmerian Bosporus had long occupied a privileged position. Although their territory lay within the limits of the Empire, they had been allowed to strike gold coins, the usual—and latterly the invariable—types of which had been the imperial portrait on the one side and the bust of the royal vassal on the other. Their

gold issues gradually deteriorated, first into electrum, next into silver, and then into potin, and finally all attempts to mint anything less ignoble than bronze were given up. Their bronze, however, persisted until the reign of Constantine the Great. Its extinction marks the completion of the triumph won by the Roman coinage over the Greek that had given it birth. Henceforth, as far as the arm of Rome could reach, there was room for Roman money only.

Beyond the frontier it was different. In distant regions, like India and Abyssinia, autonomous coinages of Greek ancestry flourished uncontrolled and unthreatened. Just across the borders of Roman territory, however, there was an intermediate zone over the money of which the emperors professed to claim a certain limited jurisdiction. Thus the Parthian coinage, a direct descendant of that of the Seleucid kings, had been superseded in the earlier half of the third century A.D. by the issues of the revolting Sassanians. The Sassanidae never submitted to the political tutelage of Rome. And yet, according to Procopius, writing in the days of Justinian, "the king of Persia can strike as much silver money as he pleases; but neither he nor any barbarian king has the right to place his mark (or his portrait) on any piece of gold, however much gold he may possess, and no piece of the sort could have currency, even among the barbarians." A restriction of this kind could, of course, be effective only in so far as the power to enforce it existed. But it is interesting to

¹ Bell. Goth., iii. 33.

note that the statement of Procopius is borne out by Zonaras who tells us that Justinian II., in the end of the seventh century A.D., made it a casus belli with the Arabs that they had paid tribute in coin that bore a new Arabian stamp instead of the imperial one, "for it was not allowed to have any type impressed upon a gold coin save that of the emperor of the Romans."

To come back to pre-Byzantine times, it will be well to explain that, even after the coinage of the Empire had become wholly Roman, all Roman coins were not struck in the capital. Considerations of ordinary convenience dictated the establishment of branches of the mint in various centres throughout the provinces. We know of between twenty and thirty cities, including two in Britain, from which Roman imperial coins were at one time or another issued. Minor differences of style, no doubt, there were. But in their general appearance and in the character of their types all these coins resembled each other closely. Without the mint-mark it would almost require the eye of an expert to distinguish the products of London and Colchester from the pieces that had their origin in the very heart of the empire. Even the rise of 'usurpers' like Carausius did not affect the solidarity of the system. And the reason for this is obvious. Whatever the real seat of his power, every claimant of the purple professed to be emperor of Rome.

It was under Carausius that London first became a Roman mint. His name inevitably recalls the barbarian invasions, for his recognition as Augustus was associated with the urgent need that was beginning to be felt for

¹ Chronicon, xiv. 22. Cf. Gibbon, Decline and Fall, chap. lii.

making use of every available instrument to resist the outside pressure that was ere long to overthrow the Empire. This is, therefore, a suitable point at which to resume consideration of barbarous imitations. And we shall begin with Britain. Gold coins, it will be recollected, were not struck at Rome until the end of the Republic. But, long before the restless Helvetii provided Julius Caesar with an excuse for active interference, his countrymen had been pursuing in Gaul a policy of what it is now the fashion to call 'pacific penetration.' Where Roman traders went, Roman money became known. The earliest coinage of Gaul and Britain had consisted, as we have already learned, of imitations of the gold Philippus. Now a new native currency grew up, this time of silver, many of the types being directly borrowed from those of Roman denarii.

In Britain the movement is most noticeable about the beginning of the Christian era,—we may say, roughly, during the century that preceded the Roman conquest; and, there at least, it was accompanied by something like an artistic revival. The coins of Cunobelinus, the Cymbeline of Shakespeare,—to take a prominent example—are found in all three metals.¹ The gold pieces are descended from the Philippus.² The silver and the bronze are remarkable for the variety of their subjects, which are often borrowed from classical mythology and can sometimes be traced back to a Roman original. On the whole, their execution is surprisingly good. With the definite consolidation of Roman

¹ See Evans, Coins of the Ancient Britons, pp. 284 ff.

² See supra, pp. 86 ff.

authority in Gaul and Britain these independent coinages naturally came to an end, as the mintage of Spain had done at a much earlier period. In Spain and in Gaul a few privileged 'coloniae' and 'municipia' were permitted to strike money under the earlier emperors. Before the middle of the first century A.D. that privilege had been everywhere withdrawn. The West can show nothing to correspond to the so-called 'Greek Imperial' issues of the East. Its money is all purely Roman from the reign of Nero onwards until the day when the barriers of the Empire were finally broken down by the new nationalities who had so long been thundering at its gates.

After the Visigoths, Vandals, Ostrogoths and other 'barbarian' peoples had fairly established themselves on the territories they chose for permanent settlement, they adopted many of the institutions of Roman government. By this time the practice of minting money was an indispensable element in the organization of every reasonably well-ordered community, and it could not but be continued. As a matter of fact, it was taken over in a particularly whole-hearted fashion. earliest money of the new nations was entirely composed of direct, and not always very skilful, imitations of the imperial currency. Until after the middle of the fifth century A.D. no coins were struck in Europe bearing the name of a 'barbarian' ruler. The persistent employment of the imperial types was certainly calculated to secure for the issues that bore them a more general acceptance than would otherwise have been possible. And it must be remembered that many of the 'barbarian' kings and princes maintained the

making use of every available instrument to resist the outside pressure that was ere long to overthrow the Empire. This is, therefore, a suitable point at which to resume consideration of barbarous imitations. And we shall begin with Britain. Gold coins, it will be recollected, were not struck at Rome until the end of the Republic. But, long before the restless Helvetii provided Julius Caesar with an excuse for active interference, his countrymen had been pursuing in Gaul a policy of what it is now the fashion to call 'pacific penetration.' Where Roman traders went, Roman money became known. The earliest coinage of Gaul and Britain had consisted, as we have already learned, of imitations of the gold Philippus. Now a new native currency grew up, this time of silver, many of the types being directly borrowed from those of Roman denarii.

In Britain the movement is most noticeable about the beginning of the Christian era,—we may say, roughly, during the century that preceded the Roman conquest; and, there at least, it was accompanied by something like an artistic revival. The coins of Cunobelinus, the Cymbeline of Shakespeare,—to take a prominent example—are found in all three metals.¹ The gold pieces are descended from the Philippus.² The silver and the bronze are remarkable for the variety of their subjects, which are often borrowed from classical mythology and can sometimes be traced back to a Roman original. On the whole, their execution is surprisingly good. With the definite consolidation of Roman

¹ See Evans, Coins of the Ancient Britons, pp. 284 ff.

² See supra, pp. 86 ff.

authority in Gaul and Britain these independent coinages naturally came to an end, as the mintage of Spain had done at a much earlier period. In Spain and in Gaul a few privileged 'coloniae' and 'municipia' were permitted to strike money under the earlier emperors. Before the middle of the first century A.D. that privilege had been everywhere withdrawn. The West can show nothing to correspond to the so-called 'Greek Imperial' issues of the East. Its money is all purely Roman from the reign of Nero onwards until the day when the barriers of the Empire were finally broken down by the new nationalities who had so long been thundering at its gates.

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fiction that they were merely the vassals of the emperor. The action of Odoacer, the first of them to place his own name upon his coins, is very significant.¹

When he put an end to the Western Empire in 475 A.D. by deposing Augustulus, Odoacer was taking a step that was nominally in the interests of imperial unity. He sent a deputation of the Roman Senate to Constantinople to lay at the feet of Zeno, the Eastern Emperor, the imperial insignia of the West, and to assure him of the allegiance of the new kingdom of Italy. He struck imperial gold and silver in the mints of Rome, Ravenna, and Milan, while the Roman Senate -reviving the arrangement originally instituted by Augustus—reverted to the custom of striking bronze with the letters S C in the field. Gold, silver, and bronze alike bore the head and the name of Zeno. Before the end of his reign Odoacer ventured to assume a certain initiative in the matter of money. He issued silver which had the name and portrait of his 'suzerain' on the obverse and his own monogram on the reverse, and also copper on which his personal responsibility was flaunted, naked and unashamed. It will be noted that even he did not trench on the imperial prerogative so far as to coin gold. This bold innovation was reserved for the Frankish king Theodebert, the Austrasian, (534-547 A.D.) whose action amounted to an absolute defiance of the authority of Justinian. Yet it was only in the name that any alteration was made. The types on both sides, and also the legend on the reverse, were exact copies of what were to be found on Justinian's own coins. This last feature is typical of the career on

¹ See F. Lenormant, La monnaie dans l'antiquité, ii. pp. 442 ff.

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238	V. Palaeologus (1341-1391 A.D.): bronze,	
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which the coinages of Western Europe generally were about to enter. For centuries the blind, untutored imitative instinct was to exercise practically undisputed sway.

In the Eastern Empire the same instinct was by no means inactive; its vitality is always quickened when the creative faculty falls dormant. But the story of Byzantine types has an interest that is all its own. To understand the course of its development, we must go back a little way, and see how a new element had gradually asserted itself. Until the reign of Constantine the principles which we saw in operation under Augustus continued to regulate the choice of types for the imperial money-for the obverse, the portrait and name of the emperor or of some member of his family, and, for the reverse, designs of a commemorative or a conventionally religious character, frequently accompanied by a descriptive legend. have said 'conventionally religious,' because it will hardly be contended that any real sanctity attached to them; there could be no question of invoking the witness of the gods on some coins, when frankly secular types were freely admitted upon others.

The art on the money of Constantine and his colleagues is sadly degenerate. The old skill in portraiture has been almost entirely lost, while the reverse types are far less varied and far less well executed than they once were. Most of them are but dull copies of the designs the engravers had found on earlier pieces. Yet, in spite of their generally monotonous character, they supply us with examples of all the great classes we met with during the epoch

to which the finest imperial pieces belong. Thus, religious types are represented by Jupiter, Hercules, Mars, the Sun, and the goddess Roma; personifications of qualities by such figures as Valour, Concord, Victory, and Security; personifications of countries and cities by figures of Africa, Alamannia, Francia, and Constantinople; architectural types by the gate of Trèves with the river Moselle flowing in front of it; military types by legionary standards and trophies; commemorative types by representations of the Emperor receiving Victory from the hands of Jupiter; and so on.

It was into this heterogeneous mass that the new element was more or less suddenly projected. Thanks to the full and careful researches of M. Jules Maurice, the study of the numismatics of the Constantinian period has now been placed on a strictly scientific basis.¹ The exact date at which the leaven of Christian symbolism was introduced can therefore be definitely determined. The effects of the change were destined to be very far-reaching. The new religion was to become as prominent a factor in determining the types of Byzantine coins as the old religions had been in the case of the money of the Greek cities and states before the Roman supremacy. And yet, in the first instance, the occurrence of Christian emblems on coins was, so to say, almost fortuitous. They were not adopted

¹ M. Maurice's results have been published in a series of papers appearing in different periodicals, notably the *Numismatic Chronicle* and the *Revue Numismatique*. In the application of exact method to the coins of this period he was so far anticipated by Otto Voetter, "Erste Christliche Zeichen auf römischen Münzen" (*Num. Zeit.*, 1892). Madden's articles in the *Num. Chron*. (1877 and 1878), although now out of date, contain a good deal that is still of interest

deliberately as out-and-out rivals to the symbols of the pagan cults. The earliest to make their appearance figure rather as subsidiary devices.

The tale of Constantine's vision of the Cross is one of the most familiar in history. Eusebius relates, on the authority of the Emperor himself, how the sacred sign was revealed to him and his army in the noonday sky as they were advancing to the decisive battle with In spite of the words ΤΟΥΤΩΙ NIKA Maxentius. attached to it, the import of the omen seemed dubious, and Constantine was sorely perturbed until night, when Christ appeared to him in a vision and told him to make a standard in the shape of the sign that had been shown him and to use this as a protection against his enemies. The result was the construction of the famous labarum, or Standard of the Cross, which Eusebius describes for us from personal observation.² It consisted of a long spear covered with gold and transformed into a cross by the addition of a transverse bar. It was surmounted by a crown of gold and precious stones, on which was a monogram formed of the first two letters of the name of Christ. The monogram afterwards came to be regarded as emblematic of the whole and to be used practically as the imperial crest. We are told that it was painted on the shields of the soldiers, and that the Emperor wore it on the front of his helmet.

The defeat of Maxentius took place in the autumn of 312 A.D. It left Constantine master of the West, the control of the East being in the hands of his colleague

¹ De Vita Const., i. 28.

² Op. cit., i. 30.

Licinius. A war between the two broke out in 314 A.D. Constantine was so far successful, but he did not push matters to extremities. He granted terms to his rival, and lived in peace with him for nine years. In 323 A.D. he attacked and overthrew him, thus gaining the command of the whole Roman world. as the relations of the two were friendly, each struck coins in the name of the other at the mints over which he exercised direct control. Coins of Licinius, for instance, were issued at London, just as coins of Constantine were issued at Alexandria or at Antioch. The lesser lights of each imperial family are similarly represented. In the case of all alike, the reverse types are, as has been indicated, of the usual traditional character. Sometimes there are clear traces of a tendency to associate particular deities with the different personages named on the obverse.1 But, for our present purpose, it would be idle to attempt to discriminate between Constantine's types and those of Licinius. The one set are as frankly 'pagan' as the other.

It was at the mint of Tarraco in Spain that Christian emblems made their appearance soonest.² In the year 314 A.D., probably after the outbreak of the first war between the two emperors, coins were struck there having the cross as a symbol in the field of the reverse, the type itself being of the usual pagan character. Maurice reminds us that some twelve months earlier Constantine had accorded certain privileges to the Christians as the result of

¹ E.g. Maurice, Num. Chron., 1900, pp. 323 ff.

² This was first demonstrated by Voetter, op. cit., p. 43.

the conference with Licinius at Milan.¹ A more remarkable, because a more widespread, manifestation of a similar sort took place about the year 320 A.D. when the \$\mathbb{X}\$ monogram was simultaneously employed at Tarraco, Aquileia, Siscia, Thessalonica, and Trèves.² In most cases it figured as a symbol in the field, but at Siscia we get it on the Emperor's helmet—a mere detail, as it were, of the portrait. Here again, as Maurice has shown, the phenomenon coincided with a distinct accentuation of Constantine's pro-Christian policy.³

Interesting as these facts are, it would be easy to exaggerate their importance. They are, I think, the indirect, rather than the direct, reflection of the state of the imperial mind. We can best account for the curious inconsistencies they involve by supposing that they are the result of a dual control. general similarity in legend and type between contemporary issues of the various mints throughout the Empire points to the existence of a central authority. Minor variations indicate that some degree of latitude was allowed to local officials. And it is among minor variations that I would class the earliest Christian emblems. They would hardly have been introduced had those responsible for them not felt secure against imperial displeasure. At the same time, their introduction was not due to imperial orders. Some such hypothesis is necessary for a satisfactory explanation of the frequent blending of Christianity

¹ Rev. Num., 1900, pp. 283 ff.

² Maurice, Num. Chron., 1900, pp. 330 f.

³ Rev. Num., 1900, pp. 296 f.

and paganism; of the contrast between Tarraco, where Christian emblems are displayed so early, and London, where they are never found at all; and also of the occasional occurrence—at Constantinian mints, of course—of the **monogram on coins struck in the name of the pagan emperor Licinius.

After the defeat and death of Licinius, both the \$ and the cross tend to become increasingly prominent, while types representing heathen deities begin to disappear. In 326 A.D., the year following the Council of Nicaea, a remarkable piece was struck at the mint of Constantinople.3 The reverse type consists of the labarum itself standing upright, with the monogram on the top, and having its lower end thrust through the body of a serpent (Plate viii. 13). This is an obvious allegory of the triumph of Christianity in the person of Constantine. It recalls a picture which Eusebius describes 4 as hanging in the vestibule of Constantine's palace, the Emperor being shown piercing the serpent that represented the enemy of the human race. Elsewhere the same writer reproduces a letter of Constantine's in which his rival is described as a 'serpent.' This type, however, is quite exceptional. For the most part, the labarum remains what it originally was—an adjunct of the emperor or of his army. Sometimes the emperor is seen holding it in his hand (Plate ix. 1), or again it is planted in the ground between two soldiers. A very interesting coin of Constantius II. (Plate ix. 2) has the former of these

¹ Maurice, Num. Chron., 1900, p. 138.

² Ibid., p. 339.

³ Maurice, Rev. Num., 1901, pp. 183 f.

⁴ De Vita Constant., iii. 3.

⁵ *Ibid.*, ii. 46.

devices accompanied by a translation in Latin of the Greek motto of the vision,—'HOC SIGNO VICTOR ERIS,' while a figure of Victory places a wreath on the Emperor's head. Even more striking in its way is a piece of the same ruler on which the * standing alone occupies the centre of the field and is supported to left and to right by the A and ω , the legend being SALVS AVG NOSTRI, 'the health of our Emperor.' This type, with a longer legend, is repeated under Magnentius (Plate ix. 3). It is perhaps worth remarking in passing that the use of the first personal pronoun in these and many similar inscriptions of the later empire points in the same direction as certain uses of the dative case that were discussed in last lecture. Who are the NOS, unless it be the moneyers speaking on behalf of the emperor's subjects?

The significance of the types we have just been describing is unmistakable. Their constantly increasing popularity is a testimony to the growing importance of Christianity as a social and political force. In the circumstances of the time we must look upon the Christian symbols as party emblems. They were placed upon the coins, not from any feeling that money was a sacred thing, but in very much the same spirit as was displayed by the armies that went into battle with the labarum carried in the van surrounded by a picked bodyguard of fifty men. And yet their use as party emblems could not, of course, divest them of their essentially religious character. We see this most clearly by contrast with the reaction they provoked. The temporary revival of paganism under Julian the Apostate not only caused them to vanish entirely, but

produced a series of types, the religious bearing of which is more clearly marked than that of any group we have encountered for a very long time. money of Julian shows a certain number of reverse types of the traditionally commemorative character, the Emperor triumphing over his foes (Plate ix. 4), Victory writing on a shield, and the like. The majority of them, however, are religious, and not merely conventionally religious, for they exhibit representations of the Egyptian deities who commanded Julian's special reverence. Sarapis, Isis, Osiris, and the bull Apis are particular favourites. Whether this was due to direct imperial command or to a natural desire on the part of the moneyers to gratify their master is a matter of little moment. In either case the new types furnish a counterblast to the Christian symbols of Constantine and his successors. They bear witness to Julian's religious beliefs, not to the sanctity of coins.

When Christianity was once more supreme, the Egyptian types disappeared, and there was a return to the devices that had been customary before their introduction. So far as the Western Empire is concerned, there is little more to be said. From the death of Julian until the deposition of Augustulus there is hardly any change of importance to be mentioned. The chief features for remark are the gradually increasing monotony of the types,—figures of Victory, and of emperors and empresses predominate,—and the introduction of the simple cross as a separate device. But the death of Theodosius I. in 395 A.D. had led to the final division of the Empire, and the types of

Byzantium call for special attention. At first there is not much to notice. As in the West, we have continuous stylistic degeneration and a growing monotony of subject, tendencies which are not checked until the remarkable, if temporary, renaissance which set in about the ninth century. Artistically the most interesting point is the transition from profile to full face treatment. The latter method of representation had been employed occasionally at Rome even before the division of the Empire, and it became fairly common there afterwards. At Byzantium we can trace its rapid advance in popularity until the time of Justinian (527-565 A.D.), after whose reign it has an almost absolute monopoly. A good seventh century example is the coin of Constans II. figured on Plate ix. 6.

So far as subjects are concerned, the types follow the trend that was observable at Rome. Personifications of qualities practically cease. Victory alone maintains her place. Indeed, she does more, often forming one of a group which includes the emperor or members of his family. The cross, too, makes gradual headway, sometimes held in the hand of Victory (Plate ix. 5), but ultimately as an independent type, usually, in technical terminology, 'a cross potent, upon three degrees' (Plate ix. 6). A form of reverse that became characteristic of Byzantine copper coins was the simple value-mark, eloquent, like the reverses of our own shilling and sixpence, of the poverty of artistic invention. In the course of the fifth century A.D., however, a note of novelty had been struck in the remarkable piece on which the figure of Christ was for the first time employed as a type. This innovation was prompted

not by a religious, but by a commemorative, motive.

The coin is known to us by a single specimen, now in the Hunterian Museum (Plate ix. 8). It is a gold solidus, struck about 450 A.D. on the occasion of the marriage of Pulcheria to the Emperor Marcian. The obverse presents us with a bust of Marcian, helmeted and holding spear and shield. On the reverse are the bride and bridegroom standing with clasped hands. In the background, between them, is the figure of Christ with a hand laid on the shoulder of each. It is the 'dextrarum junctio,' often represented in antique works of sculpture and on earlier coins, where, however, the place now filled by Christ is occupied by Juno Pronuba, the goddess "cui vincla jugalia curae." The inscription reads FELICITER NVBTIIS, which Eckhel, with his neverfailing aptness, illustrates by the lines of Juvenal:

"Signatae tabulae, dictum FELICITER, ingens Coena sedet, gremio jacuit nova nupta mariti."

The full meaning of the group on this particular coin was not recognized until a few years ago when a very similar solidus found its way into the Berlin Museum. In publishing the second coin Prof. Dressel was able to throw a striking light upon the first.²

The Berlin piece (Plate ix. 7), which is in wonderfully fine preservation, was issued thirteen years earlier, and commemorates the marriage of Valentinian III. to Eudoxia, daughter of Theodosius II. The obverse has the armed bust of Theodosius, facing. In type and inscription the reverse closely resembles that of the

¹ Sat. ii. 119 f.

² Z.f.N., xxi. pp. 247 ff.

Hunter solidus. But it is not Christ who takes the place of Juno Pronuba. It is Theodosius II., father of the bride and head of the imperial family. A comparison of the two coins shows that the later is modelled very directly on the earlier. Why, then, the difference in the central figure? Dressel's answer is convincing. It was symbolical of the nature of the marriage, which, historians tell us, was a spiritual one only. Pulcheria had taken the vow of chastity in her youth. When her brother Theodosius II. died, she was past the prime of life. Upon her as Augusta rested the duty of selecting a colleague to share with herself the burden of imperial responsibility. She chose Marcian, a man of humble birth but sterling qualities. To raise him to rank worthy of the purple, she asked him to be her husband. But, according to Zonaras, this offer of a throne was accompanied by the express stipulation that her youthful vows were to be respected.1 The significance of the type is plain.

This interesting coin apparently stands by itself. For more than two hundred years we meet with nothing like it. Then on the coins of Justinian II. (685-695 A.D. and 705-711 A.D.) we get the bust of Christ as an ordinary reverse type (Plate ix. 9). It is shown with the cross in the background, the gospels being held in the left hand, while the right hand is extended in the act of bestowing a benediction. The accompanying legend is Ins CRISTOS REX REGNANTIVM. The obverse is an appropriate pendant. It shows the bust of the Emperor, facing as is now usual, holding a cross and surrounded by the words DN IVSTINIANVS

SERVVS CHRISTI. The appearance of such coins at this precise juncture is exceedingly interesting.

It was in the reign of Justinian II. that the Moslems first gained a secure footing in Asia Minor, and thus became a serious menace to the rulers of Constantinople. The antagonism was not merely racial and political. It was also religious. Now, it was Justinian's contemporary, the caliph Abd-el-Melik, who initiated the Mussulman coinage, the Arabs having hitherto used the Byzantine and the Persian currencies. This step is said by tradition to have been taken in consequence of a threat made by Justinian that he would place upon his coins devices offensive to Islam. The story in this form may or may not be accurate. But that there is solid fact behind it, seems certain from the actual numismatic evidence. The legend on the reverse of the silver coins of Abd-el-Melik reads like a deliberate reply to the challenge conveyed by the bust of Christ and the words 'King of Kings.' It runs: "Mohammed is the apostle of God, who sent him with the guidance and religion of truth, that he might make it triumph over all other religions in spite of the idolaters."

The last five words are peculiarly enlightening. Representations of living things were an abomination to all true followers of the Prophet. There is no express prohibition of them in the Koran. But there are several traditional sayings of Mohammed bearing on the point. The best known is the rebuke he administered to his wife Ayesha, who had bought for his use a riding cushion on which pictures were worked. Mohammed said to her, "The people who make these things shall be punished in the day of Resurrection; it

shall be said unto them, Make what you have created live." And he added, "The house in which these drawings are, the angels do not enter." With one or two exceptions (which really belong to the category of barbarous imitations) Mohammedan issues all the world over testify to the respect with which this obiter dictum has been treated by the Faithful. The coins have no types. The decorative instinct has to be satisfied with picturesque arrangements of the inscription or with elaborate monograms such as are found to-day on the current money and the postage stamps of the Turkish Empire.

The types and legends on the coins of Justinian II. thus furnish clear testimony to the manner in which the Byzantine emperors were becoming identified with the profession—one dare not say with the practice—of Christianity, as opposed to the gathering force of Islam. They have another feature of great interest. appearance, just at this particular time, of actual representations of Christ is evidence of the importance to which sacred images had now attained. The Church was on the eve of a tremendous reaction. Justinian II. was put to death in 711 A.D. Five years later Leo III.. the Isaurian, the first and greatest of the 'iconoclasts,' succeeded to the imperial throne. He it was who issued the famous edict against images, and thus produced the convulsion that finally sundered the Greek Church from the Latin. As we should expect, the bust of Christ is not found upon the coins again until the day of the iconoclastic emperors was over. It should be noted, however, that unlike some zealots of a later age, they did not place the cross itself under their ban. It was, in fact, one of their most common coin-types,

and is often seen surrounded by the inscription Insvs XRISTVS NICA—' Jesus Christ is Conqueror.'

Just a century after the death of Justinian II. the head of Christ was reintroduced upon the Byzantine coinage by Michael I. (Rhangabé), who was likewise the first emperor to lend renewed countenance to image worship. The revival, however, was only temporary, so far at least as the coins were concerned. It was not until 842 A.D., when Theodora, widow of Theophilus, assumed the regency on behalf of her young son, afterwards Michael the Drunkard, that a Council sitting at Constantinople definitely pronounced anathema on the image-breakers. From this date representations of Christ upon coins become more and more numerous and varied. Frequently we get the full figure,—sometimes seated, sometimes standing. About fifty years later we encounter, for the first time, the head of the Virgin as a reverse type. After this we see her pictured in many attitudes. Often she holds a medallion on which is the head of Christ. Occasionally she is seated with the Holy Child upon her knee. One very rare bronze coin represents her thus, with the Magi offering their adoration (Plate ix. 11). In this last case the accompanying legend is "Blessed among women." More usually it is the simple description, "Mother of God." Nor are Christ and the Virgin the only sacred personages who appear. Saints are also very common. The earliest example is probably St. Alexander blessing the Emperor Alexander, son of Basil I. (912-913 A.D.). But it was not until the end of the following century, under Alexius I., that

the practice of introducing saints into coin-types acquired a permanent hold. St. Demetrius, St. George, St. Michael, and St. Theodore were among the most popular.

We have now reached a period when the representations on coins have come to be divided fairly equally between imperial portraits and religious types of the nature that has been indicated above. It may be repeated once more that this extraordinary phenomenon is not a proof of the religious theory of coin-types as such. Devices of precisely the same character occur on contemporary seals. The parallelism between the two is obvious enough on the surface, and detailed study serves only to emphasize it. We may indicate some of the more striking points of resemblance, drawing the materials from Schlumberger's splendid Sigillographie de l'Empire Byzantin.

Imperial and other portraits are occasionally found on seals. As, however, the great majority of the surviving specimens are the signets of private individuals or of corporations, portraiture is much less common than it is upon coins. A very few show reproductions of buildings, while a small but exceedingly remarkable class presents us with heraldic emblems—lions, wolves, griffins, eagles, winged oxen, cocks, and the like. Although there is nothing in Byzantine numismatics to correspond to this last group, the analogy with the primitive currency of Asia Minor is worth drawing attention to. But by far the larger number of the seals are concerned with religious subjects of the very kind that is to be met with so frequently on contemporary coins. The method of

treatment too is identical. Many have the bust or the full figure of Christ. The Virgin is even more popular, and Schlumberger's collection includes examples of about fifty saints. Under the iconoclastic emperors such representations disappeared from seals just as they disappeared from coins. They were replaced by lengthy inscriptions, by monograms, or by crosses.

So much similarity is, of course, the outcome of a general tendency. It implies movement on parallel lines. At the same time, each of the two sets of things must have influenced the other. Of this mutual influence the stronger current must, I think, have been that which issued from the seals. The circumstances were such as to admit of, or even to encourage, a greater degree of inventiveness in sealengravers. They worked for many masters, and they were required to produce distinctive designs. Granting that they had to keep within conventional limits, we cannot but allow that they had wider scope than the engravers of the mint. As a matter of fact, their devices are much more varied. The heraldic group, for instance, as has been already pointed out, has nothing to correspond to it upon the coins, whereas there is no class of coin-type to which we cannot find a counterpart among the seals. Thus, beside the single type representing the Adoration of the Magi we can set the seals which depict such scenes as the Annunciation, the Presentation in the Temple, the Transfiguration, the Crucifixion, and the Resurrection.1

The conclusion suggested above is fully confirmed by the inscriptions. In the first half of the seventh

¹ Schlumberger, op. cit., pp. 24 ff.

century A.D. the Emperor Heraclius (614-641) had placed the legend DEVS ADIVTA ROMANIS on the reverse of some of his coins which bear the type of the cross. His successors followed his example, and, had the brief prayer stood alone, we might have regarded it as a sort of national motto or confession of religious faith. By and by, however, we find its place taken by a personal invocation. Thus, Theophilus (829-842 A.D.) and Michael VII. (1071-1078 A.D.) have Κυβιε ΒΟΗΘΕΙ Tω Cω ΔΟΥΛω ('Oh Lord, help Thy servant'), while Alexius I. (1081-1118 A.D.) employs CωτεΡ CVNEPFEI BACIAEI AAESIW ('Saviour, lend Thine aid to King Alexius'). Equally interesting are the appeals to the Virgin. A silver coin of Constantine Monomachus (1042-1055 A.D.), for example, has on the one side a figure of the Emperor facing, holding a cross and a sword in its sheath, accompanied by the inscription EVCEBH MONOMAXON. On the other side is the Virgin standing with hands raised in the act of benediction, surrounded by the words ΔεcΠΟΙΝΑ cωzoic (Plate ix. 10). The whole forms a single sentence—'Oh lady, do thou keep in safety Monomachus the Pious.

 purpose which the seal was meant to serve, often couched in the first person like the earliest of all coin inscriptions. A common formula is 'I seal the writings of so and so.' Another is 'I am so and so's seal.' But there are many variants. An interesting example in Schlumberger's own collection, for instance, recalls (with a curious difference) the inscription just quoted from a coin of Monomachus. The legend runs: $\Delta \varepsilon \varepsilon \Pi OIN\alpha \ \varepsilon \omega ZOIC \ TAC \ \Gamma PA\Phi AC \ \varepsilon \varepsilon P \gamma lov.^2 \ In the case of many private seals the words are arranged so as to form an iambic trimeter, such as OY <math>C\Phi PA\Gamma IC \varepsilon IMI \ THN \ \Gamma PA\Phi HN \ OP \omega NO \varepsilon I, — 'Look at the writing and see whose seal I am.'$

To the latter class of inscriptions the coins, naturally enough perhaps, provide no parallel. On the other hand, they present us with something equally remarkable,—illustrations of the fully developed coin motto. Thus, there are rare gold and silver pieces, anonymous but probably struck by Romanus IV. (1067-1070 A.D.), which read on the obverse OC ΗΛΠΙΚΕ ΠΑΝΤΑ KATOPOOI round the figure of the Emperor facing, with a cross in his right hand and in his left a globe surmounted by a smaller cross. The reverse shows the Virgin standing holding the infant Christ in her arms, while round about are the words ΠΑΡΘΕΝΕ COI ΠΟΛΥ-AINE (Plate ix. 12). Sabatier3 treats these as separate legends, beginning with the obverse, and translates: ' Qui espère en toi, réussit en tout. En ton honneur, Vierge très-glorieuse,' thus giving the second the form of a dedication. Obviously, however, we ought to take

¹ See supra, p. 51. ² Schlumberger, op. cit., p. 43. ³ Monnaies Byzantines, ii. p. 172.

the two sides together, putting the reverse first, for then we get the hexameter line:

Παρθένε σοι πολύαινε ος ηλπικε πάντα κατορθοί

"Whoso hath set his hope on thee, most glorious Virgin, he succeedeth in all things." This, it will be seen, is a motto of perfectly general application. So far as I know, it is also the oldest clear example of a metrical inscription on coins, although (as Eckhel long ago pointed out) the EXPECTATE VENI of Carausius is an unmistakable reminiscence of the Virgilian

'Quibus Hector ab oris

Expectate venis?

Incidentally it may be remarked that there was a certain commercial convenience attaching to the employment of religious types. From the ninth to the twelfth century no gold coins were struck in Western Europe at all. The Byzantine pieces-'bezants,' as they were called—formed the gold currency of all Christendom. Even the silver coins of Byzantium were readily accepted. Wyclif in his translation of the Bible uses the term 'besauntis' both in the parable of the Talents and in the parable of the Woman having the Ten Pieces of Silver. The fact that they bore sacred symbols would undoubtedly facilitate their free circulation. Not that this advantage was more than an accident. The analogy of the seals shows that the true explanation of the religious types lies much deeper down-in the character of what Schlumberger calls the most pious people the world has ever seen. Special causes, however, may also be traced. In regard to the seals an important factor was probably the circumstance that they were so largely used by ecclesiastical dignitaries and corporations. In the case of the coins it has to be remembered that the political forces by which the history of the Byzantine Empire was determined moved, to a large extent, along the lines of religious cleavage. In particular the long drawn-out conflict with the Saracens must have operated powerfully in the direction of emphasizing the political, as opposed to the purely religious, significance of the cross as an emblem. It is only natural to suppose that a similar significance may have come to be associated with the sacred images as a consequence of the importance to which the veneration of them had attained. And there is one point where the stimulus generated by rivalry with the Mohammedan money seems clearly apparent.

Precluded, as we have seen that they were, from the use of types, the Mohammedan rulers fell back upon inscriptions. The whole field of a coin might be covered with writing, and a great opportunity was thereby presented. The marginal inscription on the reverse of the silver 'dirhem' of Abd-el-Melik has already been quoted. The same side had in the centre the words, "God is One, God is the Eternal. He begetteth not, neither is He begotten. There is none that is like unto Him." Round the margin of the obverse were the date and place of striking, while in its centre was the text, "There is no god but God alone. There is none that shareth with Him." The 'dirhems' of Abd-el-Melik may fairly be taken as typical of orthodox Mohammedan coins generally. And it may be added that the motive that underlay

the use of such texts was not essentially different from that which, twelve hundred years before, had prompted the Athenians to place the head of their patron goddess on their tetradrachms. In the face of such aggressive proclamation of religious belief as was indulged in by the Saracens, can we wonder that, as time wore on, the coins of the Byzantine emperors should have become more and more deeply tinged with the corresponding colour?

Sometimes even the personal element vanishes entirely. Thus, a series of common but unattractive bronze pieces, which bear no name, show simply a bust of Christ on the obverse and a cross on the reverse (Plate ix. 13). They are attributed by Sabatier to the time of the Latin emperors (1204-1261 A.D.). If this view be correct, then the Crusaders who drove out the Greek dynasty and established a Latin empire on the Bosporus, adapted themselves absolutely to the Byzantine tradition. The cross, by the way, is sometimes planted on the crescent. And this crescent deserves special notice as being the only strictly secular feature on either side of the coins. It is, in all probability, a local allusion. The crescent was an emblem of ancient Byzantium. It occurs on her coins in the first century B.C., and its use as a badge of the city must have endured for fifteen centuries, for its adoption by the Turks as a military and religious crest dates from their capture of Constantinople. It is very interesting to think that their action in borrowing the local emblem may have been to some extent anticipated by the Crusaders.

¹ It is not accepted by Schlumberger (Num. de l'Or. Lat., p. 271).

In the petty empires set up by the exiled Greek imperial family at Nicaea, Trebizond, and Thessalonica, the minting traditions of Byzantium were faithfully perpetuated. In 1261 A.D. Michael VIII., Palaeologus, drove out the usurpers and recovered the city for the Greeks. Some of his gold coins allude directly to his victory (Plate ix. 14). The reverse shows Christ seated, with the nimbus round His head. At His feet kneels the Emperor supported by his patron saint, St. Michael. The obverse has the Virgin as the central figure. She stands with hands uplifted, also wearing the nimbus, while round about her is a framework representing the walls of Constantinople. This is at once a revival of the commemorative influence and a return to the architectural type. The whole design is peculiarly appropriate for one who called himself 'the new Constantine.' Nor did his successors cease to pride themselves on their retention of the capital. The bronze pieces of John VIII., Palaeologus, (1423-1448 A.D.)—almost the last coins struck by a Christian ruler in Constantinople—have on the obverse the Emperor standing to front, holding the labarum in his right hand, and a model of the city in his left. Above, a hand from Heaven—the symbol of the First Person of the Trinity-stretches down to bless him. The reverse has also a full-length figure, probably a saint. The inscription consists merely of two letters, the initials of the Emperor's name. The contrast with the Mohammedan coinage could hardly have been more complete.

For the sake of continuity it was desirable to follow to its end the story of the coin-types of the Eastern Empire. We must now return to the West, and see what had been happening there in the interval. The details are far too complicated to be entered upon within the limits of time at our disposal. Besides, they have already been luminously and instructively treated by Mr. C. F. Keary in a series of papers published a good many years ago.¹ In the circumstances I shall not attempt to do more than indicate shortly the general principles by which the development of particular phenomena has been regulated.

As was stated earlier in the lecture, the dominating principle was the imitative one, and sometimes the imitation has all the characteristics of barbarism. As the various peoples that served themselves heirs to the possessions of Rome, took the Roman coinage as a model, there is a certain resemblance between the currencies of them all, although in course of time each group naturally developed special features of its own. The earliest English coins, for instance, the Anglo-Saxon sceattas and the Northumbrian stycas, are readily distinguishable from contemporary Continental coinages, and yet, as Mr. Keary has shown, they were originally imitations of Merovingian money, which in its turn was directly derived from the issues of the later Roman emperors. Some of the processes of degradation are exceedingly interesting, notably that which resulted in the production of the so-called 'bird type' (Plate x. 7, 8, and 9). By a curious cross current the influence of the original source was infused into these old English coins in a much less roundabout fashion. Some of the

^{1 &}quot;The Coinages of Western Europe" (Num. Chron., 1878 and 1879) and "The Morphology of Coins" (Num. Chron., 1885 and 1886).

sceatta and styca types appear to be modelled immediately upon Roman coins. They must have been copied from specimens which continued to circulate in Britain after the withdrawal of the legions.

The sceattas were mainly of silver, the stycas almost entirely of copper. The Merovingian currency to which their parentage has been traced was chiefly of gold. This feature it shared with the other barbarian coinages that derived immediately from Rome. A great epoch in the monetary history of Europe is marked by the reign of Pepin the Short. He abandoned gold, and struck a new silver denarius which became the standard coin throughout his dominions. His lead was followed practically everywhere throughout the West,-metal, fabric and types being all alike copied by other rulers,—and the effects of his action persisted for centuries after his death. The Carlovingian types were, to some extent, novel. Some, indeed, were not types at all, the field on both sides being occupied by the legend (Plate x. 5). This reminds us inevitably of the Mohammedan money, and it seems quite probable that Mr. Keary is right in detecting here the influence of Arabic coins, then very common in north-western Europe. The presence of these Arabic coins in regions so far from the country of their origin used to be attributed to the raids of the Vikings. It now seems much more likely that they travelled in the ordinary course of trade across the Russian steppes from the east of the Caspian. On those Carlovingian pieces where types are used the prominence accorded to the inscription is a new feature. The characteristic

¹ See v. Zambaur, Monatsblatt der Numismatischen Gesellschaft in Wien, December, 1902.

devices were few in number, but they had many descendants. The emblem of the cross, surrounded by a circular inscription, became the commonest of all reverse types. The bust, sparingly used by the earliest Carlovingians, was much more popular on some of the coinages they inspired. In England, for example, almost immediately after Pepin's great reform, the lumpy sceatta was replaced by the broad, thin penny, the usual types of the latter being a bust and a cross. The English penny in due course became the model of the first Scottish money—the coins of David I. The remaining Carlovingian devices also gave birth to numerous imitations, more particularly in France and in Germany, among the most popular being the monogram containing the King's name, and what is usually known as the 'temple type.' Another of considerable interest is the representation of a city gate (Plate x. 6).

The sameness that was produced by the course of development indicated, had a certain convenience. Where, as under the feudal régime, it was possible for a fairly large number of mints to be active at the same time within a comparatively narrow area, it was well that the coins issued should resemble one another so closely that they could circulate side by side. But it is doubtful whether any motive of this kind was consciously operative. It is much more likely that the real reason lay in the poverty of invention that inevitably resulted from the paralysis under which the fine arts were suffering.

It is curious to note that the use of the inscription must have exerted, during the period now under review, an influence of precisely the opposite character to that

which we saw reason to attribute to it in antiquity.1 When the use of writing became common on Greek coins, it diminished the necessity for each city retaining a type or types peculiar to itself, and rendered it much easier to employ different devices for different denominations. Art was a living thing. The creative impulse was there, and it rejoiced to find an opportunity for exer-But in the dark ages of Western Europe it was quite otherwise. The designers had little originality. Of their defect, however, they were barely sensible. long as the letters denoting the name of the ruler or the mint were sufficiently large and legible, a characteristic design was not felt to be necessary. Not seldom, it is to be feared, there was a more sinister motive at work in producing the imitation. Chautard has succeeded in clearing the character of some of the princes who were responsible for the 'counterfeit sterlings,' or copies of the English penny, which were so extensively struck on the continent during the thirteenth and fourteenth centuries. But he is compelled to admit that in many cases there was a deliberately dishonest intention.2 The counterfeits were of inferior metal. And, as we know from Chaucer and Langland, the 'lussheburghes' made their way into England in spite of all the royal edicts directing their exclusion.3

We learned incidentally that, during the supremacy of the system first introduced by Pepin, the West of Europe drew its supplies of gold coin mainly from Byzantium, and that even silver 'bezants' were

¹ See supra, pp. 72 and 126 ff.

² Imitations des monnaies au type esterlin, p. xix.

³ Chaucer, Monk's Tale, 74; Langland, Piers Plowman, c. xviii. 72.

familiar. We should, therefore, expect to find that in this age of imitation their types were often reproduced. And this proves to have been the case. We are once more indebted to Mr. Keary for demonstrating the wide extent of the influence of Byzantine types.1 North of the Alps Byzantine elements are traceable in the coinages of Germany, side by side with elements derived from the types of the Carlovingians. There are even sceattas for which a Byzantine original can be found. To all of these, however, only a secondary interest attaches. With the Italian imitations it is different. The designs of the engravers of Byzantium may strike us as stiff and formal. Yet when in the fullness of time they were transplanted to Italian soil, they blossomed and bore fruit. The movement was closely analogous to what took place in regard to painting. Cimabue's Madonnas might almost have been executed for churches in Constantinople.

As the cities of Italy grew in wealth and power, and threw off their allegiance to the German Emperor, they began to mint money of their own. For their new types they turned naturally to Byzantium. The first silver ducats of Venice, for example, struck under the doge Enrico Dandolo (1192-1205), have on the one side the seated figure of Christ and on the other the Doge receiving the gonfalon or banner from the hands of St. Mark (Plate x. 3). How closely the general scheme is modelled on Byzantine originals can be seen by comparison with the gold coins of Leo VI. or of Romanus III. (Plate x. 1). The era of modern coinage may be said to have begun half a century later,

¹ Num. Chron., 1886, pp. 77 ff.

in 1252 A.D., when the 'fiorino d'oro' was first struck in Florence,—the 'maladetto flore,' as Dante calls it with obvious reference to its type, "which has led the sheep and the lambs astray, since it has made a wolf of the shepherd." 1 This was not the first time that gold had been minted in mediaeval Italy. A hundred years before, Roger II., one of the Norman Dukes of Apulia, had struck gold pieces of Mohammedan style, the idea being in all probability borrowed from the gold coins of the Arabs, with which he had become familiar in Sicily. Much more remarkable was the gold currency of one of the most extraordinary men whom the Middle Ages produced, the Emperor Frederick II., 'The Wonder of the World' (Plate x. 2). Artistically, it is quite exceptional.2 There is no trace of Byzantine influence, the ecclesiastical trend of which was probably distasteful to the great heretic. Its inspiration is drawn direct from Roman gold, and from Roman gold of the best period. It anticipates by some two hundred years the revival of the art of portraiture upon coins, and is thus an apt illustration of what historians say as to the keenness of Frederick's artistic sympathy and insight.

Except possibly at Ragusa, Frederick's coins had no successors. But the striking of the gold florin, two years after his death, was the signal for a general

¹ Paradiso, ix. 130 f.

² The only issue that can be set beside it is the first currency of the Republic of Ragusa, which belongs to the end of the thirteenth century. It is of bronze, but shows the same high relief and good style that are so conspicuous in his money. As it is slightly later, imitation may explain the coincidence.

renewal of the mintage of gold throughout Europe. In many cases the actual types were copied. The days of slavish imitation were, however, drawing to an end, and we now begin to find increasing evidence of originality of design. The renewed mintage of gold involved changes in the silver currency also; additional denominations were introduced, affording opportunity for greater variety of type. As art grew to be more and more of a living force, execution improved and coins once again became things of real beauty. The gold pound of Henry VII., for instance, the first 'sovereign' struck in England, is a magnificent piece of decorative work (Plate x. 11). While it is twice the weight of the present twenty-shilling piece, it is much thinner. It has consequently a larger diameter, fully an inch and a half,—and a surface area which gave the engraver full scope for the exercise of his talent. The obverse has a figure of the king seated on his throne, with the royal insignia. The fact that he is represented facing is a reminiscence of Byzantine tradition perpetuated through the 'sovereign type' of early English kings like Edward the Confessor. The reverse has a double rose, seen from above, charged with a shield on which are the arms of England and of France in alternate quarters. The richness with which both designs are elaborated shows us one aspect of the decorative influence at its highest, and makes the whole coin a worthy representative of the age and the king to which we owe one of the finest portions of Westminster Abbey.

Of the process by which English and other modern coinages lost all artistic distinction and sank to the dull level of bourgeois respectability on which they now rest so complacently, I do not intend to speak. It belongs to the general history of art. But the gold florin (Plate x. 4) will provide a convenient point from which to review the principles that have determined the choice of mediaeval and modern coin-types. On one side was the full-length figure of John the Baptist, the patron saint of Florence. This feature was doubtless borrowed directly from the Byzantine practice spoken of earlier in the lecture. But it is clear that it suited the mediaeval habit of mind. The figure of a patron saint became a very favourite type. On the coins of Italian towns and states alone more than two hundred distinct saints are either represented or named. When it is added that figures of Christ and of the Virgin are also common, the vitality of the Byzantine tradition will be apparent. In England the group of St. Michael piercing the dragon gave a name to one of the best known of English coinsthe 'angel.' In Scotland we had St. Andrew on his cross. To-day the sovereign of the United Kingdom has St. George.

The coin mottoes of Byzantium also found their counterpart on the coins of the numismatic revival. There was no motto on the *fiorino d'oro* itself, but the corresponding silver piece had the punning Leonine hexameter:

"Det tibi florere Christus, Florentia, vere."

Similarly, the Venetian gold sequin (1280 A.D.) read

"Sit tibi, Christe, datus, quem tu regis, iste ducatus."

More directly reminiscent of the Byzantine legends

was the inscription on the gold 'angels' of the English kings—PER CRVCEM TVAM SALVA NOS XPE REDEMPTOR—"By Thy cross do Thou save us, oh Christ our Redeemer," or the XPC REGNAT XPC VINCIT XPC IMPERAT, "Christ is King, Christ is Conqueror, Christ is Lord," which is found on the Scottish 'lions' and elsewhere. The 'nobles' in England and Scotland had the quaint legend, IHS AVTEM TRANSIENS PER MEDIVM ILLORVM IBAT—"But Jesus, passing through the midst of them, went on His way." The utter inappropriateness of this last text (it has no direct connection with the type, which is the figure of the king standing in a ship) indicates that these mottoes were sometimes mere cryptic charms.¹

In England coin mottoes continued to be chiefly, if not wholly, religious down to the close of Elizabeth's reign. With James I. they became more specifically commemorative. On some of the gold coins issued by him in 1604 we get FACIAM EOS IN GENTEM VNAM, the allusion to the Union being much more explicit if regard is had to the whole verse of which these are the first words: "I will make them one nation in the land upon the mountains of Israel; and one king shall be king to them all; and they shall be no more two nations, neither shall they be divided into two kingdoms any more at all." On the double crowns of the same year we find HENRICVS ROSAS REGNA IACOBVS, where, by a conceit worthy to have emanated from the King's own brain, the Union of the Crowns

¹ See the interesting note on "The First Gold Noble," by W. Wroth in *Num. Chron.*, 1882, pp. 298 f.

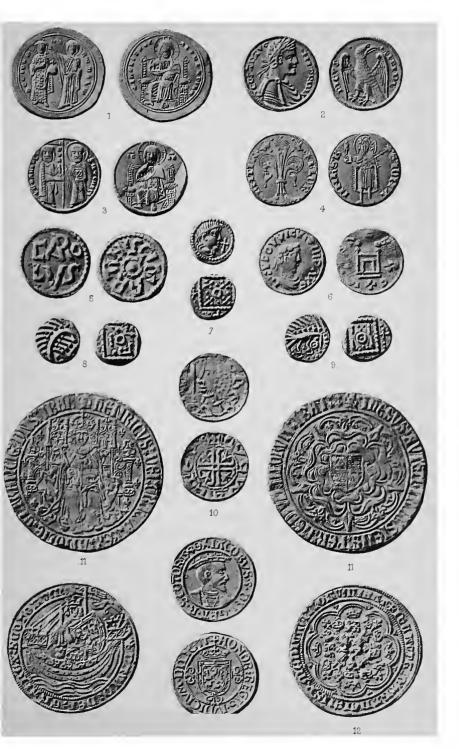
² Ezekiel xxxvii. 22.

in the person of James is compared with the union of the Red and White Roses in the person of his ancestor, Henry VII. Such a departure from traditional usage was not altogether an innovation. The texts on the coinage of James's mother are often commemorative. The legend, ECCE ANCILLA DOMINI, "Behold the handmaid of the Lord," on one of her earliest gold pieces, is a distinctly personal allusion. The money issued during the period of her union with the Dauphin is also full of signs of the same tendency. The alliance is symbolized in various ways, as, for example, by the combination of a dolphin and a thistle into one and the same group, while the legends are equally pointed in their reference.

Returning to the forino d'oro, we find its second type illustrative of a tendency that has been long lost sight of. The lily was the emblem of the city of Florence. What is more, the device is a 'canting badge'-fore. We are back to the days of heraldry in types. The renaissance for which the striking of the gold florin was the signal was marked by the introduction of heraldic devices both in our own island and on the continent. And the number of these grew steadily until the royal coat-of-arms or the national emblem became, as it is now, the commonest of all reverse types. This return to the earliest form of type was due, of course, to the great revival of heraldry itself, and this in turn was connected with the general reawakening of the artistic spirit. But it is interesting on its own account and, in view of some of the points raised in the opening lecture, it is specially so because it provides us with so many examples of the 'speaking

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type '—the pomegranate at Granada, the bear at Berne, the gate (janua) at Genoa, the sheep issuing from a house at Schaffhausen, the monk at Munich, the ladder (scala) of the Scaligers at Verona, and many more. Other phenomena of the earlier stages of coinage are similarly, and equally unconsciously, reproduced. Thus Sir Martin Bowes, master of the mint under Henry VIII. and Edward VI., sometimes placed a bow as a symbol on coins for which he was responsible. This was a 'canting badge,' but it was not his crest, for he also employed an arrow, a swan, or a rose. The parallel with the Athenian magistrates is very close.¹

The vast change that came over the coinage of Europe within a comparatively brief space of time can be aptly illustrated from our own Scottish money. The earliest pennies belong to the twelfth century. As has been mentioned, they are direct imitations of the contemporary currency of England, which again was framed on the Carlovingian model. The types are of the simplest (Plate x. 10)—a conventional bust on the obverse, crown and sceptre showing that it is a king, and on the reverse the cross, whose ancestry has already been traced to imperial Rome. execution is so poor that the inscriptions are often unintelligible. The first gold coin issued in Scotland presents a striking contrast. It is the noble of David II., minted in 1358 (Plate x. 12). It too illustrates the imitative tendency, for it is closely copied from a similar piece struck a few years before by Edward III. of England. The obverse type was

perhaps commemorative on the original: it is said to have been an allusion to the naval victory won by Edward at Sluys in 1340. Here, however, it is purely decorative,—the king crowned standing to front in a ship. The heraldic element is supplied by the arms of Scotland blazoned on his shield. The richness of the reverse design requires no comment.

There remains one other modern type to be discussed —the portrait of a reigning sovereign. In its essence this was a legacy from the Hellenistic age through the medium of the Roman Empire. But all realism, all genuine endeavour to produce a likeness had been abandoned in the course of centuries. The head or bust had become a mere convention. It continued to be so till long after the artistic revival had fairly set in. On English coins, for example, there is no serious attempt at portraiture until the last years of Henry VII.'s reign. When the change did come, it came through the influence of a sister art. The old Roman medallion had been a development of the coin. The Italian medal was originally free from all association of this kind. It was, in the hands of Pisanello for example, the effort of a painter to find a new medium of expression. And it was for portraiture that it was chiefly employed. From the medal the true portrait made its way back to the coin, with the result that during the best period the perfection of the first and second centuries of the Roman Empire was more than rivalled.

It would not be possible, I think, to find a more beautiful illustration of the fully developed modern

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coin than the 'bonnet piece' of our own king, James V. (Plate x. 13). If we look at it in the light of the story I have endeavoured to trace, we shall find that at every point it suggests some reminiscence of its ancestry. The type of the reverse, the Scottish lion, is heraldic, representing a return to what was probably the original form of type. Round the margin is a good specimen of the coin motto— HONOR REGIS IVDICIVM DILIGIT—"The king's power loveth judgment,"1-serving to recall the money of Byzantium and the influence exercised upon it by the currency of Mohammedan peoples, itself a protest against the image-worship of seventh century Christians. The obverse, with the portrait of the king and an inscription recording his name and titles, with the date, takes us back to a Roman original, and to an even more distant past. Although portraiture on coins is a purely secular thing now, we must not forget that it is a standing record of the deification of living rulers, and of the once all-powerful influence that religion exercised in determining the selection of coin-types.

¹ Psalms xcix. 4.

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