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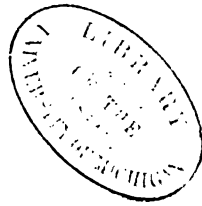
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EGYPTIAN ANTIQUITIES.

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EGYPTIAN ANTIQUITIES:

VOLUME I.

By
G. Long

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THE
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EGYPTIAN ANTIQUITIES.

INTRODUCTION.

It is necessary to say a few words on the design of this little book, in order to obviate any misunderstanding as to its pretensions. These two volumes form part of a series that will be published on the Antiquities of the British Museum, it being the wish of the Society for the Diffusion of Useful Knowledge to furnish visitors and others with fuller and more exact information on the works of art in our national collection, than can be comprised within the limits of a common catalogue. But to give both additional interest and value to these volumes, it has been thought advisable not to confine the description to a bare account of what the Museum contains, but to treat generally of the history of art among the Egyptians, Greeks, and Romans, illustrating the text principally, but not entirely, by the specimens in the Museum. With this view the present volumes have been written; and when their size and the title of the series to which they belong are considered, no one will suppose that they are intended as a complete treatise on the antiquities of antient Egypt. The object has been to collect from the best authorities, both antient and mo-

dern, such information as will tend to give an interest to what the Museum contains, and to furnish more exact information to the general reader than he will find in most popular books on Egypt. Another object has not been lost sight of altogether, to supply classical students with additional motives for a laborious and voluntary study of those antient books, which unfortunately are in general only a compulsory and heartless task. If they were made intelligible, perhaps the evil we complain of would be remedied.

This volume is only a compilation (as all such volumes must be), in which every authority that was accessible and could be depended on, has been freely used. The books from which extracts are made, or the passages which furnished particular ideas, have been carefully referred to; but so much has been written on Egypt that it is not always easy to assign to the right person whatever share of merit may be his due.

There are, however, several books on Egypt, which are so frequently quoted or referred to in these volumes that some more particular notice of them is justly due to the authors.

The *Ægyptiaca* of Mr. Hamilton has been taken in preference to almost every other authority, as furnishing a most faithful and perspicuous description of those monuments of Egypt which he visited. Without disparaging other excellent travellers among our countrymen, we cannot refrain from expressing the superior degree of confidence which we feel when supported by Mr. Hamilton's authority. Belzoni's account of his operations in Egypt and above the cataracts, furnishes a most valuable supplement to previous descriptions. A manly and honest tone pervades the whole, which is calculated to secure the writer that credit which he well deserved. But though Belzoni was an accurate observer, he was not always a very good describer, at least in the English language;

and we not unfrequently find passages in his book which are very difficult to comprehend. Other English writers, who are occasionally quoted, are referred to at the bottom of the page.

Professor Heeren's work on Egypt, which we are glad to see has been lately translated in this country, is well deserving a careful perusal, and it will be seen by the references that we have often made use of it. The principal object of the German Professor has been to illustrate the political and social condition of antient Egypt, while our volumes treat more especially of the arts. While therefore we acknowledge very great obligations to Professor Heeren's third chapter, 'on Thebes,' we have trusted to our own observations and other authorities for such matters as are briefly discussed in his fourth chapter, 'on the Arts, &c. of Egypt.' Professor Böhlen's work on antient India, together with Heeren's on the same subject, have also been very useful. On the former, which contains an immense mine of matter, it would require much more learning than we possess, to pass a competent judgment. We can hardly doubt, however, that the ingenious writer will at a future time somewhat modify his opinions about Egypt.

In addition to accurate delineations of all the most valuable Egyptian antiquities of the Museum, these volumes contain very exact copies of some of the finest engravings in the great French work on Egypt, and in Gau's Nubia. The very high price of such books, and the consequent difficulty of procuring access to them, particularly out of the metropolis, render it the more necessary to republish some of the designs in a cheaper form. Of Gau's Nubia, a splendid monument of the industry and talent of a single unassisted individual, it is impossible to speak too highly; it contains views, sections, and ground-plans of the Nubian temples between the first and second cataracts,

with many Greek inscriptions, which form a valuable supplement. By the kindness of the friends of Mr. James Burton, now in Egypt, we have been favoured with a set of his 'Excerpta Hieroglyphica,' which were lithographed at Cairo. They contain accurate copies of a great number of sculptures and hieroglyphical tablets; and we have thus had the advantage of comparing, in some cases, Mr. Burton's drawings with the copies made by Belzoni, and with those in the French work. We are also indebted to some of Mr. Burton's papers and drawings, which are in Mr. Greenough's possession, for information on the sites of the antient mines of Egypt. Another English gentleman, Mr. Wilkinson, who is also in Egypt, has lately transmitted to the Geographical Society of London some papers on the Eastern Desert, which are published in the Society's Journal for 1832.

The stranger who visits the Gallery of Sculpture, in the British Museum, cannot fail to be struck with the curious collection of objects in the room of Egyptian Antiquities. Passing from the contemplation of the almost faultless representations of the human form in marble, the triumph of Grecian art, he comes to figures more remarkable, at first sight, for their singular forms and colossal size, than for their beauty. Though the contrast between what he has just left, and the new scene to which he is introduced, creates at first no pleasing impression, feelings of curiosity and admiration soon arise from a more careful examination of what is around him. The colossal dimensions in which some figures are exhibited, the hardness of the materials employed, and the strange combinations of the human and the animal form, all unite in exciting an intense desire to know in what

country, and in what age of the world, such marvelous specimens of human art were produced. When he is told that these are but a few samples of the wonderful works that still exist in Egypt; that other European capitals—Rome, Turin, Paris, and Berlin—have their galleries enriched from the same source, or their public places ornamented by them; that the antient tombs and temples of that country still furnish inexhaustible materials to enrich our Museums and gratify the curiosity of the antiquary,—he will at once perceive that a mere knowledge of the names assigned to these pieces of stone would convey no information at all, and that any description of them must be unintelligible, if it does not connect them with the country from which they came, and the monuments of which they are but a part. We shall therefore give such a sketch of Egypt, its physical character, climate, and history, as may help a reader to understand the true nature of the Egyptian antiquities in the Museum. And though it will frequently be necessary to speak of those great Egyptian works, which are known to us only by engravings, it will be our object, in doing this, to connect the scattered fragments before us, with the larger masses to which they once belonged—in fact with the existing monuments of Egypt. In this way, the more general description will assist us in understanding the *particular specimens*; and the specimens, in their turn, will aid us in forming more correct conceptions of the wonderful efforts of Egyptian art.

CHAPTER I.

PHYSICAL CHARACTER OF EGYPT.

EGYPT is nothing more than a long narrow valley, through which the Nile runs, leaving on each bank a strip of fertile land, which in some places is several miles in breadth; and in others of very confined dimensions. The southern limit has in all ages been fixed by a natural obstacle—the cataracts, or, more properly, the rapids of Assouan, the antient Syene, which are formed by a number of granite rocks that lie across the bed of the river. From this place, which is in N. lat. about $24^{\circ} 8'$, the Nile runs in a direction generally north, with one great bend to the west, which commences near the ruins of Denderah. A few miles north of Grand Cairo, in lat. $30^{\circ} 15'$, the river divides into two* main streams and into numerous canals, which intersect the flat alluvial country on the coasts of the Mediterranean, known in antient as well as modern times by the name of the Delta. The course of the river from Syene to the neighbourhood of Cairo, where the mountains end, is above five hundred English miles.

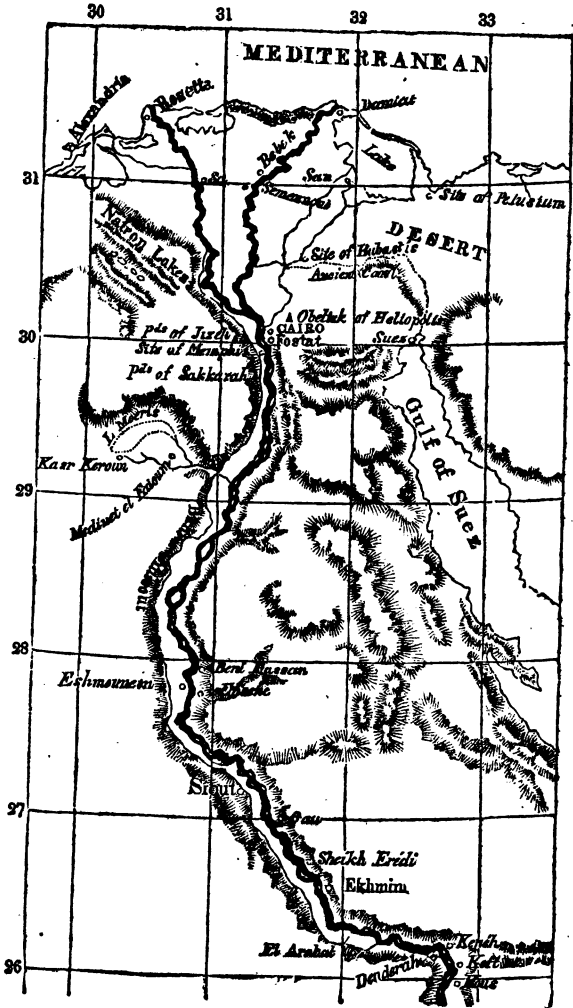
The basin of the Nile is formed by hills, which in some parts are high enough to deserve the name of mountains; as, for example, on the west, opposite the site of Thebes, where they rise almost precipitously to the height of 1,000 or 1,200 feet above the level of the river. Those between the Nile and the Red Sea are intersected by many defiles, some of which have served

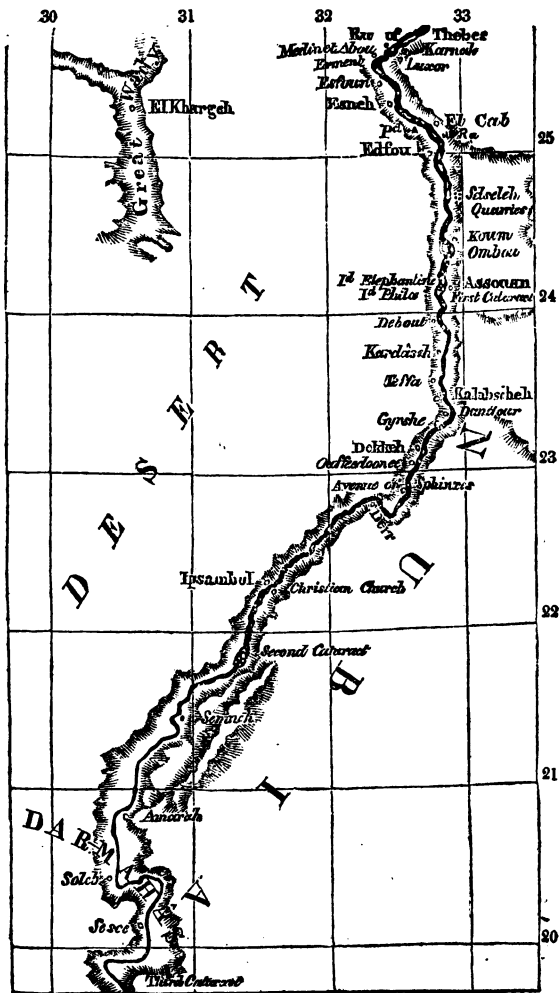
* In the time of Herodotus seven main branches (two of which were artificial) were enumerated; but at present the Rosetta and Damietta branches are the only two that are used for navigation.

in all ages as lines of communication between the river and the trading towns on the coast. In the neighbourhood of Cairo the hills of the eastern range sink down, and make a sweep eastwards to Suez, a town at the northern extremity of the gulf which bears the same name. The chain that forms the western limit of the valley in general leaves a much wider space between the river and the hills. As far as a place called Jebel Selseleh, about forty miles north of Syene, the river runs nearly in the middle of the valley, leaving very little cultivable ground on either side. As we advance northward, the western range retires further from the river, which in some places is eight or ten miles from the foot of the hills. Near Beni-Souef the hills sink lower (N. lat. $29^{\circ} 10'$), being about fifteen miles from the Nile, the continuity of the ridge is broken, and a canal, a branch of the Bahr-Yussouf, runs through the opening into the great natural lake now called Birket-el-Keroun, the antient Mœris.

This canal, called the Bahr-Yussouf, or Joseph's Canal, is generally considered as commencing about ten miles south of Ashmouneim ; but, in fact, it is only a continuation of another canal, which commences much farther south, near Farshout. It runs generally in the same direction as the river, at a distance varying from three to six miles. Its banks, like those of the Nile, are raised higher than the land at a distance, owing to the greater accumulation of mud. Consequently, between the canal and the Nile there is a kind of valley or depression.

The mountain range continues its northern course with diminished height, forming in the neighbourhood of Jizeh a kind of natural terrace, on which the great pyramids stand. It continues to skirt the western edge of the Delta, and may be considered as communicating with the Bahr-belâ-mâ, which runs parallel





to the hills that form the valley of the Natron Lakes. This valley, which lies to the S.W. of the Delta, contains six lakes, remarkable for the great quantity of salt produced from them. The crystallizations are both of muriate of soda, or common salt, and of carbonate of soda, called natron or trona*.

The Bahr-belâ-mâ, which is separated from the Natron valley by a ridge of hills, contains petrified wood, and is said to have also very much the appearance of having been once a channel for water. Indeed it has been supposed that the waters of the lake Keroun may once have had an outlet here.

The most durable monuments of his labour that man can leave behind him are formed out of the rocks of the earth. Egypt abounds with a great variety of such materials; which, from the hardness of their substance, and from being used in large masses, are almost as imperishable as the quarries from which they were originally cut. On the west side of the Nile, as we ascend from the Delta, we find the general character of the hills to be a limestone formation, which occasionally contains shells. The great pyramid, near Jizeh, is built of a species of limestone, which is worked without much difficulty. In the neighbourhood of Esneh (N. lat. $25^{\circ} 20'$) and Edfou a sandstone formation commences, alternating with limestone; but the mountains contain also slate, and quartz of various colours. The great slabs used in the construction of the temples of Egypt are (with the exception of the ruins in the Delta and a few parts of some other temples) of sandstone; and the same material was employed occasionally for the purposes of sculpture, as we may see from the colossal ram's head in the Museum. The rocks in the neighbourhood of Jebel Selseleh are compact granular sandstone, and the

* See description of a Trona lake, by Dr. Oudney.—Denham's Travels.

quarries of that district show that it was once extensively worked. In the neighbourhood of Syene, now Assouan, we meet with that particular species of granite which is mixed with hornblende, and called Syenite* from the locality in which it is found. On the east side of the Nile, in the neighbourhood of Syene, scattered about the foot of the mountains, and occasionally close to the river, are those extensive quarries which furnished the ancient Egyptians with materials for their colossal statues and obelisks. Here is still to be seen a half-formed obelisk between seventy and eighty feet long †, together with unfinished columns, sarcophagi, and the marks of immense blocks that have been removed from the rock.

The mountain range on the eastern side differs in its geological character in some respects from the western chain; and in general approaches nearer to the river. From Mount Mokattam, which rises above Grand Cairo, the limestone extends southwards, but with many interruptions, as far as on the western side. But the serpentine and granite appear to commence earlier, and to characterize the eastern more strongly than the western side, occupying the highest position. In the neighbourhood of Syene the granite alternates with the decomposed sandstone, which produces an irregular and broken appearance that has sometimes been compared with that of a ruin.

This slight and imperfect sketch may serve to give some idea of the abundant materials at the disposal of the Egyptian workman; but the varieties that are found are almost innumerable. Mingled with the

* Mr. Hamilton remarks in a note, that the modern Syenite does not appear to be the Syenites of Pliny, which is the common red granite used for making obelisks, such as that at Heliopolis and those in Rome.—See Plin. xxxvi. 8, 9, 10, 11. Mr. H. adds, that there are no large obelisks of grey granite.

† Hamilton's *Ægyptiaca*, p. 69.

granite are found gneiss, porphyry (particularly at Jebel Dokhán), serpentine, and quartz, which contain cornelians and jasper. A species of marble also is found in Upper Egypt of various colours, and well adapted for the chisel. Rock crystal, alabaster, or, more properly, arragonite, green feldspath, black hornblende, basalt, with the topaz*, emerald, amethyst, lapis lazuli, and a variety of other stones, enrich the mineral kingdom of Egypt, and the islands adjacent to it in the Red Sea.

Nor is the mountainous region between the Nile and the Red Sea deficient in metals. It is now ascertained that there is iron † in this part of Egypt, and indeed prior to this discovery there could hardly be any doubt that the ancient inhabitants must have ‡ used it in working the hard rocks of the granite quarries. Copper mines also are now found in the same districts, and in Arabia Petræa, which were without doubt known to the antient Egyptians.

In a fragment of Agatharchides on the Red Sea, we have a curious picture of the mode of working the gold mines; and of the dreadful sufferings of the wretched beings who were doomed to labour in them. These mines were between the river and the Red Sea, and probably near a place on the coast now called Jebel Allaka, where D'Anville fixes the position of the second of the three towns, called Berenice. This second Berenice was distinguished by the name of Panchrysos, or Golden, from its vicinity to the mines. It is in lat. 22° N. If we want any additional evidence, we may learn from Makrizi, an Arab writer, that this region produces silver, copper, and iron; and tradition named

* Mentioned by Agatharchides, a Greek writer of the age of Ptolemy Philometor.—Hudson's *Minor Geographers*, vol. i.

† Mr. James Burton discovered the iron mines at Hamamy.

‡ Agatharchides says they had no iron. This question will be discussed hereafter.

both the Greek Ptolemies and the Egyptian Pharaohs as the workers of the mines. We must bear in mind that, though Syene was considered the natural boundary of Egypt, the dominion both of the Pharaohs and the Ptolemies extended southwards far beyond this limit.

It is well known that rain seldom falls in Upper Egypt, (it does however fall several times a year); and though the coast enjoys the benefit of frequent showers, even Cairo is only occasionally refreshed by rain. The dry surface of Egypt, and the comparatively small elevation of its mountains, are not at all adapted to attract moisture, and consequently from June to September, during which time the winds blow regularly from the north, the clouds and mists from the Mediterranean are carried over Egypt, and meet with no obstacle till they come in contact with the mountains of Abyssinia. There they are deposited in heavy rains, which probably form numerous pools and lakes. From these transgressing their boundaries, and also from the swelling of the higher branches of the river, the Nile, in Egypt, annually inundates part of the country. It begins to rise in June, about the summer solstice, and continues to increase in height till October. Sometimes it falls short of the ordinary elevation, and bad crops or famine are the consequence. Again, in other years, the rapid rising of the Nile above the ordinary level of the inundation causes great disasters, sweeping away the earth-built cottages of the Arabs, and involving their families, crops and cattle, in one common ruin. Such a scene as this Belzoni witnessed in the neighbourhood of Thebes in the year 1818, when the flood rose with great rapidity three feet and a half above the level of the preceding inundation, and did great damage.

The valley, says Belzoni, "appeared like a vast lake, containing various islands and magnificent edifices. On our right we had the high rocks and the temples of

Gournou, the Memnonium, the extensive buildings of Medinet-Abou, and the two colossal statues*, which rose out of the water like the lighthouses on some of the coasts of Europe. On our left we had the vast ruins of Carnak and Luxor; to the east of which, at a distance of eight miles, ran the Mokattem chain of mountains, forming the boundaries of this vast lake as it appeared from our boat." When the inundation has subsided, a rich deposit of mud is left behind, which is more valuable than the best manure. The ground requires but little labour to prepare it for the seed, and under the warm sun of Egypt the most luxuriant vegetation springs up in a few weeks. But when the parching heats have continued for some time clouds of dust fill the sky, and the earth, when it is not irrigated, becomes as dry as the sand of the desert.

The following is Volney's description of this country †:—"A flat surface intersected with canals, inundated during three months, covered with mud and verdure for three more, the ground dusty and cracked during the remainder of the year—villages of mud and broken bricks, peasants naked and sunburnt, buffaloes, camels, sycamores, date-trees thinly scattered, lakes, cultivated fields, and extensive unoccupied spaces—add to this a brilliant sun in an azure, and almost always cloudless sky, winds varying in force, but never intermitting; such is something like a picture of the physical aspect of Egypt."

When we consider that the soil of Egypt, like that of all hot countries, requires water to make it productive, and that it is to the Nile alone that it is indebted for its supply, we can readily conceive that the whole agricultural operations of the Egyptians must depend on the periodical rise of the river. To this beneficent source of all fertility, whose origin and cause were to

* See chapter on Colossi. † Volney, *Egypte*, 4to. p. 234.

them involved in mystery, the ancient inhabitants of Egypt looked upon it as a superior power, and hence the physical peculiarities of the river influenced the religious system of the people. It is probable too that the overflowings of the river were, in some degree at least, the cause of the mode of interment adopted among the ancient Egyptians. All nations wish to preserve some memorial of their progenitors. This feeling is the same in kind, whether it be exhibited in pompous funeral monuments, in sculptured marble, in portraits, or in collecting the historical records of past times. To preserve and to transmit to posterity the features of the most distinguished of our race is now an art that ranks high among the inventions of civilized life, and is calculated to give a great degree of pleasure. But the Egyptian went farther than this. He could not well inter the body of his friends in the alluvial earth of the Nile valley, which was annually liable to disturbance from the action of water; nor could he consign it to the river*, which was too sacred to be polluted. The dryness of the climate, and the facilities afforded by the rocky mountains for the formation of tombs or vaults, pointed out to the Egyptian a ready way of gratifying the natural wish of preserving the bodies of his friends and relatives. The practice of embalming, which probably arose *partly* from the causes just mentioned, was indeed carried to a most ridiculous excess, and among the rich to a degree of extravagant expenditure; but we think it has some things to recommend it in preference to the Neapolitan plan, of throwing dead bodies promiscuously into a great hole, to putrify in one common disgusting mass †.

* This notion of the sanctity of the river is denied by some modern writers. That this religious idea had ceased to exist probably under the Romans, or even earlier, we are willing to admit.

† See Matthews's Diary of an Invalid.

It is not our purpose at present to give anything more than a very general sketch of the physical character of this country: such particular facts as are closely connected with our immediate subject will be best explained in their proper places. But we cannot too strongly impress on the attentive observer of the antiquities of the Museum, that if he wishes to understand what is before him, he must study the character of the country from which they came. For example, if he looks at the sculptured monuments, the sarcophagi and the obelisks, he will observe the forms of animals or plants which were either subservient to the purposes of daily use, or were honoured for some real or supposed virtues; or in some cases venerated under the influence of fear. The existing* animal and vegetable kingdoms of Egypt furnish a comment on the sculptures; and these in their turn derive an additional interest from the perusal of what Herodotus, Diodorus, Strabo, and other writers, Greek, Roman, and Arabic, have transmitted to us on the antient history of Egypt.

* Here again is debatable matter. It will form part of the subject of a separate chapter.

CHAPTER II.

POLITICAL SKETCH OF ANTIENT EGYPT.

THE monuments of Egypt are its best and completest history; they are the books which the antiquary should study. On the sculptured walls of the great temples of Thebes we see represented those political events which formed a great epoch in Egyptian history, and on the walls of the painted sepulchres we can read the domestic life of the nation. The writing, too, that covers so many laboured masses of stone is now partially deciphered, and we see on the monuments themselves the names of kings recorded by antiient writers. We have learned enough to stimulate us to further exertions, without however feeling confident of ultimate success.

On the earliest periods of Egyptian history there is considerable discrepancy of opinion among modern writers; and though we are rather inclined to side with those who do not set a high value on what has hitherto been done towards illustrating the Egyptian annals, we feel bound to give such a sketch of them as coincides with the most generally received authorities.

We first find Egypt mentioned under the name of Mizraim, in the book of Genesis, and the patriarch Abraham on a visit there. His grandson Jacob, together with all his family, settled in the country. It was then apparently a populous and powerful kingdom, the granary of the neighbouring countries, and probably the centre of a caravan trade, which brought to it the spices and valuable products of India*. But the sacred records give no specific information about the origin of this political community, except that it consisted of the posterity of Ham †, a name perpetuated in that of the country, which in the Coptic or true

* See Genesis, xxxvii, 25. . . . † Genesis, x. 6.

language of the people is Ham or Cham*. In the absence of historic evidence, various theories have been formed to show the connection of the Egyptians with other nations. One theory, which appears the most plausible, traces the race that built the temples on the banks of the Nile in Egypt, from the higher branches of that river in Nubia, or even from Abyssinia. We now know that a series of temples extends from the province of Chendy (the town of the same name is in lat. $16^{\circ} 41'$) along the river, interrupted only by the Nubian desert, into Egypt, and that these possess such characteristics in common, as to render it probable that they were the progressive and improving efforts of a tribe or people moving down the river. The great temple at El Meçaourah, nine leagues south of Chendy, has been conjectured to be the original Ammonium†, or temple of Jupiter Ammon, from which, like religious colonies, sprung the larger temples, and the ecclesiastical systems of Thebes and other places in Egypt. Others look for the cradle and the first essays of Egyptian art in the monuments of Nubia, between the first and the second cataract. This opinion we shall take an opportunity of discussing hereafter.

Attempts have been made also to connect the early inhabitants of Egypt with those of the western side of the great Indian peninsula. To support this hypothesis it is argued that the temples of Nubia, excavated in the solid rock, have the same most obvious characteristics as those of Elephanta and Salsette, near Bombay, and are adorned with colossal figures which, though in many respects very different indeed, would show a kindred set of workmen. The often-told story of the Indian sepoy is also quoted to confirm this. These native soldiers, while marching through Egypt, to join Lord Hutchinson during the French invasion,

* This element *Cham* exists in the word Chemmis, once a large city of the Thebais.—Herod. ii. 91.

† Heeren, *Ideen. Æthiopier.* p. 416.

were so much struck with the magnificent remains of Denderah, that they performed their devotions in the temple, recognizing at once the characteristics of their own places of worship. Though this would be a curious fact (if it were altogether undisputed), it proves nothing decisively. It is not surprising that, when two countries offer similar physical peculiarities, man should apply them to similar purposes either of a civil or religious character. Again it must be observed, that among nations still more widely separated than the Indians and Egyptians very curious similarities have been discovered, particularly in those symbolical forms which entered so largely into the religious systems of the Pagan world*. There are, however, many curious points of resemblance between the sacred buildings of Egypt and India, which we shall notice in the course of this work, without assuming any theory to explain the cause of these resemblances. Whatever doubt may be expressed about the Indian origin of the chief caste in Egypt, we cannot for a moment admit any hypothesis which would assign an Egyptian origin to the Indians:

We have remarked that in the time of Abraham Egypt already appears as a populous and powerful kingdom. Its inhabitants then must have been living under some settled form of government long before that period, but of the precise time and mode of the settlement we have no information at all either in sacred or profane history. We learn something more of Egypt during the time of the captivity of the Israelites; and though the sacred records give but few particulars that bear directly on our present subject, the antiquities of Egypt,

* We consider it unnecessary to discuss the argument for an early connection between Egypt and India, founded on the story of the conquest of Egypt by an Indian Prince, said to be preserved in the sacred books of India. It is now well known that a Brahmin deceived Wilford, and forged entire passages in the MS. The name of Mizra-sthan, or Egypt, we consider to be one of them.—See Böhlen's 'Altes Indien,' vol. i. p. 198. Heeren, *Indien*, p. 6.

there is one passage too curious to be overlooked. After the death of Joseph the rapid increase of his descendants alarmed the Egyptians, and to keep them in subjection, as well as to limit their numbers, they compelled them to labour at great public works. "Therefore they did set over them task-masters to afflict them with their burdens, and they built for Pharaoh treasure cities, Pithom and Raamses*." "And they made their lives bitter with hard bondage, in mortar, and in brick, and in all manner of service in the field: all their service, wherein they made them serve, was with rigour." Josephus adds that the Israelites were also employed in making embankments, and cutting canals; the invention of which Herodotus attributes to Sesostris, the great Egyptian conqueror. The Jewish historian further tells us, they were compelled to build pyramids. The account which Herodotus had from the Egyptians was, that the native people were tasked by their despotic kings to raise those enormous edifices, the pyramids, near Jizeh, and that the memory of the tyrants was abhorred in Egypt. But it is not at all improbable that the Israelites might also have been employed on some of the numerous pyramids that line the Nile valley in Lower Egypt; and which are probably of much higher antiquity than those of Jizeh.

From the time of the Exodus, or departure of the children of Israel from Egypt (about B. C. 1491 †), we read no more about it in sacred history till the reign of Solomon, who married a daughter of the King of Egypt (B. C. 1014). It is rather remarkable that Solomon, who was connected with the Egyptians both by marriage alliance and by commercial exchange, should have borrowed artificers and cunning workmen solely from his friend Hiram, King of Tyre, and not from his father-in-law, the King of Egypt. Even

* Or Rameses, in the Greek version.—Exod. i. 11.

† We adopt the received chronology.

the house which Solomon built for his Egyptian wife appears to have been altogether the work of Tyrian architects; yet we have undoubted evidence in the buildings and sculptured decorations of the Egyptian temples that they possessed at that time the arts in at least as high a state of perfection as anything that Tyre was likely to produce. It may be remarked, however, that many of the ornamental parts of Solomon's buildings resembled the decorations of an Egyptian edifice; and it is therefore by no means improbable that Egyptian artizans were employed by him, though there is no distinct mention of the fact.

From the few, but valuable, notices of early Egyptian history contained in the Bible, we turn to examine briefly what profane literature offers to us. With the exception of what we have lately learned by the partial deciphering of the hieroglyphical system, nearly all our knowledge of antient Egypt has come down to us through the medium of the Greek and Roman writers, particularly the former. It will be found convenient to divide the antient history of this country into several periods, each of which was marked by the predominance of some particular race, and by some great change in the social and political condition of the people. It is also a convenient division for the purpose of assigning the existing buildings to their proper epochs; for the reader cannot be too soon informed that *all* the great monuments of Egypt do not belong to the first period.

I. This first period extends from the earliest historical records, or traditions, to the conquest of Egypt by the Persian Cambyses, B. C. 525.

II. The second extends from B. C. 525 to the occupation of Egypt by the Macedonians, B. C. 332, comprehending a period of 193 years, during which Egypt was a province, though a very unruly one, of the Persian empire.

III. The third comprehends the dynasty of the Ma-

cedonian kings from B. C. 323*, the commencement of the reign of Ptolemy, the son of Lagus, till Egypt became a province of the Roman empire, B. C. 30.

IV. Comprises the history of Egypt as a Roman province, and as an appendage of the Eastern Empire, till the invasion of the Arabs, A. D. 638.

It was during the first-mentioned of these four periods that those great works were erected, which properly belong to the age of genuine Egyptian architecture. For though many works in the Egyptian style were doubtless erected during the dominion of the Ptolemies and the Roman emperors, we are enabled, by a strict comparison, to distinguish between them and those which are more properly the works of the ancient Egyptians. In the course of this volume, allusions will be sometimes made to the names of kings who are mentioned in the Egyptian annals, and it is absolutely necessary that the reader should have a clear conception of what is known, or rather what is supposed to be known, about this obscure portion of history. We shall have occasion to discuss more minutely some controverted questions, when we come to consider the hieroglyphical system of the Egyptians.

According to Herodotus and Diodorus†, both of whom visited Egypt and talked with the priests, gods reigned in Egypt before men. It is not worth the labour to examine the introductory chapters of the first book of Diodorus any further than to convince ourselves that the Egyptian deities, according to his account of them, were nothing more than the powers of nature invested with forms and individual attributes. These gods reigned for 18,000 years; the last of this

* Alexander conquered Egypt, B. C. 332; but the establishment of a regular Greek dynasty can only be fairly reckoned from B. C. 323.

† Herodotus was born B. C. 484, and lived at least till B. C. 408. Diodorus visited Egypt, as he tells us, book i. chap. 44, in the reign of Ptolemy Dionysius, about the year 60 B. C.

divine race being Horus, the son of Isis and Osiris. Then began the race of human kings, which comprised a period of near 5,000 years from Men or Menes, the first mortal king, to the 180th Olympiad, or about 58 B. C., when Diodorus visited Egypt.

* We will now give, in two parallel columns, the series of kings as found in Herodotus and Diodorus, and we shall make a few remarks on them with reference to the chronicles of Manethon, the Egyptian priest. We must bear in mind that the accounts of Diodorus and Herodotus were derived directly from the priests themselves, whose written archives were registered in the great temples of Thebes† and Memphis; and we think that a fair view of these authorities will render it probable that up to a certain era we have good reason for trusting the general correctness of these chronicles as to the series of the kings. But what particular acts are to be assigned to each is a very different and a very difficult question.

HERODOTUS.

(Book ii. chaps. 99—182.)

Mén, the first king.

Then the priests read to Herodotus from a papyrus roll the names of 330 kings, the successors of Mén, about whom nothing was known. Eighteen of these sovereigns were Ethiopians; and one was an Egyptian woman.

Mœris, the last of the 330, gave his name to the great lake.

Sesostris, the great conqueror.

Pheros, his son, struck blind, but recovered his sight.

DIODORUS.

(Book i. 45—68.)

Ménas.

After Ménas, fifty-two kings during 1040 years. Nothing known about them.

Busiris I., followed by his descendants, eight in number, of whom the last was Busiris II., the founder of Thebes.

Uchoreus, eighth in descent from Busiris, builds Memphis.

Ægyptus, grandson of Uchoreus.

Twelve kings.

Mœris.

Seven generations.

Sesoosis, the great conqueror.

Sesoosis II., his son, assumed the name of Sesoosis; struck blind, but recovered his sight.

* This is taken from Heeren's *Egypt*, with some slight variations.

† See Herod. ii. 99.

Proteus, contemporary with the war of Troy.
Rhamsinitus.

Cheops, built the great pyramid.

Cephres, his brother, built a pyramid.

Mycerinus, son of Cheops, built a pyramid.

Asychis, built a brick pyramid.

Anysis, a blind king.

Sabacos, an Ethiopian, drives him into the marshes.

Anysis restored, Sabacos retiring from Egypt.

Sethos, a priest of Hephæstus, became king.

Twelve kings reign together, and build the labyrinth.

Psammitichus, one of the twelve, becomes sole ruler of Egypt.

Necos, his son, commenced the canal that joined the eastern branch of the Nile with the Red Sea.

* The pyramids of Jizeh are meant.

† Tnephachthos is called the father of this Bocchoris by Diodorus, i. chap. 45. In the chronological series (64-65) it is impossible to know whether Diodorus intends to call him the son of Mycerinus or not.

Many generations.

Amasis, a cruel tyrant.

Actisanes, an Ethiopian, dethroned him.

Mendes, or Marrus, an Egyptian, built the Labyriuth for his tomb.

Anarchy for five generations.

Proteus, contemporary with the war of Troy.

Remphis, son of Proteus.

Seven generations of glorious kings. Neileus, one of them, gave his name to the river, which before was called Ægyptus.

Chembis, of Memphis, built the largest of the three pyramids*.

Cephren, his brother, built a pyramid.

Mycerinus, or Mecherinus, son of Chembis, built a pyramid.

Bocchoris, the wise †.

A long period.

Sabacon, an Ethiopian.

Twelve kings reign together.

Psammitichus, one of the twelve, becomes sole ruler of Egypt.

Four generations.

Compare Kings ii. chap. 23.

• Psammis, son of Necos.
Apries invaded Phœnicia.

Apries took Sidon, in Phœnicia. Compare Jeremiah xliv. 30, for his name of Pharaoh Hophra.

• Amasis, of Siouph, dethroned Apries, and conquered Cyprus.

Amasis conquered Cyprus; attacked by Cambyses, the Persian.

• Psammenitus, son of Amasis, dethroned and put to death by Cambyses, B. C. 525.

With Psammenitus ended the race of independent native kings.

These two lists, though they agree in many of the most important names, differ in no small degree, and we shall not attempt to reconcile their discrepancies. It was the object of both writers rather to mark the most important eras and facts, than to give a regular chronicle of Egyptian kings. Yet there are some very important omissions, in both lists, of events that belong to the period of credible history. In the twenty-second dynasty of Manethon (of whom we are going to speak), the first king is Sesonchosis, whose name appears on one of the pillars of Carnak. He is probably the Shishak of the Book of Chronicles (ii. chap. 12), the contemporary of Rehoboam, who came up against Jerusalem with "twelve hundred chariots and three-score thousand horsemen," and robbed both the temple and the king's palace, B. C. 970. Herodotus drew his information principally from the priests of Memphis, and, as Heeren has very well remarked, the history of all the kings, whose names he gives as successors of Sesostris, is connected with the history of the pyramids and the building of the great temple of Hephæstus, or Phtha, at Memphis. Hence *his* history of Egypt, being derived from the priests of Memphis, is exceedingly meagre in all that relates to the history of Thebes and Heliopolis, the two other great centres of Egyptian hierarchy.

Herodotus remarks (ii. 13) that King Mœris* died about nine hundred years before he visited Egypt. If we suppose Herodotus to have been in Egypt about B.C. 450, this will carry the era of Mœris (according to Herodotus) back to the year 1350 B.C., a time when the Israelites were still under a theocracy, and the history of Europe, for us, had not begun to exist. But what must we say of the three hundred and thirty kings who preceded Mœris? A short examination into this subject is necessary to complete our sketch of the earliest portion of Egyptian history.

In the time of the second Ptolemy, Manethon, the chief priest of Heliopolis, collected the history of the antient kings of Egypt from the records of Heliopolis, where was the most learned college of priests in Egypt. The learning of this college is attested by Herodotus, and by the fact of Eudoxus and Plato (if we can give credit to the story) having spent some time there for the purpose of being initiated into the wisdom of the Egyptians. What it was that Eudoxus and Plato learned from them we do not know. The original work of Manethon is lost, and all that we now possess is in the shape of fragments. Some of the most curious extracts are found in Josephus's reply to Apion; but Manethon was principally used by the Christian writers, who attempted to systematise the Biblical Chronology. Julius Africanus, in the third century, made use of Manethon in compiling his Chronicles; as also did Eusebius, bishop of Cæsarea, in the fifth. The work of Africanus is lost, and the Greek text of Eusebius exists only in fragments. But fortunately we possess the Chronicles of George Syncellus, a monk of the ninth century, who made use of the works both of Africanus and Eusebius; and besides this, in the year

* Mœris is an Egyptian name, corrupted by Herodotus. As Sesostris is the first of the 19th dynasty, Mœris must belong to the 18th, and probably he lurks under the name either of Memphres or Armais, both of whom belong to the 16th dynasty.

1818, the complete work of Eusebius was published, having been translated into Latin out of the Armenian version which was found at Constantinople. In the Chronicles of Africanus and Eusebius, all that is preserved of Manethon is the series of kings, with the years of their reigns generally added, and now and then some fact mentioned in connection with them. These kings are distributed into thirty classes, called dynasties. The first dynasty opens with Menes, of This*, the first king after the demigods; the eighteenth and nineteenth are those to which the kings belong, who erected most of the great monuments of Thebes and some of those in Nubia. The last dynasties contain the Persian kings of Egypt, together with some native Egyptian kings, who maintained a kind of independence. We are therefore enabled to compare these scanty extracts from Manethon, at the second or third hand, with the text of Herodotus and the existing inscriptions on the monuments. For it should be borne in mind that many of the inscriptions on the obelisks and temples were real historical documents, the imperishable annals of the kings of Egypt. This fact, if there were any doubt about it, would be proved by the following passage of Manethon, quoted by Syncellus:—"He made use of, as he tells us, the writings that were found in the archives of the temples, which Agathodæmon had copied from the inscriptions on the obelisks, and translated." We can see no reason then for doubting that Manethon, who lived under an enlightened and inquiring monarch, faithfully rendered the Egyptian annals into Greek. What degree of credibility should be given to the monuments of Egypt is quite another question; but we should never lose sight of the fact, that whatever we read in Herodotus, Diodorus, or others, about the earlier Egyptian kings, depends altogether on the

* This, a town of Upper Egypt, supposed to have once existed, near Abydos.

interpretations of the priests, whose original records were the inscriptions on their temples and obelisks.

The three hundred and thirty kings of Herodotus, who preceded Sesostris, seem most likely* to be those who are mentioned in the first seventeen dynasties of Manethon, which indeed contain the names of only two hundred and seventy-six kings; but the number of kings in the sixth and tenth dynasties of Manethon is not mentioned by Eusebius. These two dynasties comprise, one, two hundred and three, and the other a hundred and eighty-five, years, which would allow some additional kings to the number preserved by Eusebius. It is foreign from our present purpose to enter on a minute consideration of these earlier kings of Egypt, as far as we know them from monumental evidence; we reserve this till we discuss the table of Abydos. It is almost unnecessary to add that nobody will give any credit to the priest-list of three hundred and thirty successive monarchs.

Sesostris, otherwise called Rameses the Great, whose era, as the successor of Mœris, is fixed by Herodotus about 1350 B.C., was undoubtedly a real personage, whose actions indeed may have been much exaggerated, but who probably united all Egypt in one monarchy, and gave to it the form of a consolidated empire; or at least extended and confirmed the power which he inherited from his predecessors. There is, however, much confusion in the accounts of Sesostris, who, as it has been well observed, like other great national heroes, has the honour of a number of exploits, which may have belonged to many different monarchs. Of the numerous kings said to have preceded Sesostris some were certainly genuine historical personages, and perhaps sovereigns of all Egypt. Others may have been the kings of particular districts; and, consequently, the early dynasties of Manethon (if they

* See Heeren, Appendix, No. iiii, from whence this and what precedes is taken.

have any value at all) were not *successive*, but *contemporary* dynasties, that reigned in the great cities of Egypt. We learn, indeed, from Manethon the very names of the cities in which these races of early kings reigned, and which, beginning with the most southern, perhaps also the most antient, are Elephantine, Thebes, or the great Diospolis; This, afterwards called Abydos; Heracleopolis; and Memphis. The dynasties of the Delta or Lower Egypt probably belong to a later period, and were established in Tanis, Bubastis, Mendes, Sebennytus, and Sais. It has been objected to this system of contemporary monarchs, that their dominions must have been very limited. This is quite true, but we have an almost undisputed example of synchronous kings within the limits of probable history, in the case of the Dodekarchy which preceded the reign of Psammitichus. We can hardly suppose that Manethon forged the names of the kings in his dynasties, and we must therefore admit that most of them were genuine monarchs of whom some record was left behind in their respective cities, and on the temples or obelisks which they erected. We do not, however, mean to say that we believe these kings can be arranged in any thing like a regular chronological series. Nor can we look on the early dynasties with King Men, the monarch of This, at their head, in any other light than as a series of mythical kings, under whose name there may be some historical fact concealed. It is rather curious that in the Hindoo mythology Manus or Man is the progenitor of the human race, as in Egypt Men or Menes was the first human king*. The resemblance between these names and the Greek Minos, the German Mannus (Tacit. German. II.), the mythic founder of the Teutonic race, is sufficiently striking. Our own word *man* belongs to this antient family, and it signifies in the Sanskrit, *to think*.

* See Böhlen, 'Das alte Indien,' i. 120—219.

Without discussing at present the controverted points in antient Egyptian history, it will be sufficient to state those results on which many good writers are now generally agreed*. Egypt, at an early period, was conquered by a foreign race, probably of Arab stock, and these conquerors maintained themselves, at least in Lower Egypt, for several hundred years. This is generally called the reign of the Hyksos or Shepherd Kings, and is in fact the first conquest of Egypt on record. They took possession of Memphis and fortified Avaris, otherwise called Pelusium, which lies on the eastern frontier of Egypt. The dominion of the shepherd kings lies probably between the years 1800 and 1600 B. C., and, as some conjecture, comprises the period when the children of Israel left the country under the guidance of Moses: according to the common chronology this event took place B. C. 1490. It seems doubtful if Upper Egypt altogether fell under the power of the shepherd kings; at least we learn from Manethon's seventeenth dynasty that the shepherd kings and the Theban monarchs reigned at the same time. The expulsion of the shepherds was effected by Thutmosis, king of Thebes, and from this epoch commences the splendour of the Sesostrid kings, and probably the union of Egypt in one great monarchy. It is now generally admitted that this important event in Egyptian history formed one of the principal subjects for the exercise of Egyptian art, as we may judge from the historical reliefs on the walls of the temple of Carnak†, and those on the pyla of Luxor, and other Theban edifices.

Who Sesostris was, or whether there was more than one king of that name, we shall not venture to decide; but it is worth while bearing in mind that the kings of

* But many others, of good repute, are not agreed.

† See Denon, pl. 133, and the great French work, 'Antiquités,' Planches, vol. ii.

Manethon's eighteenth and nineteenth dynasties are those which belong to the brilliant period of Egyptian history that followed the expulsion of the shepherd kings. The names of Thutmosis, Amenophis (the same as the Greek Memnon), and Rameses (the Great, otherwise called Sesostris), are now read on various monuments in Nubia and Egypt, and most conspicuously on the great buildings of Thebes—Luxor and Carnak. Many chronologists are agreed in fixing the epoch of Sesostris to about 1500 B.C., which is more than a century earlier than the data of Herodotus lead us to assign. The greatest works of Egyptian art, the magnificent temples, statues, and obelisks of Thebes, probably belong to this period, and it is also probable that the kingdom of Thebes existed in its full strength and splendour from about 1600 B. C. till the Ethiopian invasion of Sabacos about B. C. 800, nearly two centuries after Shishak's pillage of Jerusalem.

Even the names of the Ethiopian monarchs, Sabacos, Sebichos, and Tarcos, the twenty-fifth dynasty of Manethon, may be still read on some of the monuments in Egypt*, and on the temples of Nubia. A scene of anarchy and disorder appears to have followed these Ethiopian conquests, to which we may fairly ascribe, in part at least, the ruin of Thebes, and perhaps some of the monuments of Nubia. Sethos, a priest, succeeded to the supreme power on the removal of the Ethiopians; and after him we find Egypt parcelled out under twelve kings, till Psammitichus, one of them, contrived by the aid of Greek troops to make himself master of all Egypt. With the reign of Psammitichus something like order was restored, and Egypt was again united under a native monarch about B. C. 650.

From this period to the Persian conquest, B. C. 525, various great monuments were erected by the native

* See Salt's Essay. The name *Teraka* is found behind a small propylon at Medinet-Abou.

kings, particularly by Amasis, the Saite, the last but one before the conquest. This Amasis brought a large monolith* temple from Elephantine to Sais, and placed a colossus in front of the great temple of Phtha at Memphis, which was 75 Greek feet in length.

II. The history of Egypt under the Persians is but obscurely known. Cambyses, the first Persian † who invaded it, was a merciless barbarian, whose ravages extended from the plains of the Delta to the southern limit of Egypt. It is the opinion of all who have attentively observed the ruins of Thebes, that most of the devastation has been caused by the hand of man, and that the labour of the destroyer must have been almost as great as that of the builders of those enormous temples. There is a notice in Pliny, which he picked up we know not where, that the mischief was partly done by fire, which is not improbable. The population of Thebes must have been very great, and the houses were, doubtless, huts principally constructed of wood. The heat from so enormous a burning mass might crack and displace many of the stones. Pliny says ‡ that Cambyses was so struck with admiration at one of the great obelisks, that he ordered the flames to be quenched when they had reached its base. The effects of fire are said by Zoega to be distinctly visible on some of the Roman obelisks, which were thrown down during the troubles of the city.

But it seems not unlikely that Thebes, or at least Memphis, suffered from foreign invasion between the time of Sabacos and the visit of Cambyses. Nebuchadnezzar, after the siege of Tyre, invaded the country,

* *Temple of a single stone.*

† According to Xenophon (Cyrop.) Egypt was conquered by Cyrus. It is sufficient to state that he says so.

‡ Pliny, xxxvi. 9. Hâc admiratione operis effectum est, ut cum oppidum id expugnaret Cambyses rex, ventumque esset incendio ad crepidines obelisci, extinguere ignem juberet molis reverentiâ, qui urbis nullam habuerat.

and in the language of the Book of Kings (ii. chap. 24), "the King of Babylon had taken from the river of Egypt unto the river Euphrates all that pertained to the King of Egypt." It is a general tradition among the Arab writers that Nebuchadnezzar ravaged this country. "Memphis," says Abd-allatif*, "was a flourishing city in the time of Abraham, Joseph, and Moses, and a long time before and after this period, till the reign of Nabuchodonosor. This prince ravaged Egypt, and it remained in a state of desolation for forty † years after. The reason of this invasion was, that the King of Egypt granted an asylum to the Jews who fled from the conqueror. Nebuchadnezzar, to avenge himself, marched against Egypt and ruined all the country." Makrizi states the same fact, and asserts that Nebuchadnezzar, or Bokht-Nasar as he calls him, "ruined Memphis and many other cities of Egypt."

Ammianus Marcellinus (xvii. 4), quoted by Heeren, has preserved a tradition of Thebes being attacked by the Carthaginians before the time of Cambyses. It is possible that in the decline of the Egyptian power, when the seat of government was removed to Memphis or perhaps to Sais, Thebes may have suffered from the predatory bands of the desert; but the probabilities of a Carthaginian expedition as far as Thebes seem to be very small, even when the story is supported by Professor Heeren's ingenious caravan roads.

Whether there now exist in Egypt any buildings or obelisks erected during the Persian occupation, which can be proved to belong to that period, we do not know; but there can hardly be a doubt that the Persians, like subsequent conquerors of Egypt, encouraged or allowed the natives to erect monuments after the antient fashion. M. Champollion has read the name of Xerxes in phonetic, i. e. alphabetic hieroglyphics, on a vase of alabaster belonging to the French king's collection, and that of Cambyses on a statue

* De Sacy's Translation, p. 184. † Compare Ezekiel, xxix. 12.

in the Museum of the Vatican. Fragments of stone, with the arrow-headed characters of Persepolis, have been found within the isthmus of Suez, and bordering on the Delta, and a fragment of a head in the same style as those of Persepolis is given in the great French work. This head may be compared with those in the British Museum, brought from Persepolis by Ker Porter; they are placed in one of the small rooms leading to the Townley collection.



Persian characters found in Egypt. (From the French work.)

There is a little story in Herodotus*, about Darius, connected with this subject, which is worth recording. This prince being at Memphis, wished to have a colossal statue of himself placed in front of that of Sesostris, which was seated before the great temple of Phtha. The priest objected to this, and told him that he ought not to have his statue placed before that of Sesostris, till he had equalled the exploits of the Egyptian king. This passage is curious, for we may fairly infer from it that Darius was actually engaged about assigning the position of a colossal figure already executed; and also we learn that Darius was in Egypt after his Scythian expedition. We are not aware that this latter fact is noticed anywhere else in ancient writers, except so far as it is implied in Diodorus (i. 95).

III. With the age of Alexander a new order of things commenced in Egypt. The building of Alex-

* Herod. ii. 110. We have given what appears to us the meaning of this passage.

andria and the establishment of a Greek dynasty* made a greater revolution than Egypt had yet seen. The history of this period also is less known than it deserves to be, but as far as our present subject is concerned, we possess sufficient proof that the Ptolemies, the successors of Alexander, contributed largely to the restoration of the antient monuments of Egypt, and also left behind them buildings which may almost vie with anything that the Pharaohs had accomplished. The magnificent temples of Denderah and Edfou, with Ombi and others, are most probably due to the age of the Ptolemies, who, we know, adopted to a certain degree the forms of worship established among their subjects. On the island of Philæ, near the cataracts and the boundary of Egypt, the antient inhabitants of the country have left behind them imperishable memorials of their skill and taste in architecture; but it is not improbable that parts of the Egyptian monuments of this island should be attributed to the Ptolemaic age †. Again, the temple at Debot (the antient Parembolè) would appear, both from its style and from the Greek inscription on the cornice of one of the propyla, to be the work of the Greek kings of Egypt ‡. The Ptolemies seem to have done little to embellish Thebes, which indeed on one occasion is said to have suffered under Greek dominion. In the reign of Ptolemy Lathyrus (about B. C. 86) this city rebelled, and after a three years' siege, was taken and plundered by the Greek king. We certainly find that some restorations were made, and probably even some small buildings were erected at Thebes, under the dominion of the Romans; but it suffered so much from the time of the Ethiopian Sabacos down to the latest injuries inflicted by religious fanaticism, that it

* But ever since the time of Psammitichus Greeks had been crowding to the country, and had no doubt contributed to produce great changes in the habits, and probably even the arts, of the Egyptians.

† Champollion, Précis, 84.

‡ Hamilton, p. 48. Gau.

is difficult to say which of all the barbarians did it most damage. Cambyses is perhaps blamed for more than he deserves. There can be little doubt that the Christian fanatics of Egypt did as much mischief as all the ravagers who preceded them. In their indignation at the sight of the gross superstitions of Egypt, they forgot the reverence that is due to all great efforts of human industry; and in their haste to destroy or appropriate to their own use the labours of the idolaters, they showed a tendency to degenerate into a similar superstition.

IV. That some buildings which, before our better acquaintance with the monuments, were assigned to the earliest ages of Egyptian architecture, were built or in part restored or embellished under the Roman emperors, is undeniably proved from inscriptions and other evidence. On the cornice of the pronaos * or portico of the great temple of Denderah the name of Tiberius is found, and, though the inscription is imperfect, there is enough to show that this portico was at least repaired in the time of Tiberius; and from the propylon of the small temple of Isis, at the same place, we learn that it belongs to the age of Aurelius. It may be urged, however, that this was merely a new dedication of the temple to Aphrodite (whose name appears in the inscription) and to the Synnæan † deities; and as the inscription does not state positively on what occasion it was placed there, we must allow this objection to have its full weight. There is the evidence of inscriptions to show that a temple was built at Gartas in Nubia, as late as the beginning of the third century of the Christian era, and Gau found traces of the stone wall that surrounded it in the neighbourhood of the present village.

It hardly lies within our plan to describe buildings

* Hamilton, p. 206.

† 'Αφροδίτη τῆ μινύστη, καὶ τοῖς συννάϊς θεοῖς.

erected under the Ptolemies or the Cæsars, in the Grecian and Roman-Greek style, though we should not omit to mention that Egypt was indebted to those foreign dynasties for many monuments of Grecian architecture, both useful and ornamental. Alexandria alone contained at one time, with its temples, museum, public buildings, port and arsenals, perhaps as many objects of curiosity as any city belonging to the Greek nation; and Antinoë, built by Adrian in memory of Antinous, shows in its extensive remains the magnificence of design, though not the simplicity of the best ages of Grecian architecture. This place, as we see from an extant inscription, received embellishments as late as the time of Alexander Severus *. The island of Elephantine, with its heaps of ruins, attests that the Egyptian, the Greek, the Roman, and the Arab, have at different times been on the spot, but it is easy to distinguish the durable remains of Egyptian art from the more perishable works of a later age.

We may mention one instance of error into which a distinguished traveller fell, in order to show the importance of carefully examining the architectural remains of this country before we assign them to the period when Egypt was governed by its native monarchs. Pococke observed between Jizeh and the great pyramids a long causeway and various arches of a bridge. He hastily concluded that this was the causeway mentioned by Herodotus †, as a work almost equal to the pyramids themselves. It will be easily shown that this could not be the work to which Herodotus alluded, when we come to describe the pyramids; but we have abundance of direct evidence to prove that these arches and the causeway were built by Karakousch, one of the Emirs of Salah-eddin Youssouf (commonly called Saladin), and have been repaired at various periods since his time by other Arab princes. This causeway

* Hamilton, p. 282.

† Herod. ii. cap. 124.

extended from the west bank of the Nile opposite to Old Cairo for about six miles, as far as the arches which are near the base of the rock on which the pyramids stand, and it served as a road by which to convey materials for the construction of the walls of Cairo and the citadel of the mountain.

After the introduction of Christianity into Egypt, many of the ancient temples were used as places of Christian worship. For example, the great temple on the island of Philæ has evidently been used for a Christian church, and great pains have been taken to destroy or to cover the richly-painted sculptures on its walls. Some of the figures have been partially chiselled out, and others covered with coatings of plaster, which, as it every now and then falls off, discloses what is under it*. This island also contains the remains of a Greek church †, built of old materials, on which the original Egyptian sculptures still appear, intermingled with crosses and other ornaments which mark the same epoch. Even the temples south of the cataracts were also in some instances appropriated to the Christian worship, as at Maharraka, a little south of Dekke, where Belzoni observed the Egyptian figures peeping from under those of the Apostles, which remain quite perfect on the walls. And in Gau's splendid work on Nubia, we see (pl. 45, Temple of Sebona) on the wall at the extremity of the sekos, in the place originally appropriated to the heathen deity, the apostle Peter in bas-relief, painted with a great head of yellow hair, a large yellow key in his left hand, and a pair of red slippers on. That he might not be mistaken, his name is written beside him in barbarous Greek characters. An Egyptian figure stands on each side, preserving the same attitude and character as when the temple was dedicated to the heathen deities. At Behnesch, the ancient Oxyrhynchus, there is a large

* Hamilton, p. 49.

† Denon, pl. 70.

mosque which was once a Christian church. We know that the Heptanomis, or Middle Egypt, contained many churches in the early ages of Christianity. At Kouft (Coptos) there is a ruined Greek church, which had been built out of the materials of two temples; and a handsome bridge at the same place, formed of stones with inverted and unconnected hieroglyphics, shows to what use the antient temples were turned.

The Mohammedan conquest of Egypt has probably been more fatal to the monuments of that country than any previous invasion, a fact of which sufficient evidence is found in extant Arab writers, from whom, in the course of this work, we shall give some curious extracts to prove this point. Whatever works were erected during this period are so clearly marked by a distinctive character that there is no danger of confounding them with anything that is more antient.

We have endeavoured thus briefly to show that the existing architectural remains of Egypt do not belong solely to the times when Egypt was governed by native kings; but that during a period of full 2000 years (reckoning from the probable date of the most antient buildings to the second and third century of our era), the various ruling dynasties in this country have vied with one another in embellishing it with works of art. It would indeed be strange, if, during the time when the Ptolemies ruled Egypt and made it the centre of commerce and science, no monuments had been erected to the antient religion of the country, which was more than blended with the sacred ritual of the Greeks. And still more strange would it be, if all the monuments of the magnificence of the Ptolemies which attested their toleration or their encouragement of Egyptian superstition, had been swept away, while those only remained which belong to a period anterior to the Persian invasion.

As Egypt has enjoyed, at various epochs, the pro-

tection of enlightened rulers, who have restored its antient buildings and erected new monuments, so it has felt more than once the fury of barbarian conquest. Within the limits of credible history its towns were ravaged by the wild Nomadic tribes, led on to plunder by the Assyrian monarchs, whose terrible devastations are described in the strong and sublime language of the Hebrew prophets*. Among the towns that probably suffered from the Assyrians is the town of No of Ammon, by which most critics understand the city of Thebes. But there was also another No of Ammon in the Delta (the smaller Diospolis of the Greeks), which may be the town to which the prophet Nahum alludes. If the No of Upper Egypt is meant, we may consider that it was the great city of Thebes which suffered in this invasion, and that Cambyses the Persian is blamed for more than he deserves, when he is accused of being the destroyer of the hundred-gated city. That the Ethiopians also had probably a share in the devastation has been already mentioned.

We have briefly adverted to the fact, that on the introduction of the Christian religion into Egypt, many antient temples were turned into churches, while their sculptured figures formed the groundwork for Christian images. It would have been well for the history of Egyptian art, if the zeal of the new proprietors of the temples had been limited to such acts of peaceful occupation, or to the building of monasteries and the scooping out of hermits' cells; but unfortunately a rage for demolishing the idols of antiquity was cherished among the Christians of Egypt. The Iconoclasts or Image-breakers sought to gain the favour of the court of Constantinople by the destruction of all representations of the human form, whe-

* Ezekiel, xxix. xxx.; Jeremiah, xlvi. It would seem not an unfair inference from these passages that Egypt was actually invaded and occupied by the Assyrians. See above.

ther the work of heathen or of Christian art, and we may without hesitation attribute to this fanatic spirit the partial or complete demolition of innumerable remains of antiquity. At last Theodosius by his imperial rescript (A. D. 389) suppressed the pagan places of worship, and the destruction of the great temple of Serapis at Alexandria gave the Christians a complete triumph over the adherents of the antient superstition*.

The monuments of Nubia, which are so admirably illustrated by the work of Gau †, have also suffered from the hand of violence, and one of the barbarous invaders of this country has recorded his acts of devastation in the Greek language on a pillar of the front wall of the great temple of Kalapshé (formerly Talmis), dedicated to the god Mandulis. "I Silco, prince of the Nubians and all the Ethiopians, came to Talmis and Tephis; once and twice I made war against the Blemyes, and the first time a god aided me in conquering my enemies. A second time I conquered them, and took their towns. I established myself there with my troops. The first time I vanquished them, and they asked my pardon. I made peace with them, and they swore by their idols, and I believed they were honest men, &c. ‡"

Such is the style adopted by the barbarian, who, according to Niebuhr's conjecture, ravaged Nubia about the reign of Diocletian. The most curious fact shown by it is the proof, which however is not the only one, of the Greek language having spread into Nubia, and being adopted in public documents by sovereigns who were probably of half Greek and half barbaric extraction.

* See Gibbon, chap. 28.

† Stuttgart, 1822.

‡ Niebuhr's Translation; Appendix to Gau's Nubia.

CHAPTER III.

GENERAL VIEW OF THE MONUMENTS OF LOWER EGYPT.

THE preceding sketch of the antient history of Egypt will already have given the reader a slight acquaintance with the situation of some of the great monuments of this country. Though the temples of Upper Egypt present the most striking specimens of architecture, and furnish us with the chief materials for illustrating the antiquities of the country, still the remains that are now found in the Delta and Middle Egypt are too striking to be passed over in a general sketch, such as we propose to make of the existing monuments.

The traveller who lands at Alexandria finds the remains of a Greek city intermingled with the erections of the Mohammedan dynasties. This city is not in the limits of the fertile Delta, but within the physical boundaries of the Libyan desert, and its desolate aspect is now in perfect harmony with the natural features of the country around it. The pillar of Diocletian, commonly called Pompey's Pillar*, with the catacombs cut in the rock, and one solitary obelisk, are the chief architectural remains of this great city that attract the attention of the traveller. As late as the year 1200 there were two obelisks standing, but one is now on the ground. As we advance from Alexandria to Rosetta we enter the real Delta, a country which, though now little distinguished by antient works of art, was once adorned with magnificent

* See Hamilton's Plates, No. 18.

temples, obelisks, and colossal statues. The materials of the temples have in many cases been carried off to build modern towns; the earth and rubbish have accumulated round other places so as to hide what now remains; and as for the statues and other works of art of smaller dimensions, they have either been broken up or carried away by the successive pillagers of the country. Rome and Constantinople* were both adorned with monuments of Egyptian art, and other capitals of Europe besides our own are enriched with the spoils of this antient land.

Near the branch now called the Rosetta, (see the map) is Sà, on the site of Sais, which Amasis adorned with the magnificent propylæa of the temple of Athenæa (Minerva), a colossus 75 feet long, and a monolith temple of very large dimensions. This site has been visited by various travellers who speak of indications of extensive remains, which most probably exist at least under ground, but we are not able to find any trustworthy description of this place.

Semennut (the antient Sebennytus), which lies nearly due east of Sà and near the Damietta branch, contains some ruins; but at Bebek el Hadjar, or Beibeth, about eight miles N. E. of Semennud, there are the ruins of a magnificent temple, probably dedicated to Isis. It was built entirely of granite blocks, which must have been brought from the neighbourhood of Assouan, and was once undoubtedly one of the most wonderful works of Egyptian art, as its ruins amply prove, though they are now heaped together in the greatest confusion †, as if an earthquake had at one shock levelled the whole with the ground. "We may have," says Mr. Hamilton ‡, "some idea of the magnificence of the temple in its perfect state, from the cir-

* The enormous Egyptian scarabæus in the Museum was brought from Constantinople.

† See Denon's Plates, No. 17. ‡ Page 389.

circumstances that several of the blocks which have fallen are even now thirty feet above the level of the ground. The temple was 300 feet in length and 100 wide. The capitals of the columns have been in the same style as those of the great portico or pronaos at Denderah, representing on each of the four sides, the front face of Isis." So little is known of the history of this great temple, that it is even doubtful what ancient site it occupies, though we are inclined to adopt the opinion of those who consider it to be the Atarbechis of Herodotus, and the Aphroditopolis of Strabo. We are in general so much occupied with the contemplation of the great temples of Upper Egypt, that we are apt to overlook the striking remains in the Delta, which, though in all probability posterior to the great buildings of Thebes, are undoubtedly more ancient than many temples in Middle and Upper Egypt, and mark one of the splendid epochs in the history of the country.

Sau, the ancient Tasis and the Zoan of the Scriptures, though little known in profane history, attests by its ruins its former magnificence. It lies a few miles from the outlet of the Canal of Moezz into the Lake Menzaleh, and on the east side of this canal. The mounds*, formed of crumbling bricks, which have served as the enclosure of the temple, are about 1000 feet long and 700 wide, while the enclosures which mark the limits of the ancient city, are conjectured to be about five miles in circuit. "The ruins † of the city are contained within several very large enclosures of ancient mounds. In the centre of the most considerable of these we first observed the ruins of a massy propylon of red and grey granite, and beyond it fragments of porticoes, columns, walls,

* Hamilton, p. 383, and Mr. Burton's Sketch.

† Hamilton; and see Depon, pl. 17.

obelisks, and statues, lying in confused heaps for the length of several hundred paces." Mr. Hamilton excavated here an andro-sphinx of colossal size, which is rather a rare combination, the more common kind of Egyptian sphinx * having a woman's head attached to a lion's body, while this figure (agreeably to its appellation) has a male head, with a straight beard fastened to the chin, as if by a bandage passing up the cheeks and tied to a fillet round the head. Amasis made a number of andro-sphinxes to adorn the great temple at Sais, which we may suppose were similar to this discovered at San. A granite capital of large dimensions was also found here. These extensive ruins lie in the midst of marshes, with no human habitations around them but a few miserable huts built of mud and reeds. Such is the present condition of a city whose origin is † assigned to a very remote age, and which was once probably a royal residence of the Pharaohs.

The mounds of Tel Artrib (the hill of Artrib, and the antient Athribis); near Benalhassar, are worthy of being commemorated among the works of the Egyptians. They are in circuit about five miles, forming an irregular kind of square. Those also of Tel Basta (the Pi-Beseth of the Scriptures), or the hills of Basta, "well deserve ‡ this title from their great height and extent. The whole circuit of the walls cannot be less than three miles; within the principal enclosure, where there has been the greatest accumulation of the ruins of successive edifices, is a large pile of blocks of granite, which from their forms and sculptures appear to have belonged to various propylæ and obelisks." These mounds were raised about the cities to protect them from the annual inundations, first by Sesostris, when he commenced his canals, and

* See the chapter on Obelisks, Sphinxes, &c.

† Numbers, xiii. 22; Isaiah, xix. 13.

‡ Hamilton, p. 367.

afterwards under the Ethiopian invader Sebakea, who employed criminals on these public works. The description which Herodotus * gives of Bubastis presents so delightful a picture, and is so well illustrated by the present state of the place, that we cannot omit inserting it.

“ There are temples larger than that of Bubastis and more costly, but none so pleasant to look on. It is after the following manner : except the entrance it is surrounded with water ; for two canals branch off from the river, and run as far as the entrance to the temple ; neither canal touching the other, but one running round in one direction, and the other in the opposite. Each canal is one hundred feet wide, and the banks are lined with trees. The propylæa are sixty feet high, and adorned with figures † nine feet high of excellent workmanship. Now the temple being in the middle of the city is looked down on from all sides as you walk round ; and this happens to be so because the city has been raised, but the temple has not been moved, remaining in its original position. A wall goes quite round the temple, and is adorned with sculptures ; within the enclosure is a grove of very tall trees planted around a large building (ναός), in which is the statue. The figure of the temple is a square, each side of which is a stadium (600 Greek feet). In a line with the entrance is a road built of stone about three stadia long, leading through the public place towards the east. The breadth of the road is about 400 feet, and on each side of it are exceeding tall trees. The road leads to the temple of Hermes.”

From this it would appear that the level of the whole city was raised, except the ground occupied by the temple, which of course after it was once built could

* Herod. ii. 137, 138.

† He means probably intaglios in relief, as on the propyla of Edfou.

not be touched. But the practice of raising the level of the cities would show that the private houses were in general of such a nature as to offer no impediment to this alteration. The mass of them was probably little better than the huts of the Fellahs or labourers of the present day. Mr. Hamilton remarks that Herodotus' description of "looking down on the temple" exactly corresponds to its present appearance. Bubastis lay on the east side of the Pelusiac branch, as may easily be inferred from the above extract.

About six miles N.E. of Cairo is Matarieh, celebrated for its spring of fresh water, no common thing in Egypt, and a solitary obelisk of one mass of red granite that marks the site of Heliopolis or On, one of the most famed of Egyptian cities. The ruins are described as being in the form of a rectangle, about three miles* in circuit. There is a small model of the obelisk of Heliopolis in the rooms of the London Asiatic Society. Some remains of sphinxes on a road leading to the site of the temple, with fragments of a colossal statue, are all that now mark the place of this temple so renowned in Egyptian history. The city of Heliopolis was deserted even in Strabo's time†: two of its famous obelisks had been carried to Rome, and the rest were considerably damaged, some lying on the ground and others still standing. The description given of Heliopolis by Abd-allatif, an Arab physician, who wrote his book on Egypt about the close of the twelfth century, will show that since that period this place has undergone considerable changes. Abd-allatif spent some years in Egypt, and saw two obelisks at Heliopolis, one standing and the other fallen.

"Among the monuments of Egypt we must reckon those of Ain-schems‡ (the fountain of the Sun), a small town which was surrounded by a wall, now

* Pococke, p. 23, note.

† P. 806, Casaub.

‡ The Greek Heliopolis.

easily recognized though in ruins. These ruins belong to a temple where we see surprising colossal figures cut in stone, which are more than thirty cubits in height with all their limbs in proportion. Of these figures some were standing on pedestals, others seated in different positions, in perfect regularity. In this town are the two famous obelisks called Pharaoh's Needles. They have a square base, each side of which is ten cubits long, and about as much in height, fixed on a solid foundation in the earth. On this base stands a quadrangular column of pyramidal form, one hundred cubits high, which has a side of about five cubits at the base, and terminates in a point. The top is covered with a kind of copper cap, of a funnel shape, which descends to the distance of three cubits from the top. This copper through the rain and length of time has grown rusty and assumed a green colour, part of which has run down along the shaft of the obelisk. I saw one of these obelisks that had fallen and was broken in two owing to the enormity of the weight. The copper which had covered its head was taken away. Around these obelisks were many others too numerous to count, which are not more than a third or one-half as high as the large ones*."

Other Arabic writers say that on the copper top the figure of a man was cut, seated and looking towards the east. This large broken obelisk which Abd-allatif saw, probably fell about the year 556 of the Hegira, or A. D. 1160 †. The dimensions which Abd-allatif assigns to the obelisk are, as usual with this author, somewhat exaggerated; but modern writers differ also as to its height, some making it as much as seventy feet, while others reduce it to sixty-four. Perhaps many travellers may have had no opportunity of accurately measuring the height, but we might expect some

* De Sacy's Translation, p. 180.

† De Sacy, note, p. 229.

little more consistency about the breadth of the base, which according to some is six, and according to others, eight feet. The fact is, the sides are not all of the same dimensions. Zoega, a learned writer on Egyptian antiquities, supposes* that the obelisk which was transported to Rome, and placed in the Campus Martius, came from Heliopolis. This obelisk, according to Pliny †, was the work of Sesostris. We shall describe it more particularly in a separate chapter.

This slight sketch of the remains of antiquity which the Delta now contains will serve to show that it once possessed monuments which might almost vie with those of Upper Egypt; but from their position so near the sea and in the most inhabited part of Egypt, much has been carried away, and the materials have been used for the construction of modern buildings. When P. Lucas visited the temple at Bebek (A. D. 1716), the people in the neighbourhood were in the habit of cutting grinding stones out of the pedestals and capitals of the pillars. There are still to be seen at Cairo noble granite pillars, some Greek and others Egyptian, which have been carried off from the ancient temples by the Mohammedans to adorn their own buildings. There are other Egyptian remains in the Delta, as for example at Damânhour, Tel Etmaie, and various places of little historical importance. Tel Etmaie contains, however, an entire monolith temple, of which we shall speak hereafter.

The modern town of Cairo, or more correctly Kahira, built by the Arabs on the east bank of the Nile, lat. $30^{\circ} 5'$, and above the point where the river divides, occupies a position in importance equivalent to that of ancient Memphis. Fostat, or old Cairo, about three miles south of Grand Cairo, stands on the site of a town called Babylon, built according to tradition by some Babylonians whom Sesostris had carried

* See Ammian. Marcellin. xvii. 4.

† xxxvi. 9.



No. 5.

Museum Obelisks.

No. 70.

captive, and who revolted. In Strabo's * time it was a Roman military station. The two broken obelisks in the Museum were brought by the French from Cairo. They are of small dimensions, the side of the base of each, as they now stand, being about seventeen inches. The material is a fine black basalt, which admits a high polish; and the artist has not failed to make the most of this advantage, many of the figures upon them being cut in a very superior manner. These obelisks, together with many other objects in the Egyptian gallery, fell into the hands of the English at the capitulation of Alexandria in 1801, when the French were compelled to retire from Egypt.

From Cairo the spectator commands a view of those wonderful works of the Egyptians, the great pyramids of Jizeh, the more particular description of which we reserve for another part. But besides the pyramids of Jizeh, there is a great number of pyramids of various sizes, some very small and in a ruinous condition, lining at irregular intervals the west bank of the Nile, at some distance from the river, for the space of more than sixty miles.

The village of Metrahenny, "half concealed in a thicket of palm-trees," about ten miles south of Jizeh, on the west side of the river, marks the site of the great city of Memphis, once the rival of Thebes in magnitude and splendour. Yet, owing to its position, it has been so much exposed to plunder from the successive conquerors of the country, who have used it as a stone-quarry, that even its site has been matter of dispute. Independent, however, of the ruins that are still there, the situation is determined to correspond to that of Metrahenny by other evidence † that is incontestable. Its remains are spread over an extensive space, on which may be seen blocks of granite,

* P. 807.

† See Major Rennell's Geography of Herodotus.

with fragments of columns, statues and obelisks, which are all that remain of the great temple of Hephæstus (Phtha), and the other * sacred buildings of Memphis.

“ High mounds enclose a square of eight hundred yards from north to south, and four hundred from east to west. The entrance in the centre of each side is still visible. The two principal ones faced the desert and the river. We entered by the last, and were immediately much gratified by the sight of thirty or forty large blocks of very fine red granite, lying on the ground, evidently forming parts of some colossal statues, the chief ornaments of the temple †”.

The temple of Memphis was begun, according to tradition, by the mythical king Men or Menas, and successive sovereigns laboured to extend and beautify it. The plan of an Egyptian temple was such (as we shall see when we come to a more minute description of one) that it could be continually receiving accessions without injury to its essential parts. Herodotus tells us that King Sesostrius placed six colossal statues in front of the great temple. When Strabo saw the Hephæsteium it was still entire, but the Greek geographer, who seems to have been but little moved by the sight of wonders, has left Abd-allatif to tell us the tale of what Memphis was even in the twelfth century. He says that it extends half a day's journey in every direction, and that in spite of the violent mutilation of its statues, and the immense mass of materials that had been carried off for building ‡—“ its ruins offer to the spectator a union of things which confound him, and which the most eloquent man in vain would attempt to describe.

“ As to the figures of idols found among these ruins, whether we consider their number or their prodigious size, the thing is beyond all description. But the accu-

* See Strabo, p. 807.

† Hamilton, p. 303.

‡ De Sacy, p. 184.

tracy of their forms, the justness of their proportions, and their resemblance to nature, are most worthy of admiration. I measured one which without its pedestal was more than thirty cubits; its breadth from right to left was about ten cubits, and from front to back it was thick in proportion. This statue was formed of a single piece of red granite, and was covered with a red varnish to which its antiquity seemed only to give a new freshness."

This kind of red paint on statues may be seen on several specimens in the Museum.

The district called El Faioum is one of the most interesting in Egypt, but unfortunately not so well known* as many other parts of less importance. Belzoni, one of the latest travellers who visited it, has not given a clear account of what he saw. The great lake of this province called Birket el Keroun, formerly Mœris, is not an artificial lake as some antient writers have told us, but a real work of nature about the size of the lake of Geneva. The water is saltish, and only palatable in any degree when the lake has received a large infusion of fresh water from the Nile, with which it communicates by a branch from the long canal that runs parallel to the river, and is called the Bahr Youssouf. This canal may possibly have been a natural channel enlarged by art, and was probably cut from the Nile through the opening into the vale of Faioum, for the purpose of regulating the inundation. When the water rose very high, the overplus might be received into the lake Mœris, and let out again for the purpose of irrigation as it might be wanted. Yet it could not flow out again by the same channel through which it entered, except on the supposition of the whole Faioum being once a great lake, and the water occupying a large surface that is

* Mr. Burton, we believe, has examined the Faioum, but has not yet published any account of it.

now dry. The Bahr Youssouf is much higher than the level of the Faïoum district, and the notion of the water flowing back from the lake into the Nile, certainly presents some difficulties; we may perhaps look for an exit at the N.E. extremity of the lake near Tamieh*. By some misunderstanding of the antient Greek writers, or through the mis-statements of the priests, this work was magnified into the excavation of a lake, which still in its diminished size is at least thirty miles long.

The ruins at Medinet el Faïoum, formerly called Arsinoe, and still earlier the City of Crocodiles, show clearly that it was once of great extent. High mounds, fragments of granite columns, and other indications of an antient site, are scattered all around. There is also an obelisk † in the neighbourhood, at a place called Bijige, about forty-three feet high, of red granite. It is much decayed all round to the height of about ten feet, but mostly on the south side. The hieroglyphics on it have been copied by Mr. Burton.

Belzoni found remains of antient towns on the western side of the lake, where he is inclined to look for the ruins of the great labyrinth, but it certainly was not on that side of the lake, if we may trust the evidence of the best antient writers. All hopes of finding this curious specimen of Egyptian architecture are, we fear, useless. Lucas and others have attempted to show that Kasr Keroun, an odd kind of building at the western extremity of the lake, is the real labyrinth. If Lucas' ugly drawing is at all like the original, we can have no hesitation in assigning *his* labyrinth to a comparatively recent epoch. Part of the portico, at least, has been superadded.

* See Herod. ii. 149, who seems to say, the water flowed back by the same channel by which it entered.—See Strab. 809; and Ritter, Africa, p. 807.

† Pococke, i. 59.

CHAPTER IV.

MONUMENTS OF MIDDLE AND UPPER EGYPT.

As we ascend the Nile from lat 29° , numerous mounds and walls, indicating sites of former cities, attract the voyager's attention, but we shall limit our description to those remains that are calculated to illustrate Egyptian art.

At Behneseh (the antient Oxyrhynchus), a town on the Bahr Youssouf, a single Corinthian* column without leaves or volutes, now partly in the sand, indicates that a temple once existed, built most probably about the age of Diocletian. But the first temple in the true Egyptian style that we find in Upper Egypt is the portico of Ashmounein †, on the west side of the river (lat. $27^{\circ} 40'$), on the site of the antient Hermopolis the Great. This portico, which is all that now remains of the temple, consists of a double row of pillars, six in each row; the architraves, which are formed of five stones, each as usual passing from the centre of one pillar to that of the next, still remain. The stone over the centre pillars, where the intercolumniation is wider than between the rest, is twenty-six feet and six inches long, which will serve to give some idea of the magnitude of the masses employed in the Egyptian buildings. There are some peculiarities about the pillars which will require notice when we come to discuss the details of an Egyptian temple, the present chapter being intended only to give the reader some adequate notion of the site and general effect of the great temples of Upper Egypt.

Nearly opposite to Ashmounein is Ensené, the antient Antioe, the city of the Emperor Adrian, and

* Denon, pl. 31.

† Denon, pl. 33; Minutoli's plate.

a few miles lower on the same side of the river are the grottoes of Beni-Hassan (probably in the neighbourhood of the antient Speos Artemidos or Cave of Artemis), whose painted walls will furnish us with materials for the illustration of the arts and domestic life of the Egyptians. These grottoes contain also large hieroglyphical tablets.

In the hills near the town of Siout, now the chief place in Upper Egypt, are some magnificent tombs which indicate that this neighbourhood was once a place of some importance. Siout is most probably the antient Lycopolis. Gau el Kebir (the great) is a small village on the east bank of the river (N. lat. 27), “* remarkable for the remains of an antient temple which had once been of considerable extent. The ruins are three hundred feet long; but the portico only is standing. It consists of eighteen columns eight feet in diameter, which with their entablatures are each sixty-two feet high; and, being surrounded by a thick grove of palm-trees, this is one of the few buildings of Egyptian origin that can be said to have a picturesque appearance. The sculptures on the pillars and the front wall have nothing peculiar in them: at each side of the entrance is a serpent erect with a mitre on its head; and on the frieze is the usual ornament of the globe and serpents—a symbol of the eternity and beneficence of the Deity.”

Such was the appearance of Gau in 1802; but this magnificent portico, which stood close to the banks of the Nile, was thrown down in 1819, by the water undermining it, and when Dr. Richardson visited the place only a single pillar was standing. Gau, the German architect, whose name oddly enough happens to be the same as that of the place we are describing, saw what remained of this portico in 1818, as he was ascending the Nile; but in 1819, on his return from

* Hamilton, p. 266.

Nubia, he found that nearly all traces of it had disappeared. Gau is the antient Antæopolis. It appears from a Greek inscription* on the frieze (which however is incomplete) that Ptolemy Philometor and his sister Cleopatra dedicated it to Antæus and the Synnæan deities, B. C. 176; probably they built the temple. The second part of the inscription, which is in a different character, shows that Aurelius and Antoninus repaired the roof.

Sheikh Erede †, twenty miles south of Gau, on the east side of the river, is remarkable for a colossal statue of Roman sculpture, about ten feet high, in a sitting posture, and in the costume of a Roman senator. At Ekhnim also, the antient Panopolis, on the east bank, once a city of importance, there are scattered ruins of two temples, but perhaps more might be discovered if any traveller had time to make excavations. The Greek inscription ‡ found there on an architrave furnishes additional proof, if any were wanted, that many buildings in Egypt were erected or restored by the Roman emperors. This inscription contains a dedication to the god Pan, which confirms the opinion of this being the antient Panopolis, called by Herodotus, Chemmis. The old historian describes a temple of Perseus at Chemmis, with a large propyla and colossi (vol. ii. p. 91). Ekhnim now contains the best Coptic church in all Egypt.

The remains of Arabat, the antient Abydos, on the west side of the river, are less known than we should wish them to be, as there is something very peculiar in the construction of the larger building, which is not a temple. It is nearly covered with sand, and, contrary to what we usually find to be the case, built partly of a calcareous and partly of a sandstone. Strabo speaks of a Memnoneium here, which, he says, is like the labyrinth in some respects. Various chambers in it have

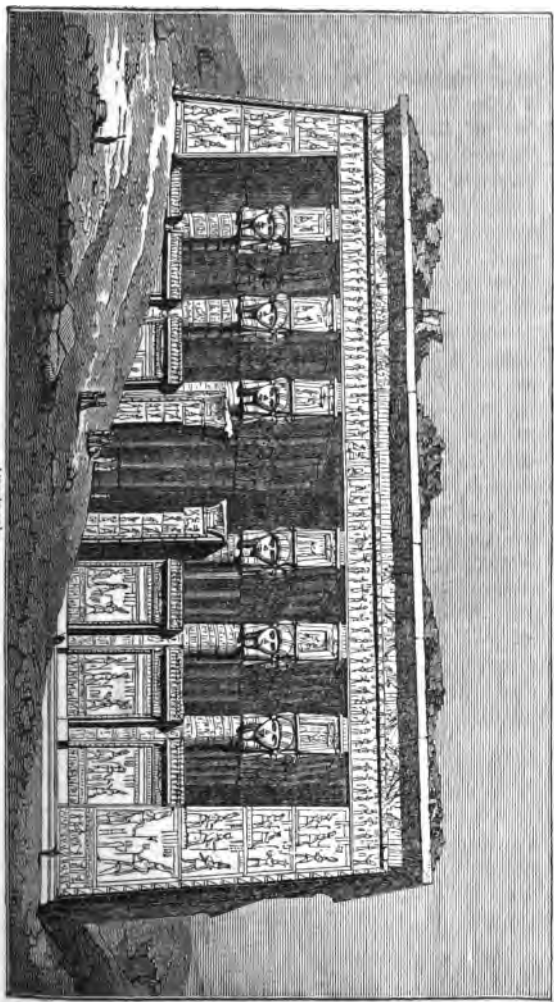
* Hamilton, p. 268. † Ibid. p. 265. ‡ Ibid. p. 263.

been examined, but we have not been able to meet with a plan of the whole building. From this place Mr. W. Bankes brought, in 1818, a copy of a large hieroglyphical inscription, which is now commonly called the Genealogical Table of Abydos. It was in making an excavation for the purpose of obtaining a ground plan that the tablet was discovered. It has since been copied by Mr. Burton and others.

At the great bend of the river to the south, and on the west side, stands the magnificent temple of Denderah ('Tentyra'), the most perfect of all the existing monuments of Egypt. The remains cover a great extent, and consist of various buildings, and propyla*, besides the temple itself. They are enclosed, with the exception of one propylon, within a square wall, whose side is one thousand feet, and built of sun-dried bricks. The wall is in some parts thirty-five feet high, and fifteen thick. Several travellers (Mr. Hamilton, Dr. Richardson, &c.) have minutely and very ably described this temple with its innumerable decorations, and, we believe, nearly all now agree in assigning the date of its erection either to the period of the Ptolemies, or that of the early Roman emperors. If the inscription on the cornice of the pronaos or portico, to which we have before referred, is to be considered as decisive, this temple was built in the reign of Tiberius. It is however conjectured by Dr. Richardson, with more probability, that it was built under the Ptolemies and repaired in the reign of Tiberius.

This view is taken from the French work on Egypt. The building is very much encumbered with rubbish, and therefore for the purpose of showing some part of the front entire, we have represented one small portion as it would appear if cleared down as far as the

* The meaning of the word *propyla* may be understood by referring to the view of Luxor, opposite to p. 64. The *propyla* are the two massive walls which are seen behind the obelisks.



Leontezah.

base. P. Lucas, who travelled, as he tells us in his title-page, by order of Louis XIV., has given a front view (vol. ii. p. 133) of the portico of Denderah, which those who have the opportunity may be amused by comparing with the French drawing, or that by Major Hayes in the plates accompanying Hamilton's *Ægyptiaca*. Since the time of Lucas and Norden we have made some progress in our knowledge of Egyptian art. Lucas' view certainly shows us the Isis-headed pillar; but his long-necked and half-bosom bare Isis is more like the portrait of some fashionable of Louis' court, than the genuine head of Isis. The sculptures, though very small in this drawing, are distinct enough to be intelligible. One is undoubtedly a gentleman of the old school, with his sword by his side, sticking out in a very proper manner. Another has a three-cornered hat on, a long old-fashioned coat, full in the bottom part, and descending as far as the knees; while the attitude of the legs is exactly the very stiffness that we see in some old pictures. Another figure, with its back turned to us, is a Dutch sailor or fisherman, with large water-boots on. Several other figures are furnished with very respectable modern hats. Nothing of the intercolumniary walls is seen in this drawing. When Langlès edited Norden's *Travels*, in 1795, this miserable drawing was the only view of Denderah that he could find to make up for Norden's omission.

As some more particular description of this temple will be useful, we give Mr. Belzoni's, which is the shortest, though not the most complete.

"The front is adorned with a beautiful cornice, and a frieze covered with figures and hieroglyphics, over the centre of which the winged globe is predominant, and the two sides are embellished with compartments of sacrifices and offerings. The columns that form the portico are twenty-four in number, divided into four rows, including those in front. On entering the gate the

scene changes, and requires more minute observation. The quadrangular form of the capitals first strikes the eye; each capital consists of four quadrilateral faces, on which are represented a temple with a divinity, under the portico of the sanctuary; under each square face we see a colossal head of Isis with cow's ears, and the usual head-dress of females on the monuments. There is not one of these heads but is much mutilated, particularly those on the columns in the front of the temple facing the outside: but notwithstanding this disadvantage and the flatness of their form, there is a simplicity in their countenance that approaches to a smile. The shafts of the columns are covered with hieroglyphics and figures, which are in basso relievo, as are all the figures on the front and lateral walls. The front of the doorway, which is in a straight line with the entrance and the sanctuary, is richly adorned with figures of smaller size than the rest of the portico. The ceiling contains the zodiac, enclosed by two long female figures, which extend from one side to the other of it. The walls are divided into several square compartments, each containing figures representing deities, and priests in the act of offering or immolating victims. On all the walls, columns, ceiling, or architraves, there is no where a space of two feet that is not covered with some figures of human beings, animals, plants, emblems of agriculture, or of religious ceremony. Wherever the eyes turn, wherever the attention is fixed, every thing inspires respect and veneration, heightened by the solitary situation of the temple, which adds to the attraction of these splendid recesses. The inner apartments are much the same as the portico, all covered with figures in basso relievo, to which the light enters through small holes in the walls: the sanctuary itself is quite dark. In the corner of it I found the door, which leads to the roof by a staircase, the walls of which are also covered with

figures in basso relievo. On the top of the temple the Arabs had built a village, I suppose to be the more elevated and exposed to the air; but it is all in ruins, as no one now lives there. From the top I descended into some apartments on the east side of the temple. There I saw the famous zodiac on the ceiling. The circular form of this zodiac led me to suppose, in some measure, that this temple was built at a later period than the rest, as nothing like it is seen any where else. In the front of the edifice there is a propylæon, not inferior to the works in the temple; and, though partly fallen, it still shows its ancient grandeur. On the left, going from the portico, there is a small temple surrounded by columns. In the inside is a figure of Isis sitting with Orus in her lap, and other female figures, each with a child in her arms, are observable.

“The capitals of the columns are adorned with the figure of Typhon. The gallery or portico that surrounds the temple, is filled up with rubbish to a great height, and walls of unburnt bricks have been raised from one column to another.”

We pass by Kennéh, on the east bank, from which travellers may go to Cosseir to embark on the Red Sea; we hasten by the remains of Kouft, the ancient Coptos, and the solitary* propylon of Kous, standing alone without its temple,—to the plain of Thebes, to the most wonderful assemblage of ruins on the face of the earth.

All travellers agree that it is impossible to describe the effect produced by the colossal remains of this ancient capital; nor does it lie within our plan to attempt this description at present any farther than is necessary to make our readers acquainted with the general character and localities of the existing temples of

* It bears a Greek inscription, containing a dedication of the temple by Cleopatra and Ptolemy Philometores.

Egypt. The ground-plan* will show the site of the most striking monuments on each side of the river.

No knowledge of antiquity, no long-cherished associations, no searching after something to admire, is necessary here. The wonders of Thebes rise before the astonished spectator like the creations of some superior power. "†It appeared to me," says Belzoni, "like entering a city of giants, who, after a long conflict, were all destroyed, leaving the ruins of their various temples as the only proofs of their former existence." Denon's description of the first view of Thebes by the French army, which he accompanied in the expedition into Upper Egypt, is singularly characteristic. "On turning the point of a chain of mountains which forms a kind of promontory, we saw all at once antient Thebes in its full extent—that Thebes whose magnitude has been pictured to us by a single word in Homer, *hundred-gated*, a poetical and unmeaning expression which has been so confidently repeated ever since. This city, described in a few pages dictated to Herodotus‡ by Egyptian priests, which succeeding authors have copied—renowned for numerous kings, who, through their wisdom, have been elevated to the rank of gods; for laws which have been revered without being known; for sciences which have been confided to proud and mysterious inscriptions, wise and earliest monuments of the arts which time has respected;—this sanctuary, abandoned, isolated through barbarism, and surrendered to the desert from which it was won; this city, shrouded in the veil of mystery by which even colossi are magni-

* See chapter on Colossi.

† Belzoni, p. 37.

‡ Herodotus has given no description of Thebes. Denon several times quotes Herodotus for what is not in that author. But this is so common, even with people who have claims to scholarship, that it has become almost a fashion to say that any thing is in Herodotus.

sted; this remote city, which imagination has only caught a glimpse of through the darkness of time,—was still so gigantic an apparition, that, at the sight of its scattered ruins, the army halted of its own accord, and the soldiers, with one spontaneous movement, clapped their hands." It is, however, rather unfortunate for Denon's description, that another traveller denies that there is such an approach to Thebes as is mentioned in the extract, and he assures us that the ruins cannot be seen till the traveller comes near them; and further, that to produce such astonishing effects as the Frenchman describes, we ought to be *very* near them or *among* them. Without pretending to reconcile these contradictions, we can readily believe that the ruins may produce a considerable effect, even at some distance, if Denon's drawings are at all correct. As to the impression made by a near inspection of these wonderful remains, there is no discrepancy among travellers.

Thebes lay on each side of the river, and extended also on both sides as far as the mountains. The tombs, which are on the western side, reach even into the limits of the desert. Four principal villages stand on the site of this antient city,—Luxor and Carnak on the eastern, Gournou and Medinet-Abou on the western side. The temple of Luxor is very near the river, and there is here a good antient jettée, well built of bricks. The entrance to this temple is through a magnificent pylon, or gateway, facing the north, 200 feet in front, and 57 feet high above the present level of the soil. Before the gateway stand the two most perfect obelisks that exist, formed, as usual, of the red granite of Syene, and each about 80 feet high, and from 8 to 10 feet wide at the base. Travellers differ in their estimate of the width of the base, some, perhaps, taking the actual measure on the surface of the soil, while others may make allowance for the part that is buried;

for that the soil is much elevated will appear from what follows: “* Between these obelisks and the propylon are two colossal statues, also of red granite; from the difference of the dresses it is judged that one was a male, the other a female, figure;—they are nearly of equal sizes. Though buried in the ground to the chest, they still measure 21 and 22 feet from thence to the top of the mitre.” Another cause of discrepancy in the measurements may be, that the adjacent sides of the obelisks are of different dimensions; which is generally the case.

It is this gateway that is filled with those remarkable sculptures, which represent the triumph of some antient monarch of Egypt over an Asiatic enemy, and which we find repeated, both on other monuments of Thebes, and partly also on some of the monuments of Nubia, as, for example, at Ipsambul. This event appears to have formed an epoch in Egyptian history, and to have furnished materials both for the historian and the sculptor, like the war of Troy to the Grecian poet. The whole length of this temple is about 800 feet. By the aid of the ground-plan and the minuter description of an Egyptian temple, which we shall presently give, its general distribution will be easily understood.

But the remains of Carnak, about one mile and a quarter lower down the river, are still more wonderful than Luxor: one of the buildings is probably the temple of Ammon, which we know from Diodorus was on this side of the river. An irregular avenue of sphinxes, considerably more than a mile in length (about 6560 feet), connected the northern entrance of the temple of Luxor with it; but this was only one of several proud approaches to perhaps the largest assemblage of buildings that ever was erected. For a

* Hamilton, p. 115. There are three (see Minutoli, and the French plan); and probably there were four.



Luxor

minute description of Carnak we must refer to the plans in the great French work, and to Dr. Richardson's and Mr. Hamilton's accounts. The irregularities in the structure and approaches of this building show that the various parts of it were raised at different periods, for indeed it would have been impossible for any one sovereign to have completed such a monument in his lifetime; and we know, also, that the Great Temple at Memphis received numerous additions during a long succession of ages. Some parts, both of this temple and of the larger building at Carnak (sometimes called a palace), have been constructed out of the materials of earlier buildings, as we see from blocks of stone being occasionally placed with inverted hieroglyphics. It is impossible, without good drawings and very long descriptions, to give anything like an adequate idea of the enormous remains of Carnak, among which we find a hall whose roof of flat stones is sustained by more than 130 pillars, some 26 feet, and others as much as 34 feet, in circumference.

The remains on the western side of the river are, perhaps, more interesting than those on the east, some of which will form the subject of separate chapters.

That nearly all the monuments of Thebes belong to a period anterior to the Persian conquest, B. C. 525, and that, among them we must look for the oldest and most genuine specimens of Egyptian art, is clear, both from the character of the monuments themselves and from historical records; nor is this conviction weakened by finding the name of Alexander twice on part of the buildings at Carnak*, which will prove no more than that a chamber might have been added to the temple and inscribed with his name; or that it was not unusual for the priests to flatter conquerors or conquerors' deputies by carving on stone the name of their new master. Thebes was the centre of Egyptian

* Champollion, Précis, p. 56.

power and commerce, probably long before Memphis grew into importance, or before the Delta was made suitable to the purposes of husbandry by the cutting of canals and the raising of embankments.

Between Thebes and the cataracts of Assouan are numerous remains, which it is unnecessary to particularize further than by indicating their sites, with the exception of the Temple of Edfou, which, as it is one of the best preserved, we shall afterwards make use of in our description of the general structure of an Egyptian temple.

Erments (the antient Hermonthis) is about eight miles from Medinet-Abou, on the same side of the river. The ruins are very extensive, but the temple itself is small, and is remarkable for some peculiarities in the plan, as well as for having many sculptures different from what are found in any other temple. At Erments are the foundations of a Greek church (for the place was once an episcopal see), 160 feet long and 83 wide, which has had four rows of granite columns in the cella. The dimensions of this church will serve to give some idea of the kind of buildings erected in Egypt under the Christian emperors: the materials are evidently those of an old Egyptian temple. We may remark, also, that, in Upper Egypt, in early periods, granite was in general only used for obelisks, and occasionally for propyla or gateways; as, for instance, one of the propyla of Carnak is built of granite, covered with well-wrought hieroglyphics. There are the remains of a tank near the temple of Erments, cased with stones, and provided with steps to lead down to the water.

Passing by the ruins of several places of less importance, we come to Esneh (the antient Latopolis), on the west bank of the river, a temple once supposed to be of the highest antiquity, but now brought down, by pretty general consent, to the period after the Mace-

domian conquest. It is encumbered with all kinds of rubbish and filth;—the material is a sandstone, as usual, and the portico consists of six rows of four columns each, with lotus-leaf capitals, which, however, are all different. Denon* is inclined to consider this as one of the finest specimens of Egyptian architecture.

About half way between Esneh and Edfou, is the last pyramid within the limits of Egypt, as we ascend the Nile. The side of its base is about 60 feet; it is now in a very ruined † condition. Nearly opposite to this pyramid, on the east side, are the grottoes of El Cab (Eleithuias), whose painted chambers are the best place in which to study the domestic life and rural economy of the Egyptians.

Between the Temple of Edfou (N. L. 25°) and the cataracts, are the extensive quarries of Hadjar Selseleb, and the remains of Ombi, now called Koum Ombou, or the *hill* of Ombou, where there is a magnificent temple, on the top of a sandy hill near the river; and a smaller temple of Isis to the N. W. of it. The large temple has no propylon‡ or dromos in front of it, and the portico, contrary to universal usage in Egypt, has an odd number of pillars in front, there having been fifteen in all, arranged in three rows. Thirteen columns are still standing. There were two principal entrances to this building, which really appears to have been two distinct temples united in one. On a cornice above the door leading into one of the two adyta of this temple is a Greek inscription, said to appear co-eval with the building itself. This inscription shows that the sekos was built, or dedicated, or repaired, (we cannot say which, as the Greek does not specify,) in the reign of Ptolemy and Cleopatra Philometores. It was dedicated (according to the inscription) to the great god Aroeres

* Voyage, p. 148.

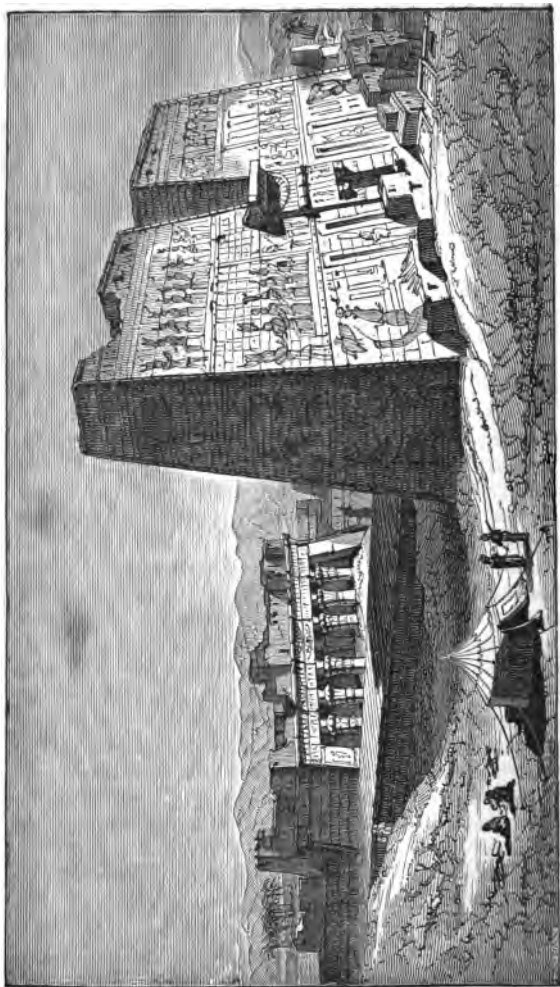
† See Denon, pl. 62.

‡ Dr. Richardson.

Apollo, and to the other deities of the temple, by the soldiers stationed in the Ombite nome.

The island of Elephantine, at the northern, and Philæ, at the southern extremity of the cataracts, have been already mentioned as containing remains of Egyptian buildings probably belonging to the age of the Pharaohs, as well as erections of later dates. The remains of Elephantine are not very striking, particularly when contrasted with the noble monuments of antient art which are heaped together in such profusion on the little island of Philæ, on a space about 1250 feet long, and 400 feet broad in the widest part.

We have now arrived at the limit of Egypt, where the navigation is impeded by the rapids caused by the numerous granite rocks and islands in the river, and where once undoubtedly, owing to the necessity of unloading cargoes, and again shipping them at Syene, the Egyptians, and others connected with them by commerce, must have formed a depôt for their various wares. Thus this rocky district became a commercial centre; and wherever commerce existed in the antient world, temples arose, and by throwing their sacred protection over all within the hallowed precincts, contributed to the preservation of property and the continuance of friendly intercourse. To such a cause, perhaps, we may partly assign the buildings of Syene, Philæ, and Elephantine. The granite quarries alone in the neighbourhood of Syene must have employed a considerable number of hands, and thus have contributed to increase the population of this district.



Estros.

CHAPTER V.

AN EGYPTIAN TEMPLE.

THE Temple of Edfou, which we have chosen as one of the most suitable to illustrate the general style of the sacred buildings of Egypt, though not the most ancient of the existing monuments, is one of the most imposing in its appearance, and one of the completest both in its great outline and its smaller details. It stands on the west side of the river (N. lat. 25°), on a small eminence on the plain, which has here an unusually low level. The temple is exceedingly encumbered with rubbish, both outside and inside. The accompanying view, taken from west to east, will convey a general impression of the exterior of this temple, as well as of some part of the interior distribution.

The entrance is composed of two pyramidal moles, sometimes called propylæa by modern writers, each front of which is about a hundred and four* feet long, and thirty-seven wide at the base; the moles are about one hundred and fourteen feet high. These dimensions of the base (one hundred and four feet by thirty-seven) diminish gradually from the base to the summit, where the horizontal section is eighty-four feet by twenty. They are, in fact, truncated pyramids, with a rectangular base (not a square), and sides inclining less to one another than in the regular pyramids. Between the moles is the door, from the jambs of which project two pieces of stone, which were intended, as Denon supposes, to support the heads of two colossal figures. We see, in fact, two

* See the ground-plan, on which the dimensions are given in English feet, and tenths of a foot,

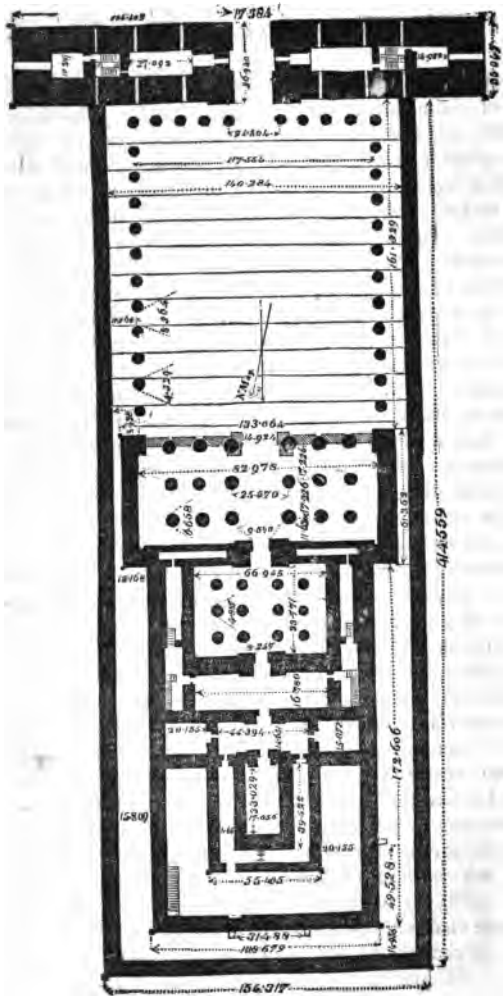
colossal statues similarly placed at the entrance of the great temple of Luxor*, and we know that it was usual both for colossi and obelisks to be used in pairs, and placed as an ornament in front of the propylæa. Two obelisks, as we have before remarked, are thus placed in front of the great doorway of Luxor. On each of the fronts of the propylæa may be observed two long niches, before which, Denon supposes, obelisks must formerly have stood, as he found similar niches cut on the wall behind the obelisks of Philæ; or they may have been intended to receive some such long spearlike ornament as we see on one of the restored propyla, as given in the French work on Egypt. On the walls of these moles immense figures are sculptured in a masterly style: there are three rows in the front, the lowest containing the largest figures. After passing through the doorway we enter a court (which may be partly seen in the view) surrounded with pillars: on each of the longer sides there is a row of twelve pillars, which are placed at some distance from the side-walls; and as the space between the tops of the pillars and the wall is roofed over with stone, a covered portico is formed which leads on each side to the door of the staircases which are in the pyramidal moles. These staircases furnish an access to the chambers of the propylæa. There is also a row of four pillars, including the corner one, on each side of the doorway as we enter the court, similarly covered over. From the base of these pillars to the top of the stone-covering is about thirty-seven feet six inches. This enclosure is now filled with rubbish and wretched buildings, one of which may be seen in Denon's view to the left of the moles, forming a part of the modern village of Edfou. There is a gradual ascent by a kind of steps, as represented in the longitudinal section

* See Denon, pl. 50, and our pl., p. 81.

(*Egypte*, vol. i. pl. 50), from the entrance of this court to the pronaos or portico.

The portico, as we see from the ground-plan, consists of eighteen pillars, six in a row, the intercolumniation of the central ones, forming the doorway, being, as usual, the greatest. The whole height of the portico above the lowest level of the court is about fifty-six feet, part of which is due to the gradual ascent just described, which seems to have been common in many temples, for the purpose of giving the façade a greater elevation. The intercolumniations of the front pillars are built up to more than half the height. After passing through the pronaos, we come to a doorway which leads towards the sekos or cell, which, in the Egyptian temples, is always divided into several apartments; but this sekos is so full of rubbish and filth, that some travellers have complained that it is impossible to make out the distribution of this part of the temple. The accompanying ground-plan, however, which is taken from the great French work on Egypt, will enable us, if it is correct, to comprehend the arrangement of the interior parts.

Passing through a second doorway, and leaving on each hand a long chamber, we enter a kind of hypostyle hall, supported by twelve pillars; the roof is flat, and formed by large beams of stone crossing from each pillar to the next in the same row, the whole being covered with thick flat slabs. The pillars have the quadrilateral Isis-headed capital, as at Denderah. After leaving this chamber, we come to another long and narrow one, from which there are two small entrances to the side-galleries, wherein we see flights of steps leading upwards to the roof of the sekos. Still further, we see another small chamber, with an apartment on each side of it, probably for the use of the priests. From this last-mentioned chamber we enter the holy recess itself, an



Ground plan of Edfou.

oblong room about thirty-three feet by seventeen, in which the figure of the deity was placed. This might either be a statue of stone, with an altar or small monolith in front of it; or it might be a painted relief with a figure on each side of the deity, in the act of adoration, as we see in various temples, particularly in Nubia. In these sanctuaries, there was generally a monolith. From the chamber, which is immediately in front of the adytum, we see two galleries running down on each side of it, and leading to a doorway, by which the priests might walk into a large, but perfectly retired space, all round the sanctuary, or might ascend on the roof by a flight of steps to enjoy the pure air and the light on the terraced roof; for below they had no light at all, except it might be from small apertures, through which the Fellahs, who now live on the roof, discharge all their dirt into the temple. It will be observed that, from the covered gallery on each side of the large open area, there is a path continued all round the temple, between the outer and the inner wall. Probably the vulgar were allowed to use this walk, as a thick wall was between them and the apartments devoted to the priests and the worship of the deity; for none but the priests, and probably the kings, were admitted into the inner apartments, much less into the adytum, which contained the representation of the deity. Pausanias*, in the second century of our era, when travelling in Greece, was not allowed to see the statue of Isis in the temple of Phlius, where the Isiac worship had been introduced. A wall, as usual, surrounds the temple, decorated on both sides with hieroglyphics executed with the greatest care. The terrace is now covered with mud cottages, and the chambers of the sekos serve as repositories for grain or other commodities, or as receptacles for dirt.

* II. 13, 7.

Belzoni's account of this temple will serve to complete our description of its general appearance.

“ *This temple may be compared with that of Tentyra for preservation, and is superior in magnitude. The propylæon is the largest and most perfect of any in Egypt: it is covered on all sides with colossal figures of intaglio rilievo †, and contains several apartments in the interior, which receive light by square apertures in the side. We have here one of those curious subjects of inquiry, which, in my opinion, have never yet been explained. These square holes, or windows, viewed from the inside of the chambers, appear to have been made for the purpose of giving light to these apartments, or to hold some particular ornaments or emblems, placed in them occasionally on festival days; consequently it must be concluded that they were made at the same time with the building. Yet, on the outside, these very windows come in contact with the colossal figures which are sculptured on the walls; and part of these appear as if cut off where the windows have been made; so that, from the appearance on the outside, it is to be inferred that these apertures were formed after the building was finished. For my own part, I think they were cut long after that period, and made to give light to the apartments, which were inhabited by people of a different religion from those who built the temple. The pronaos (the entrance-court) is very wide, and is the only one to be seen in Egypt in such perfection, though completely encumbered with Arab huts. The portico is also magnificent; but, unfortunately, above three-fourths of it covered with rubbish. Through some holes in the upper part of the sekos I entered the inner apartments; but they were so obstructed

* Belzoni, p. 56.

† The meaning of this term may be understood by looking at the figures sculptured on the obelisks in the Museum.

that I could not proceed far. The Fellahs have built part of their village on the top of it, as well as stables for cattle, &c. The temple is surrounded by a high thick wall, which extends from each side of the propylæon, so as to enclose the whole building. Not only the temple, but every part of the wall, is covered with hieroglyphics and figures. On the side wall of the pronaos I observed the figure of Harpocrates, which is described by Mr. Hamilton, seated on a full-blown lotus, with his fingers on his lips, as in the minor temple at Tentyra; and on the west side of the wall is the figure of a unicorn. This is one of the few figures of beasts I observed in Egypt. The elephant is to be seen only in the entrance to the temple of Isis, in the island of Philæ: the horse, as a hieroglyphic, is on the northern exterior wall at Medinet-Abou, and the camelopard is on the wall of the sekos of the Memnonium, and on the back of the temple of Erments. On looking at an edifice of such magnitude, workmanship, and antiquity, inhabited by a half-savage people, whose huts are stuck against it, not unlike wasps' nests, and to contrast their filthy clothes with these sacred images, that were once so highly venerated, makes one strongly feel the difference between the antient and the modern state of Egypt. The minor temple is but of small dimensions. It had a portico in front, nothing of which is to be seen but fragments of columns buried in the rubbish."—"Farther on," he continues, "to the south is part of a building, which no doubt was a second propylæon, as it faces the one now standing. Farther still, is a small temple, almost unnoticed by travellers, which has an avenue of sphinxes, leading in a right line towards the temple. The sphinxes, several of which I cleared from the surrounding sand, have a lion's body and a female head as large as life. There are vast heaps of ruins all around these temples, and many relics of antiquity may be buried there."

The engravings in the French work enable us to add to what has already been said, a few particulars respecting the decorations of this temple. The sculptures on both faces of the propyla are exactly the same, and distributed into three compartments, one above another: this was a very common mode of arranging their pictorial designs in Egypt, and may be observed in many of the tombs. The heights of these compartments, beginning with the lowest, are respectively about fifty, eighteen, and fourteen and a half feet, which leaves a space between each compartment; and also between the highest compartment and the cornice. The height of the figures in the lowest, including their caps, is about forty-six feet: here we observe a tall figure, with uplifted axe, going to strike off the head of a Briareus, or rather the heads of a great number of people, whom the hero has contrived to grasp firmly by the hair, while he holds them suspended in the attitude of entreaty. The vulture, a bird that often accompanies the Egyptian conqueror, is hovering over the uplifted hand with a ring in its claws. Two female figures, exactly alike, one standing behind the other, with the high cap on their heads, and the sacred serpent erect on their brows, are looking towards the male figure. In one hand they hold a kind of key, with a circular handle, which, from its having some resemblance to the letter T, is often called the sacred Tau, or crux ansata. Two elliptical rings, or cartouches, such as are now known to contain the names and titles of kings, are seen on each side near the hero's head-dress, but there are no characters within them, according to the engraving; and no traces of their having been erased by violence, which is a very ordinary occurrence in the monuments of Egypt. The other two compartments, on each side, contain the usual representation of offerings made to the deities.

The doorway of an Egyptian propylon is one of the most imposing parts of the architecture. In this instance, the whole height, from the base of the doorway to the top of the cornice, is $74\frac{1}{2}$ feet, and the height of the entrance itself about $51\frac{3}{4}$, leaving $22\frac{3}{4}$ feet for the architrave, the noble moulding, the frieze, and the cornice that surmount it. The width of the doorway is the same all the way from the bottom to the top, the whole width being $40\frac{1}{2}$ feet, and that of the passage itself $17\frac{3}{4}$. The winged globe, flanked on each side by the erect serpent, ornaments, as usual, the frieze of the doorway. It is impossible, without engravings on a large scale, to give any adequate idea of the bold gigantic mouldings which run along the edges of the propylæa, and other corresponding lines of the portico and the rest of the building. In the sunny climate of Egypt the effect of the shadows from these projecting ornaments, but more particularly those from the well-rounded cornices, must make a most pleasing contrast with the illuminated part of the building. The bold sweep and projection of the cornice, that forms the finish of the pronaos, as in the temple of Denderah, will often throw a deep and strong shade over a large part of the front of this noble temple. The capitals of the pillars in the entrance-court present three or four varieties; and this is also the case with the pillars in the portico of this and other temples, which makes one striking difference in the characteristics of an Egyptian and a Grecian temple. The longitudinal section of the whole building (Égypte, i. pl. 50) shows that the front of the pronaos recedes a little from the perpendicular as it rises, similarly to that of the propylæa. On two faces of the cubical block (le dé) that surmounts the capital of the second pillar in the second right-hand row of the hypostyle chamber, there are two elliptical rings containing proper names and titles.



One of the rings has the name of Ptolemy expressed in hieroglyphic characters, with the addition of "the immortal, beloved by Phtha," according to M. Champollion's version.

There are some representations of animals among the sculptures on this temple, that are rather uncommon. The hog appears several times, very well drawn, with his tail as gracefully curled as any modern pig could show. In pl. 59 we have a man spearing a tortoise; and in another place a horse, which is very rarely indeed found among those representations of animals which we call hieroglyphics. In the historical sculptures and battle-scenes on the temples of Thebes, it occurs frequently.

A short distance to the south of the great temple is a smaller one, which is generally considered to be a temple of Typhon, or the evil deity. This is inferred from the figure of the ugly being that appears on the plinths of the quadrangular-topped pillars, just as he is seen on the capitals of the columns in a smaller temple at Denderah, which is near the large one. The front of this Typhonium faces the east, and that of the great temple, the south. The axes of the two are consequently at right angles to one another, or rather form an angle of about $89^{\circ} 6'$ according to measurement.

The uppermost figure of the engraving opposite is a Typhonian head. The three figures beneath also belong to the same class of representations.

A Typhonium is also found by the side of the temple of the good deity at Denderah, Philæ, &c., and placed in a similar position.

It may now be useful to compare Strabo's sketch of an Egyptian temple with this description of Edfou. The Greek geographer, it should be remembered, appears to have had in view, in his description, the temple of Heliopolis, which no longer exists.

“ * The arrangement of the parts of an Egyptian temple is as follows : In a line with the entrance into the sacred enclosure (τέμενος), is a paved road or avenue about a hundred feet in breadth or sometimes less, and in length from three to four hundred feet, or even more. This is called the dromos, as Callimachus has it :

‘ This is the sacred dromos of Anubis.’

Through the whole length of the dromos, and on each side of it, sphinxes are placed, at the distance of thirty feet from one another or somewhat more, forming a double row, one on each side. After the sphinxes you come to a large propylon, and as you advance you come to another, and to a third after that ; for no definite number, either of propyla or sphinxes is required in the plan, but they vary in different temples as to their number, as well as to the length and breadth of the dromi. After the propyla we come to the temple itself (νέως or ναός), which has always a large and handsome pronaos or portico, and a sekos or cella of only moderate dimensions, with no image in it, or, at least, not one of human shape, but some representation of a brute animal. On each side of the pronaos, and in front of it, are what they call the wings (πτερά). These are two walls of equal height (with the temple ?), but their width at the base is somewhat more than the breadth of the temple measured along its basement line. This width of the wings, however, gradually diminishes from the bottom to the top, owing to the sides inclining inwards towards one another, up to the height of seventy-five or ninety feet †. These walls

* P. 805, Casaub.

† Strabo is evidently speaking of the great pyramidal moles, such as we see in front of the temple of Edsou, but, in this in-

have sculptured forms on them of a large size like Tyrrhenian figures, and the very antient Greek works of the same class. There is also at Heliopolis (the geographer is describing this place) a chamber with many pillars*, like that at Memphis, in a barbaric style; for, except that the pillars are large and numerous, and form many rows, there is nothing in them agreeable to the eye or calculated to produce effect. They are mere specimens of much labour ill bestowed."

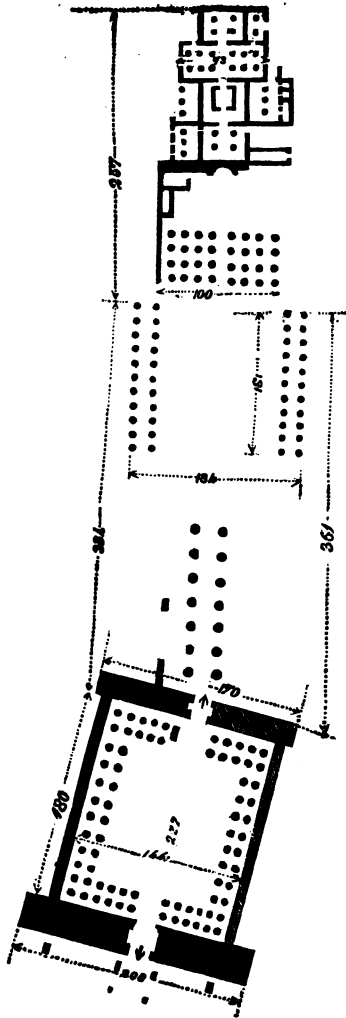
From Belzoni's account it would appear that the great temple of Edfou once had a second propylon, agreeably to Strabo's general description, and also a dromos or avenue of sphinxes, which probably connected the little temple before which they stand with the large one.

The great monuments of Thebes are the best school in which we can study the old and genuine architecture of the Egyptians. Those remains lie on both sides of the river, as we have already described. Luxor † is on the eastern side, and the rear or southern part of the building is close on the bank of the stream. It stands, like many other edifices, on an artificial elevation, about ten feet high, surrounded by a brick wall. The northern part, which contains the great entrance, is much encumbered with the rubbish and huts of the modern village.

stance, the moles are higher than the temple, as, we believe, they always were. The translation presents something like the meaning of Strabo, but the sentence in which he speaks of the "great walls in front of the temple" is exceedingly obscure, and undoubtedly corrupted. We find an interpretation given to this passage in the notes to Minutoli, p. 382, pretty nearly the same as we have proposed in our translation.

* Such as we have described in the plan of Edfou. See also the plan of the hypostyle chamber in the palace or temple of Carnak.—(Egypte.)

† El Kusr, "the ruins,"



Ground-plan of Luxor

An inspection of this ground-plan* will aid us in forming some more exact idea of the progress of Egyptian architecture; for this building at Luxor is universally acknowledged to be one of the old genuine edifices of Egypt, erected, most probably during a long period of prosperity, when Thebes was the residence of the native monarchs, and also the centre of an extensive inland traffic.

The reader is already familiar with the entrance to this building from the print given at p. 64. In the ground-plan we see first, the place where the two obelisks stand; next, behind them, the position of the two colossal statues, with their shoulders just rising above the accumulated rubbish, and the high cap on their heads; and again, behind these, the great propylæa with the entrance between them. In Minutoli's plan, and in that of the French, a third colossus is seen near the middle part of the right-hand propylon. It is surrounded with modern buildings, and can only be seen from the top of the propylæa. We may presume there was another colossus to correspond on the opposite side, thus making four in all. From the propylæa we pass into a peristyle court about 232 feet long by 174, round which we see remains of the double row of pillars indicated in the ground-plan, and partly shewn also in the general view. This court contains an enormous quantity of earth and rubbish, that has accumulated in the course of centuries; owing principally to its present tenants, for the Arabs have placed part of their village within this enclosure. After passing from this court through other pyramidal propylæa we come to a double row

* This plan is from the French work, and it will be found, on comparison, to differ in several respects from that of Minutoli, which we should have preferred following, had we been earlier aware of the difference. Either plan, however, answers sufficiently well the purpose which we have in view, which is not the minute detail of all the parts of this building.

of seven columns $11\frac{1}{2}$ feet in diameter, and here we observe that the axis of the temple changes its direction; and again, on entering the portico, which is formed of thirty-two pillars in four parallel rows, we perceive that there is another slight change of the line, in which the temple stands. In the French plan, the angle between the magnetic pole and the axis of the first great court is 58° ; the corresponding angle of the gallery which succeeds to the first court is $49^\circ 30'$; and the third change in the direction of the building is measured by an angle of $46^\circ 21'$. This irregularity would lead us to conjecture that the whole was not built at once, according to a general plan, but that it was the work of successive ages. Now, supposing this building to have been a temple, there is no part which could be specially appropriated to the religious service of the Deity and the use of the priests, except the numerous small chambers at the extremity of the building; we cannot, therefore, help considering the southern part of this edifice, with its adjoining chambers, as the original temple, to which successive monarchs or priests made additions, which at last were completed by the great court, with its propylæa, colossi, and obelisks. That tradition, at least, assigned this kind of gradual growth to some of the great temples of Egypt, is clear from the instance of the temple of Phtha at Memphis, which we have already referred to. This temple at Memphis appears to have had four great entrances built by different kings, and similar to that at Luxor, as shown in the print. One of them was built by King Amasis, as Herodotus was informed; a fact of which reasonable evidence could be found, even in vulgar tradition, as this Greek merchant visited Egypt within less than a century after the death of Amasis, which was followed by the Persian conquest of that country.

It may appear, at first sight, difficult to assign any

reason for the later architects of the temple of Luxor making a change in the line of the building's direction. But it seems probable that this was done in order that the northern front might lie more nearly opposite to the temple of Carnak, with which it was connected by a long alley of sphinxes. This alley, however, does not run in a straight line, but makes a bend to the right, and then another to the left before it reaches the southern propyla of Carnak. If this be admitted as a true explanation, it will follow that the northern part of Luxor is more recent than the temple at Carnak with which it is connected.

Professor Heeren* and some other writers on Egyptian antiquities consider the edifice at Luxor not to have been a temple, but a palace, or rather a public building for some civil purpose. It seems, indeed, not unlikely that the magnificent monarchs of Thebes would build palaces and other public edifices in which they would receive the homage of their subjects, dispense justice, and display their splendour and wealth to the embassies from foreign nations, which we see represented among the historical sculptures of Egypt. The general style of those Theban buildings which are undoubtedly temples, and of those which Heeren considers to be palaces, agree in the grand characteristics of propyla, extensive courts, and hypostyle chambers. There is also this further agreement, that in the palaces as well as in the temples, we find chambers for the priests, and apartments adapted to religious service; and in this there is no inconsistency, for we know that the Egyptian kings were bound to practise a strict and daily observance of religious duties. But amidst the numerous small apartments of Luxor, we do not observe any one exactly corresponding to the adytum of a temple, which, we believe, is almost always an oblong room of small dimensions, not sup-

* p. 278, &c.,

ported by pillars. Heeren remarks another characteristic difference in the sculptures of these two classes of buildings. The walls of both are covered either with reliefs or intaglios, but those of the temples are appropriated to religious subjects, while on the outer walls of the palace, and the inner walls of the great courts, in addition to some representations of a religious kind, we find battles by sea and land, hunting scenes, &c. which never appear on the temples. Again, in those apartments of the palaces, which we may suppose to have been appropriated to the domestic use of the king, we observe the occupations and scenes of daily life depicted—not indeed without some intermixture of religious subjects, for the omission of such representations would have been at variance with the whole character of Egyptian art, but still in a style very different from the purely religious sculptures of the edifices supposed to have been appropriated to sacred purposes. These reasons seem to us to have great weight, and to be well deserving of the attention of antiquaries.

The small chambers at the extremity of this great edifice at Luxor are built of granite; the rest of the temple is of sandstone. From the Christian paintings* on the walls, the circular niches and the doorways that are built up, it appears that some of the chambers were once used as a church.

It was the practice of the kings of Egypt, both native and Greek, to place their names on the buildings which they erected or adorned; and sometimes, perhaps, particularly in the case of the Greek sovereigns, it was not unusual to cut their letters and their name on buildings erected long before their time. The name of Alexander† is read in hieroglyphics on a portion of the temple at Luxor, which is said to bear also marks of being a more recent construction than the rest of the

* Hamilton, p. 119.

† Champollion, *Précis*, p. 239, 2nd edition.

edifice, and may therefore probably have had Alexander's name inscribed on it, by the priests, out of compliment to their new master.

The remains of Carnak lie north-east of Luxor, about 2,500 feet from the banks of the river, the principal part on an artificial elevation, surrounded by a wall of unburnt bricks, about 5,300 yards in circuit. It is impossible, without a plan * on a large scale, to give any adequate idea of the extent of these remains. They consist of several buildings, the largest of which, by some called a palace and by others a temple, is contained within the spacious enclosure just mentioned, which was extensive enough to hold also a large tank, which was cased with stone, and had a flight of steps eading down to it. The chief front (the western) is turned to the Nile, with which it was connected by an alley of colossal crio-sphinxes ; and at the termination there was probably a flight of steps leading down to the banks of the river. The axis of each part of this temple lies in the same direction, which is 49° † west of the magnetic pole.

Here the devotee would land, who came from a distance to the shrine of Ammon, and with amazement and a feeling of religious awe, would he slowly walk along between the majestic and tranquil sphinxes to the still more magnificent propyla of the building. This ‡ colossal entrance is about 360 feet long and 148 high, but without sculptures ; the great door in the middle is 64 feet in height. Passing through this doorway, he would enter a large court, occupied by a range of pillars on the north and south sides, and a double row of taller pillars running down the middle. It is rather curious that on the south side of this court another building of smaller dimensions projects some

* See Egypte, iii. pl. 16.

† Ground-plan, Egypte, pl. 20. We do not know whether the quadrant is here divided into 90° or 100° .

‡ Heeren. Dr. Richardson. French plan.

distance into it; which was either a subordinate part of the larger temple, or, if we consider the great building to be a palace, this appendage must be considered as a temple attached to it. The pillars in the middle of the entrance court terminate opposite to two* colossal statues in front of a second propylon, through which, after ascending a flight of twenty-seven steps, we come to a large hall which has had a flat stone roof. This is the great hypostyle hall of Carnak, which is supported by one hundred and thirty-four colossal pillars; there being sixteen columns running across the breadth of the building, in nine parallel rows, which, however, as we shall presently explain, offer some irregularities.

The hypostyle hall has a double row of larger pillars, twelve in number, running down the centre. Owing to the projection of a doorway or entrance from the court which succeeds the hypostyle hall, there are two pillars cut off on each side, from the rows of smaller pillars which are next to the larger ones. This reduces the whole number to one hundred and thirty-four, which would be one hundred and forty-four, if all the pillars were of the same size, and if there were no irregularity in the two rows nearest the centre rows on each side. The width of this magnificent hall is about 388 feet, and the length or depth (measured in the direction of the axis of the building) $170\frac{1}{2}$ feet. It is remarkable that the great courts and chambers in some of the oldest Egyptian buildings, such as Medinet-Abou and the tomb of Osymandyas, have their width greater than their length: the entrance, in fact, is in the centre of the longest side; and this apparently must have been part of the architect's design. In the small chambers, however, such as the sanc-

* One is still standing in tolerable preservation. It is a figure with one foot a little in advance of the other. The whole is made of a single block.—See French drawing, and Major Hayes' sketch in the plates to Hamilton's *Egyptiaca*.

tiary, we believe the case is nearly always the reverse; and also in the great courts of the palace of Luxor, in that of Edfou, and other temples. The area of this prodigious hall is 57,629 square feet, on which stand the hundred and thirty-four columns, the largest near 11 feet in diameter, once supporting a roof of enormous slabs of stone. Words are inadequate to express the grandeur of conception exhibited in this design. Champollion's expression, though before quoted, is worth quoting again, as it conveys the full force of a powerful impression:—"The imagination which in Europe rises far above our porticoes sinks abashed at the foot of the one hundred and forty columns of the hypostyle hall of Carnak.*"

But we shall form a more exact idea of this enormous work by comparing it with some standard of which we can judge. The church of St. Martin's in the Fields, one of the finest and largest of modern religious edifices in London, is $137\frac{1}{2}$ feet long and 81 feet wide, measured along the outside basement, not including the steps and portico. This will give an area of nearly 11,150 square feet, which is not so much as one-fifth part of the great hall of Carnak.

Or we may consider the matter in the following way. The width of the hall of Carnak is more than four times that of the front of St. Martin's church, while the depth of the former exceeds the length of the latter by more than 32 feet. Therefore four such churches as St. Martin's might stand side by side on the area of this hall, without occupying the whole space. In forming this calculation the *outer* measurements of St. Martin's church have been taken, and the *interior* measure of the great hall of Carnak. But the great hall itself is not more than one-seventh of the whole area enclosed by the walls of the great temple.

The two rows of columns down the middle are larger

* Westminster Review, xxviii. 416.

than the rest, and were designed to support the highest part of the roof, in the vertical sides of which small window-lights are cut. Both the pillars, walls, and propyla of this magnificent colonnade are completely covered with sculptured forms of deities. On the outside of this part of the temple two immense boats are sculptured; one of them, which is 51 feet long, has the head of a ram at each end. Another boat, 45 feet in length, is full of people, who are pushing it along with poles. In the French work (*Antiq.* iii. 33) two such boats are represented, but here the people in the first boat are pulling along the second boat, which is that of Ammon.

At this part of the building where the grand hall terminates, the great passage from the temple of Luxor, after having made two deviations from the main line, strikes in, by which the sacred processions would arrive from the last mentioned place through the long avenues of sphinxes and under four successive propyla to the great temple of Carnak. Here also, near the centre of this magnificent building, are three noble obelisks about 70 feet high, and 9 square at the base; a fourth obelisk is lying on the ground cut into two pieces*. Near these obelisks are some small chambers, which either contained the adytum, or were set apart for the use of the priests.

* We have here followed Dr. Richardson's description, which, however, does not agree exactly with the French plan (*iii.* 21). According to the French plate just referred to, after leaving the hypostyle hall we pass through propyla to a wide and narrow court where two obelisks once stood, of which one only now remains, in front of other propyla. It seems as if a new building commenced here. After going through the second propyla just alluded to, we arrive at a passage between two wide and narrow peristyle courts, with square pillars around and caryatid figures of Osiris attached to them. On entering this passage between the peristyle courts we see the position of two other obelisks of much larger dimensions than the two first mentioned. Only one of them is standing.

We may infer from this position of these two smaller obelisks that the place which they occupy was once the front of the building, and that the great hypostyle chamber, and all that is before it, are the additions of a later period. Indeed this seems confirmed by the appearance of the great entrance turned towards the river, which looks as if it had never been finished. In this building also, as at Luxor, there are internal proofs of its being built at different eras—* many of the gateways (those on the south side) form different angles with one another, and with the walls of the temple: in some places blocks of stone are used, covered with inverted hieroglyphics, and some of the principal sculptures are concealed behind a projecting gateway. Another instance of the symmetrophobia (dislike of symmetry) of the architects of antient Egypt, is visible in the difference in the spaces between the sphinxes and crio-sphinxes, and in the sizes of these statues, which vary from twelve to seventeen feet in length, as they form the several avenues which lead to the body of the building."

The following extract from Mr. Hamilton relating to the entrances and the great hypostyle hall will not be superfluous, though in substance it agrees with the description already given.

There are twelve principal approaches to the great temple of Carnak †, "each of which is composed of several propyla and colossal gateways or moles, besides other buildings attached to them, in themselves larger than most temples. The sides of some of these moles are equal to the bases of the greater part of the pyramids in the Heptanomis, and are built in the same rustic style, each layer of stone projecting a little beyond that which is above it. One of the propyla is entirely of granite, adorned with the most finished hieroglyphics. On each side of them have been co-

* Hamilton, p. 131.

† Ibid. p. 122.

ossal statues of basalt, breccia, and granite, some sitting, some erect, from twenty to thirty feet in height. The avenues, of sphinxes proper, and crio-sphinxes (animals with a lion's body and a ram's head), which lead in several directions to the propyla, and one of which was continued the whole way across the plain to the temple at Luxor, correspond to the magnificence which they promise: and the body of the temple, which is preceded by a large court, at whose sides are colonnades of thirty columns in length, and through the middle of which are two rows of columns fifty feet high, consists first of a prodigious hall or portico, whose roof is sustained by one hundred and thirty four columns, some of which are twenty-six feet in circumference, and others thirty-four: then are four beautiful obelisks, marking the entrance to the adytum, near which the monarch is represented as embraced by the arms of Isis. The adytum itself consists of three apartments entirely of granite. The principal room, which is in the centre, is 20 feet long, 16 wide, and 13 feet high. Three blocks of granite form the roof, which is painted with clusters of gilt stars on a blue ground. The walls are likewise covered with painted sculptures of a character admirably adapted to the mysterious purposes mentioned by Herodotus, on the subject of the virgins who were there introduced to the Theban Jupiter *. Beyond this are other porticoes and galleries, which have been continued to another propylon at the distance of two thousand feet from that at the western extremity of the temple."

This temple seems in fact to have had some resemblance in its plan to the great temple of Memphis, which had four principal propyla, turned respectively to the four cardinal points. The western † entrance of Carnak faced the river; opposite to this at the

* Herod. i. 182.

† This entrance is not due west.

eastern end was another propylon, which Mr. Hamilton describes as being two thousand feet distant from that first mentioned; and again another set of propyla (four in the French plan, all of which had colossi in front of them), on the southern side formed the approach from Luxor. We may conjecture that another similar approach on the northern side would perhaps have been made, had the native monarchs continued to reign at Thebes*.

It is exceedingly difficult to procure exact measurements and descriptions of such buildings as those at Thebes, which is owing not only to the enormity of the masses, but also to the state of ruin in which many parts of those edifices are now lying. In the French plan, the whole length of the palace of Carnak, from the western extremity to the eastern wall, is about 1215 feet. This is the length of the real building itself, not taking into the account any propyla that may have existed on the eastern side, or any part beyond the walls of the edifice. The breadth in the narrowest part is 321 feet; the longest line of width being that of the front propylon, which we have already stated to be about 360 feet. The dimensions of St. Paul's in London, from east to west, within the walls, are generally stated at about 510 feet; and the line from north to south, within the portico doors, is about 282. When we consider that the great palace of Carnak is of a rectangular form, and its least width 321 feet, we may form some idea of the prodigious difference between its area and that of St. Paul's, which is in the form of a cross. The Egyptian edifice has no lofty dome, like that which gives to the Christian edifice an air of grandeur and unity, perhaps unattainable by any effort of Egyptian art; but the

* The remains of a northern approach are actually shown in Denon's plan, pl. 93.

great hall of Carnak is in its kind a specimen of architecture equally calculated to excite our admiration. But words are inadequate to convey any idea of the extent of the remains of this wonderful place. Besides the great palace with its propyla, obelisks, and avenues of colossal sphinxes, there are magnificent temples to the north and south of it, altogether forming an assemblage of remains such as perhaps no other spot on earth can offer. What Thebes must have been in all its glory, before commerce deserted its temples for the sanctuaries of Memphis, and foreign conquest laid waste its palaces, it is impossible to conceive. A single glance at the ground-plan alone, when its scale and the magnitude of its parts are familiar to us, fills us with surprise and almost with incredulity.

The names of Philip, Alexander, and Berenice, represented by hieroglyphical characters, and enclosed in the usual elliptical rings, are found on the granite sanctuaries of Carnak; from which, however, we cannot fairly conclude that these parts of the building are of no higher antiquity than the Macedonian occupation of Egypt. It is sufficient briefly to mention this for the present: we reserve for a subsequent part of this book, the more particular description of the various modes of writing used in Egypt, together with the examination of such names of Egyptian, Greek, and Roman rulers as are found on the buildings both north and south of the first cataract.

The longest description of Thebes by any antient author, and, we may say, almost the only description, is in the first book of Diodorus, but unfortunately this writer, though he visited Egypt, and probably went as far as Thebes, has, according to his custom, given a very confused account of this celebrated city. Indeed he is almost as bad as some of the worst modern travellers; still we may extract something

from him. The fame of this Egyptian capital had spread into Asia Minor in the time of Homer, who speaks of its "great wealth" and its "hundred gates," from each of which there issued "two hundred men with horses and chariots." Diodorus tells us that some persons conjecture that the story of the hundred gates had its origin in the numerous propyla or gateways, and we may add in the long avenues and numerous approaches leading to the principal buildings.

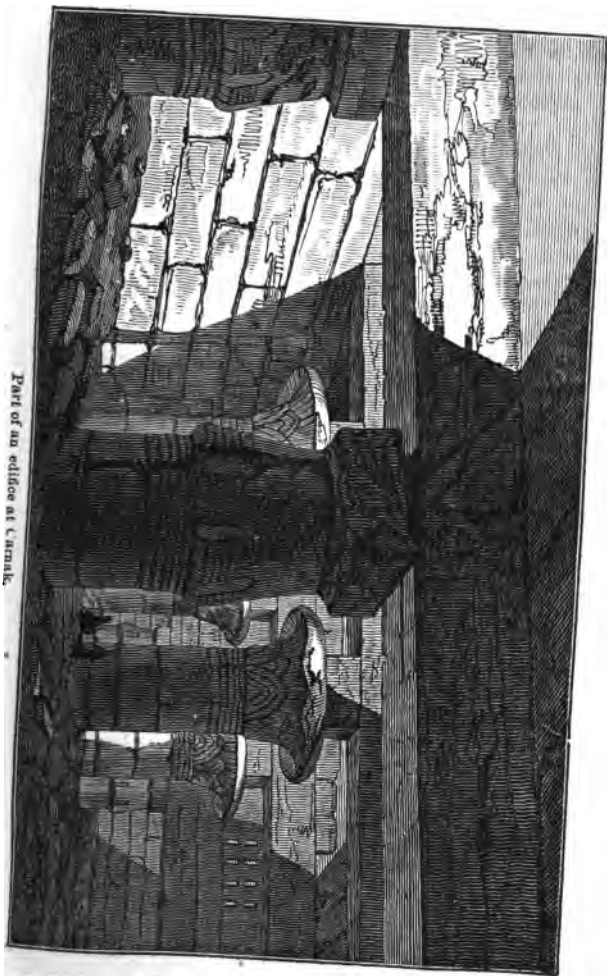
The common name of Thebes among the later Greek writers was Diospolis the Great (the great city of Jupiter); and we know also that the Egyptian deity Ammon, who was represented with a ram's head, was considered by the Greeks as equivalent to their Zeus or the Roman Jupiter. At Thebes there was a great temple of Ammon, which was undoubtedly the temple of Carnak, or at least a part of the great edifice which we have described; for it was on the east side of the river, as will appear from the following passage of Diodorus (i. 97):—"Once a year the sanctuary or shrine of Zeus is taken across the river to the Libyan (the western) side, and after a few days it is brought back, as if the deity were returning from Ethiopia." Sesostris dedicated a boat of cedar wood to Ammon, the god of Thebes; it was 420 feet long, gilded all over on the outside, and covered with silver within. On one of the walls of this temple there are two large vessels sculptured. One of these* boats which is eighteen or nineteen feet long has the head of Ammon finely carved at the front and the stern. These do not seem to be the same boats which Dr. Richardson describes, yet they agree in the important symbol of the ram's head, which indicates the god Ammon.

We cannot conclude this chapter without remarking that this annual procession of the sacred ship,

* Hamilton, p. 130.

and the return of the deity from Ethiopia after some days' absence, serve to confirm the hypothesis of the Ethiopian origin of Thebes and the worship of Ammon. "I think," says Heeren, after quoting the passage from Diodorus about the holy ship, "that this procession is represented in one of the great sculptured reliefs on the temple of Carnak. (Egypte, plates iii. 33.) The sacred ship of Ammon is on the river with its whole equipment, and is towed along by another boat. It is, therefore, on its voyage. This must have been one of the most celebrated festivals, since, even according to the interpretation of antiquity, Homer alludes to it when he speaks of Jupiter's visit to the Ethiopians and his twelve days' absence. That such visits of the gods of the colony to those of the parent state were common, and sure proofs of national relationship, is well known from numerous instances in the antient world. The forms only might be different: in one case this relationship might be commemorated by such a procession as we have described, in another by the actual mission of a sacred embassy." When Alexander* took Tyre he found there a religious mission from Carthage, a Tyrian colony. The same inference will apply to all ages; a common religion is one of the strongest ties among men, and tends perhaps more than any thing else to perpetuate between two countries those friendly relations which had their origin in a kindred blood. A common religion implies also, in some degree at least, a common language; and that this was the case with the Egyptians and Ethiopians is a fact which cannot be doubted.

* Arrian. Anab. ii. 24, 8.



Part of an edifice at Urmak.

CHAPTER VI.

AN EGYPTIAN TEMPLE—CONTINUED.

WE now come to describe more in detail the characteristics of the portico.

*This part of the temple consists of pillars, generally an even number, extending along the front of the temple, and supporting a flat roof of stone. These pillars are placed two, three, and sometimes even four rows deep, as in the portico of Denderah, in a portico at Luxor, and in other cases also. Above the rows of pillars, and on the square plinths at the top of them, large blocks of stone rest (corresponding to the architraves of a Greek temple), reaching along the whole breadth of the building, from the centre of one column to that of the next in the same row. Large cross blocks are then placed at right angles to those just described, extending in a similar manner from each pillar of the front row to the corresponding pillar of the next, and so on. In this way the tops of all the pillars are united by strong beams of stone, which make a frame-work adapted to receive the large flat slabs that form the roof. The construction of the roof of a portico is shown in the most distinct manner by Denon's interior view of the temple of Edfou (pl. 57). In the print that we have given, the stone beams only run in one direction, cross ones being unnecessary where the spaces between the columns were comparatively narrow. The flat slabs of the roof projecting beyond the front and sides of the portico, have their outer edges rounded into that bold curve which corresponds to a Grecian cornice, and is so

* Hamilton,

striking an ornament in Egyptian architecture. The plinth or block of stone which is placed above the capital, and on which the architraves immediately rest, forms one of the peculiar characteristics of an Egyptian pillar. Sometimes its height is so great as to remove the capital from the entablature a distance equal to the height of the capital itself, which thus changes its character by being transferred from that position which from custom appears to us more suitable for it. The height of this plinth or *dé* is equal to that of the whole entablature above it in a small peripteral temple on the island of Philæ. The height of the entablature is determined by the thickness of the two sets of stones already described, of which one forms the beams, and the other the roof of the portico. At Denderah the height of this entablature is about one-fourth of the whole height of the column.

In the oldest Doric temples, as in that of Concord at Girgenti, the entablature is exceedingly high and massy; the buildings of this class being not at all inferior in magnitude and the dimensions of their several parts to the most colossal edifices of Egypt. The architrave and frieze of these old Doric temples of Sicily were of equal height, and the cornice, which was remarkable for its bold projection, was about three-fourths of the height of the frieze. This entablature consisted of *three* great masses of stones placed one above another. Writers differ somewhat in their estimate of the relative proportions of the parts of the entablature to one another, and to the height of the pillar in these old Greek temples; but all agree in assigning to these buildings a massiveness of construction that excites the wonder of the spectator. "The height of this entablature," says Mr. Hamilton, "was in general equal to one-third of the height, or about two diameters of the columns on which it rested: that portion of it occupied by the architrave was

somewhat less than one diameter, the frieze about two-thirds of a diameter, and the cornice the remaining third. The very considerable projection given to the cornice, equal to one-half of the diameter of the column, by the depth of shade which it casts upon the rest of the entablature, and corresponding with the dignified simplicity of the Doric edifices, gave to them that venerable and imposing character in which the temples of the Ionic or Corinthian orders have ever been deficient." Under the cornice, and at the highest part of the Egyptian architrave, we often see a full round moulding, which, in the portico of Denderah, is continued down the edges of the front, and also along the sides of the building. Over the centre of the doorway the winged globe, as it is commonly called, sometimes accompanied with serpents, is the usual ornament, occupying at Denderah the centre of the frieze. The entablature along the sides of the temple, and on the back parts, is of a similar character, and covered with sculptured figures of the same kind.

The Egyptian hall in Piccadilly is a monstrous combination, erected at an expense sufficient to have enabled the builder to show the people of London an exact model of an Egyptian temple. Some of the parts, however, will help those who have the opportunity of seeing it, to form perhaps more exact conceptions of the chief members, which we shall describe. A full bold sloping moulding runs up the sides and along the top, surmounted by a deep, projecting, and curved cornice, in this Piccadilly temple.

It is the character of the propyla, and sometimes of the porticos, to have the outer lines that bound them on each side inclining to one another, so as to preserve the character of a truncated pyramid; a form which we must consider as the original type of the propyla of an Egyptian temple. This pyra-

midal form appears in the oldest constructed Hindoo temples, which, were their tops cut off, would be reduced in their upper parts to the shape of an Egyptian propylon; and it may give some confirmation to the opinion just expressed to remark, that many of the Nubian pyramids appear to have been temples, if we may judge from the porticos that stand in front of some of them. In Egyptian temples, instead of finding a pillar occupying each anterior angle of the portico as in a Greek temple, we have the side walls of the building continued till they form part of the façade.

In the temple of Denderah the intercolumniations are built up with a wall to somewhat more than two-fifths of the height of the pillars, which, however, are not entirely closed over in their lower parts, according to Denon's plan*. A small temple on the island of Philæ has the intercolumniations built up with a wall to about two-thirds of the height of the columns. In several Nubian temples also we see the pillars of the portico engaged in walls, sometimes to two-thirds of their height, as at Gartaas; or even higher, as at Taffa, where the two pillars of the pyramidal portico are engaged in a wall almost as far as the capitals. The two pieces of stone now in the Museum, commonly called friezes, have probably formed the upper part of one of these intercolumniary walls; for they are sculptured on both sides, and are too thin and small for any other purpose except the one alluded to; unless possibly they may have belonged to a small doorway. The doorway of the portico of Denderah, and of other temples similarly constructed, is formed by two upright jambs, without a lintel to unite them at the top.

* Denon's geometrical elevation of the portico of Denderah is partly taken from a temple in Philæ of a similar construction.— See *View of Denderah*, p. 58.

It is to be remarked that the roof of the portico of Denderah is higher than the rest of the building, which contains the sekos and other apartments; and this is the case too in the temple of Edfou, as may be seen from the view which we have given, and in other temples also. But the oldest temples probably had the whole top of the building flat.

There is a very striking difference between an Egyptian and a Greek temple, in the former having no pediment rising above the entablature at the two opposite ends of the building; while in the Grecian temple the cornice is surmounted at each end with a triangular front, the base of which is the length of the cornice, and the other two sides form an obtuse angle at the vertex. The absence of this finish leaves an Egyptian temple incomplete in our eyes, which have been trained to admire the Greek models now naturalized among us; and indeed it seems almost impossible so far to familiarize ourselves with an Egyptian portico as not to feel that it has an appearance of incompleteness.

Genuine Egyptian pillars, as a general rule, are of an irregularly rounded form, but of a diameter varying at different parts of the height; and the intercolumniations, perhaps, differ but little from the proportions of the old Doric temple. But the eye that is accustomed to look on the Ionic or Corinthian column will complain that the Egyptian is rather stunted, the height being probably in general not more than from three and a half to five diameters, while the composite pillars in the ruins of Antinoe have an altitude equal to ten diameters. The columns of Girgenti, reckoning their capitals, are not quite equal to five diameters taken near the base; but in the time of Vitruvius the height of the Roman Doric column had increased to seven diameters. Winkelmann endeavours to show that in the temple of Concord the height of the column

was made equal to the width of the temple, which width in the Doric temples was one-half of the length of the building of the cella only. The diameter of the pillars of the temple of Jupiter, at Girgenti, is said to have been twelve feet. There is a peculiarity in the columns of the portico of Ashmounein not found, we believe, elsewhere in Egypt. Instead of being formed of large masses placed one above another, they consist of irregular pieces, fitted together with such nicety that it is difficult to detect the lines of junction; and this illusion is aided also by the forms of the columns. The bottom is like the lowest leaves of the lotus; after which we see a number of concentric rings, binding the column just like the hoops of a cask; and again above them the column is worked in such a way by vertical cuttings as to present the appearance of a bundle of rods, held together by hoops: the whole has very much the appearance of a barrel; but still this does not destroy the effect produced by the colossal dimension of the columns, which are about 40 feet high including the capitals. The greatest circumference is about $28\frac{1}{2}$ feet, at the height of five feet from the ground, for the column diminishes in thickness both towards the base and the capital. The distance between the two centre columns is 17 feet, and between the rest 13*. These columns at Ashmounein were painted yellow, red, and blue; and from a careful examination of them all, it has been found practicable to make out the details of a whole column, which may be seen represented in all the brilliancy of its colouring in Minutoli's 14th plate.

These last-mentioned pillars are found also in a temple at Gournou†, which is apparently of great antiquity, and even in the very incomplete sketch given

* Hamilton, p. 304. Denon, pl. 33.

† Denon, pl. 41.

by Denon produces, by the magnitude of its proportions and the solidity of its parts, a very imposing effect. This style of pillar is undoubtedly a very old one, and is apparently nothing more than the imitation of a number of doum (Thebaic palm) trees bound together to make a strong support. We cannot agree with Minutoli in referring the origin of these massive props to so slender a type as the stalk of the lotus. We may support our opinion by the authority of Herodotus, who recognized the form of the palm-tree in the pillars of a chamber at Sais (ii. 169); and though this passage *may* be interpreted as referring only to the palm-leaf ornaments of the capitals, which so often occur, yet it is a much fairer interpretation to understand the old traveller as speaking of the *whole* form of the column. The words are "pillars in imitation of palm-trees." Indeed we may trace the imitation of natural objects in every part of an Egyptian column. Those of Denderah, which are perfectly cylindrical and of equal diameter all through, rise from their pedestal just like the shaft of a Greek pillar, and it might perhaps be conjectured that in this form we see a trace of the Grecian era to which they belong. But we see this cylindrical pillar in buildings of much higher antiquity, as, for instance, at Luxor, where the double row of pillars in the second court are cylinders of the same diameter from the bottom of the shaft to the top. They rest also on a cylindrical base of a larger diameter than the horizontal section of the shaft. But the pillars in the portico of Esneh and in many other temples diminish in diameter near the bottom of the shaft, the lower part of which is gracefully rounded into a resemblance to the calyx of a flower, resting on a flat pedestal; which tends to confirm the notion that the lotus is *one* of the original types of the shaft of the pillar. That it is a principal one in the capitals, is evident at first sight. The pillars

of this beautiful portico at Esneh are also marked with vertical lines, similarly to those of the portico of Ashmounein; and, as far as one can judge from an engraving, the effect of this ornament is not unlike that of the flutings in the Grecian columns, though in the Greek column this ornament is formed by a concave, and in the Egyptian by a convex, surface.

Square columns are found in the tombs, where they have been left standing when the rest of the stone was cut away; and we see also square pillars with standing figures in complete relief attached to one side of them, both in the temples of Thebes, and the two rock-hewn temples or tombs of Ipsambul. The large edifice of Medinet-Abou, commonly called a palace, contains a peristyle court (the second, there being one in front of it), on the north and south side of which there is the usual kind of column, five on each side. On the east and west sides there are respectively eight square pillars, with caryatid figures in front of them facing one another. On the west side of this court is a second row of regular columns, behind the caryatid pillars and parallel to them*. The whole length of this court from east to west is $123\frac{1}{2}$ feet, the breadth from north to south $144\frac{1}{3}$. The circular columns stand on that kind of base which so often occurs in Egyptian temples—a frustum of a sphere, formed by two parallel planes cutting off a portion on each side of the plane of a great circle, which has the edges rounded. From this base the pillar rises with the usual calyx-formed bend, swelling out as it rises higher. The diameter of the base just described is about 9 feet 10 inches. The caryatid figures form no part of the square columns, but stand on a base of their own, which, together with the figure it supports, is attached to the square column just as it would be to the wall

* Egypte, Antiq. vol. ii. pl. 7.



Denderah Pillar.



Caryatid Piliaster.

of the building. The design of these huge quadrangular masses, which measure about eight feet on each side, is evidently to form a support to the caryatid figures, and to secure at the same time the effect produced by the open spaces between a row of columns.

Even modern travellers, on entering this magnificent area, feel something like a sensation of religious awe at the sight of the enormous masses of the architecture, and the colossal representations of the deity. But how much more overpowering must have been the effect of these commanding figures, when they appeared in all their original perfection before the eyes of the native Egyptian. It has been truly remarked that he must have felt as if in the presence of an assemblage of deities. Though we may find fault with the detail of these colossal caryatids, as indeed we may with every part of an Egyptian statue, we cannot deny the effect that is produced by the magnitude of the masses and the calm repose of the composition.

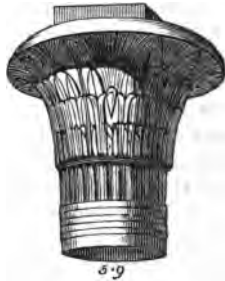
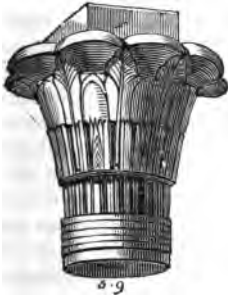
The whole height of the caryatid pilaster of Medinet-Abou with its base and entablature is about $37\frac{1}{2}$ feet, and the figure itself with the cap about 24 feet. This cap is one of the insignia of divinity or royalty (for kings shared the attributes of the gods); the hands crossed on the breast, with the flagellum in one and the kind of crosier in the other, are among the symbols of Osiris.

Mr. Hamilton describes a singular kind of pillar which he observed in two porticos at Carnak, where the columns appeared to have been "in the form of human figures in the character of Hermes, that is, the lower part of the body hidden and unshapen, with his arms folded, and in his hands the insignia of divinity." They seem in fact to be terminal caryatids.

The capitals of the Egyptian pillars offer a singular variety; for not only do we find a great diversity in

different temples, but even in the same building we sometimes see every capital of a different form. Denon has given two plates (59, 60) of all the most curious Egyptian capitals, an examination of which, particularly of plate 59, will show the truth of his remark, that the Egyptians copied nature.

The most common form of the capital is that of the calyx of a plant, probably the lotus, which, in the religious system as well as in the daily economy of the ancient Egyptians, was a most important element. This simple and graceful form has received, however, many modifications at the hands of the Egyptian mason, who appears not to have been at all deficient in taste in his selection of the natural models, nor in the power of adapting them to the purpose of architectural ornament. In other capitals the design has been probably taken from the gracefully hanging palm-leaves, as they appear at the top of the trunk, bending down on all sides. Denon's plate, No. 59, exhibits perhaps the most graceful forms for the capital of a pillar that have ever been devised: they are directly taken, as all figures of beauty must be, from the objects of nature. In all these we see that the general character of the capital is borrowed from the cup of a flower: in some cases the top or outer rim is exactly circular; in others the circle is broken into a number of curved lines with their convexities turned outwards, thus forming a series of beautifully bending petals. On the outer surface of these graceful bends various ornaments are cut encircling the whole capital. We have the bulrush with its stem and leaves; and the palm-branch with its leaves and fruit; and the calyx of the lotus flower grouped with the leaves of the same plant; and the rounded tuft-like head of the palm before it is expanded in spring; and the lotus again with its flower alternately in the bud and full blown: and we also see the vine with its shoots and leaves inter-



mingled with those of the palm-tree*. The print which we have given, contains some specimens of these varieties. How far the forms of Grecian architecture have been mingled with those of Egyptian, is a question for an architect to answer, after he has fixed, with some tolerable degree of certainty, the different eras of the existing monuments of Egypt. That there are resemblances too striking to be mistaken, is clear from a bare comparison. In some Egyptian capitals both the volute of the Ionic† pillar, and the leafy decorations of the Corinthian, or, at least something of the same character, may be easily recognized. But yet we do not mean to imply that the parts of an Egyptian and Greek temple are not readily distinguishable.

One of the most curious capitals is that on the pillars of the portico of Denderah. It is quadrangular, with an Isis' head on each side, surmounted by another quadrangular member, each face of which contains a temple doorway, with two winged globes above and other appropriate decorations. (See p. 58 and 105). This portico, which we believe belongs to a period not earlier than the Ptolemies, has round cylindrical pillars. The whole height of the pillar, as appears from the plate, is 46.10 English feet, of which the capital and the *dé* form about .361 parts. It will be recollected that the same kind of capital is found in the ruins of Bebek in the Delta. As the traveller advances into Nubia, he finds the same quadrangular capital with the Isis' head on a small temple at Gartaas‡; which, if we may judge from the representations given of it, must undoubtedly belong to an earlier period than the capitals of Denderah.

* See Denon's description of his plate.

† As in a peripteral temple on the island of Philæ.—(Hamilton.) See Denon, pl. 60, No. 3.

‡ Gau, pl. 7.

But as we advance still further into Nubia we find fresh traces of the Isis-headed pillar.

It will be recollected that we spoke of a small temple at Denderah, near the large one of Isis, which has received the name of the Typhonium, from the representations which it contains of the ugly being Typhon. The figure of Typhon appears on the cubical kind of block which surmounts the capital, and is repeated on all the four sides of it. He is also seen similarly represented on the Typhonium of Edfou. At Naga, on the Nile, (a town in the province of Chendy, whose capital of the same name is in N. L. 17°) there are still remaining three pillars of the Typhonium, which, as far as we can judge from Cailliaud's* drawings, are quadrangular columns. The part, at least, that is not in the ground, is quadrangular. On each side of this column there is a figure of Typhon in full relief, with an Isis' head above it. The space between the top of the Typhon's head and the Isis is filled by an ornament which probably may belong to the Typhon's head, and is apparently the same thing that we see on the large head (p. 78). The head of Isis has not the plentiful supply of hair, or whatever other ornament it may be, that descends on each side of the face of the Denderah Isis, but it is essentially the same figure, in a still ruder state than we see it either at Gartaas or in the Egyptian temple. At Mount Barkal†, in Nubia, the same kind of capital occurs. It would seem probable then that the Isis worship descended the Nile from the higher regions bordering on Abyssinia; for it is hardly an admissible hypothesis to suppose that the Isis' heads of Naga are posterior to those of Gartaas, Denderah, and Bebek.

There is a capital of an Egyptian column in the

* Cailliaud, *Voyage à Meroë*, pl. 10.

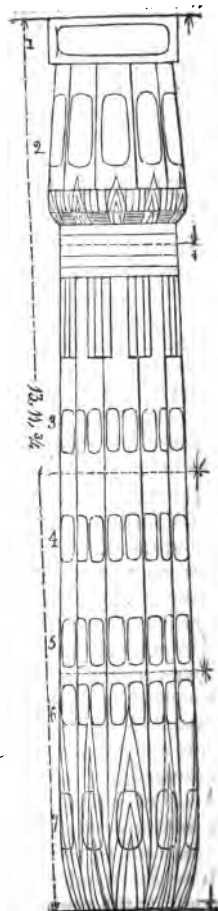
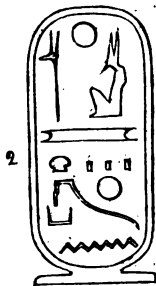
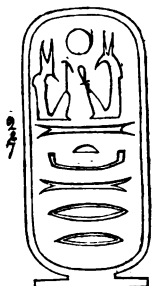
† Cailliaud, pl. 68.

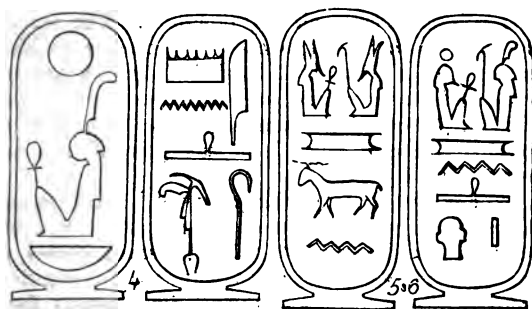
vaults of the Museum, which is worth noticing, as it frequently occurs in existing temples. This capital may be considered as consisting of a number of thin cylindrical pillars, diminishing towards the top, and vertically placed in contact with one another so as to show part of their curved surface, the rest being turned inwards. The *dé* or abacus on the top of the capital is of moderate dimensions. The lower part of the capital shows distinctly in its leafy forms those simple models in nature, in the skilful appropriation of which the Egyptian artist displayed his greatest talent. This capital admits of a variety, (see Denon, plate 60, No. 5,) which we may imagine to be made by cutting each curved surface longitudinally, the whole length of the capital, so as to form it into two equal plane sides, the intersection of which making a sharp edge, which is repeated all round the capital, produces, in our judgment, an effect very disagreeable to the eye.



The architect of the Piccadilly temple has not neglected to avail himself of this ugliness, having selected the most unsightly of all Egyptian capitals to add to the disfigurement of his edifice. Yet it has the advantage of being a correct imitation. There are eight of these prismatic faces on this capital, surmounted by a *dé*, and terminating at their lowest parts in the swelling cup-formed receptacle.

The whole column to which this capital belongs is now lying in the vaults of the Museum in its four original, uninjured parts, which may easily be united. The material is a black granite, and the length of the four parts about fourteen feet. It belonged to Mr. Salt's collection, and was brought from a house in Cairo. In the rounded cup-like shape of the lower extremity, on which we see the forms of some water-leaf cut, and in the gradual diminution of the diameter of the shaft, from the point where it has attained its greatest circumference, it agrees with the general character of many Egyptian pillars. The usual line of rings or hoops is observed under the capital, thus preserving, in the more durable material of stone, the original form of a construction in wood: for we cannot doubt that the forms of the Egyptian pillar, as used in their temples, were derived from the previous use of the doum or palm-tree, to support a covering intended to shade them from the sun. Such a plain and rude attempt to form a portico the traveller may sometimes see in the United States of North America, where the rough inhabitant of a log-hut will place a row of upright poles before his door, connecting the tops of them by cross pieces to the body of the house. Branches of trees spread over this frame-work form a protection from the burning sun, and, in fact, a portico. It is very obvious that it might require only some accidental circumstance, such as the possession of a nicer perception of beauty





in the proprietor of such a hut, to perpetuate its leafy ornaments in some more permanent and imitated form.

This capital has eight curved faces, each containing a cartouche. These eight cartouches form four similar pairs, one of each pair being the same as a cartouche on the vertical face of the *dé*. The *dé* itself has four cartouches, one on each of its vertical faces: the two opposite ones are the same. The next block of the column, that on which the capital rested, has a square hole about $1\frac{1}{2}$ inch deep on the top, which is found also on the top of the other two lower blocks of the pillar. Corresponding to these holes on the top of each of the three lower blocks, there is a projecting piece of the stone left at the bottom of each of the three upper blocks, which was let into the hollow of the lower block on which each upper block rested.

There is a difference between the eight rounded longitudinal faces of the shaft and the capital—the latter being really rounded into a circular curve, while the former have an almost angular line running down the centre of each face, and thus approximating to

the prismatic faces already described. The second block contains two cartouches on each face, making sixteen in all. The third block has four cartouches on six of the faces, and only three on the other two. On the lowest block there are three cartouches on each face, one of which is broken quite off, and another much injured.

These cartouches contain, as usual, the names and titles of kings, but not more than eight distinct cartouches are recognized* "in the seven circles of scrolls which surround it." One of these is identical with a cartouche on a statue in the Museum from Carnak, containing the name and title of Ramses (Sesostris): another cartouche on this column differs only in one symbol from another cartouche on that statue, and it undoubtedly has the same meaning. There are two cartouches which contain the title and name of Amenophth, or Memnon, the same as on the statue No. 38 of the Museum and the great Memnon statue at Thebes. The precise signification of the other cartouches is probably doubtful. The Museum thus possesses a complete specimen of an Egyptian pillar, though it is but on a small scale. The following dimensions will assist us in forming a more correct estimate of its character:—

	ft.	in.
Diameter of lowest part of pillar (the basis of the cup)	1	7 $\frac{3}{4}$
Diameter of thickest part of the column, which is 2 feet 2 inches from the lowest part	2	1 $\frac{1}{2}$
Diameter of the thinnest part of the shaft, immediately under the capital	1	8 $\frac{1}{2}$
Diameter of thickest part of capital, which is 6 $\frac{3}{4}$ inches above the diameter last mentioned	2	1 $\frac{1}{2}$
Diameter of capital immediately under the dé	1	9 $\frac{1}{4}$

* See Transac. of Royal Soc. Lit. vol. i. p. 212, where there is some account of the cartouches on this column; but only six are there mentioned. We reserve the more particular discussion of the cartouches for a separate chapter.

	ft.	in.
Width of side of dé	1	11
Height of capital	2	7½
Height of dé	0	8½
Height of highest block containing capital	3	8½
Ditto of next	3	8½
Ditto of next	2	11½
Ditto of lowest	3	7½
Whole length of pillar	13	11½

There is another Egyptian capital in the Museum (No. 13) which has the complete cup-like form. The lowest part of the capital has the smallest diameter. A little above its base, the capital swells out in a convex form, and then again recedes in a graceful curve, which has its concavity turned outwards. In the highest part there is again a slight return to the convex form. The whole of this capital is fluted with the greatest nicety; and the flutings both at their insertion and union in the base, and all along their course to the termination in a rounded point, show distinctly an imitation of some leafy type in nature. A narrow rim runs all round at the top, serving to bind together the terminations of the leaves or flutings: on this rim the *dé* rests.

	ft.	in.
Whole height of capital and <i>dé</i> , as they now stand	1	8
Whole height of <i>dé</i> , nearly	0	7
Width of each side of ditto	2	2½

We believe it is generally considered that the great length of the *dé*, which separates the capital of the column from the architrave, is a defect in Egyptian architecture. To judge of this, however, we should have the whole building before us. Denon seems to admire this member of the architecture even in its most extravagant proportions, for his encomium of it follows close upon his brief description of a capital surmounted by a Typhonian *dé*, which is one of the largest that is given in his drawings. "No. 9,

plate 60," he says, "is taken from a temple which appears to have been dedicated to Typhon, whose figure is seen on the *dé*, which is, in fact, only a prolongation of the column. This architectural member, which I have never seen but in the Egyptian column, gives freedom to the capital, prevents it from appearing crushed by the architrave, and produces so good an effect to a person who approaches the pillar, that I am surprised it has never been imitated."

In the church of St. Martin's, in London, there is an effect produced by the position of the pillars which support the arches of the side galleries, that, at first sight, looks very like an imitation of what Denon recommends, though it is a different thing. The pillars that support these side arches have above the capital the usual proportions of architrave and frieze, which are surmounted by a very bold projecting cornice. From the top of the cornice the arches spring. As the breadth of the architrave and frieze is about the same as the diameter of the pillar, these members have very much the appearance of a prolongation of the column, like that produced by the *dé*. The effect on the whole is not disagreeable to the eye, though it is more conformable to architectural rules to make arches spring from square pillars.

The Egyptian doorway is found both with upright jambs, such as we construct at the present day; and also occasionally with the jambs somewhat inclining* to one another, like the two outer sides of the propyla. The doorway in the propyla at Edfou, as we have remarked, has upright jambs; and this is undoubtedly

* "The inclination of the door-jambs gives to the Peruvian edifices a certain resemblance to those of Egypt, in which the lintels are invariably narrower than the sill."—(Humboldt.) The learned traveller is mistaken about Egyptian doorways. ■

the kind of construction that occurs also in the oldest buildings of Egypt, such as the great palace of Medinet-Abou, and the two rock-cut temples at Ipsambul. One of the pyramids of Sakkara also has a rectangular doorway in it, with a series of hieroglyphics on the front face of the two jambs and over the lintel*. This same kind of rectangular doorway is seen also in the remnants of the old Ammonium at Siwah, according to the drawing in the plates accompanying Minutoli's Journey to the Oasis of Ammon. Though there can be no doubt of the antiquity of this species of doorway, it would seem natural that the inclining one also should be of equal antiquity, for the principle of its construction is the same as that of the great propyla. Denon (pl. 41) gives a view of this second kind of doorway from one of the buildings of Medinet-Abou, and in the same plate there is also a monolith temple from the island of Philæ, with a doorway similarly constructed. In the temple of Denderah, which is now almost universally admitted not to be anterior to the Ptolemaic age, we find (Denon, pl. 39) an interior doorway in complete preservation. The whole height to the top of the cornice is about 30 feet, and every part of it is profusely decorated with hieroglyphic figures. The whole body of the doorway stands out somewhat more than a foot from the surface of the wall, which bounds it on both sides. A bold round moulding runs up the salient edges on each side of the doorway, and is continued horizontally over the top. Above this are the frieze and cornice. The two side-mouldings incline to one another a little, so that the distance between them, measured along the base of the doorway, is about 29 feet, and over the doorway about $27\frac{3}{4}$. Within this outward moulding, which serves as a kind of frame-work to the whole,

* Burton, Plates. Minutoli, ditto.

there is another smaller projection of the doorway, the edges of which also are rounded with projecting mouldings similarly inclined to the outer ones; over this second moulding is a frieze bearing the winged globe, and an erect serpent on each side of it, the whole, as usual, being crowned by a bold cornice. In the centre, like a picture within its frame, is the entrance itself, which is strictly rectangular, and about 20 feet high and 9 wide. In this respect it differs from the two doorways alluded to (pl. 41); and it may perhaps be considered that it thus presents a compound of the Egyptian and the Greek form. The first-floor windows of the Egyptian hall in Piccadilly, will give some idea of an Egyptian doorway. But in the oldest Greek temples, those of Pæstum and of Concord at Girgenti, it is supposed there was the same kind of doorway, formed by the jambs inclining a little towards one another; but as the side-posts of these doors are taken away, it is difficult to determine positively if this was the case. But there is still a small temple at Girgenti, which has this kind of doorway, and indeed Vitruvius* describes this form as belonging to the oldest Doric, Ionic, and Attic doorways. A more exact examination of the remains of Egyptian architecture may, perhaps, determine at what epoch this form began to be used in Egypt: certainly it appears most frequently in the most recent buildings. The advantage of it is, that it gives greater strength to the construction, as the architrave thus rests on a larger base. The same principle appears in the conical forms of the old Doric pillars; for, by diminishing the surface on which the architrave rests, the outer parts of the pillar are less liable to be fractured by the weight of the architrave, which rests more immediately on the parts nearest the axis.

* iv. 6.

No vestiges* of doors have been discovered in the temples of Egypt ; but in some cases holes have been observed in the upper parts of the jambs, adapted to receive a cylindrical kind of bar, from which it is conjectured that a door might have been suspended. Also, lower down in the jambs, other holes have been noticed, suited to receive bars that might fasten the door. But we can hardly imagine that such a clumsy contrivance as this should have been all the door that was in use about an Egyptian temple, particularly at the entrance between the great propyla ; though it is possible that some of the great doorways may never have had doors fitted to them. Some modern writers speak of bronze folding-doors, as one of the parts of an Egyptian temple, but we are not aware of any direct evidence for this, though the thing is not only possible, but very probable. Herodotus describes the doors of the temple of Belus at Babylon, as made of metal ; bronze probably is meant. It is not at all unlikely that the Egyptians possessed the art of working in metal as early as the Babylonians, or even much earlier ; and they would be the more induced to attempt such an ornament for their temples as bronze doors, from the scarcity of wood in the country. In the description of Solomon's temple, a building probably of the same epoch with some existing temples in Egypt, we find wood was used in the construction of the doors. " And for the entering of the oracle he made doors of olive-tree ; the lintel and side-posts were a fifth part of the wall. The two doors also were of olive-tree ; and he carved upon them carvings of cherubims and palm-trees, and open flowers, and overlaid them with gold, and spread gold upon the cherubims and the palm-trees †."

* Hamilton, p. 90.

† Kings, i. 6. See what follows ; also about the golden hinges, chap. vii.

The profusion of sculptured ornament that covers every part of a highly finished Egyptian building, makes a most striking characteristic difference between the style of a Grecian temple, and one on the banks of the Nile. The propyla, columns, entablature, the inner apartments, nay, even the very outer walls, are often covered with highly finished reliefs, or with figures in intaglio. But it was different with temples built in the genuine Greek style, even in Egypt. In the room of Egyptian antiques in the Museum, there is a noble fragment of a porphyry column, 7 feet high and 8 in circumference, brought from Egypt, but from what part of that country it came we do not know. From its regular form, however, and the absence of any figures upon it, we must pronounce it to have belonged to some building erected by the Greeks or Romans after their own models.

There are in the Museum two specimens of the sculptured members of an Egyptian temple, which are most particularly deserving a minute examination. They are called friezes in the Museum Catalogue, and are numbered 71 and 4. From their form, their dimensions, and having sculptures on both sides, they seem to have been the upper part of the intercolumniary walls of a small temple. The material of both is the same, being a very fine grained basalt, like the two obelisks that stand near them. The dimensions also appear to agree, as far as we can determine, though it is somewhat difficult to measure No. 4, as exactly as No. 71, owing to the former being more damaged. These two pieces of stone, then, probably belonged to the same building, though there is considerable difference in their sculptures; but this is an ordinary occurrence in Egyptian edifices. The chief dimensions of No. 71 are the following:—

	ft.	in.
Perpendicular height	4	0
Breadth of front along the base . . .	3	1½

The corresponding line in No. 4 seems to be somewhat more than this, about 3 feet 4 inches. The other dimensions are the same, or very nearly so in both.

	ft.	in.
Thickness of stone at base	1	3¼
Thickness just above cornice, where birds' feet begin	1	0

The face of this stone (No. 71) is beautifully polished. The lower part is slightly grooved with longitudinal vertical lines, thirty-nine in number, which being sunk a little below the level of the stone, are left rather rough. Above these are four horizontal lines, forming the lower part of a kind of frame, in which we see the intaglio figure in the centre. This figure, which is bending on one knee, is a beautiful specimen of Egyptian sculpture. The outline is defined by an incision in the stone, all round the edges, varying somewhat in depth, but occasionally being as much as one-sixth of an inch. The figure, which is thus bounded, is raised to various elevations, according to the artist's judgment of what was necessary to produce the desired effect. One part of the figure near the navel, is at least as high as the general level of the stone. All through this figure the artist has attempted to show the prominent and rounded parts of the body, by giving them a greater elevation. This he has done with great skill in the upper part of the calf of the leg (we are speaking of its position as it appears in the sculpture), which is rounded and swollen out owing to the pressure on it from above. The hollow also, which, when the knee is thus bent, appears at a little distance from it on the outer part of the leg, is very distinctly represented. The projection of the eye-brow, and the eye itself, with the sinking in of the hollow chamber of the eye, have not been neglected. The height of the figure, as it

kneels, measured upwards from the bend of the foot, is about $13\frac{1}{4}$ inches. It is naked, with the exception of a belt round the waist, and a close cap on the head, the margin of which appears to be indicated by a double projecting line running along the forehead, and the side of the head. A kind of riband streams from the back part. On the forehead the sacred serpent, the symbol of royalty, stands erect; and the monarch is doubtless represented making an offering, on bended knee, to some deity, though no deity appears on the face of this stone. But the meaning of the posture is well understood, from comparing it with similar figures, and from the conical kind of thing which he holds in his hand. This is a device which frequently appears on the reliefs, resting on the hand of the devotee; or standing on a hand alone attached to an arm, which is a common hieroglyphic. Sometimes there is one in each hand; and in some instances it is so exactly pointed that the face represents an isosceles triangle; in other instances it is somewhat rounded as in this intaglio. We do not profess to understand what it is intended to represent.

We have been thus minute in describing this figure, because as a work of art it deserves commendation, both for the general outline and attitude, and the execution of the particular parts. Above this compartment is a horizontal row of well cut hieroglyphics, containing two cartouches; and this is followed by a beautifully rounded moulding, succeeded by a sweeping curve (apparently belonging to no geometrical figure) that terminates in a cornice. Resting on this cornice (see the plate) there is a row of birds' legs, probably owls', but the upper part is entirely defaced. The flat top of the stone is perfectly even, except at the ends, where there are two holes, which have probably held clamps of metal to bind the block to some other part of the building. Two circular holes made

in the compartment that holds the intaglio figure, run right through the stone: this is evidently the work of the destroyer, and not of the original artist.

The two cartouches are curious. One of them contains the same prænomen that appears on the obelisk of Heliopolis; though in the latter, the beetle, which is the second figure, has the disk lying almost between his fore-legs, while in this instance his legs are placed at right angles to the direction just described. The goose, with the disk behind it, stands between this prænomen and the group containing the name. Among other figures in the second cartouche we have a male sphinx, which is not of common occurrence as an hieroglyphic. In the upper and right-hand angle of the compartment, containing the intaglio figure, these cartouches are repeated on a smaller scale; and the name, without the prænomen, is again repeated in this same angle on a still smaller scale. The same cartouches occur also on the opposite face of this block.

This face also is sculptured, but it has never been finished and polished to an equal degree with the front face: the figures are often obscure, and not deep cut in the stone. We may trace in the central parts a kneeling figure, in an attitude similar to that on the other side, but of smaller dimensions. In front of it is a standing figure, probably a deity, the head of which is not discernible, and the whole is little more than an indifferent outline.

There appear to be some figures on this face of a form that do not often occur. One is the head of a quadruped, with a kind of short horn rising up rather nearer the end of the snout than the top of the head. It is not exactly the head of a rhinoceros, but it resembles it sufficiently to justify us calling it so for the present. Along that part of the face of the frieze, which corresponds to the rim on the other side son-

taining the cartouches, there are eight or nine Greek characters visible, of a form and style indicating a late age. As these letters do not contain a complete word, it is impossible to ascertain their exact meaning*.

The face of the second block differs materially from that of the one described. On the upper part of the *back* it has a series of birds in better preservation than those on the other stone, and on the lower part of the front it has similar vertical lines to those on the bottom of No. 71. The top of the face is surmounted with that ornament which some suppose to be derived from a series of erect serpents, though each member bears very little resemblance to the sacred reptile. Instead of having one large compartment in front, the face is divided into three principal compartments by vertical lines, and is filled with sculptures. One of them, a figure in a kneeling posture, with the sugar-loaf in each hand, is making an offering to a deity, with two bulls' heads, seated on an elevated platform, and holding, in one hand, the long pointed Egyptian knife. In another compartment a figure is making an offering to a serpent, likewise placed on an elevated platform. Among other sculptures is one of a lion walking, in a good attitude and correct outline. A camel's head and long neck are also visible, to which we now direct attention, as we shall have occasion hereafter to show how this fact bears on a disputed point in the social history of this animal.

Two cartouches, several times repeated, are found on this stone, but they differ altogether from those on the other block. The second, containing the *name*, when read according to M. Champollion's alphabet, produces the letters, P, S, M, T, K; which are sup-

* They are K?, E, Ω, Σ, A, N, E?, N, E?, Ω. *Kios* is the ending of some word, perhaps a proper name: *ansiw* may be a fragment of *ansiwrs*, *renewed*, *repaired*.

posed to represent the name of Psammitichus*, the king who obtained the throne of Egypt, according to the account of Herodotus, by the aid of Greek and Carian mercenaries.

The sculptures on the back of this block, with the exception of the birds at the top, are very indistinct; and the surface of the stone, particularly near the lower part, is much bruised and very uneven.

Our description of these two blocks may, by some readers, be thought rather tedious, but we are inclined to think they will be of a different opinion after a careful examination of the originals. Here we have an opportunity of carefully studying two specimens of genuine Egyptian art, which, we may safely say, are not less than 2400 years old, and belong to that epoch when the Greeks were just beginning to get a footing in Egypt, and from which the more credible and better attested history of the country dates its commencement. Our admiration is no less excited by the high state of preservation of these minute sculptures, than by the correct delineations which they exhibit of natural objects. It would not be easy to procure similar sculptures at the present day, done in a style superior to the best among them. The number of objects that is crowded into so small a space, and often lavished on parts obscurely seen, will serve to give some idea of the prodigious expenditure of labour which the religious system of the antient Egyptians called for.

But if it requires so many words to give an imperfect description of two small parts of a small edifice, what labour would it require to give any thing like an adequate idea, either by description or drawing, of the countless sculptures that adorn the great buildings of Thebes? Months and years, say those who

* M. Champollion calls him Psammitichus the Second. See the chap. on Obelisks.

have carefully examined them, would not suffice to copy accurately a small part of their innumerable decorations. Add to this, the smooth polish of the surface, and the colouring with which many of the ceilings and the reliefs were painted—and we hardly know whether most to admire the vast conceptions of the architect, and the gigantic proportions of his building, or the patient and never-tiring spirit of the sculptor and the painter.

It would be desirable to compare the sculptures on the Hindoo temples with those of Egypt; but, unfortunately, we possess no work on the antient buildings of India that can bear a moment's comparison with the various splendid works on Egyptian antiquities*. The few specimens, from which we are able to form a judgment, do not convey so pleasing an impression as the work of the artist in the valley of the Nile. Instead of the broad surface of the Egyptian edifices, the effect of which is not at all destroyed by their numerous decorations, we see in some of the Hindoo pagodas, as, for example, that at Tanjore, a multiplicity of small parts which offend the eye, and tend to destroy the effect produced by the magnitude of the whole mass. But we hesitate to pass a decisive judgment, where we have not the means of forming a satisfactory opinion.

* We have not had an opportunity of seeing any work on Hindoo architecture and sculpture, which is similar in design and execution to that of Gau on the monuments of Nubia. Whether there is any such work or not, we are not able to learn.

CHAPTER VII.

THE MONUMENTS OF LOWER NUBIA.

WE shall form a very inadequate conception of the number and variety of the antient edifices that line the Valley of the Nile, if we confine ourselves to that part of the stream which is north of the Rapids of Philæ, where usage has in all ages fixed the limits of the country called Egypt. Buildings of the same character as those now existing in Egypt are found both in the Libyan Desert and south of Philæ, in such numbers, and of such a magnitude as to excite our astonishment. In the Wady Sivah, General Minutoli discovered the undoubted remains of an Egyptian temple, and this, combined with the warm springs, mentioned by antient writers, confirms the spot to be the Oasis of Ammon, as Major Rennell had before satisfactorily proved it to be from other considerations. In the Wady el Khargeh, the Oasis Magna of antiquity, (see the Map,) and near the town El Khargeh, are the remains of several Egyptian temples, one of which is of very large dimensions. These and other remains of various ages, found at other spots in the desert, prove undeniably that first a people of kindred stock with the Egyptians occupied them; that then the Greeks found a footing there; and finally, under the Romans, these fertile spots in the desert became military stations, and the temples were turned into churches by the Christians of Egypt. Herodotus tells us (iii. 26) that the Oasis Magna contained a tribe of Samians. This fact shows that the Greeks had made good use of their time since they first obtained a

footing in the country under the reign of Psammitichus. But wherever Greeks fixed themselves, there they built temples; and can we doubt that even before the time of Herodotus there were Greek temples in Upper Egypt and the Oasis, which probably were a compound of Greek and Egyptian forms? That there were genuine Greek temples built in the Delta before the Persian conquest, we shall presently show. Even the deserts of Arabia Petraea contain remains of Egyptian buildings. At *Sarbat el Chadem*, the *Jebel Mokateb* of Niebuhr, Rüppel* found, in 1817, the remains of an Egyptian temple, consisting of small pillars with the quadrangular Isis-headed capital, and long rectangular bases, an unusual occurrence in an Egyptian pillar. The shafts of the pillars are covered with hieroglyphics.

We shall devote this chapter to a brief consideration of the temples of Lower Nubia, founded principally on Gau's excellent work. The opinion of an architect is always deserving of attention when we wish to classify the existing monuments of a country according to their style and ornaments; and particularly valuable is the opinion of one who has himself examined, measured, and drawn the edifices about which he forms an historical theory. Gau lays down three propositions, which are;

I. That the monuments of Nubia embrace the whole period of Egyptian architecture.

II. Lower Nubia was the cradle of Egyptian architecture.

III. The monuments of Hindoostan are posterior to those of Nubia.

The third proposition is of too debateable a nature to be fully discussed here.

* Travels in Nubia, Kordofan, and Arabia Petraea; by Dr. Edward Rüppell. German. Frankfort on the Main, 1829.

Gau* remarks that all the architecture of Egypt has its types in the buildings of Nubia, from the first rude attempts to cut a temple in the rock, to the detached edifices erected under the dominion of the Greeks and Romans. We may distinguish in the architectural history of this period, three great epochs:—the first comprehends the temples cut in the sides of the mountains; the second, the temples which are detached from the rock-cut chambers, but retain the colossal masses of the primitive type; and the third embraces the small edifices of Maharraga, Gartas, Dandour, and several temples in Egypt. At the last epoch the solid and simple masses were replaced by light and easy forms. The Nubian rock-cut temples between the first and second cataract appear to be the most antient, and to show those original forms, which we see imitated in Egypt.

The most remarkable of these temples is the great excavation of Ipsambul, which was opened by Belzoni, the expenses of the undertaking having been liberally contributed by Mr. Salt. This place is about 26 G. miles north of Wady Halfa, where the Nile flows through sandstone ridges from S. W. to N. E., and a small vale on the left bank recedes towards the west. Its two faces are formed of sandstone rock, each of which has been cut so as to make the front of a temple, whose interior chambers are covered by the native mountain †. The front of the larger temple, which faces the south-east by east, was so much encumbered by the accumulated sand of centuries, that on the first sight Belzoni could discover nothing but the head and shoulders of one of the four colossi that decorate the façade. The frieze or upper part was visible as well as the head of an enormous hawk, which the enterprising traveller conjectured to be over the door.

* Preface.

† Ritter. Africa. p. 623.

With the aid of such wretched workmen as could be procured on the spot, the doorway was at last reached after the removal of the mass of sand that closed the entrance.

“We entered,” says Belzoni *, “first into a large pronaos, 57 feet long and 52 wide, supported by two rows of square pillars (four on each side), in a line from the front door to the door of the sekos. Each pillar has a figure not unlike those of Medinet-Abou, finely executed, and very little injured by time. The tops of their turbans reach the ceiling, which is about 30 feet high; the pillars are $5\frac{1}{2}$ feet square. Both these and the walls are covered with beautiful hieroglyphics, the style of which is somewhat superior, or at least bolder, than that of any others in Egypt.” This head-dress, which Mr. Belzoni very improperly calls a turban, is similar to that which appears on the caryatid pilasters of Medinet-Abou. The temple contains, with the pronaos, fourteen different chambers †: a passage leads from the pronaos to a smaller chamber, which contains four square pillars, two on each side. The sanctuary is $23\frac{1}{2}$ feet long and 12 wide, with a pedestal in the centre, and at the end of it four colossal sitting figures, the heads of which are in good preservation. “† The outside of this temple is magnificent. It is 117 feet wide and 86 high; the height from the top of the cornice to the top of the door being 66 feet 6 inches, and the height of the door 20 feet. There are four enormous sitting colossi, the largest in Egypt or Nubia, except the great sphinx at the pyramids, to which they approach in the proportion of near two-thirds. From the shoulder to the elbow they measure 15 feet 6 inches; the ears, 3 feet 6 inches; the face, 7 feet; the beard, 5 feet 6

* Page 211.

† Gau's Plan,

‡ Belzoni, p. 213.



Colossus of Ipsambul.

inches; across the shoulders, 25 feet 4 inches; their height is about 50 feet, not including the caps, which are about 14 feet. There are only two of these colossi in sight, one is still buried under the sand, and the other, which is near the door, is half fallen down, and buried also. On the top of the door is a colossal figure of Osiris 20 feet high, with two colossal hieroglyphic figures, one on each side, looking towards it. On the top of the temple is a cornice with hieroglyphics, a torus (moulding) and frieze under it. Above the cornice is a row of sitting monkeys, 8 feet high and 6 across the shoulders. They are twenty-one in number*. This temple was nearly two-thirds buried under the sand, of which we removed 31 feet before we came to the upper part of the door. It must have had a very fine landing place, which is now totally buried under the sand. It is situated under a rock about 100 feet above the Nile, facing the south-east by east, and about one day and a half's journey from the second cataract in Nubia or Wady Halfa."

In the sanctuary of this temple we find not a monolith but a pedestal, on which Heeren supposes a sarcophagus once stood, and consequently, he says, we ought to consider this rock-hewn place not a temple, but a tomb. The door of this temple has upright side posts.

In the sculptures we see the same hero as at Medinet-Abou, with representations of battles, storming of forts, and triumphal processions.

The name of Ipsambul or Abou-sambul is rather puzzling. The prefix Abou might be the Arabic word which we find in Medinet-Abou. Dr. Richardson's suggestion, that the name may be formed from such a word as Abocimpolis (supposing this place to be the Aboccis of Pliny), is at least ingenious; but it is more probable that the syllable *Psam* is the

* Twenty-two in Gau's Plate,

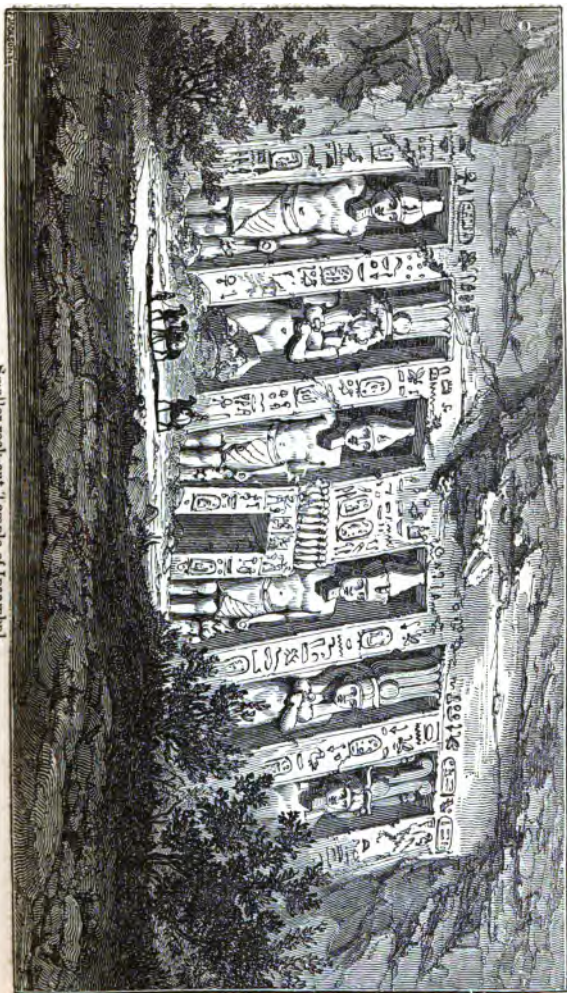
same element that we observe in the Egyptian names Psammis and Psammitichus*.

Since the discoveries made in deciphering Egyptian proper names and titles of kings, we have, in addition to the evidence of antiquity which the structure of these rock-cut temples offers, the historical evidence deducible from the inscriptions. The name of Ramses appears on every part of this temple accompanied with the usual titles; it appears also on numerous other monuments of Nubia, at Kalapsché, Derri, Girscheh, and on several parts of the palaces or temples of Carnak and Luxor. Though there were several sovereigns of the name of Ramses, it is certain that they all belonged to that brilliant era when the greatest monuments of Egyptian art were erected. The tomb or temple of Ipsambul may then be considered as coeval with some of the great Theban monuments, as to its present condition and the historical sculptures on its walls; though this by no means renders it improbable that the beginning of this great excavation belongs to a still earlier period, and that it was enlarged and improved by the great conqueror whose name it bears. This was Ramses the Great, the Sesostris of Herodotus, and Sesoosis of Diodorus, who is distinguished by M. Champollion from other kings of the same name by the difference of his prænomen or title.

The smaller rock-cut temple at Ipsambul has been more completely examined than the large one. The approach to it is free from sand. The front, which is close upon the river, and 20 feet above the present usual level of the water, is 91 feet long; the depth of the excavation, measured from the centre of the

* Ipsambul was originally called Kerkis. See the Greek inscription on one of the colossi, which is coeval with a king Psammitichus, most probably the one alluded to above.—*Trans. R. Soc. Lit.* London.

Smaller rock-cut temple of Ipsambul.



front to the extremity of the adytum, is 76 feet. On the outside are six colossal figures, about 30 feet high, hewn out of the rock, a female figure being placed on each side between two male figures. They are in the usual attitude of standing colossi, with one foot advanced before the other. The female figures are the same, and are supposed to represent Isis. The male figure on the right with the horns on his head is the representative of Osiris. All the male figures are described as having a smaller figure on each side, varying from four to six feet in height. Similar figures are said to appear on each side of the female statues. The doorway has upright jambs, and is ornamented with a broad margin of hieroglyphics on both sides and over the lintel. A number of cartouches, containing the name and prænomen of Ramses the Great, are cut in numerous places on the square border that encloses the front of the temple like a frame, and on the buttresses between the colossal figures. A passage leads to the pronaos, a room 35 feet by $36\frac{1}{2}$, supported by six square pillars, three on each side. Gau's longitudinal section (pl. 56) shows that those pillars have Isis' heads attached to them, which are surmounted, like those of Denderah, by another member of the pillar, the centre of which contains a kind of doorway. In other respects there are several differences between this Isis-headed pilaster and the capitals of the Denderah pillar, though they belong undoubtedly to the same original type. The hair that hangs down on each side of the Ipsambul Isis' face does not terminate in a thick mass like the base of a cone, but is curled upwards and outwards. From the chamber of six pillars we pass into a vestibule, which introduces us to the adytum or sanctuary, containing the remains of a sitting statue cut in the rock.

Gau remarks "that this façade, though cut in the mountain, displays very distinctly the general cha-

racter of the great propyla, of which it presents the original form in bas-relief. We easily recognise the outline of each of the two parts of the propyla with the doorway between them and the appendage of the statues, which are so cut out of the rock as to differ in no respect from the colossi which at a later epoch were placed in front of the propyla. The interior is in good preservation with the exception of the statue placed in a niche in the recess of the sanctuary, and it is richly adorned with painted bas-reliefs. The principal colour of the figures is yellow; the ceiling is blue (a favourite colour for Egyptian ceilings); a border of three colours runs all round."

It may be argued that if the names of Ramses on the great monuments of Thebes are to be considered as contemporary with the building of these edifices, we may fairly infer that the excavation of Ipsambul is entirely the work of this prince, and not of higher antiquity than the oldest buildings of Thebes. But there are still older excavations in Nubia than that of Ipsambul. At Derri or Derr, now the chief town of Lower Nubia, there is a rock-cut temple (not near the river), one of the rudest in Nubia, and the only one on the east bank of the Nile, between Philæ and this place. It has no construction in front. " * It shows in its marks of age, in the imperfection of its execution, traces of the highest antiquity, and of the infancy of the art. This infant state is easily recognised in all parts of the architecture, and in the remnants of the primitive sculpture; as, for example, the statues with their backs to the pillars of the pronaos, and that in the niche of the sanctuary, which was part of the solid rock. The bas-reliefs of the interior walls show, on the contrary, the progress which the arts made in the interval between the commencement and the completion of this excavation." - It appears then that this, certainly one of the oldest monuments

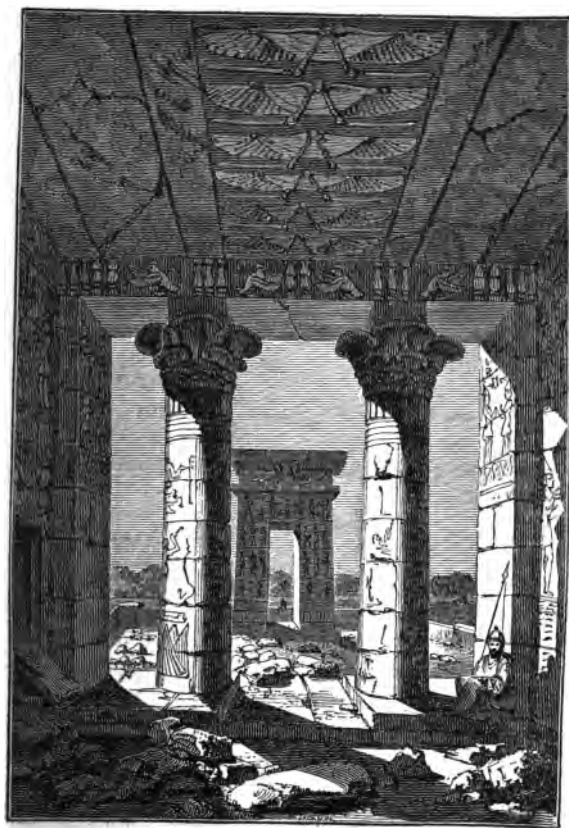
* Gau, p. 8,

of Lower Nubia, contains in itself a history, and a progressive improvement in the decorations of a sacred building. We shall not then be surprised to find here also the name of Ramses, who was not only an original builder, but an improver and an appropriator of the labours of his predecessors. The procession of the ship is represented on the walls of the adytum. In this rude rock-cut temple of Derri we have the representation of the hero cutting off the Briareus' head, as on the propyla of Edfou. The figures are considerably damaged, and it is not possible from the drawing to make out the whole of the details, but there is still enough to show that it is essentially the same composition as that which we have already described at Edfou. We shall have occasion to speak of this again when we trace it further up the river, even as far as the monuments of the antient state of Meroe.

The temple of Girscheh is exceedingly rude, and shows in the style of its clumsy ornaments the infancy of the art of sculpture. The oldest part of this edifice is undoubtedly the excavation in the rock, to which a propylon and an open court, with pillars, were afterwards added. Of the rock-cut chambers, the innermost, which is the sanctuary, contains five groups of figures; one group of four sitting figures is the uppermost. The lower groups, of three figures each, are standing, and consist of a female embracing a man, and another figure which belongs to the group. Heeren conjectures that this sanctuary was in fact a tomb for some priest-families, which is by no means improbable. Similar groups of figures, in a sitting posture, cut in the mass of the rock, are found in the tombs of Hadjar-Selseleh, in Egypt. One of these groups, containing three figures, represents a man seated with a female on each side of him; his arms are crossed on his breast, while the females

pass one arm behind the male, probably uniting their hands. This is undoubtedly a family group, like those at Girscheh. (Denon, pl. 76.) This building also has caryatid pilasters (Gau's section, pl. 28), which are similar to, but not quite the same as, those which we have described in the great peristyle court of the palace at Medinet-Abou. One of them, as it is represented in the drawing, does not consist of a single piece, like the great Egyptian works of a later period, but is formed of flat layers of stone, placed one above another, like the ordinary construction of the walls of a temple. Nothing can be imagined more clumsy or devoid of grace than the legs and feet of this figure.

The temple of Dandour is classed by Gau, and we believe with perfect accuracy, among those Nubian temples that belong to the last of the three epochs of art, which he thinks he has discovered in the various styles of the antient buildings in this part of the river. This temple is of small dimensions. It is a parallelogram, the front of which is $21\frac{3}{4}$ feet, and the length of the side $43\frac{3}{4}$; this proportion between the width and the length of the temple is very nearly what we have observed to be the case in some of the Greek temples. The building consists of a pronaos, with two pillars in front, and two rectangular chambers, one behind the other. The view just given is taken from the interior of the portico, and it shows distinctly the simple construction of this part of the edifice, together with the doorway, which is in a line with the entrance of the portico; at the distance of about thirty feet. Part of the wall that surrounded the whole building is still standing, and an alley appears to have led from the gateway to the river, where there was probably a flight of steps, of which we see distinct traces in the remains of some temples. The sacred buildings were of necessity placed near the river in Nubia, for the sake of the ablutions of the priests, and the other



Dandour.

ceremonies of religion in which water was essential; for there was no room for tanks or temples at any great distance from the stream. In Egypt, on the contrary, we often find temples at a considerable distance from the river, but then a tank was necessary, and the traces of these artificial basins are so numerous as to leave no doubt that every temple not situated near the Nile must have been provided with one of those reservoirs for water, so essential both for the purposes of cleanliness and the ceremonies of the Egyptian religion. In India, where we see so many curious points of resemblance in still existing institutions to the antient ritual of Egypt, there are often great flights of steps leading down to the rivers, forming a safe and convenient approach to the sacred stream, in which the pious Brahmin, while he makes his ablutions, at once discharges a religious duty, and enjoys a healthful recreation. Tanks are also as common near a Hindoo pagoda now as they once were around the temples of Egypt.

The front view of this temple of Dandour reminds us of the Greek and Roman temples *in antis**, by which term is meant a portico of round pillars flanked at the angle on each side by a square one, or by the wall of the temple being continued as far as the face of the portico. It is true the outer lines of the façade of Dandour incline a little towards one another, after the propylon fashion; but still the general resemblance to a Greek temple is undeniable. Between the two pillars (see Gau, pl. 26) are the remnants of the doorway jambs: from the top of the cornice of this doorway to the architrave is rather more than one-third of the whole height of the pillars. The space between the pillars and the sides of the temple has been filled up in the usual style with a low wall. The mouldings on the

* For an explanation of many architectural terms necessary to be understood, the reader is referred to the work on Pompeii, p. 96, &c.

façade of the portico are remarkably large, when we compare them with the moderate dimensions of the whole building. A profusion of sculptured figures cover this portico both outside and inside. On the ceiling of the interior, which is divided into several parts, by lines running in the direction of the temple's length, we observe, in the centre compartment, the Egyptian vulture, with outstretched wings, holding by a ring in each claw, what we take to be a long knife or sword. The drawing of this bird, which is one of the most picturesque of the Egyptian birds of prey, is not very successfully executed either in Gau's original plate or our copy. The vulture is often seen on the monuments of Egypt in the same attitude, as, for example, over a doorway at Medinet-Abou.

It is impossible not to recognise in the pillars of Dandour the mixed Greek and Egyptian form. But we observe just below the capital the vertical kind of flutings, which are one of the most common ornaments of an Egyptian pillar; and we see also a series of circles or hoops, one under another, which we have before noticed when speaking of the portico of Ashmounein. Again, the capital is of the Egyptian lotus form, at first sight reminding us also of the leafy decorations of the Corinthian capital. There is a peculiarity on the front face of the *dé*, which we have not happened to discover in any other temple. We allude to a pair of eyes, which are cut upon it, and just visible over the round edges of the capital. Between the eyes there is something shaped like an elliptical ring, but only the upper half is seen in the geometrical elevation, and what the termination is we cannot tell, nor what it can possibly mean. It occupies the place of the nose, but is as little like one as it is to the mouth, or any other feature of the face.

In the back wall of the furthest chamber Gau discovered a secret hole made in the thickness of the wall, which was probably intended to hold treasure.

and to preserve it from the barbarians, who, at various periods of Egyptian history, visited Nubia with their fearful ravages. There is a curious story in Herodotus of King Rhampsinitus building a treasure-house, which, it is true, might have been a very different kind of thing from this, but still it was a stone chamber, in which the money-loving monarch intended to keep his wealth safe from robbers. The architect, with a due regard to his own interest, contrived it so that a certain stone in the outer wall should be moveable, and on his death-bed he left the secret to his sons, who soon endeavoured to turn it to profit. The sequel of this forms one of the longest tales of Herodotus, and we may perhaps say one of the least valuable of his Egyptian gleanings.

We have dwelt thus long on the temple of Dandour, because it is of importance to attain some more exact notions of the kind of buildings erected in the Nile valley, at different epochs in the history of the country. Instead of taking everything for genuine Egyptian, because it is in Egypt or Nubia, we are now enabled, by a more accurate classification of the monuments and the aid of the inscriptions, to rectify former incorrect notions on the subject, and, in fact, to make a real and valuable addition to the history of civilized Egypt. Between the rock-cut temples, such as those of Derri and Ipsambul, and the buildings of a later date, there was an intermediate step that ought to be noticed. The first architectural attempt in Nubia would probably be the improvement of some hole in the rock; or even, if the country possessed no natural caves for imitation, the mountains themselves would offer facilities for constructing a durable habitation, which would be both commodious and cheap. A further step would be, after having got possession of a hole, to extend the excavation, to form several chambers separated by the native rock, and when a room of larger dimensions was designed, to leave square

pillars for the support of the roof. In the course of time the outer front, with the inner walls and pillars, would receive decorations, derived both from the imitations of the natural form of the country and the historical remembrances of the nation. But what a prodigious period must have elapsed between the rudest rock excavation, such as Derri was in its primitive state, and the highly finished sculptures of the great temple of Ipsambul. Between these two epochs it is not unreasonable to suppose that porticos, constructed of materials got from quarries, were built in front of the original excavations, and that propyla, dromi, enclosing walls, colossal statues, and all the other appendages of a genuine Egyptian building, were subsequently added. We believe there are no traces of any obelisks in Lower Nubia, while in Egypt we find this important architectural ornament in use from the island of Philæ as far as the very borders of the Mediterranean sea. All the oldest temples of Egypt retain most distinctly the characteristic marks of the primitive type of an excavation in the rock. We trace this in the massiveness of the construction, the flat roofs, the square pillars, and in the proportion between the diameter and the height of the irregularly rounded column; for the apparent weight, and the real bulk of the overhanging mass in an excavated chamber, unavoidably create the impression of a huge body ready to fall and crush the occupants. To destroy or weaken the impression the architect would make the height of the chamber of a suitable proportion to the length and breadth, and all the dimensions would be small. If he found it convenient to extend them, he would relieve the incumbent mass by leaving very thick and strong supports of the native rock. Again, in the position of the adytum of the constructed temples of Egypt, in the care which they took to keep it in the most retired place near the extremity of the building, with a single entrance and thick walls

round it—we see the manifest imitation of the rock-cut shrine, accessible only by one passage.

One of the best and most antient specimens of Nubian temples, partly cut in the rock and partly formed of constructed propyla, &c. is that of Essaboua, on the west bank of the Nile, about lat. $22^{\circ} 45'$. *The approach from the river to the temple is by an avenue of sixteen sphinxes, 30 feet wide; two colossal figures stand near the first pair of sphinxes, with their backs attached to pilasters and their faces turned to the river. After the sphinxes we come to the propyla, consisting as usual of two pyramidal moles, with a high doorway between, and the remains of four colossi in front of them. This is followed by an open court with caryatid pilasters on each side; and next we come to the covered portico, and the sanctuary with the holy ship. Behind all this we find some chambers hewn in the rock, which must undoubtedly be considered as of higher antiquity than all that lies in front of them. This temple indeed only wants a pair of obelisks before the propylon to make it the complete original of the great monuments of Thebes. There are, we believe, no traces below the first cataracts of such buildings as this at Essaboua; for the excavated tombs of Thebes with their doorways are a different style of art, both in the whole design and the execution of the smaller parts. May we not then conclude with certainty, that the monuments of Nubia, such as Essaboua, the small temple of Kalapsché, and others, are of higher antiquity than any buildings at Thebes, which themselves are more antient than any others now existing in Egypt?

The traces of a gradual growth in the Nubian temples is so apparent that it cannot be denied, and it is a fact of too much importance to be dismissed without due consideration. It is the very key to the correct un-

* Gau, pl. 42.

derstanding of Egyptian art, and the formation of any rational and consistent sketch of the ancient history of the country. At Debod, or Debed, on the west bank of the Nile, about a dozen miles from Thebes, there is a temple which Gau considers as a dedication to Serapis and Isis. It is neither antient nor magnificent. First we observe three gateways placed in a line, through which we approach to a pronaos, which has been added to and placed in front of a previous construction; and indeed seems never to have been finished. This is observable in many Egyptian buildings, and is generally attributed to the interruption of the works caused by some hostile invasions. But it is equally probable that it was occasioned, in some instances, by the want of money to complete what was begun on too large a scale for the limited means of the district; an occurrence just as common at the present day as ever it could be in Egypt. This temple of Debod, with its incomplete pronaos, was in its origin a small isolated chapel, or perhaps a tomb, around which other buildings grew up with the wants of the increasing population. The same fact is observable in the general history of religious edifices; an altar, a chapel, or a tomb of some pious personage, was the kernel of a larger building. The sanctuary of Debod contains two granite monoliths, with niches cut in them. From the entrance to the temple an avenue led right down to the river, which probably was terminated by a flight of steps to answer some of the purposes already mentioned, and also to form a quay where passengers might conveniently land.

Another origin may be assigned to some of the Nubian and Egyptian temples. On an elevation at Gartaas, on the west bank of the Nile, there stands a small temple, which the boatmen on the river suppose to be dedicated to a Mussulman saint, to whom, as they pass along the river, they pay their adoration. They

do this with respect to other temples also that stand near the banks of the Nile *. The boatmen in ancient Egypt formed a caste distinct from all others by the nature of their occupation, and it is reasonable to suppose they would have certain religious notions of their own, and might have patron gods to whom they would dedicate temples. We are not meaning to assert that this is an important element in the origin of Egyptian or Nubian sacred buildings, but still it is a consideration that ought not to be overlooked. Boatmen and seamen are necessarily a very distinct set of people from all others, owing to the peculiar habits of their life; and they are also a superstitious race. There is no difference in principle between the Egyptian worshipping the shrine of his deity as he descended along the banks of the Nile, or shot through the cataracts of Syene, and the boatman of the St. Lawrence bowing down as he passes the rapids of that river to the crucifixes planted on its banks. In addition then to the causes already enumerated, as contributing to the prosperity and population of ancient Syene, may we not, *in part*, attribute the origin of erections on the islands of Philæ and Elephantine to the physical position of those places at the two extremities of the rapids, where the boatman would wish to propitiate the deity, and to claim his protection by some memorial commemorating his piety or his fears?

This little island of Philæ, to describe which completely would require a separate essay, is one of the richest spots of Egypt in architectural beauty, and one of the most instructive as to the evidence of buildings being raised in the real and the mixed Egyptian style at a period long after the race of native monarchs had ceased to rule. On the propyla of the great temple on this island there are some Greek inscriptions, which Gau copied. At first we should be disposed

* Gau, p. 15.

to say that the Greeks cut these characters on the faces of the antient buildings which the Egyptians had erected; but those Greek inscriptions themselves are intersected*, and in many parts destroyed by figures cut upon *them*, in the true Egyptian style. These sculptures then, at least, are posterior to the inscriptions, and prove that the native people retained their peculiar style of art under the dominion of the Greek kings and the Roman emperors; which, indeed, we are able to show from the consideration of their detached sculptures, in full relief,—a subject which is reserved for a separate chapter. There is no decisive evidence in the fact of these Egyptian sculptures being cut upon the Greek inscriptions, which will show that the temple itself is altogether of late construction; but it may be so in part, as it consists of an adytum, and many other chambers in the rear of the building, preceded by a kind of portico with propyla, and this again preceded by a large court with a row of pillars on each side; and again, on each side beyond these pillars, there is a number of small apartments. The two great propyla, which contain the Greek inscriptions, form the entrance to this court, and are similar to those represented in the view of Edfou. They are 118 feet wide and 54 high †. Still in front of the large propyla there is a gallery 250 feet long, with a row of columns on the right and left. The whole of this court or gallery seems of less antiquity than the temple; and the columns on the right hand, which seem part of the edifice, appear never to have been completed, and are not so old as those opposite to them. These right-hand columns serve as a corridor to a number of cells which lie still further to the right of them, and in the direction of the gallery's length. But there is still another part of this temple that is deserving of notice. To the entrance angle of the

* Gau's Appendix of Greek Inscriptions, pl. 11.

† Denon,

left-hand side of the gallery, there is a pseudo-peripteral temple attached, but not lying with its axis in the same direction as that of the gallery, which itself also is not in the same direction as the axis of the great court of the temple. The columns of this peripteral temple are engaged in a wall to one-third of their height; and the capitals, which are of the calyx or cup form, are also surmounted with the quadruple Isis-headed capital of Denderah. This column has, in fact, two capitals, above which there is an architrave and cornice, but no covering to the building, which is hypæthral. It has two doorways opposite to one another, and without lintels.

There is a curious effect of light and shade produced by the position of the remains of Philæ near the Tropic of Cancer. As the sun approaches his northern limit and rises higher in the heavens, the shadows from the bold projecting cornices and mouldings sink lower and lower on the broad surface of the walls, till at last, when the sun has obtained his greatest elevation, the vertical walls remain in deep shade, forming a striking contrast with the blazing brightness that is cast over every surrounding object*.

Gau asserts that the Græeks, after their occupation of Egypt, never did intermingle their style with that of the country. In this passage we believe he is speaking of sculpture, but we do not admit that he is right even in this limited acceptance. He seems to allow that there was some architectural intermixture, but only in what he calls the arrangement (*la disposition*); for example, there is a small Isis temple near the court of the great temple of Philæ, and another in the island of Elephantine which remind us of the Greek peripteral temples, i. e. the cella surrounded with columns on the four faces. These he considers as clear imitations of Greek buildings. But we may just as fairly say they were buildings erected

* Ritter,

by the Greeks with some varieties which they thought worth adopting from the native forms. It is this pseudo-peripteral temple of Philæ which contains in its capitals the forms of the lotus-leaf intermingled with the volutes of the Ionic column.

But there is still another specimen of a very small Isis temple on the island of Philæ, which is undoubtedly Greek in the arrangement of its parts. It is *amphi-prostyle* and *in antis*, i. e. each front contains two round pillars placed between the rectangular abutments, in which each side of the building terminates. There is only a single chamber in it, about $11\frac{1}{2}$ feet long by 8 wide, with a doorway at each end opposite to one another.

That this building was erected by the Greeks is hardly matter of doubt. A conquered nation like the Egyptian would not adopt the architectural models of the conqueror, for they could not possibly know what they were, unless they had the opportunity of seeing them. But if they did see and copy them, such models must have existed in the country; and some, at least, must have been erected by the Greeks under the dynasties of the Ptolemies. It is however rather curious that with the exception of the Greek remains of Alexandria, and those of Antinoë, which belong to the age of Adrian, we know of only two or three existing buildings of small dimensions, which were in the pure Greek style. It is not likely that the Greeks, who became very numerous in Egypt, and were found all over the country, should erect no large temples in the Thebaid or in the neighbourhood of Philæ; or if ever they did build any of a size proportionate to the splendid monuments of their native country, and those of the new capital Alexandria, it is quite incredible that no traces of them should remain. We conclude then that the Grecian style is distinctly visible in several of the monuments of Philæ, and that their art, combined with Egyptian ideas, prescribed

certain forms of buildings hitherto not seen in Egypt. Unless, perhaps, we suppose what is by no means improbable, that from the time when Amasis permitted the Greeks of Asia and Europe to build temples to Jupiter, Juno, and Apollo, at Naucratis, we may date the growth of a new style of architecture, indicating a union of Greek and Egyptian religious notions which would be accompanied by a corresponding character in the sacred buildings. But whatever opinion may be formed as to the intermixture of Greek and Egyptian forms, we know, at least, that temples dedicated to the deities of the country continued to be built under the Ptolemies and the Roman emperors. Indeed the long hieroglyphical inscription copied* from some part of the great temple of Philæ, and containing the names of a Ptolemy and Cleopatra, could hardly commemorate anything less than the building or the enlargement of this edifice. Gau found inscriptions on the enclosure of a temple at Gartaas in Nubia, which proved a building to have been erected here as late as the first half of the third century of our era.

We cannot terminate this chapter better than by quoting the opinions of this careful observer on the general effect produced by an Egyptian temple. "The effect of the Egyptian temples is, in general, imposing; their appearance is magnificent. But this results more from the simplicity of their divisions than from their real magnitude. Some are of opinion that Egyptian architecture may fairly be blamed for being too massive and heavy; but to form a proper judgment we ought to view the monuments of Egypt in connection with the *scale* of the country. We ought to see them surrounded by those immense deserts which, presenting no character but monotony and extent, still possess that of grandeur. In the midst of such localities it was necessary that the effect of the monuments should be in harmony with them; all small subdivisions

* Burton's Excerpta.

would have appeared mean. Those columns of an enormous diameter, those doorways beyond all usual size, and the lofty propyla, are perfectly in unison with the places which surround them. In fact, this uniformity of nature explains, still better than the unchangeable rules of Egyptian religion, the general resemblance in character which we observe in the edifices of this country.

“ Besides the characteristic of *magnificence*, the monuments of Egypt present to the architect examples of beautiful arrangement and skilful symmetry. But there is nothing, in my opinion, which can be considered as a model of taste or as a classical study to the professors of architecture. An exception may perhaps be made in favour of sculpture, but only so far as regards the art of appropriating forms borrowed from nature. As to Egyptian painting, it was in so low a condition as not to deserve any notice as a work of art.”

If there is any part of the above extract which would require a little modification, it is probably the last sentence on painting. The British Museum contains specimens well calculated to make us deny Gau's position in its full extent.

We will not follow this judicious critic, who appears to us to have described so truly the leading features of Egyptian architecture, in his remarks on the want of taste which modern builders often display in their appropriation of antient forms. This metropolis is rich in such examples. Parts which taken singly might please by the beauty of their form and proportions, ornaments once in unison with other localities and different religious ideas, minuteness of detail hardly visible because it is out of place, materials solid and durable, and magnitude more than sufficient for the most wonderful display of antient art, are sometimes all combined to form, at enormous expense, a building that every one discovers to be inconvenient, and no one will venture to call beautiful.

CHAPTER VIII.

THE MONUMENTS OF UPPER NUBIA.

ABOUT twenty-six geographical miles south of Ipsambul, is the second cataract of the Nile, known by the name of Wady Halfa; N. L. $21^{\circ} 50'$. The enterprising spirit of modern travellers has passed over this remote boundary, and opened to us a new field for historical inquiry in the monuments of Upper Nubia. For here we still find the same style of building that we have already described, and still we feel impelled to ascend the mysterious stream, to trace the course of arts and civilization still further towards their origin.

At Semneh, there are remains on both sides of the river. On the west side, a hill which overhangs the Nile is crowned with a small temple of sandstone, that bears some resemblance to one on the island of Elephantine, being of a pseudo-peripteral character. The hieroglyphics are rude, and in parts unfinished. The sacred ship is sculptured here also in the interior of the temple, a symbol that we must not lose sight of in our ascent up the river to the antient Meroe. The ceiling of the chamber is painted blue. Notwithstanding the evidence of antiquity which this building is said to offer, we cannot hesitate in referring its present form to the same age as the peripteral temples of Philæ. Rùppel describes the pillars which support the front of the cella as fluted, and without base or capital. Another temple of much larger dimensions is found at Amara, on the east bank, but only the shafts of six or eight pillars of the pronaos remain, which are of calcareous stone.

This is an uncommon occurrence in the antient buildings of this country, which were constructed of sandstone, at least in Upper Egypt. Burckhardt* conjectures this temple of Amara not to be of high antiquity, but to be a copy of that at Philæ. Rüppel remarks that in his Journal he has marked these pillars as being of sandstone. They are eight according to him, forming a double row. There are no traces either of a stone-roof or stone-walls about this temple.

But the most interesting monument between the second and third cataracts, is the temple of Soleb, which stands on the west bank of the river, and about 400 yards distant from it, in lat. $20^{\circ} 25'$. Mr. Waddington is, we believe, the first traveller who has given a description of this edifice. "† There is an entrance exactly opposite the gate of the temple, on each side of which two walls lead up to the remains of two sphinxes: one, which is grey granite, has the ram's head, and is six feet in length; the other is so much broken as to be nearly shapeless. Further on is the beginning of a flight of steps leading to the temple; two other sphinxes have been posted in front of it, of which there remains a part only. The front of the *portail*, which is far from perfect, is about 175 feet long; the width of the staircase before it, 57 feet. The first chamber is 102 feet 6 inches in breadth, by 88 feet 8 inches in depth: round three sides of it, runs a single row of pillars, and at the farthest end has been a double row, making in all thirty columns, of which seven are still standing and perfect: the diameter of their base is 5 feet 7 inches, and their height about 40 feet. They are inscribed with hieroglyphics only. The space between them and the wall of the temple has been covered with a roof, which is now fallen in." This is evidently a peristyle court,

* p. 50.

† Waddington's and Hanbury's Travels, p. 286.

if its dimensions are correctly given, and ought not to be called a chamber. It is impossible from the above description to make out the arrangement of the pillars, but the most probable one is, that the three lines of parallel columns in the breadth of the building contained each eight pillars, reckoning those at the angles. The pillars at each side will then be six in number, if we reckon again those at the angles. The whole number of thirty is thus accounted for. It is curious that this court should be so similar in character to the great peristyle court of Medinet-Abou, which we have already described. It agrees with it in having its width greater than its length, in having a row of pillars round three sides, and a double row on the fourth side, which was the one nearest to the adytum of the temple. Besides this court there must have been a second one leading out of it, for the second chamber is described as having a single row of twenty-four columns around it, no mention being made of any other, though some traces of a central row of columns would probably have been discovered, had there ever been a roof to this court. Mr. Waddington describes the dimensions of the adytum as very difficult to make out, as no part of the side-walls can be traced, and only a few feet of the posterior one. "It has, however," he says, "clearly contained twelve pillars, of which three are still entire, except the capital of one." But the fact of their being twelve pillars will prove that this was not the adytum, but either an hypostyle room, or the pronaos itself. The sculptures on the temple are described as being in the very best style, though in some parts they have been left unfinished. "Jupiter Ammon," says Mr. Waddington, "appears twice among the remaining figures, and to him I suppose the temple to have been dedicated. This temple affords the lightest specimen I have seen of Ethiopian or Egyptian architecture. The sand-

stone, of which most of the pillars are composed, is beautifully streaked with red, which gives them from a little distance, a rich and glowing tint. The side and posterior walls have almost entirely disappeared, and the roof has everywhere fallen in; so that there remains no ponderous heaps of masonry to destroy the effect of eleven beautiful and lofty columns. We seemed to be at Segeste, at Phigaleia, or at Sunium."

From description only, unaccompanied with minute details by the pencil, it would seem impossible to form any exact idea of the relative antiquity of this temple. The proportion between the diameter and height of the pillars in the peristyle court, is somewhat less than it would be in one of the Theban columns; especially if those pillars at Soleb are of the usual Egyptian form, growing narrower as we approach the lowest part of the shaft. Mr. Waddington does not make any other remarks on the form of the pillars, and we can only infer that their general appearance is more slender, and consequently, in proportion, more elevated than that of the ancient Egyptian column. Rùppel's description of the same remains will perhaps aid us in forming a more exact notion of them.

"* About half an hour south of the village of Soleb, on the west side of the Nile, there are considerable remains, called by the natives Gorganto. In all probability these ruins were once a royal residence, as the plan which can easily be made out, is altogether different from that of other Egyptian temples; the entrance of this building is turned to the east, some few hundred steps from the Nile. All its parts follow one another regularly along one axis. The front part is a massive wall, containing a court 192 feet long and 107 broad; here there are two lion-sphinxes of granite, with outstretched paws, near the entrance.

* Rùppel, p. 81. He uses French feet, which may be turned into English very nearly, by adding one-eleventh.

The first court is terminated by two prismatic towers (propyla), leading to a second court, which is about 76 feet deep, 92 wide, and ornamented all round with a row of colossal pillars. On the west side a double row of pillars form a kind of peristyle. After this we come to a second court of the same width as the preceding, and 86 feet deep. A colonnade runs round its inner wall. In the north-western angle there is a small door, which leads to no particular chamber. The palace ends in a chamber 40 feet deep and 54 wide, with a flat roof, once supported by twelve colossal pillars. The capitals have their decorations in imitation of palm-branches; and in the pillars of both the courts the type is that of trunks of palm-trees tied together, as in the great temple of Luxor. There are hieroglyphics on the pillars and architraves, well cut, but not very numerous. The whole building is much damaged; of the seventy pillars which once ornamented it only nine remain, standing in different places. The material of all the parts is sandstone. Near the palace is a small mole in the Nile built of large blocks of freestone." When we add to this description the fact that the name of Ramses the Great is found on this temple, we obtain a probable inference as to its high antiquity; and this conclusion we may apply to enlarge our conceptions of the extent of the Sesostrid empire, and the architectural taste of its monarchs. Perhaps in no country of the world so readily as in Egypt, do we recognise the natural types which man has applied to the purposes of architectural use and ornament. Every traveller, whose eye has been accustomed to measure and compare, detects without any difficulty in the varied forms of Egyptian capitals and pillars, the few simple and graceful models which nature offers for imitation on the banks of the Nile.

At Sesce, or Sasef, on the west bank of the Nile,

about twenty-two geographical miles further south than Soleb, Mr. Waddington found four pillars covered with hieroglyphics, standing amidst the ruins of a temple. These pillars are 18 feet in height and 5 in diameter, and formed of a hard sandstone. The pedestal is of a cylindrical form, such as we observe in some of the oldest Egyptian buildings. So great a difference in the proportions of these two columns would seem to indicate some difference in their age, which is well deserving of further examination. We should not omit to mention that on this part of the river between Soleb and Amarah, near a place called Sheik Selim,* there are pillars with an Isis' face on two sides of the capital. This particular type we have now found frequently repeated in Egyptian temples, with some variations—from the ruins of Bebek in the Delta, nearly as far as the 20th degree of latitude. We shall presently trace this form still higher up the river. Rüppel considers this temple with the Isis-headed capital, not to be older than the Ptolemaic age, judging from the style of the sculptures. We have not enumerated all the remains that are found on either side of the Nile, below the third Nile cataract, because it is only our object to trace those forms of architecture and sculpture which have characterized all the buildings of the Nile valley; and we have said enough to show that as far south as lat. 20°, there is one unbroken connected chain.

Near a little island called Tumbus (lat. 19° 43'), and on the east bank of the Nile, Rüppel observed the red granite show itself; and here also he saw a colossal statue of this material in a good Egyptian style. The left foot, as usual, is advanced forwards: the head and face are mutilated: the hands, which grasp a short cylindrical staff, rest on the hips—a striped garment is thrown round the loins—bracelets

* Rüppel, p. 80.

and necklaces appear as ornaments. The whole height of the statue is 12 feet. Still further up the river, within the limits of Dongola, Mr. Waddington saw two colossal statues of grey granite, one 22 feet 6 inches, and the other 23 feet 5 inches high, but broken at the middle. A small statue, about 5 feet in height, was placed in front of the latter. Nothing could be more in the true Egyptian style than figures of these dimensions, with a smaller one, according to custom, placed near them, probably for the sake of producing an effect by the contrast, and giving a measure of the colossal magnitude. Another statue, without a head, and of black granite, was lying near the two colossi. Hieroglyphical characters were also observed on its feet, which we hope some future traveller may have the opportunity of copying. Ruppel's description of these statues is more minute, and, in some respects, different from that just given. They are found, he says, about the middle of the great island Argo (lat. $19^{\circ} 20'$) lying in front of a temple which has been reduced to such a heap of ruins by human violence, that it is impossible to make out the plan. Each statue* is 20 feet 9 inches long, French measure, including the base, which is 17 inches thick; and the sculpture is in the genuine Egyptian style. These statues have been mutilated in several parts by violence; one of them has lost both his arms, and the other is split across the breast.

The material is a granite containing large pieces of flesh-coloured feldspath, which is the predominant component part; the brown mica is in the smallest proportion. There are no hieroglyphics on either of these figures. They are in the usual attitude of Egyptian standing colossal figures, with the left foot advanced, and the arms hanging down by the

* P. 84. Both these figures are represented in Ruppel's drawing.

side. The hand is closed around a short cylindrical mass or straight stick. The colossus, which has lost its arms, shows by the broken surface, that they were attached to the body just as in the other statue. An example of this we may observe in the colossal arm of the Museum, which belongs to the large head that stands opposite to the Memnon. The arm, indeed, in this Museum specimen, by its being stretched out in a straight line, shows that it must have hung down along the body; and this is confirmed by observing that the inner side of it retains part of the broken rim which originally held it close to the whole mass. These colossi of Argo rest with their backs against a six-inch thick column, which runs the whole length of the body, to the top of the cap; and in this, as well as in the ornamental parts, they resemble completely the great statues of Egypt and Nubia, though they are described by Rüppel as much inferior to their colossal brethren of the north, both in softness of expression and the degree of finish.

These statues wear the high cap which we see so often on the caryatid pilasters of Egypt; the sacred serpent rises on the forehead. A bandage passes down the cheek on each side, holding the cap under the chin, to which is attached the usual representation of the beard. On the statue, whose arms remain, we observe a bandage or ring around the upper part of the arm above the elbow, and also round the wrist. A chain formed of large elliptical-shaped rings hangs round the neck; and a kind of upper vest is seen on the neck fastened over the shoulders by straps like suspenders. The legs below the knee, and for a short distance above, are bare; one of the statues (that without the arms) has broad bands or rings around the ankles. Round the loins of this latter figure, is a kind of shirt fastened by a belt tied with a knot, and one part overlapping the other.

The shirt on the other figure is in folds, of which one end-lappet hangs down between the thighs almost as far as the knees. On the right foot of the last-mentioned statue there is a small figure of Harpocrates standing ($3\frac{1}{2}$ feet high), with a long lock of hair hanging down the right side of his face, his hand on his lip, and the two ram's horns on his head surmounted by a couple of the usual feather-like ornaments.

The few remains of Dongola Agusa on the east bank of the Nile, lat. $18^{\circ} 15'$, show that the Christian worship was once established in this place. These granite columns and capitals, ornamented with crosses and lilies, mark the epoch to which this edifice belonged, and express, with more certainty than the evidence of books alone, a fact not without interest in the history of this barbarous country.

At Mount Barkal, which lies about three quarters of a mile from the right bank of the Nile, in lat. $18^{\circ} 25'$, we find the remains of numerous buildings, some of which undoubtedly are of high antiquity. In the name of Merawe, a place not far from the remains of Barkal, we see the traces of the antient name of Meroe, but that this was not *the* Meroe of the antient geographers is certain. The district and town of Meroe lay south of the point where the main eastern and western branches of the Nile united, and, consequently, south of Merawe. Whatever antient site may correspond to that of Mount Barkal, it is certain that there was once a city here, whose remains prove it to be an antient establishment of priests who professed a kindred worship to that of Egypt. The temples lay between the mountain and the river. One* of them has been full 450 feet in length and 159 in breadth. Two rams of granite, the emblems

* Cailliaud's Voyage à Meroe, 1823, pl. 64. contains a plan of this temple, which Rùppel says, is not so correct as his own.

of Ammon, lie in front of the chief entrance, and once probably formed part of an avenue like those leading to the temple of Ammon at Thebes.

“The peculiar form of Mount Barkal,” says Rüppel*, “must have fixed attention in all ages. From the wide plain there rises up perpendicularly on all sides, a mass of sandstone near 400 feet high, and about 25 minutes in circuit. The unusual shape of the mountain must have become still further an object of curiosity, from the phenomena with which it is connected. The clouds, attracted from all around to this isolated mass, descend in fruitful showers; and hence, we need hardly wonder if in antient times, it was believed that the gods here paid visits to man, and held communion with him. Temple rose after temple, and who can say how far many a devotee came to ask advice of the oracle? Is not even the modern name of the place, Barkal, nothing more than a corruption of the Greek word ‘oracle?’”

The fidelity of description which appears to characterise Rüppel, makes amends for the blunders which he not unfrequently commits, when he ventures to use a Greek or Roman word. His etymology of the name Barkal will gain few converts, particularly among those who do not believe ‘oracle’ to be of Greek derivation.

The great temple of Mount Barkal is one of the most striking monuments south of Wady Halfa. The length of its axis is near 500 feet †; and the entrance is formed by two massy propyla, each about 65 French feet long and 40 thick. A doorway, 13 feet wide, leads between these propyla to a spacious court 126 feet long, which appears to have had a colonnade round it. A second set of propyla, of the same length as the first, but only 21 feet thick, is

* p. 86.

† 500 feet in the ground-plan, all but four or five feet.

followed by another court 146 feet long, terminated by eighteen* massive pillars, which probably once supported a flat stone roof. A great number of other chambers follow in succession, offering altogether the complete plan of an Egyptian temple north of the cataracts of Assouan.

In one of these chambers, the fourth division of the temple following the line of the axis, which Rüppel calls the adytum, though, in our opinion incorrectly, he found an altar of grey granite, 4 feet 9 inches square at the base. The sculptures have been executed with great care, and narrow stripes of hieroglyphics run round it. The centre bas-reliefs on two sides represent two figures fastening together lotus stems in the form of an altar, on which there are royal names enclosed in the usual shields or cartouches.

Mr. Waddington and Rüppel describe the remains of two temples at Mount Barkal, as partly excavated in the rock, and partly constructed, like those of Girscheh and Seboua. This fact can only be explained on the supposition of these temples at Barkal being still older than those in Nubia, for we can hardly imagine, when we take all the facts together, that the Egyptian style of building originated in Nubia and spread upwards towards Abyssinia, and downwards into Egypt. In the Nile valley below the cataracts, we observed that a small temple to Typhon, the evil deity, is often found near a larger one consecrated to a more beneficent object of adoration. There is a Typhonium near the temple of Isis, at Denderah, and one also near the larger temple of Edfou. At Barkal also we have the remains of a Typhonium in one of the two temples just alluded to, or rather the remains of a temple jointly belonging

* Eighteen pillars in Rüppel's plan, but twenty-eight in his description.

to Isis and Typhon. Eight of the pillars in the court of this temple have square capitals with the Isis head*, on two sides, surmounted by the temple doorway as on the capitals at Denderah; but the upper member of this capital differs somewhat from that of Denderah, while it is exactly the same as that on the square pillars of the pronaos of Ipsambul. We may call this a temple of Typhon, because the figure of this ugly deity appears several times at full length, forming a caryatid pilaster, and we shall presently notice another instance where Isis and Typhon are still more closely in partnership. The sculptures in the adytum of this temple are in high relief, and painted yellow and blue. On one of the walls, among five figures of deities, we recognise Isis and Ammon.

East of this Typhonium† are the ruins of a large building of freestone; and still further, south-east, an extensive palace made of burnt bricks. It is entirely destroyed, only a few of the chief walls rising about a couple of feet above the heaps of earth. It was before the northern entrance of this building that Rüppel saw the two lions of red granite, which Lord Prudhoe brought to England in 1832. One of them the German traveller describes as being broken into several pieces, when he saw it.

The following is Rüppel's description of the drawing which he has given of one of these lions:—

“ This beautiful lion of flesh-coloured granite, together with its pendant, ornamented both sides of the entrance to a palace at Barkal. It is altogether in the Greek-Egyptian style, since it was only under the influence of foreign art that the sculptor allowed himself to give to animals an attitude which was not an immediate copy of a profile. This lion ‡ rests on his left side, with his head turned to the right, and the

* Cailliaud, pl. 67. Rüppel, p. 87.

† Rüppel, p. 89.

‡ The one that he has drawn.

paws also lying on this side crosswise. The nose, in proportion to the rest of the body, is rather too short : around the head, and extending under the chin, there is a kind of ruff, probably intended to express the hair of the mane. On the breast is a broad shield, in the middle of which are two hieroglyphic inscriptions, inclosed in rings, supposed to be names of kings. I have accurately copied them ; and I leave it to those versed in such matters to determine, from these data, the probable epoch to which these lions belong. The whole body of the lion rests on a nine-inch thick plinth, which under the head of the lion has rectangular corners, but at the back part is rounded. A border of hieroglyphics has surrounded the plinth, but they are now altogether illegible. The length of this lion is 6 feet 9 inches, and its height 3 feet 7 inches."

As Ruppel lays no claim to be a draughtsman, we cannot blame him for giving the best copy that he could of these curious specimens of art ; but his drawing, though it shows the attitude and general character of these lions, fails altogether in conveying an adequate idea of their merits. It makes the animal stiff, and sitting bolt upright on his pedestal, whereas he is reclining in an easy natural manner, with his hind quarters loose and relaxed, the leg that is visible being stretched out nearly parallel to the body, but at some distance from it. The chest, the full deep shoulder, the expression of the ribs, and the contour of the back, are all strongly marked, and replete with energy. The animals are fleshy and muscular. Altogether they convey what was probably intended—the expression of strength in a state of the most complete repose.

The animal which is lying on his right side is better preserved than the other about the haunches ; the stone is more highly polished, and it is a better specimen of sculpture, though the two were, no doubt,

intended to form a pair. The material is a granite, containing large pieces of red feldspath, with black mica and quartz. It came probably from the quarries of Tumbus, and is exactly like the material of the altar in the Museum, No. 2.

The border of hieroglyphics on the plinth of that which Rüppel describes, is by no means altogether illegible. Where the stone is not broken they can be made out very well. The owl is well cut, and also the Egyptian vulture on the front face of the plinth, but the head of the latter is gone. On the flat surface of the upper end of the plinth two camels' heads are cut exactly in the style in which they appear on the obelisks and on the Museum frieze. From a careful inspection of these sculptures, it is impossible to resist the impression that they belong to an early age. They are somewhat rude, but vigorous and expressive. On the flat part of the plinth alluded to there is a cartouche perfectly distinct. It contains exactly the figures that appear in the prænomen of the great Memnon statue, and the Museum figure of black breccia; but their arrangement is different. The disk, instead of being placed over the head of the seated figures, is placed over the bowl, and both of them are to be read before the figure. This cartouche is repeated on the fore part of the plinth, and also on the back part, with two additional figures between the seated deity and the disk and bowl. They are—the upper one perhaps the usual leaf-like representation, though the stem is rather too long; and the lower one, a semicircle resting on its diameter. It should be remarked, that the way in which this kind of granite breaks renders it very difficult to make out those characters that are damaged.

The cartouches on the breast are neither of them correctly drawn by Rüppel, but we reserve the more particular examination of them for a future chapter.

The lion, which is lying on his right side, has hieroglyphics only on the vertical front face of the plinth; and several of the cartouches have been purposely damaged, which does not appear to be the case with the other, as far as we can judge from the parts that are not broken off. This lion also has two cartouches on his breast, but not so high up as on the other figure. On the plinth the same prænomen occurs which we have described on the face of the plinth of the lion which is lying on his left side, but there are two additional figures behind the seated deity. Then comes the goose and disk, and then the name, which is hardly legible, but possibly may be deciphered.

Rüppel found a curious monument of antiquity between the pillars of the peristyle of the great temple at Barkal, of which he has given two drawings. "The careful execution of this block of blackish granite shows the importance once attached to it; but the whole is of so singular a form that it cannot be described intelligibly without a drawing. A long rectangular block, rounded at one end, with a projecting border round the bottom and top, and some angular side-projections, serve as a basis to a foot-shaped mass. It is only by way of comparison that I use the term 'foot-shaped,' since the oval rounding where the toes should be, the strange extension on each side of the heel, and the arch-formed projection from the end of the heel, form, both singly and collectively, something so original, that one is inclined to consider the whole as a fantastic design. In the upper part this foot-shaped block terminates in an elliptical surface which shows a violent fracture."

There are no hieroglyphic inscriptions on this stone except two short ones on the upper surface. Among these one shows itself to be the name of a king by its elliptical enclosure. The whole stone is 3 feet

1 inch long, and 2 feet 5 inches high. This name, we have no doubt, is the same as the prænomen on the lions; but we suspect Rüppel has drawn it rather incorrectly. It contains the same deity seated, with an eye-shaped symbol over his head, and formed simply by two curved lines, making a small angle at their intersection; below the deity the same symbol is repeated. There can hardly be any doubt that the upper ought to be the solar disk, and the lower the bowl.

Rüppel conjectures that this singular foot at Barkal may have some connexion with the story of Perseus' sandal, as Herodotus* tells it. "The people of Chemmis, in the Theban nome, have a temple of Perseus in their city, and in it a statue of Perseus. They say that Perseus often shows himself to them above ground, (or, about the country,) and often within the temple; also that one of the sandals which he has worn is often found, being about three feet long; and when this is the case all Egypt is prosperous."

The Museum contains a sculptured impression of a human foot (No. 49), about 16 inches long, which was found in front of the great Sphinx, and presented to the Museum by Captain Caviglia. The Greek characters ΝΕΚΦΘ are cut on it. What is its precise meaning we cannot tell. Many nations can display the footstep of some antient deity or hero, who has left behind him this memorial for future ages to admire. Herodotus† beheld with wonder the mighty trace of Hercules' footstep on a rock on the banks of the Dniester; and modern heroes, of a somewhat different stamp from the warlike son of Jove, have left their footsteps behind for us to tread in, if we choose.

South-west and north-west of the rock of Barkal there are several pyramids of small dimensions; and

* II. 91.

† IV. 2. This was also three feet long.

again at a place called Nourri, on the left bank, a few miles higher up the stream, there is another group still more numerous. Most of these pyramids are remarkable for having porticos attached to them, which seem to be a part of the original construction; and the roofs of some of these porticos have the complete arch with the keystone. We shall reserve for another occasion the examination of these pyramids, as well as others found still higher up the river.

Our object in tracing the monuments of Nubia up the Nile, is to show that the style of building and the decorations which we call Egyptian, are much more widely spread than is commonly imagined. Half a century ago our knowledge even of the temples of Egypt was limited to a few ill-made drawings, from which no exact ideas could be formed. Now we have before us in the splendid French work on Egypt, in Gau's Nubia, and in Cailliaud's Journey to Meroe, a continuous picture of those architectural remains which line the banks of the Nile, from the thirty-first to the seventeenth degree of north latitude. The drawings of the last-mentioned traveller have thus extended our knowledge beyond the monuments of Barkal. The modern town of Chendi, which stands near the Nile, N. L. 17°, is probably near the site of the ancient far-famed Ethiopian metropolis, Meroe. About six leagues south of Chendi are the remains of Naga, one part of which are near the river, and another at some distance from it in the desert. At Naga, near the Nile, there are fragments of columns, heaps of bricks, and the remains of a temple with a Typhonium. Of the latter building Cailliaud's drawing shows three pillars, which as far as they are seen above the ground are quadrangular, with a rude Isis' head on each side, and a figure of Typhon under it. The part of the ornament over the Isis' head, which in

the column of Denderah contains a temple doorway, is occupied in this pillar of Naga with four or five leaf-like ornaments standing erect side by side: in other respects it most resembles the Ipsambul pillar. This rude Isis' column cannot be considered as posterior to those of Egypt or Nubia, nor as an evidence of the decline of art in Ethiopia which had been introduced from another country. It bears upon it all the marks of a primitive age; the square column resembles in character those in the rock-cut temples; and the sculpture is not an attempt to imitate and refine upon the pure forms of a better age, but is a coarse and genuine effort of some original artist. We have thus traced one of the most common of all the sacred forms of Egypt as far as the antient Meroe, and whatever explanation we may assume of the symbolical forms of Egyptian sculpture, the fact is undoubted that a very few types multiplied and compounded, and perpetually repeated, enter into every part of the sacred sculpture of Egypt and Nubia. Isis, according to the mythological story, triumphed over Typhon who had murdered her husband Osiris; and it is possible that this column, in which the head of Isis is placed above that of Typhon, may be symbolical of the defeat of the murderer.

Osiris*, according to tradition, led a colony from Ethiopia into Egypt, which received also from the parent state the practice of deifying kings, which we see perpetually represented on the monuments, together with hieroglyphical writing, the usage of embalming, the whole sacred ritual, and "the forms of their sculptures." Could we have a better confirmation of the tradition than the evidence of the Isis-headed pillar of Naga? But we find a distinct mention of Isis as one of the Ethiopian deities:—"The people above

* Diodorus, iii. 3.

Meroe worship Isis and Pan, and besides them, Hercules and Zeus (Ammon), considering these deities the chief benefactors of the human race."

The other symbolical form, whose origin we trace in the remotest Nubian monuments, is that of Ammon; and here we can do no better than follow Professor Heeren in his remarks on the state of Meroe. We are now speaking of Naga in the desert, which lies about six leagues east of the Nile. There has been one large temple here and a number of smaller ones lying around it in various directions and at different distances. "The remains* of the principal temple show clearly to what deity it was dedicated. An avenue of ram statues, in an attitude of repose, leads to an open portico of ten pillars, from which we proceed through another similar gallery to the pylon. Through this we advance into a court with eight columns, then into a hall, and through a third door into the sanctuary. The doors, pillars, and walls of the sanctuary are of hewn stone, and the other parts of brick with a coating on which traces of paint are visible. The propyla and pillars are covered with sculptures, in a high style of execution. Those on both sides of the doorway in the first pylon are very remarkable. A king and queen, with the insignia of power, are welcomed by the gods; the queen is received by Ammon with the ram's head, the king by the same deity in a human form. Above, on the frieze, offerings are brought by both of them to the same gods; below, near the basement, we see female slaves with vessels from which they are pouring water. The building is in the Egyptian style, but of small dimensions. From the entrance of the first pylon to the termination of the building is about 80 feet. The approach is peculiar in having a double avenue of rams, both before and behind the portico; and the plan of the whole building seems to

* Heeren, Meroe, p. 409.

show that architecture, at the time when this building was erected, had not reached that perfection which it afterwards attained in the temples of Egypt."

Another and smaller temple to the west contains some curious sculptures on each face of the propyla. On the left side* we see the hero, with the royal serpent on his forehead and with uplifted axe, preparing to cut off the heads of a number of captives, whom he holds in one hand by the hair: the vulture is hovering over his head. It is in fact the same figure as that on the left wing of the propyla of Edfou. On the right side a female figure, likewise of regal dignity, with a large knife in each hand, is going to cut off the heads of a number of captives; the vulture is hovering over her head also. Both the figures are remarkable for the magnificence of their dress; and though they have many characteristics of Egyptian style, they are much thicker than the Egyptian form. The female particularly is remarkably large from the waist downwards. The height of each figure is 11 feet 5½ inches. The sculptures near the basement of the portico show a series of prisoners with their hands fastened behind them, just as we observe on the Theban monuments. In the reliefs of the interior we find the representations of the prisoners brought before the deities. "The upper † row contains the five male gods, Ammon with his train; at the head is the god with the lion's head, and the ornament of the ram's horns; behind him, Ammon himself; Ré, the sun-god; his son Phtha, and again Ammon with the ram's head: the lower figures are female, the same in number, and at the head of them Isis, who is holding fast the group of prisoners that has been presented to her. The king in the upper row with a train of male attendants, and the queen in the lower row with a company of females, present the prisoners to the deities. Still more striking is the

* Cailliaud, pl. 14, 16.

† Heeren, p. 410.

following representation :—the same god with the lion's head and the ram's horns as an ornament ; but with two heads and four arms. This is the only representation of this kind on all the monuments with which I am acquainted, from the source of the Nile to its mouth—the only one also that reminds us of Indian combinations.”

The lion's head on the man's body reminds us of the fourth incarnation of Vishnu, which, together with eight others, is represented on a picture in the rooms of the London Royal Asiatic Society. The pair of ram's horns, however, is, we believe, pure Ethiopian. But the double head and double set of arms form a most striking coincidence with the representations of the Indian deities. We cannot agree with Heeren in considering these sculptures at Naga equal to the best Egyptian specimens : they seem to us on the contrary, both clumsy and devoid of that delicacy which the best Theban monuments exhibit. But in the representation of the warrior queen there is something peculiar to Ethiopia, which is, probably, as Heeren conjectures, a confirmation of what we learn from the fragments of Ethiopian history, that the women sometimes went to battle, and that a female was not excluded from the throne. Among the three hundred and thirty sovereigns of Egypt, between Menes and Sesostris, Herodotus* mentions one female, whose name was Nitocris ; and in later days, also, we read of Ethiopian warrior queens †, with the title or name of Candace. It has been no uncommon thing in eastern history to find females directing the warlike operations of a nation ; and we may therefore venture to class

* II. 100. “The same,” adds the historian, “as the name of a Babylonian queen.” The antient history of Assyria and Egypt is still further inverted and entangled by both claiming a hero, Memnon.

† Strab. p. 820.

the unknown queen of Naga with the names of Semiramis and Zenobia.

The close connection that at several periods existed between Ethiopia and Egypt renders it exceedingly difficult to come to any satisfactory conclusion as to the origin of most of the monuments in the neighbourhood of Naga. The eighteen monarchs of Ethiopia, whom Herodotus* mentions, are all prior to the age of Sesostris, and it is no improbable hypothesis that they introduced into Egypt the ritual of Meroe, with the worship of Isiṣ and Ammon. Again, Sesostris at a later period conquered Ethiopia, and it is also possible that he introduced to the upper waters of the Nile those forms of architecture and sculpture which, according to some theories, were first adopted in Nubia. But we have still further evidence of a possible interchange of Ethiopian and Egyptian religious systems. The dynasty of Manethon contains three Ethiopian sovereigns of Egypt—Sabakos, Seuechus, and Tirakos; whose existence is confirmed by the testimony of the sacred records: Tirakos, or Tirhakah, was contemporary with Sennacherib. Sabakos, whom alone Herodotus was acquainted with, is said by this historian to have evacuated Egypt according to the command of an oracle—a fact which is singularly illustrated by what we are told of the strict obedience which the kings of Ethiopia paid to the superior power of their hierarchy. It is possible then that during this Ethiopian conquest of Egypt, the arts of sculpture may have been introduced from the lower parts of the Nile. But the further examination of the localities still inclines to look for the origin at least of the Ammonian worship in the monuments of Ethiopia. At El Meçaourah, a valley in the desert, about nine leagues south of Chendy, there is a vast collection of

* II. 100.

ruins consisting of eight small temples, connected by galleries and terraces, with a great number of small chambers. The circuit of these ruins is 2715 feet, and the whole was surrounded by a double enclosure. The chief temple is in the centre.

A few hundred paces from this place are seen two other buildings, one to the west and another to the east. Near the eastern temple there are traces of a large tank, protected from the sand by mounds of earth all round it, which are probably artificial. This tank was doubtless intended for the use of the temples, as we have observed to be the case in Egypt, where the sacred edifice was not near enough to the river to render the water of the Nile available for religious and other purposes. “*Though these ruins are so extensive, all is on a small scale, the buildings as well as the materials. The greatest temple is only 34 feet long: on the pillars are figures in the Egyptian style, others in the same portico are fluted after the Greek fashion. On the basis of one I thought I detected the remains of a zodiac. Time and the elements which have destroyed the antient Saba, seem to have been willing to spare the observatory of Meroe. Without making excavations it is easy to see the whole plan of the building. It is surprising that in all these ruins so few hieroglyphics are found. Only the six pillars which form the portico of the central temple have hieroglyphics; all the other walls are without sculptures.”

Heeren conjectures this to be the antient Ammonium, the original seat of the oracle of Jupiter Ammon, whence issued those religious colonies which carried civilization, arts, and religion from Ethiopia as far as the Delta and the Oasis of the Libyan Desert. This hypothesis so far from being irreconcilable with the scanty notices of historical tradition, is in every re-

* Cailliaud, quoted by Heeren.

spect conformable, so far as to show that Ethiopia was the parent of Egyptian civilization. But in the absence of more precise information about these ruins, and through the want of sculptures on them, we cannot come to any positive conclusions. This strange irregular combination of temples and chambers at Meçaourah seems to the German writer an additional reason for believing this to be the original site of that far-famed oracle, which at last found its most hallowed abode in the wide plains of Thebes, and on the sand-girt island of the Wady Siwah.

But we have a story in Diodorus that serves to confirm the notion of these temples at Meçaourah being the chief residence of the powerful priest caste of Meroe. In Ethiopia, as in antient Egypt, the king was bound to a most strict observance of religious rites, and almost every act of his life was prescribed by the unchanging laws of the college of priests. But we do not find any trace in Egypt of that complete subjugation in which the sovereigns of Meroe were held. For* there, when the priests think proper, they send a message to the king, with orders for him to die. The gods, they say, have communicated their pleasure, and no mortal should dispute their commands. It seems that for many generations the poor kings yielded implicit obedience to the will of the priests, and quietly submitted to death. But under Greek influence in Egypt a new order of things arose. In the time of the second Ptolemy, the Ethiopians had a king Ergamenes, who, by some chance or other, had the benefit of a Greek education, and was imbued with the knowledge of the Greek philosophy. The hierarchy, which in its origin probably contained the first germ of civilization, and was the protector of commerce, and the friend of social life, now suffered the reverses

* III, 6,

justly due to its usurped and extravagant tyranny. The pupil of the schools of Greece came with a band of soldiers to the inaccessible place*, which contained the golden temple of the Ethiopians; and he massacred all the priests. Like Jehu, the son of Nimshi, who slew the idolatrous servants of Baal, by one vigorous effort he shook off the yoke of superstition, "and arranged things according to his pleasure."

To this or to some similar event we may trace the introduction of Grecian art into the state of Meroe; for undoubtedly both the language and the architectural forms of this nation were, to a certain extent, adopted by the rulers of Ethiopia during, and after, the dominion of the Ptolemies in Egypt. At Naga† in the desert there is a kind of portico with four Greek pilasters, two arched doorways, and an Egyptian window between, which is surmounted by three winged globes one above another; the whole crowned with a cornice, like that on the cap of the Memnon's head in the Museum. The two pilasters to the right have the echini of the Ionic column just below their capitals.

There is a remarkable passage in Herodotus‡ which, taken in connection with what we now know of the monuments of Ethiopia, amounts almost to historical demonstration of the descent of religious colonies from the upper waters of the Nile. "Meroe, the parent city of the Ethiopians, is a large city. The

* This "inaccessible place" will agree very well with the site of Meçaourah. Professor Heeren, whose diligence in tracing the Ammonian worship deserves great praise, seems to go a little too far in wishing to change the word for temple (*ναός*) into the word *ship* (*ναῦς*) in this passage of Diodorus, and of Strabo (p. 823), who has evidently taken his account from the same source.

† Cailliaud, pl. 13.

‡ II. 29.

people worship only Zeus and Dionysus (Ammon and Osiris), and them they honour greatly. They have an oracle of Zeus; and they make their expeditions (*στρατεύονται*) whenever and wherever the deity by his oracular answers orders them." Here we have a distinct tradition that the priests of Meroe founded colonies in obedience to the will of their deity; and we have further evidence that the Ammon worship, which was carried down the Nile, was a simpler and purer form of religion than the monstrous combinations that arose below the cataracts of Syene. The symbol of Ammon with the ram's head and the procession of the sacred ship, repeated on so many monuments of Egypt and Nubia*, are the undoubted evidence of at least *one* form of religion (there might be others also) spreading along the whole course of the Nile. By the ship we may understand to be indicated the progress of colonization along the river, and with it the diffusion of the Ammonian rites; which, in conjunction with the sacred form of Isis, rested not from their wanderings till they came to the plains of the Delta and the borders of the Mediterranean, where a second Diospolis or city of Ammon received the deities of Meroe.

* In Gau, pl. 45, we see the ship painted yellow, to represent probably the gilding.

CHAPTER IX:

INDIAN TEMPLES, MONOLITH TEMPLES, &c.

IN an earlier part of this volume we alluded to certain resemblances between the temples of India and Egypt, and though we think it quite unnecessary here to enter into a discussion on any supposed origin of these similarities, our subject would be very imperfectly illustrated without some short notice of the rock-cut temples of India, and the magnificent pagodas.

One of the earliest monuments that attracted the notice of Europeans was the excavation of Elephanta*, situated in a beautiful island of the same name, called by the natives Goripura, or *Mountain City*. This island is in the bay of Bombay, seven miles from Bombay castle; it is about six miles in circumference, and composed of two long hills with a narrow valley between them.

The island has taken its familiar name from a colossal statue of an elephant, cut out of a detached mass of blackish rock unconnected with any stratum below. This figure has had another on its back, which the old travellers call a young elephant, but which, as far as we can judge from the drawing of what remains of it, has much more probably been a tiger. The head and neck of this elephant dropped off about 1814, owing to a large fissure that ran up through its back. The length of this colossal figure from the forehead to the root of the tail was 13 feet 2 inches,

* Taken from W. Erskine's description.—Bombay Lit. Trans. i. 198.

and the height at the head 7 feet 4 inches. The remains of this colossus stand about 250 yards to the right of the usual landing-place, which is towards the south part of the island.

After proceeding up the valley till the two mountains unite, we come to a narrow path, after ascending which there is a beautiful prospect of the northern part of the island, and the opposite shores of Salsette. "Advancing forward and keeping to the left along the bend of the hill, we gradually mount to an open space, and come suddenly on the grand entrance of a magnificent temple, whose huge massy columns seem to give support to the whole mountain which rises above it.

"The entrance into this temple, which is entirely hewn out of a stone resembling porphyry, is by a spacious front supported by two massy pillars and two pilasters forming three openings, under a thick and steep rock overhung by brushwood and wild shrubs. The long ranges of columns that appear closing in perspective on every side, the flat roof of solid rock that seems to be prevented from falling only by the massy pillars, whose capitals are pressed down and flattened as if by the superincumbent weight, the darkness that obscures the interior of the temple, which is dimly lighted only by the entrances, and the gloomy appearance of the gigantic stone figures ranged along the wall, and hewn, like the whole temple, out of the living rock, joined to the strange uncertainty that hangs over the history of this place—carry the mind back to distant periods, and impress it with that kind of uncertain religious awe with which the grander works of ages of darkness are generally contemplated.

"The whole excavation consists of three principal parts: the great temple itself, which is in the centre, and two smaller chapels, one on each side of the great

temple. These two chapels do not come forward into a straight line with the front of the chief temple, are not perceived on approaching the temple, and are considerably in recess, being approached by two narrow passes in the hill, one on each side of the grand entrance, but at some distance from it. After advancing to some distance up these confined passes, we find each of them conduct to another front of the grand excavation, exactly like the principal front which is first seen; all the three fronts being hollowed out of the solid rock, and each consisting of two huge pillars with two pilasters. The two side fronts are precisely opposite to each other on the east and west, the grand entrance facing the north. The two wings of the temple are at the upper end of these passages, and are close by the grand excavation, but have no covered passage to connect them with it."

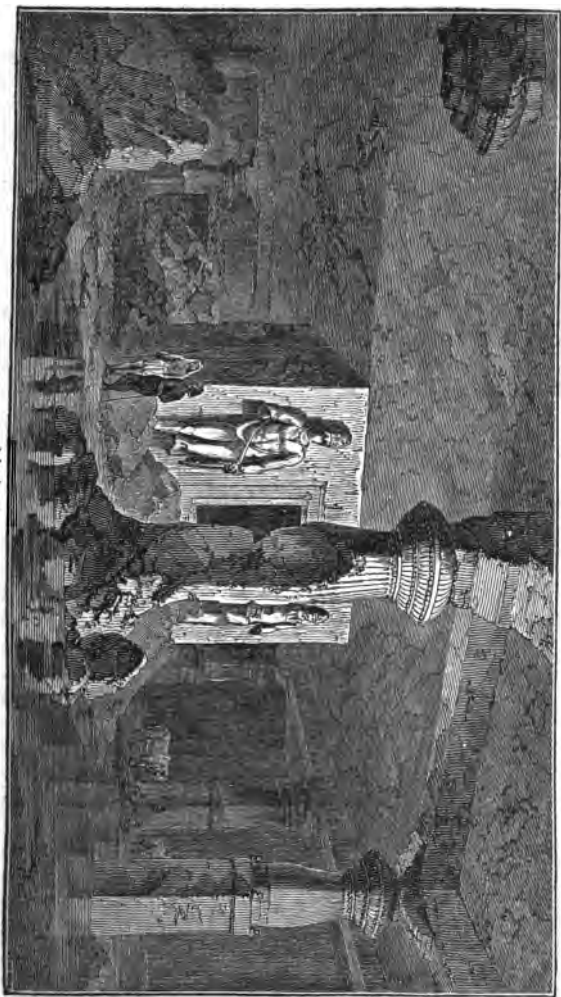
This description of Mr. Erskine is accompanied by a plan from Mr. C. Daw; but even without it, the general disposition of the excavation will be pretty clear.

From the northern entrance to the extremity of this cave is about $130\frac{1}{2}$ feet, and from the east to the west side 133. Twenty-six pillars, of which eight are broken, and sixteen pilasters, support the roof. Neither the floor nor the roof is in the same plane, and consequently the height varies, being in some parts $17\frac{1}{2}$, in others 15 feet. Two rows of pillars run parallel to one another from the northern entrance and at right angles to it, to the extremity of the cave; and the pilasters, one of which we have described as standing on each side of the two front pillars, are followed by other pilasters and pillars also, forming on each side of the two rows already described, another row, running parallel to them up to the southern extremity of the cave. The pillars on the east and west front, which have been described as like

those on the north side, are also continued across the temple from east to west. Thus the ranges of pillars form a number of parallel lines intersecting one another at right angles—the pillars of the central parts being considered as common to the two sets of intersecting lines. The pillars vary both in their size and decorations, though the difference is not sufficient to strike the eye at first.

“They rise to upwards of half their height from a square pedestal, generally about 3 feet 5 inches each way, crowned at the top by a broad bandage of the same shape; above this, but divided from it by a circular astragal and two polygonic fillets, rises a short round fluted shaft, forming about a fourth of the column and diminishing with a curve towards the top, where a circular cincture of beads binds round it a fillet composed of an ornament resembling leaves, or rather cusps, the lower extremity of which appears below the cincture, while the superior extremity rises above, projecting and terminating gracefully in a circle of overhanging leaves or cusps. A narrow band divides this ornament from the round fluted compressed cushion, which may be regarded as the capital of the column, and as giving it its character: its fluted form coalesces beautifully with the fluted shaft below. This cushion has its circumference bound by a thin flat band or fillet, as if to retain it; and above supports a square plinth, on which rests the architrave that slopes away on each side in scrolls connected by a band or riband, till it meets the large transverse beam of rock which connects the range of pillars.”

The whole temple of Elephanta seems to be probably dedicated to Siva alone. All the walls are covered with reliefs (which are yet very little known for want of complete drawings), but are described as being in good proportion and producing rather a pleasing effect than the contrary. All the sculpturés



Elephanta.

refer to the Indian mythology, and as we have remarked, the temple seems to have been the special property of Siva, since he appears very frequently with his usual attributes. In one place we see him as half man and half woman, with one breast and four hands, in one of which he holds the snake. The reliefs on the walls of this temple are in some cases raised so high that they only adhere to the main mass by their backs.

We do not yet possess any work on Indian antiquities, in which we have the great monuments of this people represented with such accuracy as we find in the best works on Egypt. Consequently it is impossible to discuss the character of ancient Hindoo architecture, and to attempt a classification of it according to its epochs, with any chance of success. It is not merely pleasing views that are sufficient for this purpose. We want ground-plans, sections longitudinal and transverse, details of all the ornamental work, and accurate dimensions of the whole. It is true that we possess many fine views, which comprehend some of the details, and we are enabled by means of them to come much nearer some probable conclusions than we were thirty or forty years ago.

In Mr. Daniell's *Views in India* (vol. v. pl. 7) we have a beautiful drawing of the north front of the Elephanta cave, with its overhanging trees and shrubs. His eighth plate is that which we have just given. "The view is taken near the centre of the temple looking westward. The space between four of the pillars is formed into a small temple, sacred to Mahadiva (Siva), and has an entrance on each side, guarded by colossal figures." The position of this small temple is marked in Mr. Daw's plan which we have referred to above. "On the walls are several groups of figures in basso-relievo, evidently relating to the Hindoo mythology; many of them are of co-

lossal dimensions and well executed. To the east and west are small apartments, decorated also in the same manner. This excavation is considerably elevated above the sea; the floor, nevertheless, is generally covered with water during the monsoon season; the rain being then driven in by the wind; a circumstance to which possibly its present state of decay is chiefly owing.'

Larger* excavations of this kind are found in the neighbouring island of Salsette, where there is a Buddha temple cut in the rock, with an arched roof, supported by two rows of octangular pillars, with capitals of elephant-caryatides†: horses and human figures are in some instances also represented on the capitals. The pillars, including the base and capitals, are about 14 feet high. Many of the pillars are evidently unfinished. At the extremity of the excavation is a cylindrical mass of stone, surmounted by a cupola-formed top, all cut out of the solid mass. This stone is 23 feet high and 49 in circumference, and supposed to cover the remains of Buddha. But these are far surpassed by the temples of Ellora, which are in the province of Hyderabad, about twenty miles north-west from Aurungabad the capital, and 239 east of Bombay. It may be considered as near the centre of India. Here we have a granite mountain, which is of an amphitheatre-form, completely chiselled out from top to bottom, and filled with innumerable temples; the god Siva alone having, it is said, about twenty appropriated to himself. To describe the numerous galleries and rows of pillars which support various chambers lying one above another, the steps, porticos, and bridges of rock over canals, also hewn out of the solid rock, would be impossible; and we recommend those who have

* See Salt's account, *Transac. Bombay Lit. Soc.* vol. i.

† See Daniell's *Views*, vol. v. pl. 12.

the opportunity to look at Daniell's designs*, which, incomplete as they are, and on too small a scale, will serve to give some idea of this wonderful place. The chief temple of the mountain is called Kailasa†, which is entered under a balcony, after which we come to an ante-chamber 138 feet wide and 88 long, with many rows of pillars and adjoining chambers, which may have been apartments for pilgrims, or the dwellings of the priests. From ‡ this chamber we pass through a great portico, and over a bridge, into a huge chamber 247 feet long and 150 broad, in the middle of which the chief temple stands of one mass of rock. This temple itself measures 103 feet long and 56 wide; but its height is most surprising, for it rises to above 100 feet in a pyramidal form. It is hollowed out to the height of 17 feet, and supported by four rows of pillars, with colossal elephants, which seem to bear the monstrous mass, and to give life and animation to the whole. From the roof of this monolith temple, which has a gallery of rock around it, bridges lead to other side arches, which have not yet been explored. This pyramidal building is covered with sculptures. "Upon the whole," says Sir C. Malet, "this temple has the appearance of a magnificent fabric, the pyramidal parts of which seem to me to be exactly in the same style as that of the modern Hindoo temples."

The rock-cut temples of India are generally supposed to be of higher antiquity than pagodas§ or temples, built on the surface of the earth; but these

* Drawings by Wales, under the direction of Thomas Daniell. There is also a set of ground-plans.

† See ground-plan by Malet, *Asiatic Researches*, vol. vi. and Daniell's plan.

‡ Böhlen, ii. 80. See Seely, *Wonders of Ellora*.

§ The word pagoda is a corruption of *Bhagavati*, "holy house," one of the several names by which the Hindoo temples are known.

perhaps exceed, in their dimensions and the finish of the several parts, even the most wonderful specimens of Egyptian art. The most common form of the Hindoo pagodas is the pyramidal, of which one of the most remarkable is that of Chalembaram, on the Coromandel coast, about thirty-four geographical miles south of Pondicherry, and seven from the sea.

“The whole temple* with its attached buildings covers an area of 1332 feet by 936, (according to others 1230 feet by 960,) and is surrounded with a brick wall † 30 feet high and 7 thick, round which there is another wall furnished with bastions. The four entrances are under as many pyramids, which, up to the top of the portal, 30 feet in height, are formed of free-stone, ornamented with sculptured figures. Above the portal, the pyramid is built of tiles or bricks, to the height of 150 feet, with a coat of cement upon it, which is covered with plates of copper, and ornaments of baked clay. On passing through the chief portico of the western propylæa, we see on the left an enormous hall with more than 1000 pillars, which are above 36 feet high, and covered over with slabs of stone; this hall might have served as a gallery for the priests to walk about in, just like the hypostyle halls of the Egyptian temples. In the midst of these columns, and surrounded by them, is a temple called that of eternity. On the right or south side, we see the chief temple, with halls of several hundred pillars at the east and west end, also supporting a flat roof of stone. The pagoda itself rests on a basis 360 feet long and 260 broad, and rises to a surprising height. It is formed of blocks of stone 40 feet long, 4 feet wide, and 5 thick, which

* Böhlen, ii. 84.

† The outer wall is brick cased with stone; the inner is all of stone. The four sides are turned respectively to the four cardinal points.—Heeren, India, p. 74.

must have been brought about 200* miles, as there are no stone quarries in the neighbourhood. The temple has a peristyle round it; and thirty-six of the pillars, which are placed in six rows, and form the portico, support a roof of smooth blocks. The columns are 30 feet high, and resemble the old Ionic pillar. The whole pyramid surpasses in size St. Paul's church in London, the latter being only 474 † feet long and 207 wide. The roof of the pyramid has a copper casing covered with reliefs referring to mythical subjects; the gilding which was once on it is still visible. In the middle of the court-yard there is a great tank, surrounded with a gallery of pillars and also an enclosure round it of marble, well polished and ornamented with sculptures and arabesques. In the eastern part there is still another court surrounded with a wall, on the inside of which is a colonnade covered with large slabs of stone. Here also there is a pagoda, which is but little inferior in size to the larger one; but it contains only large dark chambers covered with sculptures, which have reference to the worship of certain deities, particularly Vishnu. The interior ornaments are in harmony with the whole; from the nave of one of the pyramids there hang, on the tops of four buttresses, festoons of chains, in length altogether 548 feet, made of stone. Each garland, consisting of twenty links, is made of one piece of stone 60 feet long; the links themselves are monstrous rings 32 inches in circumference, and polished as smooth as glass. One chain is broken, and hangs down from the pillar. In the neighbourhood of the pagodas there are usually tanks and basins lined with cement, or buildings attached for the purpose of lodging pilgrims who come from a distance.

* 50 meilen.

† These dimensions are not exact, even making allowance for Berlin feet.

It is, however, often the case that the adjoining buildings, as well as the external ornaments in general, are in bad taste, and the work of a later age than the pagoda itself."

Some of the most striking points of resemblance between a Hindoo and an Egyptian temple may be deduced from a comparison of this description with what we have said about the sacred buildings of Egypt. The pyramidal entrances of the Indian pagodas* are analogous to the Egyptian propyla, while the large pillared rooms which support a flat roof of stone, are found frequently in the temples of both countries. Among the numerous divisions of the excavations of Ellora there is an upper story of the *Dasavatāra*, or the temple of Vishnu's incarnations, the roof of which is supported by sixty-four square based pillars, eight in each row. This chamber is about 100 feet wide, and somewhat deeper, and as to general design may be compared with the excavated chambers of Egypt, which are supported by square columns. The massy materials, the dark chambers, and the walls covered with highly wrought sculptures; and the tanks near the temples, with their enclosure of stone, and the steps for the pilgrims, are also equally characteristic of a pagoda and an Egyptian temple. To this we may add the high thick wall, of a rectangular form, carried all round the sacred spot: it is, however, principally the massy structure of these surrounding walls which forms the point of comparison, as Greek temples also had a wall enclosing the sacred ground, and the temples and churches of all countries are as a general rule separated from unhallowed ground, if not by strong walls, at least by some mark which determines the extent of the sacred precincts. Yet there is a further resemblance worth noticing between some of these Hindoo pagodas, and the great temple of Phtha

* See Daniell's View of Madura, in the Carnatic.

at Memphis. The Egyptian temple had four chief entrances, or propyla, turned to the four cardinal points of the compass; which is also the case with the pagoda of Chalembaram, with another at Siringam, and probably others also. The pagoda of Chalembaram, according to Indian tradition, is one of the oldest in their country, and this opinion is confirmed by the appearance of the principal temple contained within the walls; but other parts, such as the pyramidal entrances, the highly finished sculptures, and the chain festoons, must be the work of a later date. It seems probable then that this enormous religious edifice was the growth of many ages, each adding something to enlarge and perfect the work of former days.

It is rather hazardous to point out minor resemblances between Egyptian and Hindoo buildings, when the latter are so imperfectly represented. But one of Daniell's views (v. 21) has a Hindoo temple in the back ground, which has a very Egyptian appearance. It is near Mavalipuram. There are four pillars in front, the two extreme ones occupying the angles, and having behind them, in a right angle with the first row, three other pillars (one may be a pilaster). Thus the front row and the side rows form a portico, which is covered over with flat stones, exactly in the Egyptian fashion. In the centre of the wall, at the back part of the portico, there appears to be a door.

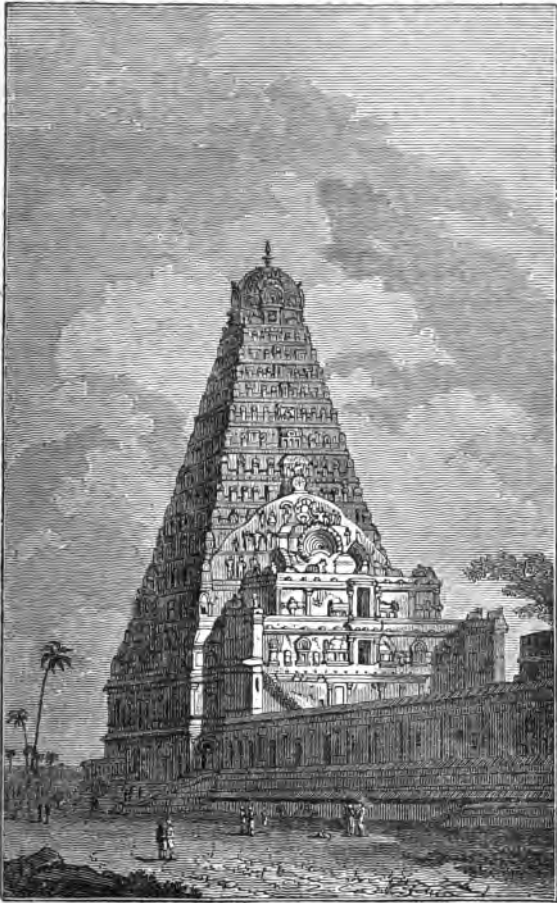
Among the oldest pagodas are those of Devagiri (God's mountain), otherwise called Dowlutabad, in the neighbourhood of Ellora. There are three of a pyramidal form, without sculptures, and each surmounted by Siva's trident. But one of the finest specimens in India is the *Great Pagoda at Tanjore, (Vol. ii. No. 24, in Daniell's Drawings,) which is de-

* From the description accompanying the plates.

dicated to the god Siva. It is considered the most magnificent in the Tanjore dominions, and indeed is the finest specimen of the pyramidal temple in all India. It is resorted to by vast multitudes on days of public festival. Although this building is of a form that occurs frequently in the Deccan (the southern part of the peninsula), it differs materially both with regard to the style of its external decoration, and the form of its termination at the top. It is about 200 feet in height, and stands within an area enclosed by high walls, the top of which, along their whole extent, is decorated in the usual manner, with bulls sacred to the divinity, to whose service the temple is devoted. The interior contains a chamber or hall that has no light except from lamps. It is unfortunate that we do not yet possess drawings of the Hindoo buildings, accompanied by plans of such a character, that their accuracy should be above all question. Daniell's view, though very beautiful, differs considerably from that by Hodges, in Maurice's Hindoostan, and possibly may have received some little embellishments*. The striking resemblance between the main part of the Tanjore pagoda and the form of a pyramid has led to various conjectures, and to a comparison between it and the tower of Belus at Babylon. When we come to treat of the pyramids of Egypt we shall discuss more fully the various buildings of this class that are found in different parts of the globe.

Buildings of this shape are found also on the small island of Ramisseram, between Ceylon and the continent of India. The chief pagoda here has the form of a truncated pyramid, and reminds the spectator of the similarly constructed propyla of Egypt. The outer side of this pagoda has been painted red, a practice, it should be remarked, common to the Egyptians

* Valentia, i. 356.



Tanjore.

and Hindoos, both of whom also were in the habit of plastering the walls on which reliefs were to be executed.

But later discoveries have made known to us buildings, in the interior even of Java, possessing the same characteristics as some of the Hindoo temples. " * The interior of the island, particularly the south east part, is rich in monuments of Indian architecture and sculpture, which not only prove that these arts were once diffused here, but were raised to a height of perfection scarcely known on the continent. All these monuments belong to the class of constructed buildings: excavated temples are not found, so far as we yet know. The largest edifices are at Branbanan, very near the centre of the island. Five parallelograms, each larger one including the next smaller, contain no less than two hundred and ninety-six little temples or chapels. The principal temple has the pyramidal form, and before its entrance there are statues of colossal size like watchmen. The whole was without doubt dedicated to the Brahmanical worship, and reminds us, in its plan, of the pagodas of Siringam, with their sevenfold enclosure. Whether there are any certain traces of Buddha † worship in Java, particularly at Boro-Bodo, is still doubtful." This sevenfold enclosure reminds us also of the seven enclosures of Ecbatana, described by Herodotus. There does not, however, appear to be any resemblance between the pillars of an Egyptian and a Hindoo temple, which are among the most characteristic marks of the former, and cannot readily be confounded with those of any other country. As far as we can judge from Daniell's sketches, the pillars of a Hindoo temple are generally angular, and the

* Heeren, India, p. 79.

† See J. Crawford's account of the ruins of Boro-Bodor, or Boro-Bodo, Bombay Lit. Trans. vol. ii.

capitals seem hardly referable to any general forms, or to admit of complete classification.

Among the works of art and unwearied labour to which the religious system of the Egyptians gave rise, we must not omit to mention monolith temples. A monolith temple properly means a temple with a single chamber in it, cut out of one piece of rock. In this sense the temple of Ipsambul, had it only a single apartment, might be called a monolith temple, as well as the great chapel at Ellora, which we have already spoken of in our short notice of those wonderful Indian excavations. But the Egyptian temples, properly called monoliths, were chambers generally of moderate dimensions, cut in a mass of rock, which was then transported from the quarry to the precincts, or into the interior of some temple. The smaller monoliths were placed in the sanctuary. It is not then so much the magnitude of most Egyptian monolith temples which causes our surprise, as the immense labour of removing masses so large from the quarries of Syene, as far as the Delta. The following description of the monolith of Amasis, will best explain what the term properly means.

“Amasis* brought a monolith from Elephantine, in the conveyance of which he employed two thousand men, boatmen of the Nile, for the space of three full years. The length of this monolith, measured along the roof, on the outside, is $31\frac{1}{2}$ feet (Greek), the breadth 21, and the height 12. The length of the chamber in the interior is $28\frac{1}{4}$ feet, the breadth 18, and the height $7\frac{1}{2}$. The monolith lies near the entrance of the sacred place, for it was never actually taken into it, owing, as they say, to the following reason:—The architect one day, as they were moving the thing along, uttered a deep groan; for he was wearied with the length of time which he had

* Herod. ii. 175.

been employed at this work. Amasis, they say, being induced by this to reflect a little on the matter, would not let them move the mass any further. But there is another story about it to this effect; that one of the men who helped to manage the levers and rollers was crushed by the monolith, and that this was the cause of its not being conveyed any further." The solid contents of this monolith, supposing the exterior and interior sides to be vertical, would be* about $4124\frac{1}{2}$ cubical feet, deducting from the whole solid contents, the mass of the excavated part. The weight then would be about 682,150 avoirdupois pounds, or 304 tons 10cwt. 2qrs. 14lbs., estimating the specific gravity of red Egyptian granite at 2.654, that of water being unity. This was a considerable mass to carry about six hundred miles, though it is inferior in weight to the larger obelisks.

The great Indian monolith temples were cut out of the solid rock on the spot, and left to stand in their original position. † On the Coromandel coast, about twenty-five geographical miles from Madras, is Mavalipuram, or more correctly Mahâbalipuram, the city of the great Bali, which contains seven monolith pagodas, of which only one at present is on dry land, the other six being visible at low water, rising up like rocks, and extending a considerable way into the sea. "Every building of this enormous town, whose remains are spread about the valley to the extent of

* We have assumed the Greek foot as equal to the English, our object being merely to give the reader an approximate idea of the magnitude of this monolith.

† Böhlen, vol. ii. p. 81. In an appendix he refers to the Asiatic Trans. vol. ii. p. 258, where it appears from the latest examination of this coast, that the fact of the sea having destroyed any pagodas is denied. The tradition of the great Bali is said to refer rather to a place on the Malabar coast. The real name of these remains on the Coromandel coast, is said to be *Mahâmalaipuram*, or the city of the great mountain.—See Lord Valentia, vol. i. p. 380.

twelve miles, was hewn out of the rock, and then the interior of each was chiselled out; occasionally a block of stone was put in to make up for any defect. A whole mountain in fact was cut up to make temples, palaces, and houses; and single masses of rock were formed into groupes of animals and mythological figures, mostly referring to the worship of Siva, but occasionally also to Vishnu and his Avatars (incarnations). The completion of the principal temple seems to have been stopped by some physical cause, for a great rent passes from the top of it right down to the ground. Perhaps an earthquake may have brought in the sea, and destroyed this city of giants."

Vol. v. plate 1, of Daniell's Views, contains a view of the sculptured rocks at Mavalipuram. "This view is a representation of several rocks which have been wrought by the Hindoos into curious architectural forms on the outside, and in the lower part excavated for the purpose of religious worship. These rocks are of very hard coarse granite; nevertheless the ornamental parts appear to have been executed with a considerable degree of skill, which is very evident on the western side, being there sheltered from the corroding effect of the sea air. A lion and an elephant appear in the centre; the former is much larger than nature, but of inferior art to some others in the neighbourhood: the latter is about the natural size; it is well designed, and the character of the animal strongly expressed." Unfortunately we have only two plates of these curious remains: pl. 2 is the entrance of an excavated Hindoo temple at Mavalipuram. "This rock, like the former, is of coarse granite; the excavation consists of one large apartment, of an oblong form, having a small temple attached to the side opposite the entrance. The roof

* Daniell.

is supported on the sides and front by a double range of columns, all curiously, and not inelegantly, formed of the natural rock. Those on the outside are composed of a lion, sitting on a double plinth, forming the lower part of the shaft, which rising octagonally and tapering, terminates in a capital, consisting of three men on horseback supporting the cornice, above which are small ornamental temples in basso-relievo." To the right of this rock-cut temple the rocks are sculptured with figures of men and animals, such as elephants, lions, some in repose, but most of them in motion. Some of these figures are said to be well executed; but we must wait for a Gau to visit them, before we shall be able to form any just estimate of them from drawings.

It is conjectured that these colossal remains of Mahabalipuram, which are undoubtedly of high antiquity, and could only be accomplished in a long series of ages, may be the site of a trading town, which Ptolemy speaks of in his seventh book, under the name of Maliarpha.

None of the very largest specimens of Egyptian monolith temples are now found, having most probably been destroyed by the barbarians who have occupied Egypt since it ceased to belong to the eastern empire. But a specimen of considerable dimensions still remains where we should perhaps least expect to find one, at a place in the Delta, called Tel et Tmai, or the hill of Tmai, the antient Thmouis. This was never a city of any great importance, though we find the Nome of which it was the capital, mentioned by Herodotus* as one of the military divisions of lower Egypt. In Mr. Burton's *Excerpta Hieroglyphica* we have a drawing of this interesting relic of antiquity, which, on the whole, agrees very well with the description and drawing in Lord Valentia's book †, who,

* II. 166.

† Lord Valentia, iii. 430.

we believe, was the first traveller to notice it. The material is a red granite highly polished, 23 feet 4 inches high, 12 feet 8 inches broad in the front, and 11 feet 3 inches deep on the outside. According to Mr. Burton's drawing, which presents a full front view, the face of the monolith is strictly rectangular, as well as the doorway or chamber excavated in it, except that the upper part of the doorway is cut into the form of an arch. Lord Valentia's, which is a half-side view, shows that the whole chamber has its interior roof cut out into a curve. The chamber is described as being 8 feet 8 inches broad and 9 feet 2 inches deep. The whole stands on a pedestal of the same material, about $6\frac{1}{2}$ feet high, (according to Mr. Burton's drawing—supposing Lord Valentia's dimensions of the upper part to be exact,) which again rests on two layers of stones one above the other, and, together, a foot or two higher than the granite block above them. Another layer of stones appears from the drawing to be under the two just mentioned; all together, probably, forming part of the steps which, we may presume, once led to the doorway. Lord Valentia makes the whole height, including pedestal and the two layers, 34 feet 7 inches, which does not agree with Mr. Burton's proportions of the lower parts. There is a large crack behind running down the back, one also on each side, and apparently another in the front over the arch of the doorway. This may have been caused by the earthquakes which have occasionally visited the Delta; and which, at one visitation, threw down an obelisk at Heliopolis according to the testimony of Abd-allatif. The top of the monolith is not flat, but elevated to a point in the centre, as Lord Valentia and his fellow-travellers found when viewing it at a distance. This pyramidal top is also represented in Mr. Burton's drawing, and its height, ac-

According to the French, is about $11\frac{7}{10}$ inches. An elevation of this monolith is given in the *Egypte* (v. pl. 29), according to which the whole height, including the supports, is 36 English feet, and the height of the monolith itself, 23 feet $6\frac{1}{2}$ inches.

In both drawings (Lord Valentia's and Mr. Burton's) there appears a kind of bar attached to the back of the chamber, and rather more than half way up it, running across in a horizontal direction; this is probably a part of the material that has been left, either to strengthen the monolith or for some other purpose, which we cannot conjecture. The front has had a border of hieroglyphics round it, part of which Mr. Burton has been able to give in his drawing, though it is said, in the short description accompanying the French plate, that "they are very much effaced, and for that reason could not be copied." There is nothing peculiar in their form. Over the lintel there is one cartouche, consisting of three figures, which are—a disk of the sun, a water pitcher with a handle of the usual form, and another water pitcher without a handle, but with two straight projections on the upper part of it, which might serve to hold it by. We have not hitherto been able to find this cartouche any where else except on a tablet in the Cosseir road, of which Mr. Burton has also given an exceedingly clear and distinct drawing—somewhat different in its execution from the clumsy and almost unintelligible hieroglyphic forms in the last edition of Champollion's *Précis*.

The monolith of Tel et Tmai stands in a kind of enclosure, which has once had a wall. Blocks of various forms are seen around it in the drawing, some of which may possibly belong to two similar monoliths which it is conjectured were placed on each side of it. In an adjoining enclosed area there are large blocks of granite, one of which bears the figure of a

ram with four horns. “*Two, which were visible, were long and twisted, diverging horizontally from the top of the forehead: a third was shorter, a little curved, perfectly smooth, and lying close to the face; the fourth was concealed.” The same head with a double set of horns is found among the sculptures of Carnak, and is one of the forms under which Ammon is represented.

It will be seen, by comparing the dimensions of the Thmouis monolith with that of Amasis, that the proportions of the two were very different; the longest line in that of Amasis being the horizontal depth of the stone, and in that of Thmouis the vertical height. The latter agrees in its form and proportions much more nearly with the small monolith which Denon found in the great temple of Philæ.—(See pl. 41.)

A monolith temple, like that of Amasis, was as valuable as a small stone quarry, and that such remains were used by the Arabs for building purposes, we may learn from the following account of Abdallatif, and Makrizi, another Arab writer:—

“† The most marvellous thing in the ruins of Memphis is the *green chamber*. It is made of a single stone 9 cubits high, 8 long, and 7 broad. In the middle of this stone a niche or hole is hollowed out, which leaves two cubits of thickness for the sides, as well as for the top and bottom. All the rest forms the interior capacity of the chamber. It is quite covered both outside and inside with sculptures *en creux* (intaglios) and in relief. On the outside is the figure of the sun in the east, and a great number of stars, spheres, men, and animals. The men are represented in different attitudes, some stationary, others moving; some have their dresses tucked up to allow them to work, others carry materials, and lastly, we see some giving orders. It is evident that

* Lord Valentia.

† De Sacy, transl. p. 186.

these representations refer to important things, remarkable actions, and represent under emblems very profound secrets. It is also clear, that all this has not been done for mere amusement, and that such efforts of art have not had ornament only for their object. This niche was firmly fixed on supports of massy granite, and placed in a magnificent temple constructed of enormous stones put together with the most perfect art."

Another Arab writer speaks of seeing this monolith in the palace of the Pharaoh who was *contemporary with Moses*: he describes it as being as green as myrtle, with stars and celestial spheres upon it.

Makrizi, speaking of the same monolith, adds some other curious particulars. "There was at Memphis a house (chamber) of that hard granite, which iron cannot cut. It was formed of a single stone, and on it there was sculpture and writing. On the front, over the entrance, there were figures of serpents presenting their breasts. This stone was of such a weight, that several thousand men together could not move it. The Emir Seïf-eddin Scheïkhou Omari *broke* this green chamber about the year 750 of the Hegira (A. D. 1349), and you may see pieces of it in the convent which he founded, and in the *jamy* (mosque) which he caused to be built in the quarter of the Sabæans outside of Cairo."

It is evident that Makrizi, when he speaks of the serpents, is describing the winged globe over the doorway. This monolith was probably made of a species of green granite, which is sometimes confounded with green porphyry.

M. Denon found two monoliths of small dimensions in the island of Philæ, both of them in the great temple, and placed respectively at the extremity of two adjoining sanctuaries. (See pl. 41.) The dimensions of one of them are 6 feet 9 inches in

height*, 2 feet 8 inches wide, and 2 feet 5 inches deep. The material is granite. Three winged globes, one above another, decorate the architrave of the doorway; the frieze and cornice are ornamented with a series of serpents erect; the holes in which the hinges of the door were fastened are still visible, from which we may conclude with Denon, that these monoliths, sometimes at least, were made to hold something, either the sacred utensils or some sacred animal. And this notion is certainly confirmed by the representations given by Denon, (pl. 125,) taken from the linen of a mummy, in one of which we see the bird itself in its monolith chamber, and a grating attached to the doorway. Several other sketches of the monolith chambers are given, all tending to show that, occasionally at least, such was the use to which these little temples were appropriated.

Mr. Hamilton † found at Gau Kebir, at the furthest extremity of the temple, a monolith chamber of the same character as those which Denon describes. It had a pyramidal top, and measured 12 feet in height and 9 in width at the base. Within were sculptured hawks and foxes, with priests presenting offerings to them, and the same ornaments on the doorway as are seen on the entrances to the great temples. Mr. Hamilton conjectures that this monolith was intended to hold some sacred animal. Its form (the pyramidal top) may be compared with that in the Kailasa at Ellora.

All the specimens of art of this description are insignificant when compared with the great monolith of Amasis already described, or with another half-kind of monolith which Herodotus (ii. 155) saw within the *temenos* (sacred enclosure) of Buto in the Delta. This latter had its four perpendicular sides formed of a single stone. Each side was of equal di-

* French measure.

† p. 267.

mensions, 60 feet in length and 60 in height. The roof was formed of another single stone which covered the whole, and projected six feet beyond the edge of the vertical walls. This monolith would present a face as large as would be formed by three adjoining houses, each of 20 feet frontage, and raised to the height of 60 feet, which is considerably above the ordinary elevation of three-story houses. The stone that covered the roof was 72 feet square, which would give an area of 5184 square feet, a space nearly equal to half the area of St. Martin's church. Enormous as these dimensions may seem, we may almost believe that Herodotus has not exaggerated them when we look on the two great colossi seated on the plain of Thebes.

Before we leave the subject of monoliths, it will be worth while to notice a curious resemblance between a piece of Egyptian antiquity and the immoveable rock-cut monoliths of Mahabalipuram. At El Modn, a place on the east bank of the Nile (latitude $28^{\circ} 50'$), Mr. Hamilton discovered within an enclosure 70 feet square, an insulated rock apparently excavated into the form of an Egyptian temple, with outer and inner doorways resembling those of a regular temple, surmounted by the globe and serpents. Mr. Hamilton remarks that this is the only instance that he had seen in Egypt of a rock excavated for religious worship. In Nubia temples excavated in the mountain rock are not uncommon, but the fact of this at Modn standing *alone*, gives it a striking resemblance to the Hindoo pagodas already described.

If we possessed complete and accurate drawings of all the great Hindoo monuments, we might possibly succeed in classifying them according to their age and character; but, in the absence of such aids, we cannot go further than to make some probable conjectures, which will not be without their use in reference

to the architecture of Egypt. The following remarks are partly suggested by what Heeren* has said on the subject of Hindoo architecture; and though we do not always assent to all his opinions, it is not easy to name a writer who is in general so judicious and well informed about his subject.

Indian architecture, we mean that of their constructed buildings, has undoubtedly its original type in the pyramidal form; but this has no connection with excavated temples, and must have an entirely different origin. Heeren remarks that the pyramidal form of architecture is that which prevails in India properly so called, on this side of the Ganges; while in Ava and Pegu, the edifices seem to follow the type of tents, which would indicate that the original form was introduced there by a Nomadic people. The notion of a pyramidal-formed building (the simplest shape of which is nothing more than a building with sloping sides) would be derived from the appearance of a hill, and would be first put into practice by an attempt to raise mounds of earth, which, from the nature of their material, would result in sloping sides. It would soon be evident in the infancy of architecture, that to raise a building to any great height, it would be most convenient to diminish the horizontal section, as the height increased. To preserve the form of steps also round it, would be convenient both for the construction of the edifice and for the ascent to the top, where we can have no doubt that religious rites were performed. Again, the direction of the four sides to the four points of the compass, is an indication that astronomical knowledge was beginning to be acquired when one of its essential elements was incorporated into the structure of a religious edifice.

The pyramidal† pagodas of India show a progress in building from the rudest unornamented forms of

* India, p. 64, &c.

† Heeren, p. 66, 67.

the simple pyramid to the lighter construction of the upper parts and the decoration of the whole exterior with sculpture; finally, they seem to have terminated in mere propyla or gateways conducting to the sacred places. Then the whole was surrounded with a wall double, or even sevenfold, within which were built all the necessary apartments; such as great chambers, with flat roofs supported by pillars after the Egyptian fashion; buildings for the sacred animals represented in a colossal form; other chambers containing all the sacred apparel for processions and ceremonies; tanks for the pilgrims and the priests to bathe in, &c. Thus these buildings show a kind of progress resembling that which we believe to be self-evident from the very inspection of some existing Egyptian temples—in both cases the sanctuary at first stood single, and was of moderate dimensions, till the devotion of kings or wealthy persons, encouraged by the zeal of the priests, raised around it numerous structures far larger and more splendid than the original temple. If we compare the old rude pagoda of Conjeveram (near Seringapatam) with the lighter structure of Tanjore, we cannot fail to see that the former belongs to an earlier and more primitive type. It is described by Lord Valentia as “of rude massive sculpture, and built in the same style of architecture as one of the temples carved out of the rocks at the seven pagodas. At the entrance were four monstrous lions and a bull of clay, evidently modern. The pagoda itself is pyramidal, ending in a sort of dome at top.” It seems not improbable, as we have already remarked from Gau, that the façade of Ipsambul is the type of the propyla of Luxor; for not only does the inclination of the boundary-lines on each side of the front show the pyramidal structure, but the whole face also of the rock, a hewn temple, slopes downwards like one of the four sides of a pyramid, This is also

the case in the propyla of Edfou and others, the horizontal section at the top being considerably less in both dimensions, than that at the base. From this it would follow that the pyramidal form of building must have existed before the temple of Ipsambul was hewn out of the rock, and this is an inference that will be rendered more probable when we come to examine the character of the Nubian edifices. At present we need say no more on this subject, except (for the sake of obviating any misconception as to our meaning) that we do not suppose the great pyramids at Jizeh to be the oldest buildings in Egypt as some writers have done, principally arguing from the supposed absence of hieroglyphics on those enormous structures.

It is generally imagined, and we have partly acquiesced in the opinion, that the origin of Egyptian architecture is to be sought for in excavations of the solid rock. This is of all opinions the most probable, but it involves another opinion also, which is perhaps equally well founded, that the most antient monuments of Nubia are the genuine produce of that country, and are not derived from any other, certainly not from those of India. For whatever *resemblances* we may have pointed out between the forms of Hindoo and Egyptian art, are by no means intended to lead to the conclusion, that either nation borrowed from the other. We believe that Egyptian architecture had its origin in two types which were combined—the pyramidal form and the excavation in the rock. And these rock excavations undoubtedly received new decorations in the course of time, so that the most splendid among them, such as Ipsambul, may be, and probably are, in some of the details, posterior even to some existing temples. As to Indian architecture, as far as we know it from plates already published, there appears to us no evidence at all that its origin is to be

sought for in rock excavations; but it appears more probable that these excavations were made after the art of building was known and practised with success.

An examination of the view which we have given of part of the interior of Elephanta, will show that it is an imitation of a constructed building. Here we see a regular column, with that form of plinth or block on the top, which is so common in Hindoo buildings: we observe the architrave passing from the top of one pillar to the top of another; and, in fact, as complete an imitation of a Hindoo roof as can possibly be made. No one, we think, will argue that the original cave was first cut rudely in the rock with mere square pillars, which were afterwards fashioned into a form to imitate the roof of constructed edifices. This indeed, if admitted, would only prove that the pillars and roof, in their complete form, were first used in edifices *above* ground, and then applied as a decoration to those previously cut out of the solid rock. But the fact of the interior of Elephanta, as it now is, being posterior to regularly-constructed buildings, is undeniable. It would be just as reasonable to look for the origin of Grecian architecture in the catacombs of Alexandria*, as for that of India in the caves of Elephanta.

The construction of the roof in the interior of a temple near Muddunpore (eighty miles S. W. from Patna) is exactly the same as we have described in an Egyptian temple. The pillars (see Daniell's View, vol. v. pl. 16) seem to be octangular in the lower part; the middle part of the shaft is fourteen or sixteen—angular; and the upper part cylindrical,

* See the view of these catacombs, by Luigi Mayer, in 'Views in Egypt,' from the original drawings in the possession of Sir Robert Ainslie. London, 1804. This volume contains a few good drawings, accompanied by the usual quantity of worthless letter-press.

crowned with a cylindrical capital of larger diameter than the shaft of the pillar. On the top of this capital there rests a block, cut into four sloping and projecting scroll-like faces, exactly like those above the capitals in the pillars of Elephanta. Long beams of stone pass from the top of one pillar to that of the nearest in the same row, both transversely and longitudinally, so that the ends of four architraves rest on the four members composing the top of each pillar. This strong frame-work is covered with flat slabs of stone. The four members which we have just spoken of seem to form an important part of a Hindoo pillar; and in some cases, as at Bangalore (N. lat. 13° , E. lon. $77\frac{1}{2}$), to occupy the place of a capital.

There is no difference whatever between the principle on which the roof at Muddunpore is constructed, and that of Elephanta, which is cut out of the rock: the latter is the copy of the former. This pillar of Elephanta, of which a pretty distinct idea may be obtained from the nearest one in the foreground of our view, occurs also in the excavations of the neighbouring island of Salsette, and in the caves of Ellora.

Heeren remarks, that the shape of the pyramid necessarily excludes the notion of the arch, though the form of the latter was well known to the Hindoos, of which we have an example in the large excavation of Salsette. Several Hindoo buildings, also, are of a cupola-shape, which would hardly be used among a people where the principle on which an arch is constructed was unknown. But as we are unacquainted with the antiquity of the structures to which we allude, and have no means of forming any opinion about them except from a mere drawing intended for picturesque effect, it is quite impossible to come to any safe conclusion.

It is a strong argument against the Hindoos knowing anything of the construction of the arch,

that they did not employ it for bridges, where its convenience recommends it in preference to any other form. In Lord Valentia's Travels (vol. i. p. 442) we have a view of the remains of an antient bridge over the Cavery, at Sivasamudra. It is formed of large columns of dark granite, each about 2 feet in diameter and 20 long, set upright, like the posts of a door, and joined at the top by another beam corresponding to the lintel. When the bridge was used, we suppose planks were laid from one cross-beam to the next, after the manner of the bridge at Babylon, which Herodotus describes.

The exquisite polish that we observe on most of the Egyptian figures in the Museum, and also on the large granite block brought from Thebes by Belzoni (commonly called an altar), is the more surprising when we consider the excessive hardness of the material. The finger, as it moves along the face of the colossus opposite to the Memnon, cannot detect the slightest roughness, nor indeed the least irregularity in the surface, except what is unavoidable from the compound nature of the material (granite) of which the statue is formed. But the walls, pillars, and other minor parts of the Hindoo temples, such as statues and figures of beasts, are wrought to a fineness of polish which surpasses, if possible, that effected by the Egyptian masons and sculptors. The Hindoo, even at the present day, succeeds in giving to the hardest granite the polish and smoothness of the best-made glass. It would appear not unlikely that similar methods were in use among the antient Egyptians, whose tools were probably just as simple as those used in India up to the present time. As, then, we conceive that a knowledge of the slender means by which the Hindoo accomplished those enormous works which are scattered over the extensive peninsula of India, may tend to give us clearer con-

ceptions of the mode in which similar things were possibly effected in Egypt, we take the following account from a paper of Dr. Kennedy*.

The tools which the Hindoos use are a small steel chisel and an iron mallet. The chisel in length is not more than about twice the breadth of the hand of the Hindoo workman, which, as is well known, is very small; and it tapers to a round point, like a drawing-pencil. The mallet, also, is iron, a little longer than the chisel, but not weighing more than a few pounds. It has a head fixed on at right angles to the handle, with only one striking face, which is formed into a tolerably deep hollow, and lined with lead. "With such simple instruments," says Dr. Kennedy, "they formed, fashioned, and scarp'd the granite rock which forms the tremendous fortress of Dowlutabad, and excavated the wonderful caverns of Ellora; for it seems by no means probable that the Hindoo stone-cutters ever worked with any other tools." He adds, "that the traces of the pointed chisel are still visible on the rocks of Dowlutabad, as they are also on some of the great works of Egypt." With these two instruments only the stone is brought to a smooth surface; it is next dressed with water in the usual way, and finally it receives the black shining polish in the following manner:—

"A block of granite, of considerable size, is rudely fashioned into the shape of the end of a large pestle. The lower face of this is hollowed out into a cavity, and this is filled with a mass composed of pounded corundum-stone, mixed with melted bees-wax. This block is moved by means of two sticks, or pieces of bamboo, placed one on each side of its neck, and bound together by cords, twisted and tightened by sticks. The weight of the whole is such as two workmen can easily manage. They seat themselves upon, or close

* Edinburgh Phil. Transac. vol. iv. p. 349.

to, the stone they are to polish, and by moving the block backwards and forwards between them, the polish is given by the friction of the mass of wax and corundum." Dr. Kennedy adds, that granite thus finished is a common material for the tomb-stones of great men in India; and that the beauty of this glossy blackness is equal to that of fine marble, and the polish almost as durable as the stone itself.

Dr. Kennedy saw, in 1794, the only remaining gateway of four, in the city of Warankul. This gateway preserves its black polish, though it is at least five hundred years old, and may be much more.

It is the generally received opinion that neither the Hindoos nor the antient Egyptians were acquainted with the mode of constructing an arch. With respect to the Hindoos, we have already stated the difficulty of forming a satisfactory conclusion. Belzoni contends that the arch was known to the antient Egyptians, and that there is now at Thebes a genuine specimen, which establishes the truth of his assertion. The following extract will speak for itself. If Belzoni is right in asserting the antiquity of the brick walls of which he speaks, they decide in favour of his opinion about the arch.

"The mode of building enormously strong walls with unburnt bricks is peculiar to the Egyptians. Of this, I trust, there can be no doubt, from the many instances clearly before our eyes; but if it be questioned, I would inquire of any traveller who has seen Thebes, whether he thinks that the wall which surrounded the avenue of sphinxes or lion-headed statues, which I discovered at Carnak, could have been made by any other people. There are even some of these walls that enclose their sacred places; and if it be objected that some subsequent nation, who adored the same gods, may have erected these walls to preserve the holy edifices, I can boldly say, No; this was not the

fact; for the walls are so connected with the Egyptian works, that it is plain they were constructed at the same time with them. But what is still more to the point, at Gournon there are various and extensive tombs, excavated not in the rocks themselves, but in the plains at their foot, twelve or fourteen feet below the surface, and extending a considerable length under ground. The way to these tombs is generally by a staircase, which led into a large square hall cut in the rock, in some instances 90 or 100 feet long; and opposite the stairs is generally the entrance into the tomb. It is to be observed, that these halls entered into the original plan of the structure; there was nothing to protect or to enclose them on any side but a wall, by which they were completely covered. Without this, they would have been exposed to all the rubbish of other tombs, which might have fallen in. The necessity of building these walls is evident; and I have no doubt many travellers will plainly see, that no other succeeding nation would have built these enormous walls to preserve the tombs of the Egyptians. Now over the stairs which lead into the hall, there are some very high and majestic arches*, not only made of the same bricks, but connected with the walls themselves; consequently, made by the Egyptians and constructed with the same key-stones as our own at the present day. There is also at Gournou a great number of other buildings of sun-burnt bricks of a later date, which I hope will not be confounded with the others. Some of these are built with a smaller sort of bricks; others, with bricks taken from the Egyptian walls; but their construction plainly shows the difference of the people who executed them."

We think it is rather difficult to find any sufficient answer to the arguments of Belzoni; though it is

* See Belzoni's plates, No. 44.

singular that the Egyptians, if they were acquainted with the construction of the arch, did not employ it on their large buildings, and even for making bridges over the river. Whether they could have overcome all the difficulties of building arches of a wide span over a broad, deep river, annually subject to a great rise, we cannot undertake to decide; but surely they might and would have applied the arch, supposing its construction known, to some of the purposes of their religious and civil architecture.

It is a commonly received opinion, though we do not undertake to vouch for its accuracy, that the arch was not used by the Greeks till after the death of Alexander, or somewhere about that period. We find in Egypt antient* arches of stone, constructed not as ours are with a key-stone, but by placing the stones in horizontal layers in such positions and proportions that the parts which are over a gateway or entrance are in no danger of falling in; the upper and irregular stones of the doorway are then chiselled into a circular curve, which has all the appearance of an arch without really being one. Such is the construction of the curved chamber at Mycenæ, generally called the treasury of Atreus. The origin of this practice is probably to be looked for in the excavation of chambers in the solid rock, where it is so easy to give an arched roof to a chamber, as the mass of stone itself, if the apartment be small, is sufficiently adhesive to preserve the shape into which it is cut; or if the chamber should be of large dimensions, it can be supported by leaving pillars of stone. Most of the roofs in the excavations of Beni Hassan (Speos Artemidos) have been cut away into the form of an arch, which is also the case, as we have already remarked, in some of the rock-hewn temples of India. But the late discoveries in Ethiopia have brought

* See Belzoni, plate 44.

to light, arches regularly constructed with the key-stone, and M. Cailliaud has given a sketch of one in his forty-third plate. It consists of five stones, the centre block being the key-stone. This arch is found in the vaulted roof of a small building or portico in the Egyptian style, which is attached to one of the sides of the largest pyramid at Assour. There are other examples of this construction besides the one here mentioned. At Jebel Barkal Mr. Waddington observed an arched roof in a portico attached to a pyramid. The only question then is, the antiquity of these particular Nubian arches, for if we admit that the pyramids of Nubia together with their porticos are of higher antiquity than the pyramids of Egypt, it will be difficult to give any probable reason why the arch was not used by the Egyptians in the construction of their sacred edifices. But the examination of this question we defer till we treat of these pyramids.

CHAPTER X.

SPHINXES.

THERE are three of the exterior appendages of an Egyptian temple that require a particular notice, sphinxes, obelisks, and colossal statues. Obelisks and colossal statues, though not always exterior ornaments, seem from their magnitude and style to have been better suited for the decorations of the principal front than for any other place; and, in fact, they are generally found in such positions.

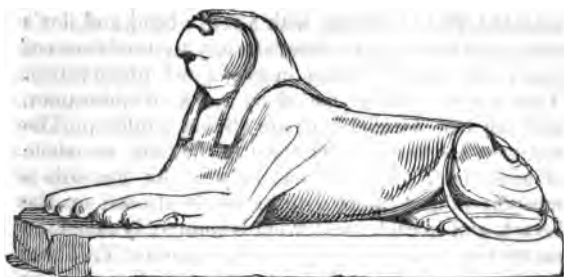
Sphinxes were most commonly used for the purpose of forming an avenue or approach to the great entrances, as we have remarked at Carnak. In Nubia also there exists, at the present day, part of such an avenue leading to the temple sometimes called Essaboua, or the Lion's Temple. The sphinxes, in this latter instance, have been placed conformably to Strabo's description in two parallel lines, thirty feet distant, and also in a line with the gate of the temple. At Essaboua there are also two colossal figures placed at the commencement of the two lines of sphinxes, one at the head of each.

What is commonly called a sphinx, is a figure compounded of an animal and a human form: it has the body and legs of a lion with a man's or woman's head. Some writers seem to be of opinion, that the proper Egyptian* sphinx has a man's head and is an andro-sphinx (man-sphinx), as Herodotus calls it when speaking of these works of art; and that the Greek notion of a sphinx is that of a lion with a

* Bohlen, *Das alte Indien*, ii, 205.

female head. But Mr. Hamilton remarks, that the andro-sphinx, which he partly excavated at San, was the only specimen of the kind which he met with in Egypt. We have already described a bearded sphinx on one of the Museum friezes. Belzoni found sphinxes with female heads near the temple of Edfou, which, however, may have been made after the Greeks occupied the country. But the great avenue that leads to the temple at Carnak, which is undoubtedly of high antiquity, is composed of sphinxes, some with the head of a female, and others with the head of a ram. We see then that there are various forms of sphinxes, and that both the andro-sphinx, or man-sphinx, and the sphinx with a female head, and with a ram's head, are found in Egypt. The figure of a sphinx is cut on each of the four faces of the obelisk of the Campus Martius, now called Campense di Monte Citorio, near the point of the obelisk. This figure has a female head, as we infer both from the absence of the beard and the expression of the countenance: and instead of the two fore-paws of the lion, we see two human arms and hands, one of which holds a kind of pyramid. It is curious that the hands are put in the wrong places; the right hand being placed on the left side, and the left hand on the right. The figure has an Egyptian head-dress, with the sacred serpent rising on the forehead. The engraving of this figure is given in the French edition of Winkelmann, of 1790, (vol. i. p. 76,) and was carefully copied from the obelisk while it was still lying on the ground. There are several specimens of small sphinxes in the Museum: one which has a hawk's head was brought by Belzoni from the interior of the temple of Ipsambul.

The Greek sphinx was often decorated with wings and represented sitting, or occasionally in action. Indeed when the artist had once become accustomed



No. 3.

to so monstrous a combination, we shall not be surprised at finding him indulge in other vagaries. In Winkelmann there is an engraving of a sphinx in terra cotta, which has a Greek face and a flowing beard, with two paws of a lion in front, and the two hind-legs borrowed most probably from a goat. Its tail has a number of elegant flourishes, two of which terminate in two different kinds of flowers. The figure, as usual, is in a couchant attitude.

Egyptian sphinxes vary very much in size, the specimens in the Museum being only a few feet in length, while the fore-legs alone of the great sphinx, which is near the pyramids of Jizeh, are at least 50 feet long. We shall describe the great sphinx when we speak of the pyramids. The sphinxes at Essaboua are andro-sphinxes, about 11 feet long, and 18 feet from one another in the line; the chin has the usual kind of straight beard attached to it. They also have on their heads a high cap, very much resembling that of the colossal figure in the Museum (No. 8) so often referred to, but not quite the same. The sacred serpent rises erect on their forehead, as on the front of the colossal statue just mentioned, and the long hair flows behind on the back, confined and arranged in the Egyptian style. In part of the great avenue leading from Luxor to Carnak a row of erio-

sphinxes, that is, figures with a ram's head and lion's body, still remain quite free from any accumulations of sand, and some of them in very good preservation. They are now partly shaded by a row of palm-trees, and the two parallel lines are 63 feet asunder. The sphinxes are only 12 feet apart in the line, are made of sandstone, and each has between its fore-legs a mummy-shaped figure with its hands crossed on the breast, and in each hand, what is commonly called the sacred *tau*, from its resemblance to the letter T. These sphinxes are, as usual, in an attitude of repose, as represented in the print just given, and have their heads turned towards the road. It seems probable that colossal sphinxes, as well as other large figures, were rough hewn in the quarry and finished after reaching their place of destination. Belzoni observed, in the quarries of Selseh, a sphinx with a ram's head like those at Carnak, standing between the rock from which it had been removed, and the Nile. It was only cut out in the rough; "and another like it is nearly cut out of the quarry*."

The number of sphinxes that once formed the avenues to the great buildings of Luxor and Carnak, is beyond all belief. The direction of these avenues is very clearly traced † by numerous remains of these colossal figures, some of which are almost entire, and a great many more are no doubt still buried under the accumulated rubbish. As we leave the great front of Luxor, which is on the north side, we pass along an avenue of sphinxes with female heads for the distance of 1,500 feet ‡. Here the avenue divides into two branches, nearly at right angles to one another. One branch, which is not quite in a line with the main avenue, leads up to a temple, which is called in the French plan, "the great temple of the south" It is

* Belzoni, p. 352. † Plan of Carnak, Antiq. vol. iii. pl. 16.

‡ This is the distance included in pl. 16, but it is not the whole distance.

lined on each side by a row of crio-sphinxes, with their fore-legs bent under them instead of being stretched out. These figures ought indeed to be called colossal rams, and not crio-sphinxes, for their attitude of repose is that of the sheep, and their legs, as well as head, are those of a ram. They are in fact the sacred rams of Ammon*. This temple, which we may call small, when compared with the enormous structure at a short distance from it, bears all the marks of antient simplicity; and yet it is partly built of the materials of a still more antient temple.

The second branch, the direction of which makes somewhat more than a right angle with the main avenue, is also lined with sphinxes having female heads, and runs for 600 feet in a straight line. Here again is a fresh change in its direction, there being a third branch nearly at right angles to the second, and consequently nearly parallel to the first branch, which we have described as running up to "the great temple of the south." This third branch is composed of crio-sphinxes, properly so called, and forms the approach to a large propylon, from which we pass to a second propylon, then to a third, and finally to a fourth, which brings us to the central parts of the enormous edifice of Carnak, which we have already described—leading us into it behind the hypostyle hall. Each of these propyla has had colossal figures in front.

We observe as we approach nearer to the temple of Carnak, that the proper sphinxes change their character for crio-sphinxes, which are a more appropriate emblem of the great deity Ammon. The principal entrance also (the western), as has been already mentioned, had an avenue of crio-sphinxes leading up to it from the river.

* We see the Ammonian ram represented with four heads on one body, *Egypte, Planches*, vol. ii. pl. 35, 36; and in one instance with wings also.

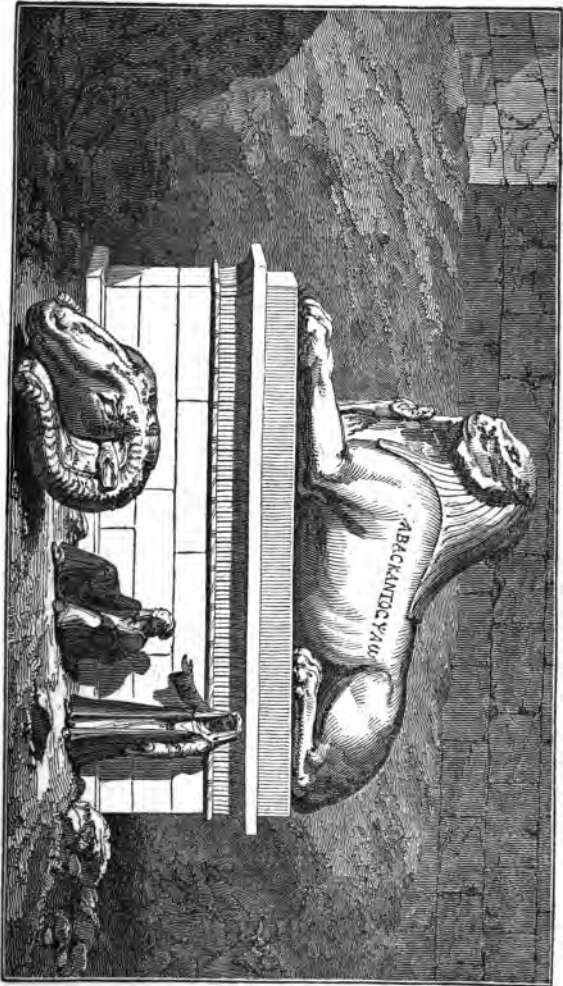
This is a drawing from the French work* of a sphinx procured by excavating in the line of this last mentioned avenue: it was found buried up to the top of the head, and at the distance of 196 feet from the front of the western propyla. In front of it, between the paws, is a standing figure, reaching almost to the animal's chin. The beard shows it to be a male; the hands are crossed on the breast, each holding the sacred tau, with a circular handle ("deux croix à anse:" *French descript.*) A longitudinal stripe runs down the middle of the figure in front, as far as the feet; and has on it hieroglyphics and a cartouche. The length of this sphinx is very nearly the same as that of the pedestal, being about 12 feet 7 inches. The height, from the top of the pedestal to the top of the restored head in the French drawing, measured along the figure between the paws, is 6 feet 2½ inches.

The head, which is represented as lying on the ground, is the colossal ram's head of the Museum; and is one of the objects collected by the French, which afterwards fell into the hands of the English; but that it does not belong to the colossus excavated by the French in front of the western propyla, will be clear from the following dimensions:—

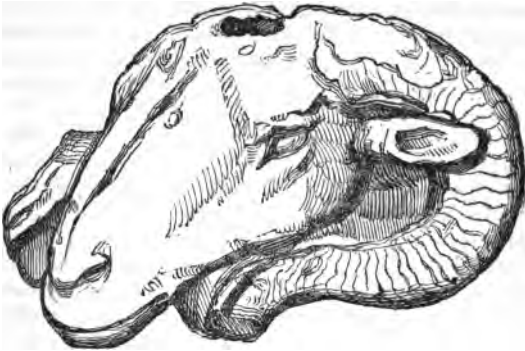
This colossal head is made of an exceedingly soft sandstone, of a dirty yellow colour. On the top of the head there is an irregular oblong hole, about 7½ inches long and 4 deep.

	ft, in.
The length of the face, measured from about the centre of this hole to the mouth, along the curve of the face, is	3 6
The length of the ear that is entire, or nearly so, is	1 0
The length of left horn, measured along its outer curve surface, about	4 11

* Vol. iii. pl. 29. See our print opposite.



Spho-sphinx.



Museum Head.—No. 9.

The tip of the horn is broken. The strict resemblance which this head presents to one of the specimens of the African sheep, and the mild and tranquil expression of the face, are very remarkable.

This head seems to have belonged to one of the colossal crio-sphinxes of that avenue, which we have called the third branch, and described as leading up to the four southern propyla of the great edifice of Carnak. In the French work* we have the dimensions of one of these sphinxes, the most colossal of all that are now found on the plain of Thebes.

	ft.	in.
The whole length is	17	$2\frac{1}{2}$
The length of head about	3	11

These colossal figures are monoliths; but not all of the same dimensions. The outline of the face, and the curvature of the horn containing the ear within it, are exactly the same in the French drawing, and the Museum specimen.

The Greek inscription, *ἄβάσκαντος ψάω*, (on the

* Vol. iii. pl. 46.

crio-sphinx opposite p. 216,) which means, *I touch without fear of harm*, has probably been engraved by some sceptic Greek, to show that he cared not for the majestic objects of vulgar fear and superstition.

Sphinxes were probably rarely omitted among the exterior decorations of an Egyptian temple, and were once as plentiful in Lower as in Upper Egypt. We read of sphinxes at Sais in the Delta; and modern travellers have noticed them at Bebek, and the ruins of Heliopolis. “*At the south end (of the mound encompassing the site of Heliopolis) are two entrances, and at the west a large one, which might have been the antient way to the temple, for near it are ruins of a sphinx of a bright spangling yellow marble; it is about 22 feet in length, the ear is 2 feet long, and the head 4 feet broad; it has such a tutulus or ornament on each side of the head, channelled as the great sphinx at the pyramid has, with which the sphinx is commonly represented.” There can be little doubt that this sphinx once formed part of an avenue through which was the main approach to the temple on the western side. For it should be observed, that there appears to be no general law as to the position of Egyptian temples with respect to the cardinal points of the compass; but in nearly all cases the main front is turned towards the river.

The head-dress which Pococke remarked on this broken sphinx of Heliopolis may be observed also in the drawing of the Theban crio-sphinx; and a similar head-dress, crowned with the high cap, is seen on the genuine sphinxes of Essaboua †, in Nubia.

So great is the variety of forms in which sphinx-figures occur, that it may be difficult to determine with certainty what must be considered as the primitive type. It might seem fair to conclude from the almost

* Pococke, vol. i. p. 23.

† Gau, p. 47.

universally observed attitude, that a sphinx should always be found in a reclining posture, with the fore-legs stretched out. We are not going to speak of exceptions to this rule in Grecian sphinxes, which generally appear with wings, and seated; but we have exceptions even in the Egyptian delineations of this compound animal. We observe on the walls of Carnak (Antiquités, vol. iii. pl. 32, no. 5,) the holy ship carried by priests, with a ram's head at each end. The sanctuary, which is in the boat, is closed; but among the reliefs or pictures on one side of this sanctuary, Ammon is seated with the ram's head, and the god, Ré (the sun), in the compartment below. At the prow of the boat there is a standing sphinx, a female, as is apparent from the great projection of the bosom. Her lion's tail is curled up over her back in a magnificent sweep. On her head is a pair of the long twisted horizontal ram's horns, surmounted by a disk, which is flanked on each side by one of those high curved ornaments, that may be compared to a large ostrich-feather. Here we undoubtedly see the sphinx connected with the Ammonian worship, retaining what is probably the original type of the human and the lion form, and blending with that the horns of the great Ammon.

Another female sphinx, represented on the walls of Carnak (iii. pl. 66), is in a reclining posture, and has the body, hind-legs, and tail of a lion; but the bosom, arms and hands, are those of a female. The attitude is that of prayer. This sphinx in another respect partly resembles those on the obelisk of the Campus Martius. It has *two* left hands: the thumbs, instead of being on *opposite* sides of the hands, which are stretched out flat, are on the same side in each hand. How many more varieties we might find of the sphinx, it is difficult to say. As we do not possess in engravings, probably one thousandth part of the

sculptures that decorate the great buildings of Thebes, it would be hazardous to conclude that there are not other varieties.

We have not been able to find any trace of a winged sphinx on any monument that can be undoubtedly called genuine Egyptian. The winged sphinx appears to be the property of the Greeks, of which there are specimens in the Townley collection of the Museum. It is true that a winged sphinx appears on the Isiac table, but this is only one reason among others for believing this monument to be a work of a later age, and of a Roman sculptor partly imitating Egyptian forms.

Sphinxes in a sitting posture, not winged, are found in several places in Nubia, but their high antiquity is at least dubious. Near one of the temples comprehended under the general term Sedegne (lat. $20^{\circ} 33'$), Rüppel saw two sitting sphinxes of black granite; and on a bas-relief, in the same place, two Isis' heads with cows' ears, flanked on each side by a sphinx in a walking attitude. This sphinx he calls an andro-sphinx, which it may be, but the beard is wanting. They have flat square caps on their heads, and a kind of narrow band going round the neck, crossed under it, with the two ends hanging down in front. The profile of the human face, as Rüppel remarks, is Greek; and the position of the ear in one of the figures is correct, according to Rüppel's drawing*, but in the other sphinx it is elevated too high, as in Egyptian sculpture. This is probably only a mistake in the draughtsman. There appear to be no hieroglyphics about this bas-relief. Altogether there can hardly be a doubt that these sphinxes and the whole temple belong to the Ptolemaic, or even to a later age.

In the ruins of the temple on the island of Argo, where the two colossi are found, there is also a sitting

* See his drawing.

sphinx of black granite, with a group of four granite apes near it in the same attitude. Ruppel also describes the fragments of a sitting sphinx at Meroe.

The Museum contains two specimens of hawk-headed sphinxes (Nos. 1, 3), which are said, in the Catalogue, to have been brought by Belzoni from the rock-cut temple of Ipsambul. This statement is probably correct, though Belzoni * describes these figures as "two lions with hawks' heads, *the body as large as life.*" The length, however, is only 41 inches, measured from the extremity of the fore-paws to the insertion of the tail: the vertical height to the top of the head-dress is about $16\frac{1}{2}$ inches. The head of No. 1 is much damaged, but No. 3 is in good preservation.

The material of these sphinxes is a soft lightish-coloured sandstone, very easy to cut. Though we cannot commend the lion part of these animals for very exact outline, their attitude is easy and natural. The two fore-paws are stretched out in straight parallel lines, while the hind-legs are drawn up in the usual manner of recumbent sphinxes. The tail forms a fine sweep over the upper projecting bone of the right hind-leg †; and the vertebræ of the spine are distinctly marked for a few inches above the insertion of the tail. The top of the head is flat; this flat surface being part of the head-dress which runs down the back of the head and rests on the shoulders: the same head-dress also descends on each side of the head. Both the hawk-beak and the eyes are very prominent; but the character of the face is not pure hawk, but an odd compound of hawk and human features.

No. 24 is another sphinx of very soft calcareous stone, with a human head, apparently a female, as there is no trace of a beard. Its length is about

* Page 214.

† The figure is reversed in the print, p. 213.

28½ inches. The tail appears to have been thrown over the hind-leg in the same way as in the two hawk-headed sphinxes, except that, in this instance, it is thrown over the left hind-leg instead of the right. This figure has been painted with red ochrous earth. It was presented to the Museum by Captain Caviglia, who found it in the excavation which he made with so much cost and trouble, between the paws of the colossal sphinx near the pyramids of Jizeh.

No. 28 is another sphinx with a human face, of about the same size as No. 24, but more mutilated, the fore-paws being quite destroyed. The hind-legs and tail are in the same attitude as No. 24; and the tail retains that knot-like termination indicating the tuft of hair, which is observable at the end of a lion's tail. This rounded termination rests in the hollow between the spine and the up-raised joint of the thigh. The surface of this stone, though very hard, is corroded into small holes, which give it in parts a sponge-like appearance: the material seems to be a hard calcareous stone. An attempt has been made to show the ribs by making curved incisions in the stone and rounding the surface between them.

The Museum possesses two specimens of small lions, which cannot be described in a more appropriate place than the present.

No. 50 is a lion couchant, in length about 22 inches, and of a calcareous stone, which has been painted red. His attitude is exactly that of the hawk-headed sphinx, No. 3; and his tail has the knotted termination which we have before spoken of. The mane is represented by a kind of head-dress, descending in front, down the chest, and on both sides as far as the fore-paws, where it rests; but in addition to this there is a flat circular bandage, commencing just below the eyes and running under the chin, intended, no doubt, to represent the fore-



No. 50.

part of the mane. In the last mentioned particular this lion, which was found by Captain Caviglia, between the paws of the great sphinx, resembles the lions of Mount Barkal*; and indeed the whole style of the head-dress descending on the chest is very nearly the same. In the Museum lion this head-dress extends down the back of the neck in the style of the sphinx head-dress: the animal reclines on a plinth $1\frac{3}{4}$ inch thick, on the fore-part of the vertical face of which six figures are cut, which an inexperienced eye might perhaps take for hieroglyphics, but they are only such as some mischievous schoolboy might carve, and certainly form no part of the original design. There are no traces of hieroglyphics on any of the sphinx figures of the Museum.

There is another lion in the Museum also of calcareous stone, and painted, which is a much more curious figure. It is about 18 inches long. Instead of being in the usual attitude, with outstretched paws like No. 50, it is lying on its right side, with the right fore-leg under the body, all but the paw. The left leg is stretched across the chest, and the paw being turned flat down, rests on the paw of the right leg, which has the under side turned upwards. Thus the two paws meet like the two hands when

* See Rüppel's Plates,

brought flat together. The foot of the right hind-leg is just seen peeping from under the body, while the left leg is nearly in the usual position of the hind-legs of a recumbent sphinx. The tail sweeps over the haunches in the ordinary style, coming out between the body and the left leg, and its termination resting in the usual position. The eyes are singular, being very long, and much more like the eyes of Egyptian human statues than anything else; certainly they are not lions' eyes: the axes of the two eyes are inclined to one another. One ear appears to be remaining, occupying the situation of a lion's ear. Part of the nose between the eyes remains, which more resembles the human nose than any thing else. All the lower part of the face unfortunately is gone, so that it is difficult to decide what its real character is. Above the eyes we observe the commencement of that kind of low head-dress which fits close to the head. On the fore-part of this head-dress and all over the chest, down as far as the paws, a number of curved lines are cut, which represent the mane with tolerable accuracy. We can hardly admit this lion to be a work of pure Egyptian style: its attitude alone is almost decisive against such an hypothesis. Yet it is curious that the attitude should be so nearly the same as that of the Mount Barkal lions. The principal differences consist in the Museum lion having a better executed mane, and in the tail of the Barkal lions not being thrown over the haunches, but lying at full length and in a straight line, extending the whole length of the right hind-leg, at a short distance from it, and nearly parallel.

This sphinx was also presented by Captain Caviglia, and is said to have come from between the paws of the great sphinx.

There is still another lion in the Museum, about $2\frac{1}{2}$ feet long, in high relief, and in a walking attitude,

The body and legs of the lion are painted yellow, and his mane red. It stands on a shelf on the left side of the room of Egyptian antiquities, and belonged, we believe, to Mr. Salt's collection. But where it came from we do not know, as it is not entered in the Museum Catalogue.

The origin of the name sphinx, and the meaning of this compound figure, have furnished matter for much discussion among the learned; but, as is often the case, their disputes are still unsettled. Some have supposed that the union of the virgin's head with the lion's body might be emblematical of the rise of the Nile, which, though commencing in June, does not acquire much strength till July and August, when the sun is in the signs of the lion and the virgin*. But this explanation will not suit the sphinx which has a male head, or a ram's head, unless we choose to suppose that the female sphinx is the original, and the rest mere fanciful inventions of a later age. Winkelmann's notion, that by the term andro-sphinx, Herodotus means to express the union of the two sexes in one form, is entirely devoid of foundation. Indeed the few remarks that Winkelmann has made on sphinxes contain nearly as many mistakes as words, which his commentators, in the French edition of 1790, have in a great measure corrected.

The sphinx is found also in India among the sacred objects that adorn the temples. The following extract from a German writer, if it does not throw some light on the origin of the sphinx-form, points out at least a curious resemblance between the sacred system of Egypt and India. "† The Egyptian sphinx, the proper andro-sphinx of Herodotus, was

* This hypothesis, which probably has very little value, will be discussed in another chapter.

† Böhler, vol. ii. p. 205,

essentially different from the Greek, which was compounded of a female and a lion, while the Egyptian was a lion with a man's head, and only such sphinxes as these (man-sphinxes) are found in India, as, for example, at Ellora. That sphinxes with female heads are to be seen in Arracan, for the present rests only on the testimony of a very careless observer, who even fancied that he saw there the biblical personages, Jael and Sisera. In India the sphinx represents the fourth incarnation of Vishnu as a man-lion. It has spread even into Tibet and other countries, where the lion itself never came, and is called either *Nara-sinhas*, man-lion, or simply *sinhas*, lion, which word is pronounced *singhas*, and may possibly be the origin of the Greek word σφίγξ (sphinx), since the Greek language offers no etymology for this word, nor can it be derived from the Coptic (the Egyptian)." In the rooms of the Asiatic Society of London there is an Indian picture of Vishnu's incarnations, but, though Vishnu is described as a man-lion in the fourth, there is no resemblance at all in *form* between this picture and a lion. But in Eastern Asia the form of the sphinx is not limited to a combination of the human and the lion shape; there are in the island of Java, among the ruins of Chandisevu, sphinxes on the steps of the great temple which are half lion and half elephant.

Most speculations on the origin of the compound figure, called a sphinx, appear unsatisfactory, nor indeed is it an easy matter for the modern inhabitants of Western Europe to conceive what is meant by the symbolical forms which enter so largely into the antient religious systems of the Eastern world. It seems to us altogether an assumption without proof, that either the andro-sphinx, or the sphinx with the female head, ought to be considered as the original type of this compound figure. The sphinx differs from other

compound figures, which occur very often in the Egyptian pictorial representations, in always having the body of a lion, or it may be, a panther, or some such animal as might be considered a symbol of strength and courage. The whole history of our species bears testimony to that tendency of the human mind, when not restrained and guided by better knowledge, to pourtray in some visible form its conceptions of Deity. However far many superior minds of the heathen world might advance in deducing from the contemplation of all around them more correct views of the goodness and wisdom of an all-ruling power, these were ideas far too refined for the mass, who felt the want of something more apparent to the senses, something on which the mind could repose from vain imaginings and real fears. Hence the deity was invested with various forms of familiar objects, under which he was venerated as a protector and friend, or feared as an avenging and angry power. Under the form of a ram and the name of Ammon we find a deity worshipped along the banks of the Nile, from the temple of the antient Meroe to the sand-girt Oasis of Siwah. The mild and benignant expression of the sacred ram would indicate the diffusion of tranquillity and peace; nor would the essential value of the symbol be changed by finding the head of the ram placed on human shoulders, or attached to the body of a lion. In the first case, it would, in accordance with the Egyptian tradition of gods having assumed the forms of animals, commemorate, as in the Hindoo mythology, an incarnation of the superior power; and in the second, the union of strength and courage with mildness and the arts of peace. The crio-sphinx then belongs to the Ammonian mythology, and is a distinct symbol from the andro-sphinx and female sphinx, which probably are connected with the worship of Osiris and Isis,



Bronze figure from P. Knight's collection. British Museum.

The practice of placing pure lions at the entrances of temples is perfectly in the Hindoo style, and we believe this must have been often the case in Lower Egypt, though owing to the devastation of centuries which has swept over that ill-fated country, few, if any, traces of stone lions exist in Lower Egypt which belong to an epoch anterior to Greek dominion. Lord Valentia* mentions "a great lion of granite" which he saw at Bahbeit, or Bebek, in the Delta, but

* iii, 4, 37.

so buried in the earth that he could not judge of its execution.

It is possible this might have been an andro-sphinx, like that excavated at San by Mr. Hamilton. Lord Valentia does not say that he saw the head, by which alone could be decided whether it was a complete lion or a compound figure.

There was a city in the Delta, called by the Greeks, Leontopolis, or the City of the Lion, but we have no means of judging of the probable antiquity of this place; though it seems likely enough, as there were various "cities of crocodiles" in Egypt, so there might have been, from remote time, "a city of lions," where this animal received adoration in a living form, like his brother-deities, the ox, the crocodile, the goat, and other sacred animals. Diodorus says, that there was a living lion maintained at Leontopolis in his time, which was treated with all the respect due to an animal that held a rank analogous to that of Apis at Memphis, and Mnevis at Heliopolis.

The Egyptians seem to have been peculiarly pleased with appropriating the form of the lion as an ornament for their sofas or couches, which we see so often represented in the bas-reliefs. Sometimes the couch is nothing more than the profile of a lion, the back being flattened to form the resting part of the couch, and the tail being turned up as an ornament and terminated by a serpent's head. Such imitations of natural forms give more pleasure to the eye than the shapeless models which modern furniture was founded on, till the revived study of antiquity, in its true sense, taught us to borrow from the patterns of people who were gifted with better taste, and to restore the paw of the lion to ornament our tables.

That it may not be supposed that there is only *one* kind of sphinx, we here give a list of the Egyptian combinations of this figure, as far as we know them with certainty:—

1. The pure lion.
2. The lion with a ram's head.
3. The lion with a hawk's head.
4. The lion with a male human head.
5. The lion with a female human head.
6. The lion's body and hind-legs with female head and human arms, as in the reliefs of Carnak and on the Campensian obelisk.

An attempt to imitate the form of the lion is mentioned among the earliest works of art of which we have distinct evidence. Cræsus made a lion of pure gold which he sent to Delphi, where Herodotus saw it after the lapse of more than a century, somewhat diminished in weight, owing to the damage it suffered when the temple was burnt. Among Grecian works of art, lions of bronze, and even of iron, are mentioned, to which we may add, as, perhaps, the oldest specimen of Grecian sculpture now existing, the lions of the gate of Mycenæ*. As late as the time of Herodotus, this animal was found in Northern Greece, in Thrace, and Macedonia, and it appears at one time to have been more widely diffused, and perhaps now is, than any other of the feline race in a wild state. It is curious to observe how familiar the form of a lion is to the people of every civilized country, and how frequently it has been used as an ornament and as a mark of superior rank. This would seem to indicate the former wide diffusion of this animal, and the victory of man over one of his natural enemies. Warriors and tyrants chose to assume it as the type of strength and courage; and at last the animal was cast in a permanent mould, into a conventional and unchangeable form, such as became the profound mysteries of the science to which, in part, he owes his celebrity. It is not unusual for people to talk of the stiff and regulated at-

* Pausan, ii. 16, 5. Gell's *Argolis*.—See description of Solomon's Lions, 1 Kings, chap. x, ver. 19, 20.

titudes of Egyptian sculpture, but the remark can only apply with any accuracy to forms of deities; those of animals, and among them the lion, are often represented with a fidelity and spirit that the most skilful artist might be proud to equal.

As the lion, both in its natural state and its imitated forms, was familiar to the Greeks as early as we know anything of this people, so the compound form, the sphinx, belongs to one of their oldest fables. It is probably connected with the story of the Cadmeans, and may possibly have a Phœnician origin. In Phœnicia itself there was a Leontopolis, or city of lions. Indeed we can have little doubt about the fact of the lion being the essential component part of this Grecian monster called the sphinx. Euripides * describes the Theban sphinx as, "a virgin winged mountain monster, with most unmusical notes, which, approaching the walls, carried off, into the inaccessible light of æther, with its four clawed legs, the descendants of Cadmus." This passage shows what delineation of the sphinx was common in the age of Euripides, which was an animal with the body and legs of a beast of prey, the head of a female, and a pair of wings. The colossal statue of Jupiter at Olympia, the work of Phidias, had sphinxes represented on part of the throne—"† on each of the fore-feet there are Theban youths carried off by sphinxes." M. Quatremère de Quincy, in his splendid work of 'Le Jupiter Olympien,' has made ‡ the sphinxes with wings according to the description of Euripides, and placed them as supporters to the arms of the throne, having below them the four victories described by Pausanias. This arrangement harmonizes well enough with the description of the Greek antiquary.

The sphinx appeared as an ornament also on the

* Phœniœsæ, 806. Compare Pausan, ix, 26.

† Pausan, v. 11, 2.

‡ See the throne restored, p. 274.

throne of the Amyclean Apollo, which was of an age somewhat earlier than the works of Phidias either at Olympia or at Athens. Among the decorations of the great* statue of Minerva at the latter place, the sphinx also is mentioned.

The works of art to which we have alluded were of the toreutic class, that is, formed of a frame-work of wood which was overlaid with gold, ivory, and ebony; and the sphinxes were only subordinate decorations. But we have information that it was in the Greek fashion to cut them in marble also. Ariapeithes †, a Scythian king, among other wives, married a Greek woman, a native of Istria, which was a Milesian colony on the west coast of the Black Sea. By her he had a son, Skyles, who learned, as was natural, his mother's tongue, and imbibed from her a taste for Greek fashions. Skyles succeeded to his father's chieftainship over a tribe of wandering Scythians on the north coast of the Black Sea, which occasionally encamped on the banks of the Dnieper near the Greek city of Olbia, another colony of Miletus. It seems that Skyles had but little taste for the company of his Scythian half-brethren, whom he used to leave for a month or more encamped in the suburbs of Olbia, while he shut himself up in the town, threw off his barbarian dress, and lived like a Greek. To complete his happiness he took a Greek wife and built a spacious house in Olbia, which was surrounded by marble *sphinxes* ‡ and griffins. The fate of this lover of innovation was rather tragical. His subjects revolted against him and chose a more congenial chief.

Two § winged female sphinxes, drawing a war-

* See Q. de Quincy, pl. 8. † Herod. iv. 79.

‡ This is not a hearsay story of Herodotus. He visited Olbia, and doubtless saw the sphinxes.

§ Views in Egypt, &c. London. Bowyer's Historic Gallery, 1804.

chariot, are cut on a triumphal arch at Tripoli in Barbary, which bears in its inscription the date of Antoninus and Aurelius Verus. The sphinxes occupy one part of the higher segment of the arch to the right of the key-stone, and two griffins or hawk-headed sphinxes with wings, occupy the corresponding position on the other side of the key-stone.

It would seem not improbable, as we have just remarked, that the Greek form of the sphinx was of Phœnician origin, as it appears to be connected with the Cadmean story. We may add that the coins of several towns in Southern Spain, probably of remote Phœnician origin, preserve this type on their reverses*. But the further examination of this subject is beyond our present limits.

* Asta, Iliberis, Munda, Osca, Urso.

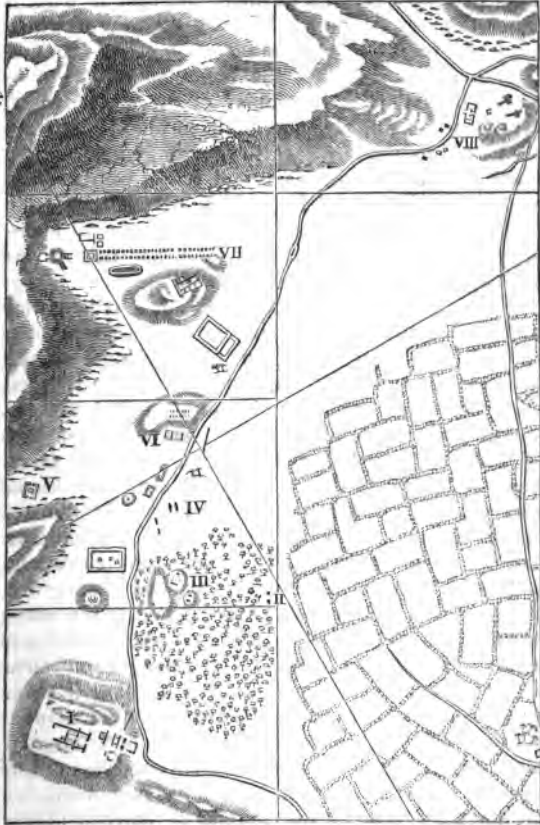
CHAPTER XL.

THEBES, ON THE WEST SIDE OF THE RIVER.—
COLOSSAL STATUES.

THE monuments of Egyptian architecture, on the west side of the Nile, are not inferior either in magnitude or interest to the gigantic structures of Luxor and Carnak. They are remarkable for containing the best existing specimens of Egyptian colossal statues, which even in their mutilated state are the great wonders of western Thebes, as the obelisks and avenues of sphinxes are of the eastern side of the city. There are no traces at present, as far as we know, of any obelisks on the west side; but, to make amends for this, we have the rock-hewn painted tombs of the Libyan mountains, which are by far the most instructive school in which to study the arts and social life of antient Egypt.

The accompanying ground-plan of part of western Thebes, which is taken from the French work, will assist us in comprehending the description of these localities, the more interesting to us because the finest specimen of colossal sculpture that has been brought from Egypt, the Memnon of the British Museum, once ornamented one of the buildings on this side of the Nile.

No. I. denotes the buildings of Medinet-Abou, which have been surrounded by a brick wall, enclosing three distinct but connected edifices. One has been called a palace, another a temple, and the third a small temple, or, as some will have it, a pavilion.



[Plan of Western Thebes.]

1000. 500 Feet.

This building, called a pavilion, lies east of what is called the palace, and has had two stories, of which the upper one is in best preservation. Pococke and Hamilton suppose that the buildings of Medinet-Abou may be the Memnonium of Strabo, in which opinion we cannot coincide. Belzoni found the traces of a tank to the north of the small temple, which must have had statues all round it, as various fragments were discovered in making excavations. He found in this temple also stones with inverted hieroglyphics turned upside down, showing that it was built of the materials of an older edifice.

There are curious traces of a large rectangular enclosure south of the buildings of Medinet-Abou, and bordering very near on the enclosure of the temples. Part of this may be seen in our reduced plan. “*This rectangle is about 6,392 feet in length and 3,196 in breadth, comprising an area of 2,269,870 square yards, which is about seven times as much as the Champ de Mars, at Paris, and consequently offered room enough for the exercises and manœuvres of a large army. The whole had an enclosure, which is indicated by elevations of earth, between which we may still distinguish the entrances, which have been counted to the number of thirty-nine; they may, however, have been as many as fifty or more. The principal entrance was on the east side, where a wider opening is seen. The whole enclosure shows distinctly that it was once adorned with the splendid architecture of triumphal monuments. Probably this extensive circus lay out of the city, but still close to it. A similar one of smaller dimensions is seen on the east side of the river nearly opposite to this on the west, and we may therefore, with some degree of certainty, determine from this double evidence the southern limits of the city. It

* Heeren, Egypt, p. 219.

is highly probable that these spacious enclosures were not merely intended for games such as chariot races, but also for the mustering and exercising of armies, which, under a Sesostris and other conquerors, here began their military expeditions, and returned hither triumphant after victory."

Though doubt has been expressed about the former existence of this extensive circus, which some have considered to be nothing more than the bed of a canal (probably from having observed only the west side of the enclosure, which is a double one), there seems sufficient evidence for it, if the dimensions above given are exact.

No. II. The two seated colossi, of which we have given a print. The more northerly is that which has so many inscriptions on its legs, and is the Memnon of Strabo. The distance from these colossi to the river, which our plan does not take in, is about 7,216 feet in a straight line.

No. III. Probably the site of a large temple, at the entrance of which were seated the two colossi, No. II.

No. IV. Colossi on the ground, broken.

No. V. A small temple of Isis, the distance of which, from its nearest angle to the more northerly colossus, is about 3,526 feet in a straight line.

No. VI. Sometimes called the palace and tomb of Osymandyas, but by Belzoni and others, with less propriety, the Memnonium. The Memnon of the Museum came out of this building.

No. VII. Long avenue of sphinxes.

No. VIII. Remains at Gournou, otherwise called El Ebek.

The only great Egyptian building, of which we find any very detailed account in antient writers, is the palace of Osymandyas. Unfortunately the description is that of Diodorus, who perhaps was not a very accurate observer, and certainly was a careless com-

piler. As it is probable, however, that he saw himself this magnificent structure, which he has attempted to describe, we shall translate the whole passage, though it is rather long, as the identifying of this building, and the true Memnonium will throw great light on the topography of western Thebes. It should be premised that no one building at Thebes will so far agree with the description of Diodorus as to remove all doubt as to what structure he intended to describe under the name of the palace of Osymandyas; and some writers have expressed an opinion that this careless historian jumbled together all that he saw at Thebes, and made one striking picture out of it. This is not improbable; though we are inclined to think that Diodorus * was really trying his best to describe a real place; and it is certain that if this great palace did exist, it was on the west side of the river.

“ Ten stadia distant from the first tombs where, according to report, the females sacred to Jupiter † are buried, they *say* the monument of Osymandyas stands. At the entrance there is a pylon (propyla) of various-coloured stone (he means granite), in width 200 Greek feet, and in height $67\frac{1}{2}$. Having passed through this you come to a square peristyle court of stone, each side of which measures 400 feet. Instead of pillars the roof is supported by figures ($\zeta\psi\delta\iota\alpha$: he means representations of the human figure) 24 feet high, of a single stone, made after the antient fashion; and the whole roof (extending from the wall to the colossal caryatids) is formed of slabs 12 feet in length, and painted with stars on a blue ground. After this peristyle court you come to another doorway, and a pylon, in other respects like the first, but covered with better executed sculptures of all kinds. In front of the second doorway are three colossi,

* I. 47, &c.

† Herod. i. 182,

each made* of a single block of the stone of Syene. One of these, which is in a sitting posture, is the largest statue in Egypt, its foot being more than $10\frac{1}{2}$ feet long. There are two other statues near his knees, one on the right hand and the other on the left, his mother and daughter, in size inferior to the large statue. This is a wonderful piece of work, not only for its magnitude, but also for its execution and the quality of the stone, in which you can not see a single crack or discoloured spot. On it there is this inscription: 'I am Osymandyas, king of kings: if you wish to know how great I am and where I lie, surpass my works!' There is also another statue of his mother, placed by itself, 30 feet high, and of a single piece of stone; she has three kingdoms (or marks of royalty) on her head, which signify that she was both a daughter, and a wife, and a mother of a king. After the pylon you come to a second peristyle court more magnificent than the former, in which there is a great variety of sculptures representing his wars with the revolted Bactrians, against whom he marched with 400,000 foot soldiers and 20,000 horsemen. The king's army was distributed into four divisions, which were commanded by his sons.

"On the first wall the king is represented besieging a fort, which is surrounded by a river: he is at the head of his troops contending with the enemy, and aided by a lion that is fighting furiously. Some said that this king really had a tamed lion, which helped him in battle, and put his enemies to flight: others say, that being an exceedingly courageous and haughty monarch, and wishing to glorify himself, he signified by the figure of a lion the temper of his own soul. On the second wall you see the captives dragged by the king, and represented without privities and hands; by which is indicated that they were cowardly in spirit, and nerve-

* We follow Wesseling's correction.

less in the midst of danger. The third wall has a great variety of sculptures and beautiful paintings, on which are represented the sacrifices of oxen by the king, and a triumph after the war. In the centre of this peristyle court there is an hypæthral altar of most beautiful stone, remarkable both for its execution and magnitude. Near the last wall (the wall opposite to the entrance wall) there are two statues seated, each of a single stone $40\frac{1}{2}$ feet high; and near the statues three passages leading out of the peristyle court into an hypostyle chamber, built like an odeum (music-hall), each side of which is 200 feet. In this chamber there is a number of wooden statues, which represent people who have lawsuits and are looking towards the judges, who are seen in the sculptures on one of the walls. These judges are thirty in number; and in the centre is the chief-justice, with the figure of truth suspended from his neck, with her eyes closed. A number of books are lying near him. These figures indicate by their attitude that judges ought to receive nothing, and that the chief-justice should have a regard to truth alone.

“Next to this chamber you arrive at a peripatus (a spacious area), full of various apartments, in which all kinds of food were prepared that are most pleasant to enjoy. Here you see the figure of the king sculptured on the wall and painted (a painted bas-relief), offering to the god gold and silver, which he yearly received from all Egypt, from the gold and silver mines. The amount of the precious metal was written under, and it was, when computed in silver, 2,003,000 minæ. Next to this was the sacred library, with the inscription, ‘Place of cure for the soul!’ Adjoining this room were figures (sculptured?) of all the Egyptian gods, and of the king bringing to each appropriate offerings, as if he were proving to Osiris, and his assessors in the realms below, that he had terminated a life

of piety and integrity. Separated from the library by a common wall there was a magnificent apartment with twenty couches in it, and statues (*εἰκόνας*) of Zeus (Ammon), and Hera, and also of the king, who is said to have been buried here. All round this chamber is a great number of apartments, containing beautiful paintings of all the sacred animals in Egypt, and a staircase leading up from them to the* whole tomb. When you have passed the staircase you see on (the ceiling of) the monument a gilded circle, divided into 365 parts, each division of the circumference being a foot and half. In these divisions the 365 days of the year are marked, with the risings and settings of the stars for each day, and the prognostics which they offer according to the system of the Egyptian astrologers. This circle (calendar) they said was stolen by Cambyses when he conquered Egypt. Such then, they say, the tomb of Osymandyas *was*, which not only in the expense of the structure, but also in the skill of the workmanship, must have surpassed by far all other buildings."

It is clear from the concluding part of this extract that the tomb of Osymandyas had lost some of its glory before Diodorus visited Egypt; and it is also possible, from the tenor of this description, that he had not seen the place. Yet the whole account, bating exaggeration in the dimensions, is perfectly in harmony with the general character of an Egyptian building. Whether, then, Diodorus wrote merely from recollection, or copied the story of some priests, we believe that *one* real building is the subject of his narrative, and that in all the substantial facts it may be exact. Now the building which we have called No. VI. agrees in many important particulars with that of Diodorus. Within a less distance than ten stadia we find abundance of tombs, quite magnificent enough to

* The original is somewhat obscure.

receive the sacred females of Jupiter. Indeed the tombs of the kings themselves are at a less distance than ten stadia from this great edifice.

As to the dimensions given by Diodorus being inexact, that is not sufficient to disprove the notion of this being the tomb of Osymandyas, when other evidence of higher value than measures tends to prove the contrary. Nor yet, when he says that the first propyla were built of granite (if *ποιικίλος λίθος*) has that meaning), must we therefore conclude that his whole account is false, because these propyla are of sandstone. There are large granite propyla at Carnak, and it is possible the historian may have made a slip in his memory, and confounded one set of propyla with another.

There are two plans given of this place by the French (*Antiquités, Planches, ii. 27, 33*); the first of which is a ground-plan of the ruins, as far as they can be now made out; the second, which is less valuable, is a restoration conformable to the description of Diodorus. The dimensions of this building, according to plate 27, the real one, are about 530 feet long and 200 wide. After ascending some steps we come into a rectangular court, 160 feet wide and 140 deep, which has had a row of pillars on the right hand and on the left. At the extremity of this court, near the entrance into the second, and on the left-hand side, are the fragments of that enormous sitting statue, which may well be described as "the largest in Egypt." We shall speak of it more particularly hereafter. Ascending some more steps we pass a second pylon, and enter a second court of the same dimensions as the first; it is peristyle, having a double row of pillars all round, except on the entrance side, in this respect agreeing with a peristyle court already described at Medinet-Abou. Two sides of this court have caryatid pilasters (*ζυῦδια*) opposite to one another—pilasters on the

side in which the doorway stands (the eastern), and on the side opposite. Under the extreme gallery of this court, which was formed by slabs joining the tops of the two sets of pillars, were the two statues mentioned by Diodorus, one of which may be the Memnon now in the Museum, and the other, we presume, is still on the spot in fragments. In the instructions given by Mr. Salt to Belzoni, when he was setting out on his expedition to Thebes, after describing the position and appearance of the Memnon, the consul added: "It must not be mistaken for another lying in that neighbourhood, which is much mutilated." And Belzoni, when speaking of his first sight of the colossus, which was the object of this journey, remarks: "The place where it lay was nearly in a line with the side of the main gateway into the temple; and as there is another colossal head near it, there may have been one on each side of the doorway, as they are to be seen at Luxor and Carnak." It should be stated, that the dimensions of $40\frac{1}{2}$ feet, given to these colossi by Diodorus, exceed considerably those of the Museum Memnon. We may therefore fairly place the evidence of disagreement in dimensions against that of agreement in position, which is perhaps the stronger of the two.

From this court where the colossus was found, another flight of steps leads into an hypostyle hall of 10 columns in the breadth and 6 in the depth, the two centre rows containing, as usual, the largest pillars; they are 35 feet high and about 19 in circumference. Only part of these columns are now standing. Again we ascend by steps into another court, with eight pillars in it, four on each side of the passage; and still by another step or steps to another chamber, where the real ground-plan terminates; but it is continued in the restored plan to which we have referred.

The historical sculptures on the walls of this edifice agree so far with the general character of Diodorus' description, as rather to confirm the notion of this being the tomb of Osymandyas; but the reader will now be able to form his own opinion on this controverted point in Theban topography.

The name of this conqueror, Osymandyas, is not mentioned by Herodotus, nor does he appear in the list of Manethon's kings. It is conjectured, therefore, that Osymandyas may be a title of Sesostris, otherwise called Rameses the Great, to whom most critics are now disposed to assign part, at least, of the great structure called the tomb of Osymandyas, as his name frequently appears on different parts of this building. There were, however, two kings called Mandou or Mandouei, one a predecessor and another a successor of Rameses the Great, and there can be little doubt that in the word Osymandyas, we have this element Mandou, which, according to Egyptian custom, was also the name of a god*. It is possible then, that the Osymandyas of Diodorus may be one of those kings just mentioned under the name of Mandou—or Smendes. (Dynasty 21.)

The Memnon's head of the Museum is No. 66, in the last catalogue. It is placed on a block of stone, on the right-hand side, near the extremity of the ninth room, which contains the Egyptian sculptures. Before we examine the claims of this colossus to the title of 'Memnon,' a brief account of its removal will not be uninteresting.

In the year 1815 Belzoni went to Egypt, with a project for constructing hydraulic machines to irrigate the fields in an easier and more economical way. He engaged to make one, by way of experiment, for the Pasha, in which he completely succeeded, though

* * See Dynasties 6 and 21.—Mendes is the Egyptian Pan. Herod. ii. 46.



Front view of the Memnon's Head.

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2 A

the ignorance and knavery of his Highness rendered the ingenious contrivance of no use. Burckhardt, the celebrated traveller, who was then in Egypt in the service of the African Association, had long wished to have the colossal bust of Memnon removed. Belzoni, who had become acquainted with him, repeatedly offered to convey it to Alexandria, from whence it might be sent to England. Mr. Salt, the British consul, after some indecision and delay, consented to the undertaking, and Belzoni set out with instructions from Mr. Salt, and a promise that his expenses should be reimbursed. In the copy of instructions * (which are written in rather an assuming style), no mention is made of remuneration to Belzoni, which, as the Italian fairly argues, would have been mentioned in the instructions, had he (Belzoni) been regularly employed by the consul to remove this colossal head, as it has sometimes been stated. The fact is, that Belzoni, after having offered to remove the head, and not finding his proposal accepted, determined to sail up the Nile to gratify his own curiosity, and the consul, at last, agreed with Burckhardt to seize this opportunity of removing the young Memnon. We give this short account from Belzoni's work, because it is fair that each person should have his due share of credit in this undertaking, and we believe the veracity of Belzoni will not be disputed. On his return, however, he did receive a present through Burckhardt, half of which was liberally paid by the consul.

This colossal head Belzoni found, according to his instructions, in the temple, which, in English books, is now commonly called the Memnonium, or temple of Memnon. It was broken, and lying with its face *upwards*, though in Norden's time it was *entire*, and with its face *downwards*, to which cause we may, no doubt, attribute its preservation. Bel-

* See Belzoni's Book, p. 26.

zoni remarks (p. 40), that he will not venture to say who separated the bust from the rest of the body by an explosion, or by whom the bust has been turned face upwards. (French work, *Antiquités*, tom. ii. pl. 26.) There is also a hole drilled in the right breast, evidently the work of modern *art*, and no doubt intended to hold gunpowder for the purpose of blowing off the right shoulder also, and rendering the transport of the head more easy. We have no difficulty in expressing our conviction, after looking at all the evidence*, that this was done by the French when they visited Thebes. They turned the face of the statue upwards, and blew off part of the body, but after all they were compelled, from some cause or other, to leave it behind. It is curious, as Nöhden remarks, and Burckhardt before him, that in the drawing of this statue, as we see it in the great French work on Egypt (tom. ii. pl. 32), the *right* shoulder is wanting, which would have been the case had the French succeeded in blowing it off. The drawing was probably made on the spot, and the figure represented in that condition, in which the French expected to send it home. There is of course no sign of the great hole on the Memnon's right shoulder, in the French engraving, as the part that contains it is omitted. If they did *this* damage to the statue, with the view of shattering the right shoulder just like the left, we may readily believe they went so far as to break the whole in pieces, which, up to the time of this visit, was probably entire, as Norden saw it. We here give the extract from Norden, that the reader may himself judge of the probability of the Memnon having been entire up to 1737, when this traveller visited Egypt.

* See Nöhden's excellent little pamphlet, entitled 'Ueber das sogenannte Memnons-Bild im Britischen Museum in London, 1822,' from which a great part of what follows about the Memnon's head is taken.

“* There is besides in this place (the Memnonium as he calls it), another colossus marked H (see plate 112): it is entire, and of a single piece of granite-marble, but its height is only moderate. It is at present thrown down, lying on its face, and half buried in the ground. All that is visible appears quite free from damage, and with respect to the attitude it is the same as that of the other colossi of which I have spoken.”

It is difficult to say what is meant by the height of a colossal statue being only moderate; but we may perhaps ascertain Norden's notions of moderate size, by observing what dimensions he gives to the great broken colossus, which lies in the same place, and measures about 62 feet round the shoulders. Norden, speaking of this colossus, estimates it at 20 feet high only; all the body of the colossus, he says, was of black granite, and of a single piece: its pedestal is in some measure entire. He considers it to have been broken by violence; and believes it to be the famous Memnon. It is clear from this account that the broken colossus in the tomb of Osymandyas, of which Norden is here speaking, is the enormous statue described by later travellers, notwithstanding the great discrepancy in the measurements; for there is no other large broken statue that will answer the description. This may serve to remove the only difficulty in recognizing the Memnon of the Museum as the *entire* statue which Norden saw lying on the ground, and on the spot from which our broken Memnon was brought.

The implements with which Belzoni removed this statue were “fourteen poles, eight of which were employed in making a sort of car to lay the bust on, four ropes of palm-leaves, and four rollers, without tackle of any sort.” With these sorry mechanical

* Norden, ii, 128.

aids, and the assistance of the ignorant Arabs, he contrived to raise the statue on the car, and to convey it a distance of more than a mile to the banks of the river. But the intrigues of the governor of Erments, and of Drovetti, the French consul at Alexandria, caused almost as much difficulty as the actual removal of this enormous mass. Even when the statue was on the bank of the river, and a written contract for a boat had been entered into with its owner, the whole scheme seemed to be ruined by the knavery of some parties, and the fear of the boat-owner that the Memnon would sink his boat to the bottom of the river. But in the mean time the governor of Erments changed his tone to Belzoni, compelled the boat-owner to fulfil his bargain, and allowed Belzoni to have the use of one hundred and thirty men. As the bank of the river was considerably above the level of the water, which had retired at least 100 feet from it, he found it necessary to make a sloping causeway for the statue, and even then it was no easy task to place so heavy a weight in a boat, unaided by any mechanical power except four poles and some ropes. It is only fair to the memory of this enterprising traveller, to let him tell his own story.

“* I cannot help observing, that it was no easy undertaking to put a piece of granite of such bulk and weight on board a boat, that, if it received the weight on one side, would immediately upset; and, what is more, this was to be done without the smallest help of any mechanical contrivance, even a single tackle, and only with four poles and ropes, as the water was about 18 feet below the bank where the head was to descend. The causeway I had made gradually sloped to the edge of the water, close to the boat, and with the four poles I formed a bridge from the bank into the centre of the boat, so that when the

* P. 131.

weight bore on the bridge, it pressed only on the centre of the boat. The bridge rested partly on the causeway, partly on the side of the boat, and partly on the centre of it. On the opposite side of the boat I put some mats well filled with straw. I necessarily stationed a few Arabs in the boat, and some at each side, with a lever of palm-wood, as I had nothing else. At the middle of the bridge I put a sack filled with sand, that, if the colossus should run too fast into the boat, it might be stopped. In the ground behind the colossus I had a piece of a palm-tree firmly planted, round which a rope was twisted, and then fastened to its car, to let it descend gradually. I set a lever at work, on each side, and at the same time that the men in the boat were pulling, others were slackening the ropes, and others shifting the rollers as the colossus advanced.

“Thus it descended gradually from the mainland to the causeway, when it sunk a good deal, as the causeway was made of fresh earth. This, however, I did not regret, as it was better that it should be so, than that it should run too fast towards the water; for I had to consider, that, if this piece of antiquity should fall into the Nile, my return to Europe would not be very welcome, particularly to the antiquaries; though I have reason to believe that some among the great body of its scientific men would rather have seen it sunk in the Nile, than where it is now deposited. However, it went smoothly on board. The Arabs, who were unanimously of opinion that it would go to the bottom of the river, or crush the boat, were all attention, as if anxious to know the result, as well as to learn how the operation was to be performed; and when the owner of the boat, who considered it as consigned to perdition, witnessed my success, and saw the huge piece of stone, as he called it, safely on board, he came and squeezed me heartily by the hand.”

This difficult task being safely accomplished, the Memnon's head sailed down the river to Rosetta, and from thence to Alexandria, where it embarked for England. In the Museum Catalogue the Memnon's head is described as the gift of Henry Salt and Louis Burckhardt, who liberally defrayed the expenses of the undertaking.

The material of which this statue is made, is a fine kind of Syene granite, of one entire mass, but two colours. The head has, with great judgment, been formed out of the red part of the granite, while the dark part was appropriated to the breast, and probably also to the remainder of the body. The figure was in a sitting posture, like most of the Egyptian colossal statues, for Belzoni found it "near the remains of its body and chair." Though a statue of colossal size, it is very inferior in magnitude to some works of Egyptian art of this kind, of which we shall soon have occasion to speak; its height, from the sole of the foot to the top of the head, in its seated position, having been probably about 24 feet, or somewhat less. The fragment in the Museum, which may be about one-third of the whole, is somewhat more than 8 feet in height. The following dimensions are worth giving: they are taken from Nöhdén's Essay.

	ft.	in.
1. The whole height of the bust, from the top of the head-dress to the lowest part of the fragment, measured behind, is	8	9
2. Round the shoulders and breast, above,	15	3
3. Round the breast, below,	14	7
4. Height of the head, from the upper part of the head-dress to the end of the beard	6	0½
5. Height of the head-dress	1	2½
6. Diameter of do.	3	7
7. The whole height of the red granite part	4	9
8. From the forehead to the chin	3	3½
9. Height of the beard on the lower part, reckoned from the breast	0	9½



Side view of the Memnon.

The weight of the mass is estimated at between ten and twelve tons.

It is universally agreed that this is one of the finest specimens of Egyptian colossal sculpture now known to exist ; and if we admit it to be a work of genuine Egyptian art (of which there can be no doubt), we may consider it as a favourable specimen of what that nation could accomplish. For so hard and unwieldy a mass to be wrought even into any resemblance to the human form, and polished to so high a degree, would of itself be a labour worthy of admiration. But that the proportions of the parts should have been so well preserved, and that *beauty* should have been impressed on this colossal face, proves that at least some kinds of sculpture were once carried to a high degree of perfection in Egypt ; though they may not be of that description of art which our earliest associations teach us to admire. In the colossal statues of Egypt calmness and repose are the most striking characteristics ; but this figure shows somewhat more. “ * It represents a young man : the breast is broad and well defined. The beard, united in one mass, adheres to the chin. The line of the eye-brows perhaps does not project enough above the eye-ball ; the tip of the nose, too, is perhaps too much rounded, and the ears, as usual in Egyptian statues, are placed too high ; ” but even with these defects, and with lips too thick for our notions, the face is full of softness, tranquillity, and beauty.

The beard has a singular form, which we often see on the monuments of Egypt, and Belzoni has gone so far as to conjecture that the antient Egyptians might have worn the beard in a kind of case ; a fashion which would be not unlike the modern practice of wearing pig-tails, except that the appendage with us was behind instead of before. From the head there descends on each side a kind of covering

* Description de l'Egypte, i. 129.

of ornament, which reaches somewhat lower than the forehead, and in its position, but not in its form, bears some resemblance to a full flowing judge's wig. The latter decoration, in various modifications of form, is found on female statues also, while the beard, whatever we choose to call so, is appropriated to the statues of Osiris and Horus; and in this case, probably, has a reference to Horus and his worship. The flowing part of the head-dress is somewhat damaged in its outline, but may be clearly made out by a comparison with the head-dress of the colossus, No. 38, which differs from this in no respect, except in wanting the upper part or corn-measure. This upper part has been called a corn-measure, from a fancied resemblance to one. But no satisfactory explanation is given of it, nor yet of the balustrade kind of ornaments which are around it, and also on the face of the broad belt hanging round the breast,—unless we adopt the notion of Böttiger*. The head-covering, according to him, is the appropriate tiara and head-dress of the statues of the royal priests of Horus; and its ornamental bordering, as well as the similar decoration on the breast, he considers to be a kind of series or combination of the snake called Chnuphis or Uræus, the symbol of royalty found so often on the monuments of Egypt. There can hardly be a doubt that Böttiger's interpretation is right: this ornament perpetually occurs, and in most cases the figure of the snake is distinctly seen. On the head-dress (at the back) are other sculptures, the hawk's feather and various plants, all of which, probably, had some symbolical meaning, indicative of the rank of the personage who bore them. The beard, Böttiger considers to be the sign of manhood, the only one appropriate to a figure which is *clothed* †;

* Appendix to Nöhdén's Essay.

† See Denon's Plates, No. 115, for specimens of hieroglyphic head-dresses.

and its symbolical application is to denote the sun at the summer solstice in the height of its strength. This artificial beard, he remarks, is found only on the god Osiris and his son Horus. Osiris appears with it under various forms: (1.) Osiris on a throne with the whip and augur's staff, or with the crux ansata, and another symbol. (2.) Osiris as judge of the dead in the well-known Egyptian representations of the death-judgment. (3.) Osiris as the origin of the mummy form; but here we must distinguish the god when standing upright in complete mummy equipment, from the god lying on the lion-shaped bier: the mummy boxes of sycamore, with the head of Osiris on them, belong to (3.). (4.) Osiris—Cano-bus; the Nile jug, the symbol of the holy Nile water, is identified with Osiris as the symbol of the sun and of power, when it has an Osiris' head. (See Winkelmann, vol. i. pl. 15.)

This statue has received the name of the younger Memnon, partly because it was found in that temple to which the name of Memnonium had been improperly given, partly also because it is supposed to belong to the same class with the statue or statues so celebrated under the name of Memnon.

We have already described the remains of that large edifice, known to Diodorus by the name of the Palace of Osymandyas, and by English travellers, generally called the Memnonium. Within its precincts is the great colossal statue of red granite, broken off at the waist, and the upper part lying on its back. In its fall it has carried along with it the whole temple wall within its reach. The face is entirely obliterated by the hand of man, and to the same cause we must attribute the destruction of the statue. It measures* 6 feet 10 inches over the foot (it is the left one that remains entire), and 62 or 63 round the shoulders: the hieroglyphical

* Hamilton, p. 167.

characters engraved on the arm are large enough for a man to walk in: the length of the nail of the second toe is about one foot, and the length of the toe to the insertion of the nail is one foot eleven inches (*Egypte*). The colossal fist of red granite in the Museum is said by some to belong to this statue, but we are unable to find any evidence of its being brought from Thebes by the French. It was surrendered by them to the English, together with other antiquities now in the Egyptian room of the Museum, at the capitulation of Alexandria; and, according to the French account (see vol. v. pl. 4), it was brought from the ruins of Memphis, where there are still remains of a colossal statue or statues of dimensions quite large enough to match with this fist. We know also from Herodotus* (ii. 110) that he saw at Memphis, in front of the great temple of Hephæstus, six colossal statues erected by Sesostris, two of himself and his wife, each 45 Greek feet high, and four statues of his sons, each 30 feet high. In the French work just referred to there is a drawing of this fist, with a little restoration added to the thumb and one of the fingers. Our print shows the fist just as it is.



Colossal Fist.—No. 7.

* Herod. here speaks of Darius intending to put up a statue of himself.

The following are the chief dimensions :—

	inches.
Length from wrist-joint to knuckle of middle finger about	32
Ditto of long joint of middle finger	26
Round wrist-bone	80
Width of all the fore fingers	30½
Ditto of middle finger	9

The remains of the short cylindrical stick may be observed between the thumb and fore-finger.

This fist probably belonged to a seated colossus like that of which the fragments remain in the palace of Osymandyas. It is not universally the case that seated figures had their hands placed flat on their thighs, like the colossi of Ipsambul, or the specimen in the Museum. In Minutoli's work there is a picture of a colossus, which we shall presently speak of more particularly, which has the right hand closed and resting on his thigh. Neither of these two colossi, the one in the Museum and the other lying in fragments at Thebes, has any claim at all to be considered *the* Memnon, of which Strabo and Pausanias speak. But there is another statue whose title is less doubtful.

CHAPTER XII.

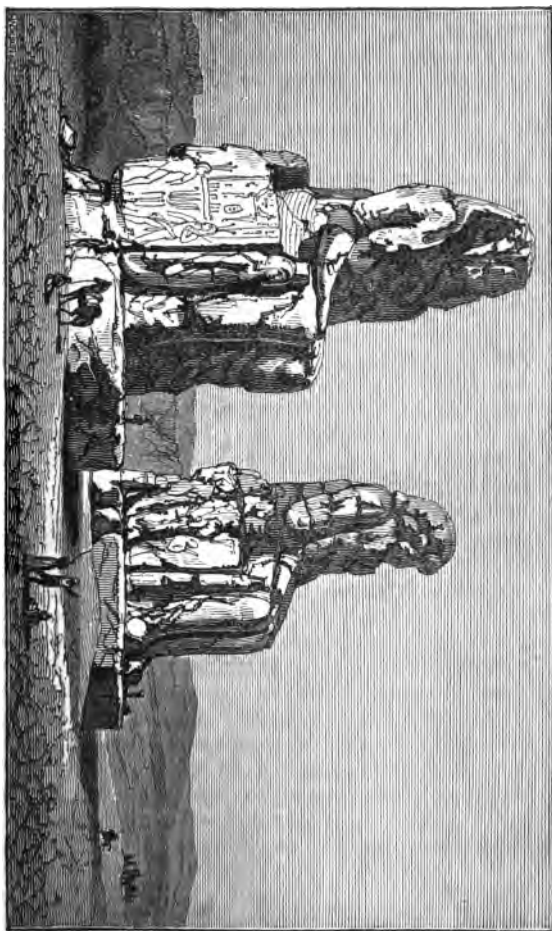
COLOSSAL STATUES.

THE traveller who lands on the west bank of the Nile, and proceeds straight towards the tomb of Osymandyas, otherwise called the Memnonium, will pass two colossal statues seated on their chairs in the plain, between Medinet-Abou and the so-called Memnonium. (See the plan.)

Of these two statues it seems clear that Strabo is speaking, when he says *, "On the opposite side of the Nile (the west) is the Memnonium, where there are two monolith colossi (statues of a single piece of stone) near one another. One of the statues is entire, but the upper part of the other has fallen from its chair, owing, as they say, to an earthquake. It is believed that once a day a sound, like that produced by a moderate blow, proceeds from that part of the statue which remains on the seat and the pedestal. I happened to be on the spot with Ælius Gallus, and many of his friends and soldiers, about the first hour, when I heard the sound ; but whether it came from the base, or from the colossus, or was made by some one of those around the base, I cannot affirm. For as the cause was not visible, one is inclined to adopt any conjecture rather than believe that the sound came out of the mass of stone. Above the Memnonium are the tombs of the kings cut in the rock, forty in number, very wonderful in their construction and well worth examining."

This is evidently the statue that Pausanias afterwards saw in the second century, and which was then in the same condition that Strabo described it

* Casaubon, p. 816.



The two seated Colossi.

to be at his visit. “ * I was most surprised with the colossus at Thebes in Egypt, which you come to after crossing the Nile in your way to the tombs (*σούριγγες*). I saw still seated on his chair a statue † which is generally called Memnon. Tradition reports that he came out of Ethiopia into Egypt, and carried his expedition as far as Susa. But the Thebans say, this is not a statue of Memnon but of Phamenoph, a native of the country. I have also heard some say that this is a statue of Sesostris, which Cambyses mutilated; at present all from the head as far as the middle of the body is thrown down, but the remainder is still seated, and daily at sun-rise produces a sound, which you may best compare with the snapping of a harp or lute string.”

Pausanias here only mentions one statue, which might seem to raise some little doubt as to the identity of his Memnon with that now on the plain of Thebes. But there is evidence on the other side of the question quite sufficient to remove this difficulty.

We will now see what modern travellers say about these two statues. “ † The two other colossal statues, called also by some the statues of Memnon, are in the plain, about half way between the desert and the river. The inundation had hardly left them early in January, and we had some difficulty in reaching them on that account. They are about 50 feet high, and seated each on a pedestal 8 feet in height, 18 long, and 14 broad. The stone of which they are formed is a hard reddish grès. From the action of the weather it is in many places discoloured, and often appears of a black, grey, brown, and whitish

* I. 42, 3.

† *ἄγαλμα ἁλίον* Bekker; *ἁλίον* one MS.; *ἁχῆον* Scaliger: *λίθινον* is a more probable correction.

‡ Hamilton, *Ægyptiaca*, p. 168.

hue."—"The two statues in question are but fifty-four feet asunder; they face the same point of the compass, (S.S.E. Pococke). They are very similar in size, character, and proportions: one of them, that to the south, is certainly of a single block of stone, and the northernmost has evidently been broken off at the waist; and while the lower part is a monolith, the body, arms, and head are constructed of several horizontal layers of stone, apparently of a different kind from the legs and base."

Denon says that these two statues are of a single block, by which he probably means that they originally were. He adds, "They can be seen at the distance of five leagues."—"The height * of the leg and foot of the northernmost statue is 18 feet 5 inches, the length of the little finger 4 feet 5 inches, and the height of the leg and foot of the small figure at his side † is no less than 72 inches. The other colossal statue to the south is nearly of the same dimensions. On the pedestals which support them, are carved a variety of hieroglyphical representations with the usual symbols of Egyptian mystery; and on both sides of the thrones on which they are seated, two priests are represented tightening with their hands and feet bands of lotus-stalks, which are apparently intended to keep upright a table on which the thrones themselves are supposed to be placed." There is a similar representation on the chair of the great colossus of Osymandyas.

It may not be altogether uninteresting to compare with this description the less minute and accurate account of an earlier traveller. Norden ‡ measured

* Hamilton.

† There is a figure in relief on each side, reaching about as high as the giant's knee, and another still smaller standing between his legs.

‡ P. 117, Langlès.

the two colossi on the plain of Thebes by means of their shadows, and he reckons them to be 50 Danish feet high, or about $51\frac{1}{2}$ English feet, from the base of the pedestal to the top of the head. From the sole of the foot to the knees he found to be, by actual measurement, 15 feet; and this, he argues, proves his measurement by the shadow to be correct; for, "according to the ordinary proportions of a man, it follows from this that each figure is 50 feet high, including the pedestal."

The Danish traveller is of opinion that their present mutilated state is owing to time alone; but he does not appear to have noticed that one of them is composed of several pieces in the upper part, and that the other is a solid piece; for he says, "they are both made of different blocks of a sort of greyish sandstone." And this led him to look for the statue of Memnon and the Memnonium in that building, which we have described as the tomb of Osymandyas.

Norden is probably also mistaken as to his inference deduced from the measure of fifteen feet between the sole of the foot and the knees; for the lower parts of colossi, we believe, are not in proportion with the upper parts. This is certainly the case with that colossal figure of the Museum, which is entire; for its height, from the sole of the foot to the knee, when compared with the other dimensions of the figure, does not agree with the ordinary proportions of a man.

These two Theban statues, though mutilated, are deserving of particular attention, because they still present us with the whole effect produced by the largest Egyptian colossi in their original position. The general impression is not destroyed by the injuries which they have sustained. Our print will serve to give some idea of these enormous figures, and the reader may aid his conception of their attitude by examining the colossal statue in the Museum

(No. 38), the posture of which is precisely the same. The height of this figure, with its pedestal, is about 9 feet 6 inches, measured from the bottom of the pedestal to the top of the head-dress.

We have before remarked that some writers are of opinion that the enormous broken colossus lying in the palace of Osymandyas, is the Memnon statue so famous for its vocal sounds; but it seems clear enough that the northernmost of the two statues last described is the Memnon of Strabo, Pausanias, and of numerous visitors who have recorded his musical powers.

The feet of the northern colossus are damaged about the toes; but on his legs, from the lowest part upwards to the height of eight feet, is a number of inscriptions in Greek and Latin, commemorating the names of those who have borne testimony to the sound. These inscriptions probably all belong to the period of the early Roman emperors, and none are much later than Adrian. The name of Strabo cannot be discovered among them. Norden and Pococke, we believe, were the first who copied any of the inscriptions on the Memnon's legs, of which Pococke has given two plates (i. pl. 38, 39). Mr. Hamilton, in his *'Ægyptiaca'* (p. 172, &c.), has also given those inscriptions which are the most legible; and since that time Mr. Salt, the late consul at Alexandria, has made a still more complete collection. His copies of these inscriptions, to the number of seventy-two, were transmitted to the Royal Society of Literature.

IMP. DOMITIANO

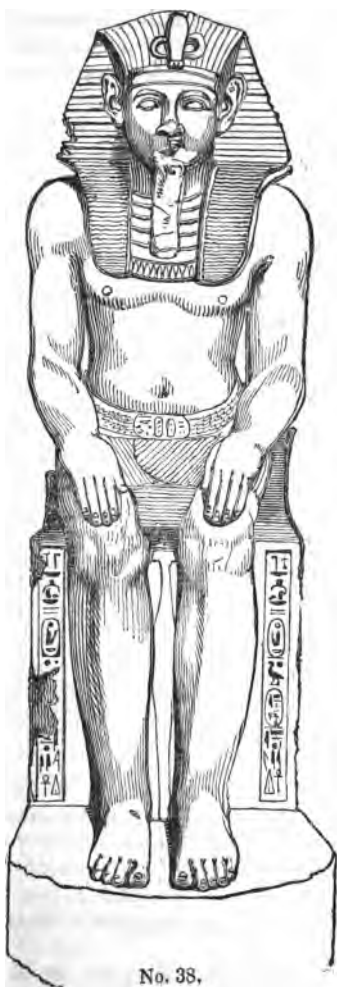
CAESARE AVGVSTO GERMANICO

TPETRONIVS SECVNDVS. PR

AVDITMEMNONEM HORAI PR. IDVS MART

This inscription records the testimony of T. Petronius, in the reign of Domitian, to the vocal sound that issued from the northernmost of the two statues, at sunrise.

The following Greek inscription we shall give in



common characters, and in its corrected state, but we do not vouch for the accuracy of the corrections.

* "Ἐαλευσιν αὐδήσαντος ἰγών, Πόπλιος Βαλβίνος
 φωνᾶς τὰς θυιάς Μίμνοντος ἢ Φαμίνοθ.
 ἦλθεν ἰμοῦ[δ]ίρατῶ βασιλεῖδι τῆδε Σαβίνας,
 ὄρας δι' ἀρώνας ἄλλος ἰσχυρὸν ἄγαμον,
 καρᾶν Ἀδριανῶν ἀμίμων διαδῶ[δ]ίμοτον.
 ἄματα δ' ἰσχυρὸν ἄδου ἀνοσι καὶ πύουρα.

The meaning of this inscription, though it is carelessly written, is clear enough so far as to show that the author of the verses, accompanied by the Empress Sabina, the wife of Adrian, heard the sounds of the Memnon in the fifteenth year of the emperor's reign, and on the 24th of the month Athur†. This inscription, it will appear (from the note), was made by a lady called Balbilla, who, in another set of fourteen verses, on the same statue, speaks of her ancestor Balbillus, whom Letronne conjectures to be Balbillus, governor of Egypt, under Nero. His virtues are recorded in a Greek inscription found between the paws of the great sphinx, and now in the British Museum. But, notwithstanding these inscriptions, it may be urged that there is some difficulty in completely identifying this as *the* Memnon statue. Strabo and Pausanias say that the upper part, in their time, had fallen down; but, at present, the upper part exists in its proper position, though not in a single piece, being built up, as Pococke describes and represents it, with five tiers of stone. Heeren has conjectured that the broken statue might have been repaired, after the

* Hamilton, p. 412. In the first line, instead of Πόπλιος Βαλβίνος, it is said that the reading is, λίθῳ Βαλβιλλᾶ. The last word certainly is Βαλβιλλᾶ in Mr. Hamilton's copy (p. 174); and there is no reason to change the lady into a gentleman.

† Athur is the name of the third month in the Egyptian calendar, and also the name of a goddess, whom the Greeks sometimes called Aphrodite.

time of Strabo, and he assigns the probable age of the restoration as that of Septimius Severus, who is known to have restored several antient monuments in Egypt. This hypothesis, though nothing is more reasonable, has not met with the approbation of some very learned persons.

If we want any further evidence of the identity of the statue which Pausanias saw, with that called the Memnon by Pococke and most English travellers, we have it in the second line of the Greek inscription: "I heard the divine sounds of Memnon or Phame-noth." Perhaps neither Pausanias nor his guides knew that Memnon was the corrupted Greek form of Amenophis, or Phamenophis, or Phamenoth,—the name of several antient monarchs of Egypt.

There is a curious passage in P. Lucas's *Travels in Egypt* (vol. ii. p. 123), from which it would appear (if we can trust the narrator) that in 1714 these two statues were still more perfect. On seeing them at a distance he thought they were pillars; but "having come near them, I saw they were two statues of a fine greyish granite marble, each more than 60 feet high. They are called the cow and calf, because *there are horns on their heads*, like those of a cow." Such horns are often to be seen on the representations of Osiris and Isis on the walls of the temples.

Without examining all that is said on the subject of the vocal Memnon, we may mention another conjecture as deserving of notice. There may have been more than *one* colossal statue with the name of Memnon to which this power was attributed, though that in repute in the age of Adrian must have been the statue with the inscription on its legs. The enormous broken statue in the palace of Osymandyas may have been a Memnon also, for what we know, but there is no evidence at all in favour of this hypothesis. Juvenal's

“Dimidio magicæ resonant ubi Memnone chordæ,
Atque vetus Thebe centum jacet obruta portis,”

“Where broken Memnon’s magic strings resound,
And Thebes with hundred gates in ruins lies around,”

would apply very well to the statue of Strabo, which, he distinctly says, was broken; and it must have remained so till the time of Juvenal and still later. Mr. Hamilton further conjectures that the statue described by Philostratus as the Memnon, and as remarkable for its beauty, may be the very statue in the Museum, to which we now give the name of the younger Memnon. It is conjectured that the sounds supposed to come from the statue were caused by some trickery of the priests, who, in their state of fallen power and influence, sought to regain some credit by miracles of this kind. The earliest notice of this vocal statue is in the passage of Strabo already translated, and in the second book* of Tacitus’ Annals, where Germanicus, we are told, heard the sounds. Alexander Humboldt† speaks of certain sounds that are heard to proceed from the rocks on the banks of the Oronoko at sunrise, which he attributes to *confined air* making its escape from crevices or caverns when the difference of the internal and external temperature is considerable. The French savans attest to having heard such sounds at Carnak, on the east side of the Nile; and hence it is conjectured that the priests who had observed this phenomenon took advantage of their knowledge, and contrived, by what means we know not, to make people believe that a similar sound proceeded from the colossal statues.

* Tacit. Ann. ii. 61. “Memnonis Saxea effigies, ubi radiis solis icta est, vocalem sonum reddens.” The vocal Memnon is also mentioned in Manethon’s catalogue, but the remark about the statue’s musical power may have been inserted by one of Manethon’s copiers. It is possible that Herodotus may be alluding to the Memnon, ii. 106.

† Personal Narrative, iv. p. 560.

But who is the Memnon from whom this statue takes its name? This is not an easy question to answer. He is first mentioned in the *Odyssey* as a hero remarkable for his beauty, and as the son of the East, or the morning*. Diodorus (ii. 22) speaks of him as the son of Tithonus, and a general who was sent by Teutamus, king of the Assyrians, to aid Priam against the Greeks; to him also is attributed the building of the Memnonium at Susa. We cannot help suspecting that the name of Memnon was only known at Susa after the Persian conquest of Egypt, and that the buildings there called Memnonian by the Greeks were, in name at least, the representative of those in Egypt: and this agrees with the tradition mentioned by Pausanias, that Memnon came from Ethiopia, and carried his expeditions as far as Susa. Memnon, it must be recollected, is the Greek name of that antient hero whose Egyptian name, as we see from the Greek inscription above, and from other proofs, is Phamenoph, or Phamenoth †, which is interpreted to be "the guardian of the city of Ammon," or Thebes; or, according to Champollion, "devoted to Ammon," "belonging to Ammon."

The name of Memnon then is of Egyptian or Ethiopian origin, and must be traced to some of the early kings of Egypt, the remembrance of whose actions was preserved both by tradition and by monumental records. In the eighteenth dynasty of Manethon, the Egyptian priest, the name of Amenophis occurs, with this remark: "This is he who is supposed to be the Memnon and the vocal stone." He is the second Amenophis, the seventh king in the series of fourteen that compose Manethon's eighteenth dynasty,

* See also Pindar. *Nem.* iii.

† The *Ph* is the Coptic masculine article signifying *the*; and *Amen* contains the elements of the word Ammon, the name of the deity.

and the son of Thutmosis, who is said to have driven the shepherds out of Egypt. The Assyrian name of Teutamus appears to be nothing more than Thutmosis slightly altered; and Tithonus also has the characteristics of a corrupted Egyptian word. It will not seem surprising that there should be this inversion and complication of Assyrian and Egyptian history, both of which have come down to us through the medium of Greek writers, who were often careless and uncritical. The chief, perhaps the only, authority that Diodorus followed in his Assyrian history, was the Greek doctor, Ctesias, whose fragments contain a great deal of curious matter, scraped together with no judgment or selection. His great heroine, Semiramis, invaded India, Ethiopia, and Egypt: the Egyptian hero, Sesostris, also invaded India, Ethiopia, and even carried his victorious arms into Europe. Thus early tradition confused the histories of two great empires, assigning even the remote regions of Bactria as an appendage both to an Egyptian and Assyrian monarchy, at an epoch, it is true, which may have been different for the two empires, but one certainly beyond all credible history. The Memnon who came from Susa to aid King Priam is, by this story, made contemporary with the war of Troy, while the Amenophis or Memnon of Manetho lived thirteen generations before that event. We may partly trace the origin of this confusion of Assyrian and Egyptian history to the vague notions of the early Greeks on the southern parts of Africa and Asia. The unknown, and, to them inaccessible regions of the south-east, were called by the general term of Ethiopia, and, as is always the case when ideas are indistinct, the further they carried their conjectures into obscurity the nearer did they approximate places and circumstances which were widely remote.

Since the partial deciphering of Egyptian proper

names, we have attained to new and interesting results confirmatory of written history. On the back of the great Memnon statue we now read the name of Amenoph himself with his title or prænomen (according to M. Champollion's version) of "the Sun, Lord of Truth." The same prænomen and name are found on a statue in the British Museum (No. 38), which was dug up behind the great Memnon. Mr. Burton, in his *Excerpta Hieroglyphica*, has given a very clear drawing of the sculptures on the back of the large Theban colossus, from which it appears that the *prænomen* is exactly the same as that on the colossus of the Museum, while the cartouches containing the *name* agree so far as the word Amenoph goes, but differ slightly in certain signs that follow the proper name in the great Memnon, and are included in the same cartouche. M. Champollion has not assigned the meaning of these signs, which he tells us are omitted in some cartouches containing this monarch's name.

Amenophis the second was a builder and a conqueror, like other illustrious monarchs of the eighteenth and nineteenth dynasties. His royal legend is found as far south as the temple of Soleb, which may probably be his work, or that of even some previous king. His name is found also on a temple of Cnuphis, in the island of Elephantine, which we have already assigned to a later age, on account of its resemblance to a Greek peripteral temple. But here it happens that the argument deduced from a comparison of architectural forms is not consistent with that deduced from the reading of hieroglyphic inscriptions. "This temple contains a sanctuary decorated with beautiful bas-reliefs representing, both on the outer and inner walls, a hero offering sacrifices. The second chamber is a *later* addition, and is not adorned with sculptures in the interior. The gallery and two porticos are also later additions, and are covered with hieroglyphics in relief."

(Denon, pl. 66. 128.) The prænomen of Amenophis is on that part of the temple (the pillars) which Denon calls a later addition*.

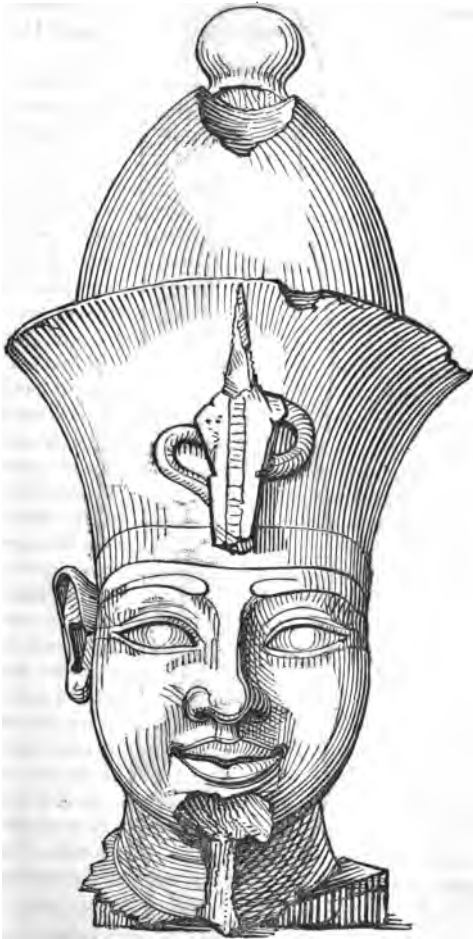
Though it is impossible to reconcile the whole mass of mythological traditions connected with the name of Memnon, it appears probable that it has a real historical origin on the banks of the Nile.

The other colossal head which is (No. 8) in the Museum, and opposite to the Memnon, was also brought to England by Belzoni. (Belzoni, p. 184.) It was found at Carnak, on the east side of the Nile, but at what precise spot the discoverer does not say. It is of red granite, polished to a wonderful degree of smoothness, and well preserved, except the left ear and part of the chin, which, together with the beard, is broken off. Though the head is of somewhat larger dimensions than the Memnon ("being 10 feet from the neck to the top of the mitre"), it was much easier to transport it from its place, as the shoulders are not attached to the head, and, in consequence, the whole mass is not so heavy as the Memnon. The arm in the Museum, measuring about 10 feet in length, also belongs to this colossus, and assists us in forming a more correct idea of the whole figure. It is clear, from the arm being straight, that this colossus must have been a full length † figure, and in a standing posture, of which we find instances in the caryatid pilasters already mentioned. The under part of the arm shows also by the fracture that it was attached to the sides of the figure, as in the Argo colossi; and we see the remains of the cylindrical staff grasped in the hand. This figure, then, originally stood with its back attached to a large block, like the mutilated colossus at the entrance of the hypostyle hall of Carnak. (See Hamilton's plates, No. 10, and Belzoni's drawing.)

The following are the dimensions of this arm:—

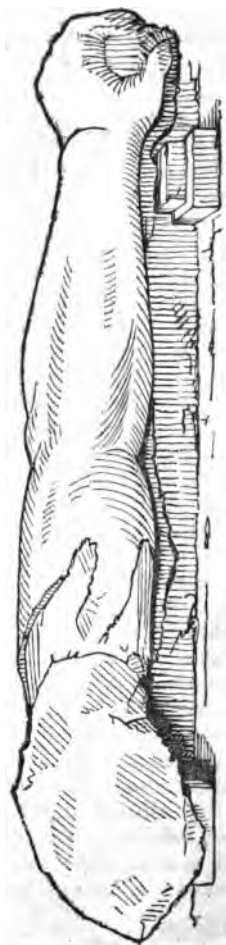
* His name appears in a bas-relief in the interior.—Antiq. i. pl. 37.

† See Belzoni's plate.



No. 8.

2 c 3



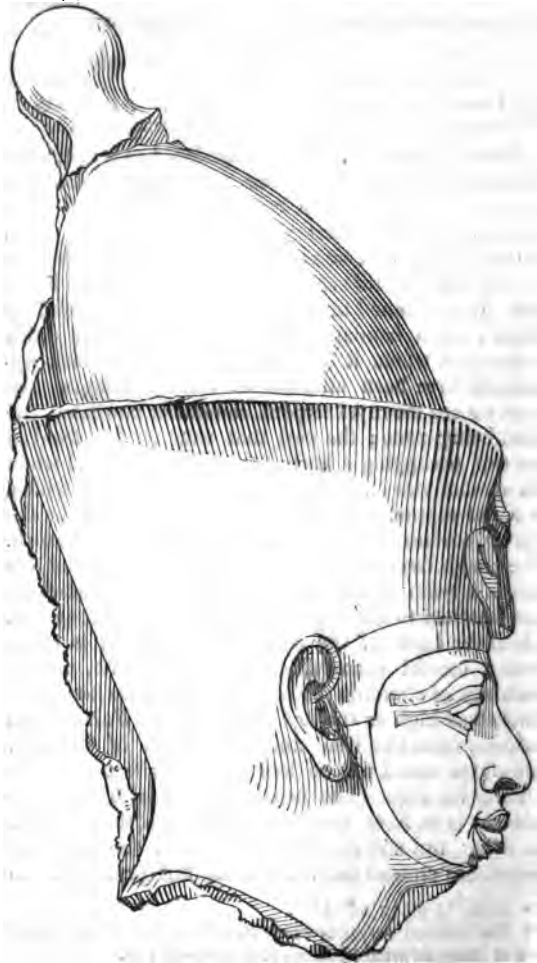
Arm belonging to No. 8.

	inches.
Circumference of arm round the thickest part below the elbow	61
Length from knuckle of middle finger to wrist (the hand being closed)	17
Length of long joint of middle finger	13½
Whole length of arm to junction with scapula	120

This colossus then may be considered as a specimen of part of a *standing* colossus, which, when attached to a caryatid pilaster, we believe, always has a high cap, something like that of the Museum figure. With the exception of a small portion of the top, which is broken off, but still occupying its place, the cap is entire. It is fastened on in the usual way with standing colossi, by a bandage on each side, coming down to the chin, where it met the beard-case, which appears to have been attached to these bandages. In front we see the royal serpent, somewhat mutilated, the head being gone; the part that runs up the front of the cap, occupying a higher place than the head when the symbol was entire, is the tail of the reptile, which, in a flat-capped regal statue, is continued over the convex surface of the head nearly as far as the crown. The rough fracture which runs up the back of the cap, is a remnant of the stone by which the head-dress was fastened to the upper part of the block against which the back of the colossus rested. It is clear, from a careful examination of this fracture, and of drawings of standing colossi, that this back-support reached as high as the top of the cap*. Forming an estimate from the head and the length of the arm, this statue could not be less than 26† feet high, including his cap. The usual attitude of a standing colossus is to have one foot advanced a little beyond the other, but still nearly parallel to it: the arms are sometimes crossed on the breast, but perhaps more

* Antiq. iii. pl. 13, no. 4.

† The colossal caryatids which Herodotus saw in the hall of Apis at Memphis were 18 Greek feet high,—ii. 153,



No. 8.

frequently they hang down along the sides, to which they are attached by a portion of the stone which is left; as we may observe in the present instance, where it is rough and fractured like the piece at the back of the head. The hands often grasp a short cylindrical stick, such as we have described in the Nubian colossi of Argo. The kind of dress which this statue probably had, may be inferred from that of the Argo statues.

	ft.	in.
The length of this statue's nose is . . .	0	11½
Width of mouth from angle to angle . . .	1	1½
Circumference of his neck just where the shirt begins	8	4½

The colossal figure of the Museum, No. 38, possesses a peculiar interest, from being a miniature copy of the great Memnon statue, and from being itself a Memnon. Its material is a breccia so compounded as at a distance to appear quite black, but upon nearer examination it may be called rather a dark grey colour. The stone contains a number of brightish yellow particles, which have been sometimes compared in appearance to the substance called Dutch metal. There is a curious streak of red about three-fourths of an inch wide, running across his right shoulder, his beard, neck, and lappets, which is also visible at the back, where it forms a curve, at first sight looking exactly like some ornament hanging round the shoulders. Belzoni remarks that this and a lion-headed statue are the only specimens of this kind of stone which he ever saw. This statue, which in all respects resembles the great Memnon, was dug up behind the two seated colossi.

This statue, No. 38, has the close-fitting cap on his head, with a broad bandage as usual descending on each side of the face to hold the beard on. The beard itself and part of the chin is broken off, which is almost the only damage the statue has received. The erect serpent is on the front of the cap, represented with several contortions, and

the head rising above them on a part of the stone left in high relief: the tail of the serpent follows the curve of the statue's head, adhering closely to it, and being continued above the position of the *serpent's* head, does not terminate till it has reached the crown of the statue, or somewhat further. The same position of the tail may be observed on the head of the colossus, No. 73, where, however, it is divided on the crown of the head by a rectangular hole five or six inches deep, cut, probably, by some barbarian.





No. 38.

The cap of No. 38, after making two triangular flat projections, against which the ears rest, descends in a lappet on each side, as far as two inches above the nipple. By the aid of this head-dress we may give a complete restoration to the front face of the great Memnon, which, indeed, Pococke* has attempted in his drawing, but not very successfully. The head-dress at the back assumes a singular rounded convex form, marked with a number of radii, all converging towards a centre at the nape of the neck, where they unite in a kind of cylindrical ornament, very like the long pig-tails once in fashion. This pig-tail, which is attached close to the mass of the stone, after running straight down for 12 inches, strikes into the square column which forms the central and upper part of the chair.

The head-dress of this Museum Memnon agrees with Mr. Burton's drawing of the back of the great Theban Memnon, which he has given in his 'Excerpta.' Pococke supposes it to be an imitation of the doum-leaf or Theban palm.

On the front of the statue, we see an ornament extending from the bottom of the throat to the termination of the lappets, and filling up the space between them. This ornament consists of a number of curved lines one above another, assuming the form of strings of beads, or any other similar ornament suspended about the neck. The body and arms are bare. Just below the navel there is a broad belt surrounding the body, on the agraffe of which there are two cartouches; that containing the name has been nearly erased. This, like many other Egyptian statues, has a nether garment of a corduroy appearance, which is attached to the belt. This garment is represented by small flutings on the stone, cut exactly in the style of those on a Greek column; it overlaps

* See Pococke's Egypt, folio, 1743, and Plate to Winkelmann, vol. i. ed. Paris, 1790, (French,) which is taken from Pococke.

in two parts on the thighs, while one end of the garment, which lies between the other two parts, extends as far as the knees. The whole of these three parts, forming a sloping inclined plane, lie between the hands which are stretched out flat on the thighs, with the middle finger reaching nearly as far as the knee-bone. The hands are the worst executed parts of the whole figure. This centre piece of the lappet, which is a truncated isosceles triangle, may be observed on many standing colossi dangling down in front, as on the colossi of Argo in Nubia, which have been already described.

The square column at the back, after descending to the depth of 20 inches from the point of junction with the pig-tail, meets the main back of the chair, which is 31 inches wide. The column itself is $12\frac{1}{2}$ inches wide, and contains two parallel and vertical rows of hieroglyphics, which are continued to the bottom of the seat. Among the hieroglyphics are two cartouches. The back of the chair of the great Memnon is precisely of the same character as this, except that the former has three vertical rows of hieroglyphics running down the back of the chair, with two cartouches in each of two rows, and a third single cartouche in the remaining row. These cartouches, which contain the prænomen or title of the king, followed by his proper name, Amenothph or Memnon, according to the Greek corrupted term, are exactly the same on the back of the Theban colossus and on the Museum figure.

There are two vertical rows of hieroglyphics in front of the chair, running down parallel to each leg, one on each side. Each row contains two cartouches, the same as those on the back. The sides of the chair have the usual lotus ornaments, enclosed in a parallelogrammic frame, just as on the seat of the great Memnon, and on the chairs of many other statues.

This statue as a work of art is not without merit, though the legs from the feet to the knee are somewhat too long, and the arms are too short. The feet are better executed than the hands. The most favourable view is a side one, which shows the back part of the arms and the roundness of the shoulders.

The following dimensions will assist the reader in forming a more just conception of this minor Memnon:—

	ft.	in.
Whole height of figure from base of the pedestal to top of the head	9	6½
Height of pedestal	1	0½
From sole of foot to knee-bone, about	3	6
Length of foot	1	7
Ditto of hand from wrist-bone to end of middle finger	1	2

From comparing the height between the sole of the foot and the knee with the whole height of the seated figure, it will be found that the proportion differs a little from what is true in a well-formed man. The proportion between the height of a man's knee, when seated in such a way that the legs shall be in the same attitude as those of the Memnon, and the whole height, may be represented by the fraction $\frac{2}{3}\frac{1}{2}$, while the like proportion in the Memnon is about $\frac{2}{3}\frac{1}{4}$. The denominator of the former fraction should perhaps be about 53, which will render the difference still greater. This colossus then shows a fact contrary to Belzoni's assertion, that the heads of colossi are larger than they ought to be in consequence of their greater distance from the spectator. In this statue exactly the reverse is the case: the head is certainly small, while the lower part of the legs and the feet exceed their due proportion. This statue, from being badly placed in the Museum and not sufficiently elevated, does not produce the complete effect which it would in a better situation.

CHAPTER XIII.

COLOSSAL STATUES,—CONTINUED.

BEFORE we dismiss the subject of colossal statues, we must say a few more words about Tamy and Shamy, as the two great colossi on the plain of Thebes are sometimes called. The remarks that we are going to make will easily be comprehended by a reference to the plan of the remains of Thebes on the west side of the Nile (p. 235).

The two colossi are seated exactly as they would be at the entrance of a large temple; and behind them (their faces being turned to the river), there is “* an enormous colossus, thrown down and buried all but the back of the chair, which is broken in two about the middle. I cannot conceive how this colossus escaped the notice of travellers.” Advancing still further in a line with Tamy and Shamy, we find numerous pedestals which have belonged to columns of large diameter, and amidst them many fragments of colossal statues of granite, breccia, and calcareous stone, together with pieces of lion-headed statues, which have been both in standing and sitting postures. Mr. Belzoni made an excavation on that part of the ground where he supposed the sekos would be, and on the second day of his search turned up the colossal figure, No. 38, which we have just described. From the above description there can be no doubt that there once stood on this spot a most enormous temple, with the two great colossi in front, and

* Belzoni, p. 292.

numerous other colossal figures in the inner courts, and in front of the portico. Mr. Belzoni conjectures that this may have been the real Memnonium, and that the most northern of the two colossi was the statue whence the building took its name. That this colossus was the Memnon of Strabo, we think is undeniable, but this is all that can be asserted of it. That there was also a temple behind the statues, appears equally clear; but when and how was such a prodigious mass of stone removed? It could hardly have been consumed in any other way than in the erection of new buildings: no other hypothesis would account for its disappearance. And what buildings except those in the neighbourhood would have been made out of such colossal materials? We do not go so far as to conjecture that any remains now existing at Medinet-Abou, or the so-called Memnonium, rose out of the ruins of this temple; but the thing is not impossible, nor improbable. In addition to what we have said about ruins on this spot, Belzoni adds that the bases of the great colossi are much lower than those of the pedestals, just described, in their rear; and he argues that there must therefore have been an ascent from the colossi to the temple. Such an ascent there really is in the temple from which Belzoni took the younger Memnon, the pavement where it lay being much lower than the interior of the building. We may then fairly argue that this once-existing temple was similarly constructed, and that the ground-front of it is now covered by the new earth which the Nile inundation has deposited to the depth of perhaps twenty feet. Heeren (p. 252) considers the building which we suppose to have existed behind the colossi, as the Memnonium of Strabo; for that geographer, he adds, places the Memnon statues in a building called the Memnonium. If this be true, the Memno-

num must have been destroyed since Strabo's time. It is just possible to translate Strabo so as to make him say that the colossi were in the Memnonium; but we do not believe this to be a fair interpretation. In spite of the indiscriminate panegyric often bestowed on this Greek writer, we do not hesitate to say that in all appertaining to minute description, especially in Eastern geography, he is as careless and unsatisfactory as the most ordinary common traveller. That great authority, Pliny (xxxvi. 7), also appears to describe the Memnon statue as *in* a temple. Heeren endeavours to account for the disappearance of this enormous building, which undoubtedly once existed, by supposing it to have been built of calcareous stone, and the materials to have been used for making lime. We cannot perceive the shadow of a probability in this hypothesis. Were there a modern town, like Cairo, in the neighbourhood of Thebes, there would be less difficulty in admitting the learned professor's conjecture.

The following extract from * Philostratus will confirm what has been advanced.

"About Memnon, Damsis† writes as follows:— He was the son of the morning, and did not die in Troy, for he never even went there, but he ended his days in Ethiopia, having been King of the Ethiopians for five generations. And the people of this country, who are very long-lived, lament the death of Memnon, considering him to have died very young, and to have been taken off by an untimely fate. The place where his statue stands is, as they say, like an ancient agora (public place), such as we see in deserted cities, where there are fragments of columns, traces of walls,

* Philostratus' Life of Apollonius, vi. 4.—See also Callistratus' Icones, ix. ; and Philostratus' Icones, i. 7.

† The companion of Apollonius.

seats and door-jambs, and statues of Hermes, partly broken by violence, and partly impaired by time. The statue of Memnon is turned towards the (rising) sun: it has no beard, and is of black stone. Both the feet are close together, according to the style of sculpture in the age of Dædalus, and the hands are pressing on the seat, for the figure is in readiness to rise. This attitude, and the intelligence of the eyes, and all the wonders they tell about his speaking, produce, as they say, only a partial effect, while the statue is inactive. But when the rays strike the stone, which is at sunrise, then the spectators cannot restrain their admiration; for the statue utters a sound as soon as the beams have touched his lips; and his eyes seem to gaze on the light, as men do who are fond of looking at the sun. They say, moreover, that the attitude of the statue produces the impression of his appearing to rise up to do honour to the sun, as men do who rise to pay their respects to a superior."

From the above extract we infer that the writer of it only knew the Memnon by hearsay, but it is valuable as confirming the opinion of the former existence of a temple, which was in ruins when Philostratus wrote.

We are not entirely ignorant of the simple mechanical contrivance that the Egyptians used for transporting the huge masses of their monolith colossi. In one of the* catacombs between Beni-hassan and Sheik-Abâdeh, there is a coloured representation of the mode in which a colossus was moved. The figure is seated upright on a wooden sledge, in each side of which a large (iron) staple is fixed. To these a strong twisted rope is fastened, which goes over the thighs and the arms of the colossus, binding it down to its seat. This precaution could only have been

* Minutoli, plate 13, drawn by Ricci.

intended to prevent any accident from the sledge sinking unequally in the ground, and consequently being liable to turn over; for the weight of the mass itself, as long as it was in an upright position, would give sufficient security to the whole. Two other twisted ropes, parallel to the ground, one some distance above the other, encircle the lower part of the figure and the chair on which he is seated. Where the ropes press close on the angles or projecting parts of the statue, a piece of an animal's skin is placed to prevent any damage from the friction. A large staple is also fastened to the fore-end of the sledge, to which four ropes are attached, each rope being pulled by a number of men, placed in pairs. The rope nearest the fore-ground of the picture, has 22 men to it, the next 21, the third 22, and the fourth 23. It is generally known that the Egyptian artists, and we may add the Greek and Roman, were unacquainted with perspective, or at least did not observe it in their designs; for it is impossible that the Greek artist could have been entirely ignorant of that which the Greek geometers knew how to demonstrate. These four rows of men are placed in the picture in four* parallel lines one exactly above the other; the consequence of which is, that all the ropes, except one, which is represented in a line with the colossus, appear to be bent, and give no idea of any power being exercised by the workmen. There are several other things worthy of observation. The men, as we have described, are in pairs; a black bushy-headed fellow always pulling side by side with a white-headed one. In the line above the four rows of workmen, there is a procession of figures, all white-headed, with palm-branches and palm-leaves in their hands, evidently intended to represent a joyful procession coming out

* Compare with this, the bas-relief in which the monarch is presenting four bulls to Osiris. (Egypte, i. 37, Temple du Sud.)

to meet the colossus, and welcome him to his new home. Their faces are turned towards the colossus, and of course in a direction contrary to those of the men who are pulling. On the prow of the sledge stands a figure with a water-pitcher, from which he is pouring out plentifully in front of the colossus, for the purpose probably of making the ground slippery. On the knee of the colossus another figure is standing. This is the master-workman, who is giving orders and looking out a-head. Just before him stands a man with his face towards the statue, holding in his hands something like a pair of clappers, for the purpose, apparently, of giving some signal. Fifteen figures in five rows, which, in the picture, are placed exactly above one another, follow the colossus: three of them have wands in their hands, and may be called overseers. Though these fifteen figures are represented in parallel lines one above another, it must be recollected that they are all on the same level, and, as they follow in the train of the colossus, must in reality form three rows of five abreast; but the artist could not manage so difficult a piece of perspective as a company of soldiers. There are still six other figures, walking by the side of the colossus. The first three are carrying each a couple of water-jars, which hang from the end of a pole passing over the shoulders, just like the cans of a London milkman. The next three are carrying a long log of wood, containing three deep notches, and one shallow one on the upper part. This was probably intended to stop the colossus, if he went too fast down hill. The head-dress of the statue is painted blue, which confirms what we are told about the practice of painting colossal figures. From this circumstance, as well as from the general appearance of the figure and the great care taken to prevent any damage to it from the ropes, we may infer that it was finished or nearly

finished in the quarry before it set out on its journey. This figure holds in the right hand, which rests on the thigh, a curved kind of symbol, but we do not know what name to give to it.

There are two colossal heads in the Museum which are entirely detached from any other part of the body. They are numbered 43 and 57.

No. 43, like the other, is of brown breccia, highly crystallized. The right side of the face has peeled off, probably from exposure to the atmosphere; and the large coarse component parts of the stone are thus distinctly shown. One could hardly imagine it to be susceptible of so fine a polish as we still observe on the entire parts. The head-dress rises above the eye-brows, commencing with a broad bandage, which is indicated by an elevation in the stone. This head-dress swells outwards a little to the height of twenty-one inches above the lowest part of the bandage; at the top it has been sawed off horizontally for the purpose probably of cutting off the irregular broken parts, and facilitating its removal from Egypt. Some shapeless fragments, three in number, are lying near the head, and appear to have belonged to the upper decayed part. A bandage passes down the cheeks in the usual style, meeting at the chin, where we observe something which is very unusual in Egyptian statues,—indications of a genuine beard, shown by incisions in the stone. This beard commences $2\frac{1}{2}$ inches below the bottom of the lower lip, so as to be a kind of fringy beard just at the tip of the chin; but, it should be observed, that the flat bandages descending on each side of the face appear to be of the same breadth as this fringy beard, which, in fact, may be considered as uniting the two side-bandages at the chin, like a rim or border of false mustachios.

As the chin is broken at this point, we must endeavour to supply the defect by means of its pendant, No. 57, which, though still more incomplete at the chin, shows by a small projection remaining on a fragment of the neck, that it has had a beard-case exactly like that of the Memnon. We may with certainty conclude that No. 47 was the same, and we can therefore easily restore this part of the face, by supposing a rim of hair about $2\frac{1}{2}$ inches deep to run along the lower part of the chin just above the beard-case. This would have the appearance of a beard being contained in a case or artificial covering, with the upper part slightly displayed, and certainly would favour Belzoni's notion of the antient Egyptians having had an artificial covering for the beard.

On the forehead of both these colossal fragments we see the traces of the serpent which has evidently been placed precisely in the attitude of that on the colossal head, No. 8, the tail being higher than the head, and running up the surface of the stone to which it is attached. A further examination of the form of the cap and the bandages will show that these two breccia heads have had exactly the same kind of high cap as the colossus, No. 8, and once belonged to statues somewhat larger.

There is something peculiar in the expression of the countenance in 48 and 57, which is certainly different from any other in the Museum. The angles of the mouth, though elevated in most colossal figures, so as to give the effect of a smile, are raised much more in these specimens than in any other in the Museum, or than any which we know from drawings. The distance between the nostrils and upper lip (of No. 47) is only $1\frac{2}{3}$ of an inch, which is very little, as will appear from comparing it with the following dimensions:—

	ft.	in.
Length of face, from bottom of bandage to bottom of chin, which is not quite perfect, measured along the nose, and in a straight line from end of nose to tip of chin	2	1
Length of nose	0	11
Width of mouth, from angle to angle, measured along the division of the lips	1	2

These two colossal heads belonged (according to the Museum Catalogue) to Mr. Salt's collection, but we are not able to state where they came from, though it is not unlikely that Mr. Salt may have left some memorandum behind him that would explain this matter. In the French work (*Antiquités*, vol. v. p. 27) there is a drawing of a colossal head found not far from the ruins of Heliopolis, which has very much the character of the two Museum heads. That described by the French is 1 foot 7½ inches wide at the forehead; what remains of the head is about the same height, which would allow for the whole head about 3 feet; the whole figure would then be somewhat near 19 feet 6 inches. It seems to us not unlikely that this head in the French work is one of those in the Museum, though it does not agree in its dimensions, nor is there any sign of a head-dress, or indeed of the higher part of the head at all in the French drawing. But the resemblance in expression and character render it at least probable that the Museum heads belonged to the same locality with that represented in the French work.

Colossal statues are found in India, cut out of a single piece of stone, and in some cases placed also in pairs at the entrance of a temple, as in that of Salsette. The following short description will point out another resemblance between the distribution of colossal statues in the interior of Indian and Egyptian temples. “* Columns of porphyry, from twenty

* Bohlen, ii. 83.

to thirty feet high, are fluted with the most elegant taste, and adorned with the most varied kind of decorations, figures, arabesques, and leaf-work, and then polished. On three sides of the pedestals of the pillars, which are five feet high, there are colossal statues eight feet high, generally in an attitude of prayer." The island of Java contains, in the interior, remains of large temples, which bear the undoubted stamp of Indian origin. " * The statues of the gods are generally of marble seven feet high, hewn out of a single piece, and have reference to the worship of Siva and Buddha. The most splendid remains are those of Chandisevu, the entrance to which is formed by eighteen gigantic watchmen."

The great statue at Sumnat, in Guzzerat, which was broken by Mahmud, was five ells in height, made of marble, and inlaid with gold and precious stones, as well as the fifty-six pillars of the hall in which it stood. Makrizi, in describing the monolith of Memphis (see p. 197), speaks also of two great statues standing near it, and of a third, which he calls the statue of Aziz, which was in the monolith, and made of gold, with two precious stones for the eyes. At Sivasamudra on the Cavery, there is a reclining † statue of Vishnu, in a temple. (Valentia, i. 442.) It is 7 feet long and wears the pyramidal cap, which, in some degree, may be compared with the high Egyptian cap, found on caryatid colossi. The colossal bull ‡ of Tanjore (Daniell's Views, vol. ii. No. 22) is formed of a single block of stone, 16 feet 2 inches in length, by 12 feet 6 inches in height, and of a kind not to be met with but at a considerable distance from Tanjore. It is in a reclining posture,

* Bohlen, ii. 89.

† Herodotus, ii. 176, speaks of two reclining colossi, 75 Greek feet long.

‡ Daniell's description.

in a flat roofed apartment open at each end, but supported at the sides by ornamented pillars in the antient Hindoo style. Another set of pillars parallel to those just mentioned also support a flat roof, and thus form a kind of gallery on each side of the chamber, in which the sacred bull reposes. Lord Valentia (i. 356) says this bull is of black granite, and that Daniell's drawing is incorrect as to the number of pillars supporting the roof over it, and the space between each of them. It appears, from the drawing, to be covered with a kind of drapery, which is either real or cut in the mass of the stone to represent a covering. Figures of bulls, in the same posture as the great idol, are seen in various positions on the terraces of this temple of Tanjore.

There is another colossal bull at Talicut, which is described by Lord Valentia as placed on the top of a small temple; it is about 12 feet in length and $8\frac{1}{2}$ high, with garlands of flowers and rich trappings about it. Lord Valentia also describes a clay bull, evidently of modern workmanship, at the entrance of the antient pagoda of Conjeveram near Seringapatam. It is in company with four monstrous lions.

The practice of placing colossal lions of stone at the entrance of a temple was both an Egyptian and Hindoo usage. Abd-allatif describes two that he saw at Memphis, opposite to one another, and of proportions far beyond those of nature. He says the sight of them inspired fear, for the sculptor had maintained with perfect skill all the exactness of form and proportion. These lions, he tells us, were afterwards broken and covered with earth.

It was sometimes the practice of the Egyptians to paint their colossal statues, as we learn from Abd-allatif's account of the great colossus which he saw in the ruins of Memphis. Traces of red paint are still discernible on the face of the great sphinx and on

one of the four colossal figures attached to the front of the temple of Ipsambul. Among the Greeks we find colossal statues not uncommon*, and several, which Pausanias mentions, were 30 feet high and upwards. The people of Elis set up a bronze statue of Jupiter 27 Greek feet high †, in the Altis or sacred grove near Olympia, and the chryselephantine statue of the same deity, placed in his temple on the banks of the Alpheus, was probably not less than 60 feet high. Among the Greeks the most common colossal statue was the chryselephantine ‡, though occasionally marble, and still more frequently metal, was used for the same purpose; but as it is simply our object to show how widely this taste for colossal figures was spread, we shall be satisfied with citing the famous work of Chares (the colossus of the sun), which was set up at Rhodes. This work of Grecian art surpassed anything that the world has ever seen. “§ It was 70 cubits high (105 Roman feet). After standing fifty-six years, it was thrown down by an earthquake, but it is still a wonder even in its prostrate condition. Few men can embrace its thumb; and its fingers are larger than most statues. Huge caverns are seen in the fractured limbs, and within them immense stones which had been put there for the purpose of keeping it steady. This enormous statue is said to have cost 300 talents, and twelve years' labour.” The colossus which Nebuchadnezzar set up in the plain of Dura, was “an image of gold||, whose height was three-score cubits, and the breadth thereof six cubits.” Herodotus also mentions a colossal statue twelve cubits high, and of solid gold, (which, however, he did not see,) as having once existed in the temple of Belus at Babylon.

* See Herod. ix. 81.

† Pausan. v. 24, 4.

‡ See Menageries, Elephant, p. 330. § Pliny, xxxiii. 7.

|| Daniel, iii. 1; more probably a gilded statue.

It should be observed that Egyptian sculpture, like the sacred sculpture of the Hindoos, was fettered by prescribed forms. All colossal statues, we believe it may be safely asserted, were connected with religious ideas, and with the personification of deity, and hence it was part of the religious system to preserve their peculiar character, and not to let the sculptor indulge his own taste or imagination. When we read of colossal statues of kings, such as that of Sesostris, it is no contradiction to the position we have just laid down. The earlier kings of Egypt possessed both priestly and royal dignity, and they assumed to themselves the titles of descendants of the gods, as we may observe in the inscription on the obelisk of Heliopolis*. The art of sculpture being subject to fixed rules, necessarily remained stationary, and the workmen could only show superior skill by giving to the prescribed outline all the finish of execution which the subject admitted. Hence the smoothness to which the stone of the colossal statues is polished, the solid unity and tranquillity which are their most striking characteristics, joined to tolerably correct proportions, are well calculated to produce a feeling of admiration and of superior power. Belzoni remarks that the heads of colossal statues are proportionally larger than the lower members, which has been designedly done, in order that the due proportion of parts might be preserved to the eye, which, in observing the statue, would be further from the top than from any other point. Though we are not inclined to dispute the accuracy of Belzoni's remark, it should not be forgotten that the entire colossal statue of the Museum is an exception to the rule laid down. To give effect to their colossal figures, both standing and seated, the Egyptians frequently placed smaller figures at their sides or between the

* See p. 339.

legs, or sometimes in both positions. Abd-allatif observed this in the colossal figures of Memphis, and the accuracy of his description both on this and other occasions makes us the more willing to trust him where we have not the means of verifying his assertions. "I saw a statue which had between its legs another smaller one cut out of the same block, which, compared with the large one, looked like a child; and yet the small one exceeded the stature of the tallest man." We may observe the same thing in the sculptures of India. Daniell's plate, No. 10, vol. v. contains a S.E. view of the Fakir's rock at Sultan-gunge on the Ganges. The numerous figures cut on this rock are a kind of intaglio, or rather very high reliefs sunk in a deep frame, the plane of which is considerably lower than the plane of the rock. Some of these sculptures appear to be very large, and we often observe a tall figure flanked on each side by a small one, not reaching up so far as the middle of the centre figure.

Belzoni remarks that the Egyptians had only four kinds of stone in general use for the purposes of sculpture—sandstone, calcareous stone, breccia, and granite,—specimens of all of which may be seen in the British Museum. The Memnon's head is a specimen of a kind of granite: the colossal ram's head, and the two small figures (No. 74) are of sandstone: the colossus (No. 73) is a hard calcareous stone; and the entire seated statue may as well be called a breccia as anything else. Porphyry, though plentiful in some parts of the Egyptian deserts, does not appear to have been used for statues by the Egyptians.

We ought not to omit mentioning a remarkable work of art in the colossal style which has been executed in modern times, and may serve to explain how the colossus of Rhodes was constructed. We mean the Borromeo colossus, which stands at Arona, on the

bank of the Lake Maggiore, in the north of Italy. It was erected at the expense of the people of Milan, A. D. 1697, to commemorate the virtues of San Carlo Borromeo, once archbishop of Milan, who died in 1584. This colossal statue, which is 66 feet high, is made of hammered copper, but the hands, feet, and head, are of bronze, cast from models by Cerano, one of which, a model of the thumb, is kept in the Ambrosian library at Milan. The figure stands on a granite pedestal 46 feet high, which, added to that of the colossus, gives a total height of 112 feet. Independent of the wonder excited by the contemplation of so enormous a statue, the parts of which are so carefully put together as to present the appearance of one mass, the expression of the countenance, and the attitude of the figure, in the act of benediction, are said to be both simple and commanding. By means of a circular staircase in the interior of the statue, the curious traveller may ascend into the saint's head, and look out of the windows of his eyes on the noble prospect which is before him. Four persons, we are told, can sit in the hollow of this colossal head round a table.

. The word commonly used by Herodotus to signify an Egyptian colossal figure is *kolossos* (κολοσσός): but he also uses the words *ἀνδρὶς μέγας* (large human figure), or simply *ἀνδρὶς*, to express the same thing. The word *kolossos* does not appear to signify, in its original acceptation, a figure above the human size.— See Æschyl. Agamem. 405.

CHAPTER XIV.

OBELISKS.

OF all the works of Egyptian art, which, by the simplicity of their form, their colossal size and unity, and the beauty of their sculptured decorations, excite our wonder and admiration, none can be put in comparison with the obelisks. As lasting records of those antient monarchs, whose names and titles are sculptured on them, they possess a high historical value, which is increased by the fact that some of the most remarkable of these venerable monuments now adorn the Roman capital. The Cæsars seem to have vied with one another in transporting these enormous blocks from their native soil; and since the revival of the study of antiquities in Rome, the most enlightened of her pontiffs have again erected those which had fallen down and were lying on the ground in fragments.

Part of the materials of the following chapter are derived from the folio volume of Zoëga (*De usu et origine obeliscorum*), and though it may not be too much to affirm that the question, as to the "use and origin of obelisks," is still as debateable as ever, yet this learned work is truly valuable for containing an account of all the obelisks, as far as they were then known, with the passages of antient and modern writers referring to them, a description of their sculptures, and a great variety of matter interesting to the student of Egyptian antiquities. Since the publication of Zoëga's work, our knowledge of the existing obe-

lisks of Egypt has been much extended by the more accurate descriptions and drawings of modern travellers; among which we set as high a value on those made by Mr. Burton, in his 'Excerpta Hieroglyphica,' as on any which we have seen. They will bear the test of minute comparison with the most trustworthy descriptions both of the older and the more recent travellers in Egypt.

A short notice of the history of Zoëga's* work is not irrelevant to our subject. George Zoëga (born 1755) was by birth a Danish subject, and a native of Jutland. His early passion for the study of antiquity was shown by the progress which he made in the learned languages, and all that appertains to the illustration of antient authors, both at the school of Altona, and at the University of Göttingen, where he attended the classes of Heyne and Meiners. A tour through the south of Europe, in 1776, and a visit to Rome, laid the foundation of that passionate attachment to the great seat of antient art, which was not diminished by a return to his native country. In the year 1784 we may date his final establishment at Rome, where he continued till his death, in 1809. Like Winkelmann, he turned Roman Catholic, but not for the purpose of securing himself a ready passage and a welcome reception at the papal court. His conversion, if we may call it by such a name, was the sole condition on which he could obtain for his wife a young and beautiful Roman lady, to whom he was strongly attached. Maria Pietruccioli and the love of antient art fixed Zoëga at Rome, where he lived a life of laborious study, devoted to his favourite pursuits; and, for a long time, hardly sufficiently free from pecuniary embarrassments to relish those pleasures with which a student must be contented.

* Biographie Universelle, art. Zoëga. His Life has also been written by Welcker.

Pius VI. having determined to imitate some of his predecessors in re-erecting those obelisks which still lay on the ground, wished to accompany them with an historical commentary and illustration. Zoëga had already made himself known by his work on the Imperial Medals of Egypt, contained in the cabinet of Cardinal Borgia; and to him accordingly the Pope confided this new undertaking. He spent the years 1790 and 1791 in carefully studying the obelisks, in which he was aided by copies of the sculptures furnished him by the liberality of the Pope. Though he did not succeed in forming any satisfactory explanation of the hieroglyphics (which, indeed, was hardly part of his plan), yet he established a fact hitherto not suspected—that the art of hieroglyphical writing or sculpture did not cease on the conquest of Egypt by Cambyses, as had been generally supposed, contrary to all reasonable probability, but that it continued in use till the final triumph of Christianity over paganism. Zoëga's work is, in fact, as we have already remarked, an immense compilation of all that was then known about the origin, the signification, the history, and the sculptures of obelisks, with a comparison of their different styles, intermingled with much valuable information on Egyptian arts, history, and mythology. At the end of the volume there is a series of faithful engravings of those obelisks which Pius VI. erected. This laborious work was finished in 1796. One great value of it consists in the numerous extracts from modern travellers, given at the foot of the page, which we have in several cases made use of, but not without at the same time referring to the originals, when they could be procured.

An obelisk is properly a single block of stone, cut into a quadrilateral form. The horizontal width of each side diminishes gradually, but almost imperceptibly, from the base to the top of the shaft, which is

crowned by a small pyramid, consisting, as usual, of four triangular sides meeting in a point. Most obelisks, of which any accurate dimensions have been given, have only the opposite pairs of sides equal; one pair often exceeding the other in the horizontal breadth by six or seven inches, or even more than a foot. Obelisks were sometimes of small dimensions, such as the two fragments in the Museum, and two much smaller at Florence, and in that case were of sandstone or basalt; but the large obelisks are all made of the red granite of Syene, from which place they were transported to the most distant parts of Egypt. It would appear, from an inspection of the great gateway of Luxor, from the remains of Heliopolis, and the two obelisks of Alexandria, that they were principally used in pairs, and placed on each side of the propyla, or great entrance to a temple. But they were also placed occasionally within the interior of the temple, but still in front of gateways, as at Carnak; just as small obelisks are said to be found within the rock-cut temples of Ellora. An obelisk of large dimensions is exceedingly well calculated to produce an imposing effect. Rising from its base in one continuous unbroken line, the eye, as it measures its height by following the clearly defined edges, meets with no interruption; while the absence of all small lines of division allows the mind to be fully impressed with the colossal unity of the mass. Its diminishing bulk also, as it rises from the base, takes away all appearance of heaviness; and the quadrilateral pyramidal top forms a more pleasing termination than any other figure would give. The different effect produced, even in a common sketch, by the huge solitary pillar at Alexandria, and the obelisk called Cleopatra's Needle, is sufficient to show the advantage of the obelisk-form. Were an obelisk, half the height of the London monument, placed by

its side, it would produce a much stronger impression, owing to the superior advantages of its shape. For a *single* object of large dimensions, a pillar, with its large base and heavy capital, is one of the worst forms; and we are decidedly of opinion that some of the high chimneys attached to our manufactories produce a more striking and pleasing effect than the monument of London would, in any position whatever.

Abd-allatif (see p. 48) mentions that the obelisks of Heliopolis had, in his time, a copper cap on the top, which, we believe, must have been an addition made by some of the various people who have conquered Egypt. As far as we know, there is no reason for believing that this was the practice among the Egyptians.

Of the two obelisks of Alexandria (see Denon, pl. 9) one only is standing. But they must have been both standing when Abd-allatif wrote, about the close of the twelfth century, for he says he saw two obelisks near the sea, without making any mention of one of them being on the ground; though, when he speaks of the two obelisks of Heliopolis, he takes care to say that one of them had fallen. From their present position it would appear that they must have been placed at the entrance of a palace or temple*. They are of red granite, about 65 feet high, according to English travellers, and at the base, we cannot say whether 7 feet square or 8, for writers vary one foot in their account of the length of a line, which certainly does not exceed 8 feet; or, it is possible, that one traveller may have measured one side and another a different one, without being aware that they are not all equal. It is not at all an unfair inference that there are proportionate errors in their measurement of the length.

* Pliny says so, xxxvi. 9.

The dimensions of the obelisk that now stands, as given by Denon, in French feet, are the following: a Paris foot is one foot English and $\frac{1}{11}$ part nearly.

	ft. in.
Height of the pedestal, which consists of three steps	5 2
Height of the cubical kind of base	6 6
Breadth of ditto	7 10
Height of the obelisk from the top of the base	62 12

The cubical base is no part of the obelisk, being always, we believe, a separate block, as in the instance of that obelisk which Belzoni removed from Philæ. While the French army was at Alexandria, the earth was removed from the base of Cleopatra's Needle, and it was laid bare to the lowest foundation stone, when the above measures were obtained, which, it will be observed, are somewhat different from those given on English authority. One of the two Alexandrine* obelisks has been presented to the English nation, but it has not yet been carried off; which may at first sight appear surprising in a country where the economy of public money has not been considered a virtue. The explanation probably is, that many claimants have been found more importunate in their demands than the obelisk. We are glad to learn that the present government intend to transport one of these antient monuments to our metropolis. It was stated in the House of Commons, April 15, that the Alexandrine obelisk is 64 feet long, and weighs 284 tons. The probable expense of removal is £15,000.

† The following additional matter, taken from Nor-

* We are not quite sure whether it is Cleopatra's Needle that was presented to the nation, or one of the obelisks in front of the gateway of Luxor. The Alexandrine obelisk is hardly worth bringing.

† Norden par Langlés p. 5, Norden travelled in 1737, &c.

den's Travels, will supply some deficiencies in the description of this obelisk.

It is the standing obelisk which is called Cleopatra's Needle; it is about midway between the modern city and the little Pharos (petit Pharillon); and the base, part of which is covered with earth, is about 20 feet above the level of the sea. Only two of the faces are in a state of good preservation; the west side is the best; the other two, the east and south sides, being so much damaged by the moist atmosphere of Alexandria, that one can hardly see the sculptures on them. The south side has suffered most of all. The fallen obelisk is almost covered with earth, and, according to Norden, appears to have been broken, but he conjectures that it contains the same sculptures, and in the same order as that which is still standing. We see on the fallen obelisk (Norden, pl. 7) a cartouche containing the name of King Ramses, which also appears most distinctly on the west or best preserved side of the standing obelisk. Each face of this last-mentioned obelisk has a row of three crowned hawks, just under the base line of the pyramidal top. Before the obelisk (between it and the sea) are a great many fragments of marbles, which, no doubt, belonged to the antient edifice, whose entrance was decorated by the two obelisks. The obelisk stands a little to the east of the new town, and near the sea.

The position and dimensions of these two obelisks agree with what Pliny says (xxxvi. 9)—“There are two other obelisks at Alexandria, near the port and close to the temple of Cæsar, which King Mesphres cut out of the quarry, each 42 cubits high.” One royal name on the obelisks is Ramses the Great, as we have already stated, his name being perfectly legible in Norden's drawing. We see also distinctly the well-known prænomens of this monarch*. But there is also

* See Champoll. Précis, pl. xvi. No. I.

another cartouche containing three figures, which are, most probably, only a variety of the name Ramses.

These Alexandrine obelisks, from their high antiquity and their connection with the history of the Greek city of Alexandria, deserve as minute a description as we can give. We therefore add the following account. Plate 33, (vol. v.) of the French work on Egypt, contains a view of two of the faces of the standing obelisk, and two faces of that which is lying on the ground.

	ft.	in.
Width of one base of Cleopatra's Needle	8	2
Width of same face of the obelisk at base of the pyramidal top	5	1 $\frac{3}{8}$
Width of adjacent base (the two opposite ones, as usual, being equal)	7	8 $\frac{7}{16}$
Ditto of base of pyramidal top	4	8 $\frac{1}{2}$
Height of obelisk from base of shaft to base of pyramidal top	57	6 $\frac{3}{8}$
Ditto of pyramidal top	6	6 $\frac{3}{8}$
Whole height of shaft	64	1 $\frac{1}{8}$

These dimensions of the base are not taken quite at the bottom of the shaft; but on one side 3 feet and $\frac{1}{4}$ inch above the bottom, and on the other side somewhat less.

Height of pedestal on which obelisk rests	6	11
Respective heights of the three plinths on which base stands, 1 foot 7 inches, 1 foot 9 $\frac{1}{4}$ inches, 2 feet 1 $\frac{3}{8}$ inches, making altogether	5	5 $\frac{7}{16}$
Whole height of obelisk and its supports, adding the 3 feet $\frac{1}{4}$ inch	79	6 $\frac{3}{16}$

The standing obelisk contains three different cartouches, two of which are titles and the third is the name of Ramses. That which lies on the ground contains five different cartouches, three of which, with some slight variations, are the same as on the other obelisk. The name Ramses is found here also together with another name.

This obelisk has camels' heads sculptured on it; and a reptile, which is either a lizard or a crocodile. On the faces of the pyramidal top a male sphinx with human arms is represented reclining on an altar, with a deity seated in front of it. The deity has the hawk's head and the solar disk—the emblem of the god *Ré*, the Sun. The hands of the sphinx appear in the drawing as they really ought to be, which is probably an error of the draughtsman. It is most likely that they resemble the arms of the sphinx on the Campensian obelisk, and on the bas-relief of Carnak. (See p. 219.)

The mode in which such enormous masses, as an obelisk 60 or 80 feet in length, were cut out of the solid rock, and afterwards placed on their base, may perhaps be made tolerably clear, by seeing how similar works have been accomplished in our own day. “ * In the granite quarries near Seringapatam, the most enormous blocks are separated from the solid rock, by the following neat and simple process. The workman having found a portion of the rock sufficiently extensive, and situated near the edge of the part already quarried, lays bare the upper surface, and marks on it a line in the direction of the intended separation, along which a groove is cut with a chisel about a couple of inches in depth. Above this groove a narrow line of fire is then kindled, and maintained till the rock below is thoroughly heated, immediately on which a line of men and women, each provided with a pot full of cold water, suddenly sweep off the ashes, and pour the water into the heated groove, when the rock at once splits with a clear fracture. Square blocks of 6 feet in the side, and upwards of 80 feet in length, are sometimes detached by this method.”

* Sir J. F. Herschell's Discourse, p. 47, who refers to Dr. Kennedy's account of the erection of a granite obelisk at Seringapatam, Ed. Phil. Trans. ix. p. 312.

Agatharchides, in his account of the gold mines of Egypt, says, that the rocks were split by burning wood, but he gives no further information on the mode of doing it.

Belzoni * suggests that the Egyptians cut their blocks in a manner somewhat similar, as far as he could conjecture from the present appearances in the granite quarries of Assouan. He supposes that the figure of the piece to be taken out of the rock was determined by cutting with a chisel a line about two inches deep all round, and then separating the mass from the rock by some sudden blow with a machine. Whatever may have been the precise mode of effecting this, we are assured by Gau, who examined the quarries at Kalapsché, in Nubia, that there had been no waste of material, but that the rock was cut in such a way that every piece of stone was made available. This might possibly have been done even with the chisel alone, for the Egyptians seem not to have been people who were sparing of labour. Some further remarks on the Egyptian quarries we shall find it most convenient to add at the end of the chapters on obelisks.

To transport such huge obelisks as those of Luxor, which are above 80 feet high, from the quarries of Syene to Thebes, and even as far as Heliopolis, must have been an arduous undertaking. The chief difficulty, however, would be in removing the mass safely into a boat or on a raft, and in taking it out again. Mr. Belzoni succeeded in placing an obelisk (from the island of Philæ), 22 feet long and 2 wide at the base, in a boat with no other aid than poles, rotten palm ropes and some ignorant Arabs. Indeed, at the first attempt the obelisk crushed down the pier that had been made for the purpose of removing it into the boat and slipped into the river. After

* Belzoni, p. 105.

being rolled out on the dry shore it was placed on board simply by means of a bridge of palm-trees. He also contrived to convey the obelisk safely down the cataracts of Assouan at a season when the river was low, and the fall of water consequently the greatest, which increased the risk of striking against some of the numerous rocks that lie in this part of the river. "This obelisk," Belzoni remarks, "was not smaller in height than that in St. George's Fields (London), but of a stone of much heavier quality."

It was the removal of this obelisk from Philæ which chiefly exposed Belzoni to the intrigues and plots of Drovetti, himself a collector of antiquities for sale, and an ardent admirer of this obelisk in consideration of its supposed exchangeable value. If half that Belzoni says of him be true, it would be difficult to find a more accomplished knave. It is but fair, however, to state that Gau in his visit to Egypt found Drovetti kind and obliging; but Gau's pursuits were not those of a tradesman in antiquities, and therefore not likely to excite the Italian's jealousy. Whatever colouring we may suppose to be given to his own side of the question by Belzoni, the main facts which he states are decisive against the said Drovetti. The obelisk which Belzoni took from Philæ, was safely landed at Alexandria, but what became of it after we do not know*.

Obelisks, on arriving at the end of their journey, were placed on their pedestals, most probably by means of banks of earth, after the manner still in use in India. In the extract which we have just made from the discourse on Natural Philosophy, a reference is given to the Edinburgh Philosophical Transactions, which contain a communication from Dr. Kennedy, on the way in which a granite obelisk was raised by

* We have been informed that it is in the possession of Mr. W. Bankes, at whose expense it was removed.

the natives at Seringapatam, which may probably throw some light on the contrivances adopted by the Egyptians for similar purposes*. The account is contained in a letter from Colonel Wilks to Dr. Kennedy. The Colonel states that he writes from recollection only. This obelisk, which was erected at Seringapatam, in 1805, to the memory of Josiah Webbe, was entirely the work of the Hindoos, with the exception of the design, which was furnished by a European.

The plinth of the obelisk is $1\frac{1}{2}$ feet thick, formed of three stones of equal dimensions, which rest on three similar stones, placed, as Colonel Wilks believes, on the solid rock which was levelled to receive them. The pedestal is a single stone, 9 feet high and about 7 wide. The base of the obelisk was 6 feet in diameter, and a hole about 3 inches deep was cut in the top of the pedestal to receive it; this would leave a ledge of about 6 inches on each side, between the bottom of the shaft and the edge of the pedestal.

Colonel Wilks, speaking from memory, says the shaft is not more than 60 feet long, but he adds, that other persons, who speak from memory also, state it to be 70 feet at least. The first stone quarried was 84 feet long, but after being moved a few yards, it was broken by an explosion of gunpowder intended to break a detached stone that stood in the way. This led the native superintendent to contract his design as to the magnitude of the block, which at last was successfully transported from the quarry to the place where it was erected, a distance of about two miles. We have already mentioned one way of splitting large masses, referred to by Sir F. Herschel in his Discourse on Natural Philosophy, and we now shall mention another which is also described in Col. Wilks's letter, and is not unlike the mode by which

* Edinburgh Phil. Trans. ix. 312.

Belzoni conjectures that the antient Egyptians detached large masses of granite from the rock.

“The workman looks for a plain, naked surface of sufficient extent, and a stratum* of the proper thickness, sufficiently near the edge of the rock to facilitate the separation, or made so by previous trimming.

“The spot being determined, a line is marked along the direction of the intended separation; and a groove of about two inches wide, and the same depth, is cut with chisels; or, if the stratum be but thin, holes of the same dimensions, at a foot and a half, or two feet distance, are cut along the line. In either case, all being now ready, a workman with a small chisel is placed at each hole or interval, and with small iron mallets the line of men keep beating on the chisels, but not with violence, from left to right, or from right to left; this operation, as they say, is sometimes continued for two or three days before the separation is effected. Those who have observed the mode of cutting (as it is called) plate-glass, will not be surprised at their beating from one end, and the fissure also taking place, from one end to the other. This is the mode by which the stone in question was separated.” The second method, already described (see p. 304), is said by Colonel Wilks not to produce so clean a fracture as that just detailed.

As granite is very brittle, it was necessary to use great caution in removing so large a mass. Colonel Wilks does not state either the time employed in the removal, or the expense of the different parts of this process. It was, however, removed by men with

* Colonel Wilks apologizes for using the word stratum, as it may displease some geologists; but he says it is the only term which will explain the kind of mass out of which these large pieces are taken. These *strata*, or beds of granite, vary both in their inclination and thickness.

ropes, about 600 at a time being employed. Colonel Wilks goes on to describe the mode of raising it thus :

“ To shorten my description I must anticipate a little, by requesting you to conceive the shaft finished, and placed ready for erection in a horizontal position, raised to the proper height, and with its base accurately placed for insertion in the top of the pedestal, when it should attain a vertical position. Then imagine a strong wall, built at right angles with the line of the shaft, and a few feet beyond its smaller end ; with two lateral retaining walls, parallel to the shaft, and a fourth of smaller elevation, near the pedestal, to support the mass of earth and workmen to be employed. On such a platform, raised ten and a half feet, you will, in the first instance, conceive the shaft to be horizontally arranged. Two lines of timber, plank or balk, were then ranged along the two sides of the shaft, to serve as fulcra, and two lines of men with handspikes, attended by others ready with chocks or pieces of timber of different thickness, to be inserted under the shaft for the purpose of keeping the elevation of the smaller end, effected by the handspikes, and distributing the pressure so equally as not to risk the accidents which would otherwise be inevitable with this very fragile substance. In proportion as elevation was thus gradually obtained for the smaller end, the space below was filled with rammed earth, and the same process was repeated with the parallel balks of timber, handspikes, and chocks ; the small end gradually rising at each successive step, the wall behind increasing in height, and an inclined plane of solid earth gradually increasing its angle with the horizon until it equalled that at which solid earth could with safety be employed ; when the force required being proportionally diminished, timber alone was employed for its elevation. Finally, a scaffolding of timber was erected,

embracing three sides of the pedestal, and nearly equal to the ultimate height of the obelisk ; ropes were applied to the summit of the shaft, in such directions as to steady and check it ; handspikes gave the requisite impetus, until it felt the power of the ropes, and was ultimately and safely lodged in its shallow receptacle."

Colonel Wilks, fearing the hole in the top of the pedestal might not be accurately horizontal, offered the engineer the use of a spirit level ; but though he admired the contrivance, he did not like to venture on a new method. By dropping water on the surface he ascertained by its motion that some parts were higher than others, and accordingly the surface was again worked till it was a perfect level, and a drop of water would stand still on any part of it.

" The whole obelisk received a very fair degree of polish from *corundum*. A piece of plank is over-spread with the sort of cement used for setting sword-blades in their handles ; while this substance is still liquid, it is mixed and powdered over with pulverized *corundum* (reduced to a coarse or fine sand, according to the purpose for which it is intended) and left to dry in the sun. These planks, weighted over, are then used like the slabs of the stone-polisher in England."

The granite pillars in the King's Library, British Museum, are each composed of one piece of Scotch granite, to which a very fine polish has been given, fully equal to that of any specimen of Egyptian art. The columns were at first smoothed in the common way, by rubbing them with stones, and then the final polish was effected by means of emery and putty-powder. The obelisk in front of the Vatican was erected by Fontana, the architect of Sixtus V., in a very different way from the simple method just described, and by the aid of the most complicated and wonderful machinery.

A print of the Séringapatam obelisk is given in the volume of the Edinburgh Transactions referred to, from which we may form a pretty good idea of the effect it produces. The plinth and pedestal are in the genuine simple Egyptian style, resembling those of Cleopatra's Needle; but, from being enclosed in an iron railing, the lower parts are somewhat obscured, and the general effect is injured. The obelisk appears, also, to taper rather too much towards the upper part, when compared with those in the Roman capital.

Pliny tells us a story, which would probably imply that he supposed the obelisks of Thebes were raised by machinery, in rather a more expeditious way than what we have just transcribed. "A king," he says, "fearing that the machines might not support an obelisk that he wished to raise, fastened his son to the top of it, in order that the additional risk which the workmen were exposed to, might secure the safety of his favourite obelisk."

During the occupation of Egypt by the Ptolemies it is not likely they would neglect any opportunity of employing so striking an architectural ornament as an obelisk, for the decoration of the new city of Alexandria, and other places which they might embellish. Accordingly, we find that (in addition to the two obelisks still remaining at Alexandria, which must have been removed by the Ptolemies from some antient temple to their present position) another is mentioned as having been erected by Ptolemæus Philadelphus at Alexandria. The passage of Pliny, which we are going to paraphrase, is somewhat obscure, according to the manner of this careless compiler. "*Ptolemæus Philadelphus erected at Alexandria an obelisk 80 cubits high, which King Nectanebus had cut clean

* Book xxxvi. chap. 9.

out* ; but it cost much more labour to take the mass of stone to its place of destination and set it up, than it did to cut it out. Some say it was brought down the river in a vessel by the architect Satyrus ; but Callixenus (Callistratus, in some editions) says it was done by Phœnix in the following manner. A canal was dug from the river to the place where the obelisk lay, and two boats were placed side by side and filled with pieces of stone of the same material as the obelisk. These pieces were in the shape of a brick, and a foot in length (or cubical pieces, each side measuring one foot), so that the proportion between the quantity of matter in the obelisk and that held by the boats could be determined. The two boats were loaded to twice the weight of the obelisk, in order that they might go under it, its two ends resting on the two sides of the canal. Then, as the pieces of stone were taken out, the boats of course rose together, and at last supported the obelisk, and carried it off. Six such obelisks were cut out of the same mountain [he means the granite quarries near Syene], and the architect received a present of fifty talents. But this obelisk was placed at Arsinoe by the above-mentioned king, as a testimony of affection to his sister, and wife Arsinoe. This obelisk being inconvenient to the naval station was brought to the Forum at Rome, by a certain Maximus, a prefect of Egypt, who cut off the top, intending to add a gilded one ; but this was never done."

Pliny first of all says that this obelisk was placed at Alexandria, and then he says it was erected at Arsinoe. Probably the obelisk erected at Arsinoe was one of the six which he mentions. The Arsinoe must have been the town on the site of Suez, at the top of the western arm of the Red Sea, and on the canal that communicated with the Pelusiæ branch ; at least the

* "Or had cut and left without sculptures."

mention of a dock-yard, or naval station, renders it more likely to be this town than the Arsinoe near the lake Mœris, though the latter also stood on a canal, by which it communicated with the river. But the whole difficulty may perhaps be best removed by reading 'Arsinoeo,' in the passage of Pliny, instead of Arsinoe. The Arsinoeon would then be a place in Alexandria dedicated to Arsinoe. From this extract we see also that Maximus intended to ornament his obelisk somewhat in the style of that which Abdallatif saw at Heliopolis, with the copper cap.

Before we proceed to speak more particularly of the obelisks now in Europe, we shall describe some of those in Egypt, about which we happen to possess the best information. Mr. Burton, in his *Excerpta*, has given very clear drawings of the hieroglyphics on several of the obelisks now in Egypt. Those that mark the site of the antient city of Tanis, the Zoan of the Scriptures, are all lying on the ground*, and can therefore be easily examined, except on the under side. The obelisk of San (Tanis), given in his 38th plate, has two of its sides represented. The dimensions of the base line and the perpendicular altitude of the pyramidal top seem to be very nearly the same. One face of this pyramidal top has sculptures on it, part of which have been erased. The other face has none in the drawing. A series of hieroglyphics, beginning at the top of the shaft with the crowned hawk, run down to the base: they are not bounded, as is the case in some obelisks, by a longitudinal groove or deep-cut line on each side. The sculptures on each face of the obelisk agree in very few particulars, except in both having the crowned hawk, as just described, and the prænomen and name of King Ramses. The prænomen occurs first, beginning from the top of the obelisk, and is followed by the

* See Denon's Plan, pl. 17.

name Ramses, with the goose and solar disk interposed between the two cartouches. Examples of this goose and disk may be seen on several of the monuments of the Museum: the symbols signify, according to M. Champollion, "Son of the Sun." The prænomen occurs again near the bottom of the shaft. The horizontal dimensions of each side of the base and top of the shaft are, respectively, as 39 and 28. We are not able to tell from the drawing, as it is unaccompanied with any description, whether it is two opposite sides, or two adjacent sides of the obelisk, that Mr. Burton has represented. The dimensions of the two sides seem to differ a little at the base, while at the top they appear to agree. This obelisk is in its proportions more pleasing to the eye than many others, being neither too slight nor too stunted.

Mr. Burton has given a drawing of three sides of another obelisk at San, which has a bit of the pointed pyramidal top slightly damaged, and is also broken in its lower part. The faces of the pyramidal apex have sculptures on them; and each side of the shaft has for its decoration at the top, the crowned hawk. The sculpture is in very good style. Behind the hawk is a solar disk or globe, with the regal serpent suspended from it, and at the same time raising its front boldly, as we see on the royal tiara. The *crux ansata*, or *tau*, with the circle attached to the top, is suspended from the middle part of the serpent. The sculptures on the three sides only agree in having the prænomen and name of King Ramses represented exactly as on the other obelisk. The dimensions of the three sides of this obelisk are the same in the drawing, from which we may, perhaps, conclude that the measurement of all the sides of the obelisk is uniform.

It has sometimes been asserted that the camel is not found on the monuments of Egypt, and argu-

ments have been derived from this supposed fact to show that the animal could not have been used in Africa before the Arab conquest of Egypt. But not * to mention the evidence of Scripture as to the camel being familiar to the Egyptians as a beast of burden, we may add that it is represented on the obelisks of Luxor, and, we believe, also on these two obelisks of San. We are not, however, *quite* sure, because the neck is rather short, only a part of it being drawn. But on the fragment of another obelisk at San, of which Mr. Burton has also given a drawing (pl. 40), the long neck of the animal, with its head, is most distinctly seen, and cannot be mistaken. This fragment also contains the name of King Ramses, an appellation perpetuated on the durable stone from the northern extremity of Egypt to the remotest monuments of Nubia. That one monarch should in his life-time complete so many great works is hardly credible, and we may therefore, perhaps, assign them to different individuals, notwithstanding the agreement in the prænomen or title. But this inquiry is more suitable for another place. We may remark, however, that as this name of Ramses belongs to the earliest history of Egypt, which assumes anything like an authentic shape, it tends to prove the high antiquity of Tanis, which we know, from the sacred records, to have † existed in the time of Moses. And if the origin of Tanis belongs to this remote epoch, what are we to say of the antiquity of Thebes? It must certainly be referred to a still more distant date; unless we suppose, which seems a supposition altogether without foundation, that the granite of Syene was transported to the Delta to

* Gen. xii. 16.—We may remark that the camel was at least well known to the European Greeks as early as B. C. 480, many of these animals having been taken after the battle of Platæa. Herod. ix. 81.

† Numbers, xiii. 22.

form obelisks and temples, before it was used to decorate places much nearer, and to which it could be conveyed with one-tenth of the trouble.

We have already spoken in our general description, of the obelisk of Heliopolis, probably one of the most venerable monuments of antiquity that the antient land of Mizraim possesses; but one about which there is considerable discrepancy in the accounts of travellers. Mr. Burton has given a drawing of this also, but we cannot determine from it whether or not the four sides of the obelisk are equal. The angles, according to Niebuhr, stand S.S.E., N.N.W., E.N.E., W.S.W. The base of the pyramidal top somewhat exceeds the perpendicular height of that member of the obelisk, which we believe to be a characteristic mark of the older specimens. The length of the shaft, according to Mr. Burton's scale, is* about 61 feet, and the width of the bottom of it about $6\frac{1}{2}$ feet. The pedestal we believe (for authorities differ) is entirely covered with earth. We cannot undertake to state the width of the pyramidal base which terminates the shaft of the obelisk. The faces of the pyramid are without sculptures; and the first in order on the obelisk, beginning at the top, is the hawk without a crown. Except where some few erasures prevent us from seeing the sculptures, it may be observed that they are exactly the same on all the four sides of the obelisk. There is however an omission, apparently accidental, of a small group of four figures on one of the faces, which has caused all the sculptures below it to be raised above the height occupied by

* Pococke, p. 23: "I found by the quadrant it was $67\frac{1}{2}$ feet high. This obelisk is 6 feet wide to the north and south, and 6 feet 4 inches to the east and west; and it is discoloured by the water (the annual inundation) to the height of near 7 feet. It is well preserved, except that on the west side it is scaled away for about 15 feet high."

the corresponding figures on the other three faces. This did not escape the observation of the accurate Norden*. Each face of this obelisk has three cartouches, in the following order from top to bottom—a prænomen not yet understood, a name read Osortasen, and the prænomen repeated.

M. Champollion assigns this king to the twenty-third dynasty of Manethon, making him the same as his Osorthos, and thus limiting the age of this obelisk to about the tenth century before our era; but this is at least doubtful. The same name occurs on several Egyptian monuments at Paris, and also on a sculptured stone in the Faïoum, which Mr. Burton has copied.

According to Norden, the hieroglyphics, though inferior to those of the obelisks of Luxor, are still well executed, and Hasselquist pronounces the sculptured birds to be so well cut that it is very easy to point out the originals in nature. This is of some importance in helping us to fix the probable antiquity of this obelisk. The sculptures show an early age, probably one before that in which the palace of Luxor was finished. Of the obelisk of Heliopolis Hasselquist says, "†At Matarie (Heliopolis) is an obelisk, the finest in Egypt. I could not have believed that natural history could be so useful in matters of antiquity as I found it here. An ornithologist can determine at the first glance to what genus those birds belong which the antient Egyptians have sculptured. I recognized the screech-owl (*strix*), which stood above at the top of the obelisk; a kind of snipe

* "I have represented the southern side of this obelisk, because it is the best preserved. The other sides are alike, excepting that of the north, where there is a small difference."—"The bottom of the obelisk on the east side is almost entirely ruined."

† Hasselquist, *Reise nach Palästina* herausgegeben von Carl Linnäus, Rostock, 1762.

(*scolopax*); a grill vogel* (*pluvialis*), was the best likeness; a duck (*anas*); and what I thought most worthy of notice, and than which I recognized none more readily, the stork (*Ardea ibis alba*), in the very attitude in which he may now be seen on the plains of Egypt, with upraised neck and drooping tail."

Mr. Burton's accurate drawing furnishes an admirable comment on the remarks of Hasselquist. The owl at the top is the bird commonly called a hawk; but it is more probably a species of owl. The small bird, which Hasselquist calls a snipe, constantly appears on the monuments, and is frequently repeated on those of the Museum.

The duck or goose (*anas*), for it may be called either, is beautifully delineated on the obelisk; but the stork is executed with a fidelity and spirit truly admirable—we mean in Mr. Burton's drawing: in the French engraving (v. 26) the execution of these birds is very inferior. A group of three storks ornaments each face of the obelisk, standing directly under the name of the king Osortasen.

The obelisk now standing a few miles from Medinet el Faioum is described by Pococke (i. 59), and we have a drawing of two sides of it in Mr. Burton's Excerpta. It is remarkable for having a circular top, in this respect bearing some resemblance to the obelisk of Axum. Each of the two narrower faces begins with the crowned hawk at the top, which is followed by a series of vertical sculptures exactly the same on both sides, till we come to a cartouche containing a præ-nomen the same as that on the obelisk of Heliopolis. Below the præ-nomen there is a discrepancy in the figures which occupy equal spaces on the two sides; one equal space containing nine figures, and the other seven, which are all different. Below these

* 'Grill-vogel' is a German word; but what it means, in this instance, we cannot venture to say.

spaces, they again agree till within one figure of the lowest part, as given in Mr. Burton's drawing. There is only visible the single cartouche which we have mentioned, the rest probably being worn out.

The following is Pococke's description : " *I went from Faioum, about three miles to the south-west, to a very particular obelisk of a red granite, called Akmeed Bijige, or the pillar of Bijige (Bibig according to Vansleb), from the village of Bijige near it. It is of the figure represented in the twenty-second plate, measuring 4 feet 2 inches on the north side, and 6 feet 6 inches on the east. It is 43 feet high, each side of it divided by lines into three columns, that in the middle being a foot wide. I observed the manner in which the hieroglyphics are disposed ; above these are four stories of men, six on each line, 18 inches high, most of them having hawks' heads and the high cap ; below, it is divided into fourteen columns of hieroglyphics ; and the top is cut down in the middle about 3 inches from north to south as, in the draught." There is hardly any resemblance at all between the miserable sketch which Pococke has given of this obelisk and Mr. Burton's drawing. As to the top, there is none at all in Pococke's sketch : in Mr. Burton's view it is rounded like a semicircle.

" The obelisk," says Pococke, " is much decayed all round, for ten feet high, but mostly on the south side ; the west side is almost entirely defaced ; and at the S.W. and S.E. corners it is much broken for about 20 feet high ; and the whole is very foul on account of the birds that sit upon the top of it ; so that it would have been difficult to have taken off the hieroglyphics."

Vansleb, who saw this obelisk in 1672, informs us that it stands on the ground without a pedestal, which

* Pococke, i. 59.

we can hardly credit. According to him the top is formed in a ridge-shape (*en dos d'âne*). "On the south face, which is one of the broadest, there are—first, three rows of figures, men and women, holding one another by the hand. Under these three rows, are fourteen rows of hieroglyphical characters, of the size of the finger, which are read from top to bottom; each row is separated from the other which is next to it by a line drawn between them the whole length of the obelisk; so that this obelisk is, without doubt, one of the most curious. On each of the smaller sides there is only a single row of characters, of moderate size, which are still very beautiful and clear. Time has nearly effaced the figures, from the middle of the column to its base."

Mr. Burton's drawing has no description accompanying it, which circumstance, added to the discrepancies of travellers, renders its interpretation somewhat difficult. Indeed, neither Pococke's wretched sketch of the obelisk, nor his description, agree at all with the more accurate drawing. Mr. B. has represented, apparently, three sides of the obelisk, one of which must be the south side, which Vansleb describes. But instead of three rows of figures, there are five, one above another, not mere men and women, as the traveller supposes, but the usual representations of kings making offerings to hawk-headed deities, &c. There are six of these figures, as Pococke correctly states, in each row. Over the two centre figures of the highest row are two cartouches, exactly the same as those on the obelisk of Heliopolis; the cartouches are repeated over the two centre figures of each of the lower rows. This obelisk, then, must be of the same date as that of Heliopolis, and the work of the same king, Osortasen. It is rather curious that the two centre figures of the highest row, over the heads of which the cartouches stand, are two figures without caps. But in each of

the four lower rows, the two central figures, over which the cartouches stand, have the royal cap on their heads; the right-hand figure in each row is the same, being a king with the high cap. The left-hand figure of the two central ones is also a king, with his back turned to the back of the other: *he* also has a high cap, but of a different form, like that of the Museum colossus, No. 8.

Under the lowest row are fourteen narrow spaces, bounded on each side by vertical lines, which are no doubt those which Vansleb describes. No hieroglyphics are marked here in Mr. B.'s drawing; but, instead of them, a number of cross-marks, intended probably to indicate that the figures are erased and indistinct. This larger side of the obelisk terminates, as usual, in a horizontal line, in the central part of which there is a circular groove, running down the face of the obelisk from the top to the distance of not quite two feet. But this does not appear to be a cut right down into the stone, as Pococke describes it. The two smaller sides terminate at the top, as we have already said, in a circular line, which we presume is continued all along the summit of the obelisk, so that the crowning part of it must resemble a cylinder cut in two by a plane passing through its axis.

It would require more space than our narrow limits allow, to describe the obelisks of Luxor; for each obelisk, with its numerous sculptures, would furnish matter both for long description and much discussion. We refer to the drawings in the great French work.

There is one obelisk in Africa, far beyond the ordinary limits of the kingdom of the Pharaohs, which deserves a short notice.

At Axum, in Abyssinia (lat. $14^{\circ} 6'$), there is, in addition to a small plain obelisk, a larger one, 60 feet high, made of a single block of granite. “* All

* Salt, p. 404.

its ornaments," says Mr. Salt, "are very boldly relieved, which, together with the hollow space running up the centre, and the patera at the top, give a lightness and elegance to the whole form that is probably unrivalled. Several other obelisks lie broken on the ground, at no great distance, one of which is of still larger dimensions." We dissent from the traveller in his admiration of this obelisk, which is by no means improved by the Greek ornaments added to the top. In Mr. Salt's plan of Axum (Lord Valentia's *Travels*, vol. iii. p. 82) we see, on the south side of the town, one plain obelisk standing, and fourteen more near it, marked as fallen obelisks. Other fallen obelisks are indicated in the plan as lying on the north side of the town, some of which have been carefully sculptured, while others have had no decorations. The large obelisk * just described is still in its original position, standing near a large daroo-tree (p. 87), as it is represented in the plate in Lord Valentia's work. Mr. Salt remarks, in his '*Voyage to Abyssinia*,' that he has no corrections to make in this print; but that, owing to a slight mistake in the engraver, the patera on the top of the obelisk is delineated in Lord Valentia's work as rather pointed, whereas it ought to be round.

This Abyssinian obelisk stands on a base consisting of three plinths (according to the view); and on one side, near the bottom of the obelisk, something like a doorway seems to be marked out. The whole is ornamented with indifferent sculptures, not hieroglyphics. There is also a Greek inscription at Axum, supposed to be about the date A.D. 300, from which,

* In Mr. Salt's '*Voyage to Abyssinia*,' which was his second visit, the height of this obelisk is reduced from 80 feet, the dimensions stated in Lord Valentia's *Travels*, to 60 feet, which is a considerable deduction from the first estimate. No mention is made of the mode in which the obelisk was measured, and the height of it may still be very incorrectly given.

supported by other evidence, we may infer that these obelisks were raised by Greeks, who spread themselves along the waters of the Nile even as far as this remote spot, and probably communicated their language to the petty chieftains of those countries with whom they might become connected by commerce and intermarriage.

It has been generally supposed that there are no traces of obelisks south of the first cataracts, with the exception of the Axumite obelisks described by Salt and Lord Valentia, which undoubtedly belong to a period posterior to the Ptolemaic age. Bruce, indeed, speaks of some fragments near Chendi; and Rppel describes one more particularly which he saw at Jebel Barkal. This obelisk is 5 feet high, made of granite, and ornamented with hieroglyphics. It stands within a small quadrangular enclosure formed by a strong wall.

It appears not improbable that the absence of large obelisks in Nubia may be owing to the impossibility of conveying such enormous masses of granite up the river from the quarries of Syene. There are granite quarries indeed in Nubia, on the east side of the river, opposite the little island of Tumbus, which furnished the materials for the two colossi on the island of Argo. Whether these quarries could supply, like those of Syene, blocks large enough for colossi and obelisks of such dimensions as those of Thebes, we are not able to learn from the statement of Rppel.

There is another obelisk beyond the limits of Egypt, in the wastes of Arabia Petra. Near the wells of Nahasb, about seventy miles S.S.E. from Suez, on a hill which covers one of the old copper-mines of this district, Rppel found a small obelisk of sandstone, 8 feet long, lying on the ground. The three sides which were exposed to the atmosphere had lost their sculptures, but the fourth, which from its position was

protected, contained hieroglyphics, which appeared beautiful as far as he could examine them.

Niebuhr (pl. 36) has given a drawing of two faces of each of two obelisks which he saw at Cairo. The reason why he did not draw all the faces will be clear from his own account:—"In plate 36 I have represented part of the Pharaonic writing on two small broken obelisks. The piece (No. 1) is of black marble, and is now the door-sill of a mosque in the castle of Cairo. Some of the figures are remarkable for being considerably raised in a sunk frame (*intaglios*). The second fragment is of granite, and is now a door-step in a house near Kantared-siedid. It is $5\frac{1}{2}$ feet long. On this also are some figures, sunk deep like the others, but raised in the centre." In the French translation of Niebuhr's Travels three figures particularly are marked as being deep *intaglios*. Pococke* also says, "In the castle of Cairo I saw a piece of a small obelisk of black marble, with hieroglyphics on it, made use of as the sill of a window; it is about 8 feet long and 18 inches square." The "black marble obelisk," described by Niebuhr, is one of those now in the Museum (No. 70), and as he has given a copy of the two sides which he saw, we have an opportunity, which but rarely happens, of testing with our own eyes the accuracy of a traveller's observation. Those who are acquainted with the character of the elder Niebuhr will have no difficulty in believing that his copy of the obelisk, though by no means the work of a skilful draughtsman, is minutely exact, with the exception of one or two very unimportant particulars. And it is no small degree of praise to have copied with such accuracy the sculptures on a monument of comparatively little importance, when the copier had not the smallest reason for supposing that the original and his copy would ever be con-

* p. 33.

fronted in one of the capitals of Europe. Such fidelity in a little matter may teach us how to value Niebuhr's evidence in others of more importance.

This obelisk (see p. 51) has been broken into two unequal pieces, which are now united, and the whole stands on a small block of stone. The lower part is quite complete, which is evident from there being, on all the four faces, a vacant space about $10\frac{1}{4}$ inches in length, between the base and the first series of sculptures.

The following are some of the dimensions:—

Width of east side, as the obelisk now stands,	ft.	in.
measured along the base, about.	1	$5\frac{1}{2}$
North side ditto	1	$4\frac{7}{8}$
Height, about	8	$1\frac{3}{4}$
Horizontal measure of east side at the distance		
of 4 ft. 6 in. from the base	1	$2\frac{5}{8}$

As the higher part of the obelisk is fractured unequally, the height which we have given is only exact for a portion of the northern face, which is one of those copied by Niebuhr. His drawing shows that the obelisk has lost a few inches in some parts of the top since it left Cairo; probably when it was extricated from its imprisonment in the door or window. This northern face contains, in the highest part, a cartouche now only half entire, which we presume to be a prænomen or title. Immediately under it we see the usual symbol of the goose and disk, followed by another cartouche containing the name. Both these cartouches are repeated on the opposite sides, and in the same position; but they do not occur again on any part of this obelisk. All the figures on the four sides are contained between two longitudinal grooves running up the faces of the obelisk, and leaving a broad smooth space between them and the edges of the column.

The sculptures on the north and south faces are

not in all respects the same; yet they differ in very few particulars. The same may be said of the east and west sides, which, however, differ a good deal from the other two.

On the east and west sides we have, among other sculptures, an obelisk represented apparently of such proportions as the column on which it is cut. The two-horned * serpent is often repeated. But the best specimens of intaglio figures on this obelisk are the birds, which indeed are generally delineated on Egyptian monuments with a surprising degree of accuracy and spirit. One which Niebuhr has marked as a fine example of deep intaglio is the goose on the north face, to which we may add the Ibis on the same side. But the finest specimen of all is a bird on the south side, in very deep intaglio: it appears to be a kind of pewit. The neck is rounded with great skill, by giving the central parts of it a convex form of considerable curvature; while the shadow cast by one of the edges, formed by the plain surface and the vertical incision in the stone, added to the shadow cast by the rounded part on the other deep incision, give a beautiful relief to the lighter and higher parts. The eye, the wings, and the feathers of the tail, are also beautifully raised. Altogether this bird, both for outline and attitude, is the finest specimen of sculpture on this obelisk, and perhaps in the Egyptian Museum.

The other obelisk (No. 5), which is placed opposite to the one just described, is also entire from the base upwards, for the reasons already given. It is not quite so easy to measure it, owing to its being more damaged than the other; but we believe the dimensions of the base are the same as those of No. 70, or they differ so little as not to be detected by our mode of measurement. It appears to have been broken into

* See Herod. ii. 74.

four pieces which are now united, but the sculptures and the whole surface are less complete than those of No. 70, owing to the rougher usage which it has experienced.

It has the same cartouches as those found on the other obelisk; but here they have been cut on all the four faces instead of being confined to two sides. The figure of an obelisk is found sculptured on two opposite faces of this column also; and many of the sculptures are the same as those of the more perfect column; but in others there is considerable difference, both in the arrangement of the figures and in the individual representation. These two obelisks, we may conjecture, from their general agreement in material, dimensions, and in the proper names, were placed in front of some small propylon—an opinion not at all inconsistent with the fact of many discrepancies in the detail of their ornaments; for it was quite in the Egyptian style to vary their decorations. The sistrum, an Egyptian instrument occasionally mentioned by Roman writers, and well known to students from drawings, is represented on these obelisks. It is formed of two parallel longitudinal bars, united at the lower part in one piece that serves for a handle. Cross pieces, three or four in number, disposed in parallel lines and at right angles to the two long pieces, were so disposed as to move backwards and forwards when shaken, and to make a rattling noise.

It is curious that the proper name found on these two obelisks is the same as that which is so often repeated on the Alexandrine Sarcophagus (No. 6), where we see also occasionally, though less frequently, the same prænomen as on these two columns.

The obelisk which Pococke describes must be one of the two specimens now in the Museum; and probably it may be the same which Niebuhr saw, not-

withstanding the difference in their accounts as to the place which it formerly occupied in the castle of Cairo.

Both the Cairo obelisks, now in the Museum, are engraved in the French work (v. pl. 21, 22) with considerable accuracy, but the excellence of the birds is hardly attained. On the east face of the obelisk, No. 5, near the base, there are two heads, which in the French engraving are those of a sheep without horns. It is difficult to say what the originals are; probably they may be sheep's heads, but certainly the French copy is very unlike what we see on the obelisk.

Our limits do not allow us to describe minutely all the obelisks that now exist either entire or in fragments; which, however, would be a curious inquiry, as it would show the prodigious number of such monuments in antient times, and that the Greeks and Romans imitated these as well as other specimens of Egyptian art. The obelisks at Catania in Sicily, for instance, are probably not genuine Egyptian work.

One obelisk exists in France. It stands at Arles, in the public place, where it was erected in 1676, having been found in some gardens near the Rhone. There is no record of the time when it was brought to France, but it would appear a probable conjecture that it had lain up to 1676, just in the position in which it was landed from the ship*.

“The obelisk of Arles is the only monument of this kind in France. Its history is not exactly known. The material is oriental granite: the height is 52 (French) feet, the base has 7 feet diameter, and the whole is of a single piece. It was found in the gardens of a private individual near the walls of the city, which are but a short distance from the Rhone.

* Correspondence d'Histoire Naturelle, par P. J. Buchoz, Paris, 1775, vol. iii. p. 181, quoted by Zoëga.

It had probably remained here ever since it was landed, which must have been near seventeen centuries ago, without ever having been applied to the purpose for which it was intended. It was quite buried in the ground, and only the point was a little bare. We learn from the town archives that Charles IX., when he was once passing through the city, ordered the obelisk to be dug out in order to be removed, but this was not done. Afterwards the inhabitants of Arles raised it in honour of Louis XIV., in one of the public places, with pompous inscriptions on the four faces of its pedestal. They have placed at its apex a globe representing the earth, and above it a sun, which is a real device (*une vraie devise*) without any inscription. The base of the obelisk is well secured, and no expense has been spared either for its ornament or its preservation. It was erected in 1676. This obelisk came from Egypt like those at Rome. It has no hieroglyphics on it, and probably the Romans brought it from Egypt, intending to erect it in honour of some of their emperors."

There are also two obelisks at Constantinople. One, a monolith, which stands in the hippodrome, or Atmeidan, is about 50 feet high, according to the most probable accounts, though some writers make it much more. It stands on a pedestal, from 8 to 10 feet high. This obelisk is said to have been erected by the Emperor Theodosius. It is thus described by Sanderson:—

"In the midst of the Atmeidan is to be seen raised upon four dice of fine metal, a very faire pyramid of mingled stone, all of one piece, 50 cubits high, carved with heroical letters; resembling the Agulia of Rome. Its foot is double: in the first foundation, which is two cubits high, is carved the manner and the way they took to set up this pyramid

or obelisk ; in the second foundation, which is four cubits high, are carved the tyrants conquered by Theodosius, who bring presents and render obedience on every side to the said Emperor, he also being carved in the midst."

The number of sculptures is small considering the magnitude of the stone. A single vertical row runs down each side, beginning with the hawk, and the figures are arranged somewhat like those on the Mahuti obelisk of Rome. But there may have been others also about the base, which is much damaged. Niebuhr has examined this monument perhaps more carefully than any other traveller.

" *It is well known that in the Atmeidan or Hippodrome of Constantinople, there is an obelisk, also a high column of masonry, and a triple serpent mutilated. The figures on the pedestal of the obelisk, as well as the Greek inscription, of which a part only is now visible (the rest being covered by the earth), have already been spoken of in other books. But no person has yet given a copy of the hieroglyphics. At last I succeeded in copying all that are on the obelisk."

Niebuhr has given a plate of the sculptures on the four sides of this obelisk ; and, if his delineation is at all exact, the style clearly indicates the workmanship to belong to a period later than that of the Pamphilian, and other pseudo-obelisks at Rome. The crowned hawk appears on the upper part of each of the four faces, but it does not occupy the highest place on the shaft, being surmounted by another group of figures, representing a divinity seated and receiving adoration. The perpendicular height of the pyramidal top exceeds the width of the base. Sculptures are visible on two of the faces ; from the third something appears to have been erased, and the fourth seems to

* Niebuhr.

have no sculptures at all. There is only a single cartouche on each of the four sides of the obelisk, and each of them occupies a different elevation. These cartouches contain each six figures, of which the first four are the same all through, and the remaining two different in all the cartouches; though it is probable that they are intended to signify the same prænomen or title of a king. There can be little doubt that this obelisk is a miserable attempt to imitate the great and genuine works of an earlier age.

“Part of the base of the Theodosian obelisk,” says Hobhouse*, “is hidden in the ground, so that the fourth and fifth line of the inscription, which record the name of the prætor during whose year it was raised in the reign of Theodosius the elder, and the time employed in its erection, are no longer visible.”

The following is the inscription to which Hobhouse alludes, according to the copies made by the old travellers:—

Difficilis quondam dominis parere serenis
Jussus et extinctus palmam portare tyrannis
Omnia Theodosio cedunt sobolique perenni
Ter denis sic victus ego domitusque diebus,
Judice sub Proclo superas elatus ad auras.

“I was once unwilling to obey imperial masters; but was ordered to bear the palm after (to commemorate the victory over) the destruction † of tyrants. All things yield to Theodosius and his ever-during offspring. Thus I was conquered and subdued in thirty days, and elevated towards the sky in the prætorship of Proclus.”

This obelisk was probably brought to Constantinople some time before it was erected, and lay on

* Travels, &c. p. 951.

† “Extinctus” should evidently be “extinctis.”

the ground till Theodosius set it up; yet the Greek inscription, on another side of the base, seems to speak of Theodosius raising it again:—

* *κίονα τετραπλευρον ἀεὶ χθονὶ κείμενον ἄχθος
μοῦνος ἀναστῆσαι Θεοδοσίος βασιλεύς
τολμήσας Πρόκλῳ ἰπικίλιτο, καὶ τόσος ἕστη
κίων ἡλίους ἐν τριάκοντα δύο.*

“The four-sided column, a weight continually lying on the ground, King Theodosius alone having ventured to raise, gave his orders to Proclus; and, great as the column is, it was erected in thirty-two suns (days).”

The word (*ἀναστῆσαι*) which we have simply rendered to “raise,” ought, in its strict acceptation, to be rendered to “set up again;” but it is rather hazardous to insist on the exact and critical discrimination of Greek words belonging to the epoch of King Theodosius. If the obelisk really had fallen down, the wonder is that it was not broken.

There is another obelisk at Constantinople, about 35 feet long, which, in 1550, was lying on the ground, and was purchased by Antonio Prioli, a Venetian, who intended to take it home to decorate one of the public places of his native city. It is probable he never accomplished his purpose, as we have no account of any obelisk at Venice, and there is now one at Constantinople, standing in the Sultan’s gardens, on the most northern eminence. It is of granite of Syene, with sculptures upon it, and not much less than that in the Hippodrome. If this is the same obelisk, it must have been erected since Prioli’s purchase, nearly on the same spot on which it was then lying.

* This inscription was first published by Gyllius, who visited Constantinople before the middle of the sixteenth century.—*Topograph. Constantinop.* Lugdun. 1562. ii. cap. ii.

In the middle* of the Hippodrome, at Constantinople, there is a kind of pyramid, constructed of pieces of stone, and called by the old topographers the "colossus structilis," which formerly has been covered with plates of copper, as we learn from the Greek inscription on its base. The pieces of copper were fastened together by iron pins, which were secured by lead; the holes in the stone are still visible. This colossus is higher than the obelisk †. The pedestal is a block of marble, 7 feet 2 inches high; and in width $10\frac{3}{4}$ feet. To the base are three steps, altogether 4 feet 2 inches high.

The following is the Greek inscription on the base of the colossus, as it is called:—

τὸ τετράπλευρον θαῦμα τῶν μεταρσίων
 χρόνῳ φθαρὶν Κωνσταντίνος νῦν διασπότης
 † ὁ Ρωμαίου παῖς δόξα τῆς σκηπτουχίας
 κρείττον νουρηγί τῆς πάλαι Διωρίας
 ὁ γὰρ κολοσσὸς θάμβος ἦν ἐν τῇ Ῥόδῳ,
 καὶ χάλκος οὗτος θάμβος ἐστὶν ἐνθαδε.

"This four-sided wonder among lofty things, which through time had sustained much injury, Constantinus, now our master, the son of Romanus, the glory of the monarchy, repaired in such a way as to make it superior to what it originally was. The colossus at Rhodes was a stupendous object; and this copper colossus is a wonder here."

This obelisk, according to P. Bellonius, had its copper plates gilded, so as to appear of gold. It seems difficult to make out whether it is really a pyramid or an obelisk. Hobhouse calls it a "marble

* Gyllius, Constantinopoleos Topographia, quoted by Zoëga.

† "The last measurement makes it 94 feet high."—Hobhouse, p. 952.

‡ οὐ Ρώμανος. Bandurius Imper. Orient. tom. i. p. 181. "Cujus filius est Romanus."

pyramid ;" but Zoëga clearly takes it to be an obelisk, as it really must be, if it has a base such as is described.

Pococke found a singular kind of obelisk in Asia Minor :—" Setting out from Nice, and travelling on the north side of the lake, in about four hours we came to an obelisk, about a mile to the north of it. The people call it *Besh-tash*, or the Five-stones, because it consists only of that number. It is of grey marble, and of a singular kind ; for it is triangular, and stands on a base and pedestal 6 feet 9 inches square, and about 11 feet high. There is an inscription on the south side of it, from which one may conclude that it was erected as a sepulchral monument, probably to some great citizen of Nice*." Pococke does not give the height ; but Zoëga conjectures, from the plate, that it is about 45 feet.

* Γ ΚΑΣΣΙΟΣ ΦΙΛΙΣΚΟΣ Γ ΚΑΣΣΙΟΥ ΑΣΚΛΗΠΙΟΔΟΤΟΥ
ΤΙΟΣ ΖΗΣΑΣ ΕΤΗ ΠΓ.—Pococke, vol. ii. pt. 2, p. 123.

CHAPTER XV.

ROMAN OBELISKS.

THERE are now, we believe, twelve obelisks of different dimensions at Rome, which were originally erected under the emperors. Augustus set the fashion of transporting these huge blocks to the Imperial capital, in which he was followed by some of his successors as late as the time of Constantine, and even later. During the calamities of the city these obelisks were thrown down, broken in pieces, and much disfigured both by fire and the hand of the barbarian destroyer. Sixtus V. and Pius VI. have been the chief restorers of these wonderful works of antient art.

The highest Roman obelisk is that now called the *Lateranense di S. Giovanni Laterano*, which stands before the north portico of the Lateran church, where it was placed A. D. 1588, in the pontificate of Sixtus the Fifth. It is placed, like the other obelisks of Rome, on a pedestal entirely unsuitable to the simplicity of its form*. Instead of the three quadrangular stones forming so many steps, surmounted by a simple block, as in the obelisk now standing at Alexandria, we have at Rome a pedestal cut into so many parts and of so great elevation, that the eye dwells more on the elaborate support of the obelisk than on the thing itself. The cornices too with which some of these pedestals are furnished are another unsightly object. Add to this the crosses and other ornaments with which the Roman obelisks are surmounted, (that of the St. Peter's obelisk is about 18 feet

* The obelisk on the Monte Citorio is an exception,

4 inches,) and we may readily conceive how much of the real effect is destroyed by these modern additions.

This Lateran * obelisk, the largest of all the Roman obelisks, and perhaps the largest in the world, is the same which the Emperor Constantius erected in the Circus Maximus. Mercati, who carefully measured it when lying on the ground, says it was broken into three pieces. The whole length of the three parts was 148 Roman palms, but the base of the lowest part was so much damaged that it was necessary to take off four palms before it could be safely set on its pedestal; this reduces the length of the shaft to 144 palms, or 105 feet 7 inches English. The whole height, with the pedestal and ornaments of the top, is about 150 feet. The sides of the obelisk are not all of equal breadth. The width of the north and south sides (as they now stand) at the base is 9 feet $8\frac{1}{2}$ inches; the width of the same sides below the pyramidal top is 6 feet $9\frac{1}{2}$ inches. The two other sides are at the base and top respectively 9 feet and 5 feet 8 inches. Therefore the circumference at the base is about 37 feet 6 inches, at the top about 24 feet 10 inches. The solid contents are 15,129 cubic palms, or 5960 cubic feet, in round numbers: the weight is about 440 tons †. The western face of this Lateran obelisk is not quite plane, but

* Zoëga, de Obeliscis, sec. ii. chap. 1. For the position of these obelisks the reader may consult the plans of Antient and Modern Rome, published by the Society for the Diffusion of Useful Knowledge.

† This is probably only a very rough approximation. The 15,129 cubic palms are given by Zoëga, but we do not know how the obelisk was measured, or how the specific gravity of the stone was estimated. By taking the mean of the measures at the two ends, and estimating the length of the shaft at 100 feet (deducting the 5 feet 7 inches for the pyramidal top), and taking the weight of a cubic foot of red Egyptian granite at 165.4 lbs. avoirdupois, we find the weight to be about 445 tons in round numbers, in its present state.

slightly convex*. The pyramidal finish at the top also has a small convexity on each of the four sides. The same is the case in the Flaminian obelisk, but is more observable in the smaller ones, the Mahutean and Medicean obelisks. From this we might be led to infer that the original form of the top of an obelisk was conical, and that of the shaft cylindrical.

Besides the four palms which were cut off from the base of the Lateran obelisk (which is clearly shown by the mutilated state of the sculptures on that portion of the surface), the lower parts, particularly about the angles, are somewhat damaged. Domenick Fontana restored these angles from the fragments of the obelisk's base, and disfigured them by an unsuccessful attempt to cut new figures in the Egyptian style†. The junctures of the three parts also show some marks of the edges having been broken, while the surface of the obelisk distinctly exhibits traces of fire, which however have done the sculptures no great injury.

This obelisk is of Syene granite, and of a colour rather paler than that of the other Roman obelisks (except the Minervean, erected by Alexander VII. 1667), but the redness of the stone and its density are greater than in Italian granite. The whole obelisk from the base to the very pointed top is covered with exquisite sculptures, equal to those on the Augustean

* Heeren says this is the case with the Luxor obelisks, and that it has been done designedly, in order that, according to the laws of optics, the surface might appear plane. We are not acquainted with the law alluded to.

† "The Sallustian obelisk has been broken and joined inaccurately. A similar restitution has been rather better executed at one corner of the Lateran obelisk, as I observed in the course of a few weeks that I passed at Rome in the summer of 1821: the block of granite that has been employed still exhibits some words of a Latin inscription turned upside down, but not effaced."
—Dr. Young.

obelisks, and superior to those on the other obelisks at Rome.

It was Constantine, the father of Constantius, who first moved this obelisk from Heliopolis to Alexandria. The son* was urged by his flatterers to vie with the glories of Augustus' achievements, who had brought two obelisks from Heliopolis, and to finish the work which his father had left incomplete. A ship was built to convey the obelisk to Rome: the number of rowers employed was three hundred. The immense mass arrived in safety on the banks of the Tiber, and was conveyed on low cars or rollers †, through the gate of Ostia and the public fish-pond (*piscinam publicam*), into the Circus Maximus.

“ † All that now remained to be done was to set it up, which they hardly expected to accomplish. Large beams of wood were planted upright, and raised to a dangerous height: they seemed like a forest of machinery. Long thick ropes were attached to the wood-work, which had the appearance of a number of threads, veiling the sky with a kind of close netting. To these ropes the mountain-mass, covered with its profusion of sculptured ornaments, was attached, and being gradually raised up into the air, and for some time actually suspended, was at last placed in the receptacle prepared for it, by the exertions of many thousand men.

“ A brazen sphere, covered with plates of gold, was placed on the top, which, being soon after damaged by lightning and consequently taken away, was replaced by a figure of a flame, also made of brass, covered with gold leaf, intended to represent a blazing fire.”

We may collect from this description that the obe-

* Ammian. Marcellinus, xvii. 4.

† ‘Chamulcis,’ Ammian. Marcell.

‡ Ammian. Marcell. The original is not very clear.

lisk was raised by a similar laborious process to that by which Fontana elevated the obelisks of Sixtus V.

This* is the obelisk that is supposed to contain the inscription which was translated into Greek by a person called Hermapion, of whom we know nothing more; but it is not an improbable conjecture that he was an Egyptian priest who understood Greek, like Manethon, mentioned above. As this obelisk originally stood at Heliopolis, we might naturally infer that the name or symbol of the sun would appear on it, which is the case. The original inscription is contained in six vertical lines (called *στίχοι* by the Greek translator), which probably occupied two adjacent sides of the obelisk. The inscriptions would be repeated respectively on the opposite sides.

The first part of this inscription, which is on the south side, is this:—

“ This says Helios (the sun) to King Rhamestes; we have given to thee all the world to reign over with joy—thee whom Helios loves and Apollo: the strong truth-loving son of Heron, born of the gods, the founder (*κτίστης*) of the world whom Helios has chosen, strong in war, King Rhamestes, to whom the whole earth is subdued with strength and courage: King Rhamestes of eternal life.”

Second inscription:—

“ Apollo the strong, he who stands upon truth, the lord of the diadem, who possesses Egypt in glory, who has adorned the city of the sun, and founded (*κτίσας*) the rest of the world, and has greatly ho-

* It would seem to be either this Lateran obelisk, or the Flaminian obelisk that contains the original text of Hermapion. Zoëga decides in favour of the latter, and Champollion against both. Champollion does not allow that any existing Roman obelisk contains the original of Hermapion's Greek text. He also remarks that the Lateran obelisk belongs to Thouthmosis, and that the Flaminian contains the names of *two* princes.—Précis, p. 187.

noured the gods established in the city of Helios, whom Helios loves."

Third inscription:—

"Apollo the mighty, the blazing son of Helios, whom Helios has chosen, and Ares the valiant has favoured; whose good things last for ever, whom Ammon loves; who fills the temple of the Phœnix with good things, to whom the gods have given length of life; Apollo the mighty, the son of Heron, to Rhamestes the king of the world, who has protected Egypt by conquering foreigners; whom Helios loves, to whom the gods have given long life, the lord of the world, Rhamestes of eternal life."

Fourth inscription:—

"Helios, the great god, the lord of the heaven, I have given to thee life free from sorrow, Apollo the mighty, the lord of the diadem, the incomparable, to whom the lord of Egypt has erected statues in this royal town, and has adorned the city of Helios, and Helios himself, the lord of the heavens. He has completed his noble work, the son of Helios, the everliving king."

Fifth inscription:—

"Helios, the lord of the heavens: to King Rhamestes have I given might and power; whom Apollo loves, the lord of the times, whom Hephæstus the father of the gods has chosen through Ares, the noble king; the son of Helios, by Helios beloved."

Sixth inscription:—

"The great god of the city of Helios, the heavenly, Apollo the mighty, the son of Heron, whom Helios loves, whom the gods honour, who rules the whole earth, whom Helios chose, the king mighty through Ares, whom Ammon loves; and the bright burning king for ever."

Pliny says, " *The sculptures and representations which we see on the obelisks are Egyptian charac-

* xxxvi. 8, 9.

ters," and he adds, with respect to the two large ones at Rome in his time—one in the Campus Martius, the other in the great Circus—"the inscriptions on them contain the interpretation of the laws of nature, the results of the philosophy of the Egyptians."

The translation of Hermapion will serve as a specimen of the philosophy to be got from obelisks; but the inscription is not without its value in other points of view*. It records the triumphs of Ramses over a foreign race, and therefore to a certain extent agrees with the pompous inscription which one of the Theban priests read to Germanicus from the antient monuments of Thebes, and probably from the obelisks. (Tacit. Annal. ii. 60.) "This city once contained 700,000 fighting men, at the head of whom king Rhamses conquered Libya, Ethiopia, the Medes, the Persians, the Bactrian and the Scythian; his empire comprised also the country of the Syrians, and the Armenians with their neighbours the Cappadocians; and extended to the west as far as the waters that wash the coasts of Bithynia and Lycia, &c." The tribute that each nation payed in gold, silver, armour, horses, ivory, perfumery, corn, and other things, was also recorded on this monument of doubtful veracity.]

The three most complete obelisks at Rome in point of sculpture, are the Lateran, Flaminian, and that which Pius VI. erected in front of the Curia Innocentiana on the Monte Citorio. The figures about the base and top, which are the largest, are also the best executed. The style of the sculpture is similar to that of the Museum obelisks, the outlines of the figures being determined by incisions in the stone, sometimes to the depth of nearly one inch and a half. In these the figure rises sometimes rounded to a small elevation, and sometimes nearly as high as

* Compare, for example, the third inscription with what Herod., ii. 73, says of the Phœnix.

the plane surface, the whole of which has been highly polished with emery, or some similar kind of fine dust: the deeper sunk figures seem to have been finished by the chisel only, being left without any polish*.

The second obelisk in size, is that which C. Cæsar† erected in the Vatican Circus. It was removed by Fontana, the architect of Sixtus V., to its present position in front of St. Peter's, and was the first of the four which this enterprising pontiff restored. It has no hieroglyphics upon it, and, if we believe Pliny, was cut by Nuncoreus, the son of Sesostris, who corresponds to the Pheros of Herodotus. It seems to have been broken in antient times‡, and to have lost part of its length; yet it is still 83 feet 2 inches high (without the modern ornament at the top), of which six feet belong to the pyramidal apex. Each side is said to be of equal width, being at the base 8 feet 10 inches, and under the pyramid about 5 feet 11 inches. It appears, however, that there are great discrepancies about the dimensions of this obelisk, which induce Zoëga to conclude that a more exact measurement is necessary, and might serve to establish the fact of this being one of the obelisks of Pheros or not§. It is not, however, easy to measure the obelisk at present. The whole height, with the pedestal and cross at the summit, is about 132 feet.

* This style of sculpture has been called by the Italians *Dis-temperatura*, from the protection it affords against the weather.

† “There is a third obelisk at Rome on the Vatican (he had just mentioned the two removed to Rome by Augustus), in the Circus of C. Cæsar Caligula, and Nero—made in imitation of that which Nuncoreus, son of Sesostris, caused to be cut. There remains another of the same kind 100 cubits high, which he dedicated to the sun, after recovering from his blindness.” Plin. xxxvi. 11. The words after Nero to the end of the first sentence, are undoubtedly corrupt.

‡ Pliny, xxxvi. 11. But see Hardoin's Pliny.

§ He erected two, each 100 cubits or 150 Greek feet high.—Herod. ii. 111.

The Flaminian obelisk (Flaminio del popolo) is in size next to the Vatican. This was one of the two obelisks that Augustus transported to Rome, and erected in the Great Circus. "The obelisk," says Pliny, "which Divus Augustus erected in the Circus Magnus, was cut out of the quarry by King Semneserteus*, in whose reign Pythagoras visited Egypt. It is 125 $\frac{3}{4}$ feet high besides its pedestal." It consists of three parts, which altogether, according to Mercati's measurements, make up 110 Roman palms, but 8 palms were cut off from the lower part before it was put in its present position; which will reduce the height of the shaft to about 78 feet 5 inches. The sides are of unequal width, those on the north and south, which correspond, are 7 feet 10 inches at the base, and 4 feet 10 inches at the top. The other two at the same positions respectively are, at the base, 6 feet 11 inches and 4 feet 1 inch. The northern face of this obelisk shows marks of damage from fire, but the other sides are uninjured.

The fourth obelisk in size, is that which Augustus set up as a sun-dial in the Campus Martius. We are enabled to identify it with certainty by means of the following inscription, cut on the two sides of the pedestal, which formerly faced the east and west.

IMP. CAESAR. DIVI. F.
 AVGSTVS
 PONTIFEX. MAXIMVS.
 IMP. XII. COS. XI. TRIB. POT. XIV.
 AEGYPTÓ. IN. POTESTÁTEM
 POPVLI: RÓMÁNI. REDÁCTÁ
 SÓLI. DÓNVM. DEDIT.

* This, like all the Egyptian names of Pliny, is corrupted. Pythagoras visited Egypt in the reign of Amasis, if ever he went there.

“The Emperor Cæsar, son of the deified Julius, Augustus, Chief Pontiff, Imperator for the 12th time, Consul for the 11th, holding Tribunician power for the 14th time, upon Egypt being reduced into subjection to the Roman people, presented this obelisk as an offering to the Sun.”

There is the same inscription on the corresponding sides of the Flaminian obelisk, which formerly stood in the Circus Maximus. The obelisk of the Campus Martius was placed in its present position on the Monte Citorio, in the 18th year of Pius VI., having been got out of the ground and the rubbish wherein it was buried, in the year 1748, and during the pontificate of Benedict XIV. by Zabaglia*. It is about 71 feet $5\frac{1}{2}$ inches English in length, according to Stuart's measurement. The perpendicular height of the pyramidal top is 5 feet $\frac{578}{1000}$ inches. The south and north bases of the pyramid measure respectively 4 feet $11\frac{1}{2}$ inches; the east and west, 5 feet $1\frac{74}{1000}$ inches. The eastern and western sides of the base of the shaft measure each 8 feet $\frac{4}{1000}$ inches. The bases on the north and south side Stuart could not measure on account of the corrosion of the material. The whole height of this obelisk with its pedestal is about 110 feet. This obelisk of the Campus was found broken into four pieces, the lowest of which was so injured by fire, that it was necessary to substitute in its place another block of the same size; the sculptures are also damaged on the remaining parts.

The pyramidal top of this obelisk is a real pyramid, being bounded by right lines and plane surfaces. Its height, which is about the same as the width of the base, is said to produce a more pleasing effect than the top of the Lateran obelisk, the height of the pyramidal top in this latter surpassing the width of the base by about one-third; while the Vatican

* Biograph. Universelle;—Zabaglia.

appears too blunted, the height there being one-fourth less than the width of the base. This obelisk in fact is pronounced to be the most beautiful of all now existing at Rome, both for the proportion of the parts and the colour of the material.

Zoëga (pl. 1) has given three faces of the Obeliscus Campensis: nearly the whole of the sculptures on one side, the west, are erased. Immediately beneath the base of the pyramidal top we have the crowned hawks, a pair on each side, with a serpent behind each attached to a globe. There are only two varieties of cartouches, one containing the prænomen, the other the name. The representation of an obelisk is cut on one face.

Plate 2 contains the sculptures of three faces of the pyramidal top, where we see a sphinx without a beard reclining on an altar. The arms of the sphinx, which are human arms, are wrong placed; that which is the left ought to be the right, and the right arm ought to be transferred to the left side.

On the south face the god Ré, the sun, with the hawk's head, is seated opposite to the reclining sphinx; on the east face, Osiris is seated opposite to the same figure. The vertical angle of the pyramidal faces contains the winged scarabæus sacer, with a large disk almost touching the two curved extremities of his wings.

Plate 8 is a view of this same obelisk, which stands on a pedestal, and that pedestal on three plinths,—on the pedestal is the following inscription:—

“Pius VI. Pont. Max. Obeliscum Regis Sesostridis a C. Cæsare Augusto horarum indicem in Campo statutum quem ignis vi et temporum vetustate corruptum Benedictus XIV. P. M. ex aggesta humo amolitur reliquerat squalore deterso cultuque addito urbi coeloque restituit Anno M.DCCXCII sacri principatus ejus XVIII.”

“This obelisk of King Sesostris, once erected as a

sun-dial in the Campus by C. Cæsar Augustus, after suffering much both from time and the action of fire, was taken out of the rubbish by Pope Benedict XIV. Pius VI., after repairing and beautifying the obelisk, removed it from the place where Benedict had left it, and again placed it on a pedestal, in the year 1792, and the 18th of his pontificate."

The whole height of the shaft as it now stands on its pedestal is 110 feet. The pedestal itself is 39 feet; a height most disproportionate to that of the shaft, when compared with the proportions of the Alexandrine obelisk.

Zoëga's plate shows the ball on the top, surmounted by an acute pyramidal kind of spike, which forms an odd contrast with the genuine simple termination of an Egyptian obelisk.

We have a short notice of this obelisk in Pliny*, who describes it as being $116\frac{3}{4}$ Roman feet in height, and further tells us that it was turned into a sun-dial in the time of Augustus.

This is translated from Hardoin's edition:—

"The deified Augustus made a new and wonderful use of the obelisk which is in the Campus, for observing the shadows of the sun and the length of the days and nights. He laid down a stone pavement so proportioned to the height of the obelisk, that at the sixth hour (mid-day) at the winter solstice, the shadow of the obelisk should coincide with the pavement; and so that it should gradually and daily decrease along certain lines (made of metal and let into the stone), and again increase,—a thing well worthy of attention, and displaying an inventive genius in the mathematician or astronomer. He added a gilded sphere to the summit of the obelisk, in order that by means of it the shadow might be collected in itself, as the apex of the obelisk produced one that was ill

* xxxvi. 10.

defined. The principle, as they say, was taken from observation of the human head." We are only translating the passage : its exact explanation we leave to others.

" This being observed or used for thirty years does not now denote the truth, either because the sun's course has undergone variation, and that of the heavens also, or because the whole earth has been to some extent disturbed from its centre, which, as I have been informed, has been detected in other places also, or from the gnomon losing its position, owing to earthquakes ; or finally from the whole mass sinking from the inundations of the Tiber,—though it is said that a deep foundation was laid in the ground proportionate to the height of the mass that was to rest on it."

We learn from this that the stone pavement was graduated so as to mark the limits of the sun's rising, meridian, and setting, for each day in the year. The spaces between rising and setting might probably be divided into twelve parts by observation.

Pliny in the preceding chapter informs us that this obelisk, which we know to have come from Heliopolis, was the work of King Sesostris. It is not very easy to see how Pliny could know anything about the matter ; and it is very unlikely that he would have taken the trouble to consult those who alone could, by any possibility, have a chance of knowing the truth—the priests of Egypt. According to the alphabetic value of those Egyptian symbols, which are now generally admitted to be determined, this obelisk bears the name of Psammitichus, written in exactly the same characters as on the frieze (No. 4) in the British Museum. But there is a difference in one of the three symbols which constitute the prænomen of Psammitichus on the obelisk, and Psammitichus on the frieze. Hence M. Champollion considers the Psammitichus of our frieze to be the son of Necho, and he calls him

Psammitichus the second. But **Necho's** son was called **Psammis** or **Psammuthis**, not **Psammitichus**; and for the present we are disposed to believe that the single difference of one character out of three in the prænomen or title, is not decisive as to any difference in the person. Proper names often vary in the mode of alphabetic expression, and why may not this be the case with the prænomens also, occasionally? But the fact is, there is no **Psammitichus**, the grandson of a **Psammitichus**. The second **Psammitichus**, if there was one, belonged to a later date*.

We have said nothing about the Barberini obelisk, as it has been generally called, which is undoubtedly not a work of the best age of Egyptian art. This we believe is the obelisk now called **Aureliano della Passeggiata**, which was erected by **Pius VII.** in 1822, on the **Monte Pincio**. The sculptures are arranged in double vertical columns on each side, and are of very indifferent execution. On one face we observe the crocodile or lizard, as on the **Alexandrine** obelisk. There are four cartouches on one side, which we will call **No. 1**: on **No. 3** there are two empty cartouches, and one on **No. 2**—placed transversely instead of vertically. On **No. 4**, near the base of the pyramidal top, there is a cartouche placed before a king who is making an offering to the god **Phré**, the sun, who is seated. In this cartouche **M. Champollion** reads the name of **Hadrianus Cæsar**, of all the Roman emperors the greatest friend of Egypt, and the truest lover of her singular arts and religion. To confirm the epoch of this obelisk, the name of **Sabina**, the emperor's wife, and that of **Antinous**, his favourite, are also read on this monument.

The **Pamphilian** obelisk is of the same class: it contains on it the name of the emperor **Domitian** †,

* *Diod. Sic. xiv. cap. 35.*

† *Champ. Précis, p. 211, p. 68.*

as well as that of his father, and shows most distinctly in the style of its sculptures the decline of Egyptian art.

The Minervean obelisk was found among the ruins of the Iseum, in the Campus Martius. The perpendicular height is about 16 or 17 feet. Of all the Roman obelisks this has the greatest inclination of its sides. The pyramidal top is bounded by right lines. The sculpture is of inferior art, and it is doubtful whether it be Egyptian or Roman. The superficies are not well polished, and the pyramidal top is without sculptures. The remaining part has one column of hieroglyphics on each side, bounded on both sides by a vertical incision, ending at the top in a plough-formed sceptre. On each column the hawk occupies the first place.

Besides the obelisks now standing at Rome, others which cannot be found are mentioned by writers of the 16th and 17th centuries; while various fragments which still exist, or lately existed in different parts of the city, attest the number of works of this kind which once adorned the imperial capital, and the devastations of barbarians both foreign and domestic.

But besides Rome, other Italian cities were adorned with the spoils of Egypt, or with imitations of genuine obelisks. There is one at Benevento, which M. Champollion has proved to belong to the reign of Domitian, to which epoch, or to one even later its sculptures* alone would induce us to assign it. The small obelisk of the *Museum Borgia* (now at Naples) was found in the ruins of Præneste in 1791, and with the Albani obelisk (now no longer at Rome), formed probably the ornaments to the entrance of some small temple. The sculpture, independent of other evidence, marks a Roman epoch, probably as late as that of the Barberini obelisk.

* See Zoëga, p. 644.

This Borgia obelisk is the *lower* part of a small one, as Zoëga infers, because the hieroglyphical characters and the vertical lines are not carried down to the bottom, but a space is left without sculptures. Also the base of the shaft is somewhat contracted up to the height of half a palm, or 4.4 inches, in order that it might be fixed in the stylobates or plinth; for this was the way in which the Egyptians secured the shaft. Zoëga believed the sculptures to be Egyptian.

There are two obelisks at Florence, one of which is the smallest known. How or when it came to Florence nobody can tell. It is made of dark-coloured granite, and does not quite reach the height of 8* palms, or 5 feet 10 inches: the top of the pyramid, and some small part of the base is gone. The sculptures are ill cut, and not after the intaglio fashion, but little more than outlined. Zoëga compares the outline of the figures, as to execution, with the hasty sketches on the integuments of the mummies, and with the figures on wood or calcareous stone.

One use of obelisks mentioned by Strabo † is, their being placed in the tombs of the kings of Thebes with the records of the events of their reigns inscribed upon them. These of course must have been small obelisks, something like the two Museum specimens, or even still smaller. But neither Belzoni, who opened so many new and magnificent tombs, nor any other explorer, as far as we know, has noticed any obelisks in these tombs at Thebes, of which Strabo speaks, or indeed in any other part of Egypt.

We are inclined to think that Strabo may have been mistaken, probably not having entered the tombs himself, and that the origin of his mistake may be pointed out by the following remark of Belzoni. In the tomb

* Hence perhaps Strabo may be supported when he says that small obelisks were placed in the tombs of the kings of Thebes.

† Strabo, p. 816.

which he opened at Thebes, commonly, but not correctly, called that of Psammis or Psammuthis, he observed the hero " * with a plate in the form of an Egyptian temple, hung to his neck by a string. It contains an obelisk and two deities—one on each side. Plates of this kind have been much sought after: few have been found, and I have only seen two—one is in the British Museum, and the other I was fortunate enough to procure from an Arab, who discovered it in one of the tombs of the kings in Beban el Malook. It is of black basalt."

Obelisks, as we have seen from numerous instances, are generally covered with figures of various kinds cut deep in the stone, and known by the common name of hieroglyphics; but some obelisks have none, as for example, that in front of St. Peter's, and another near the church of Santa Maria Maggiore at Rome. Pliny informs us that obelisks were dedicated to the sun, and he adds that their form, resembling a ray of the sun, is a proof of this; and further, that an obelisk has a name in the Egyptian language, which indicates this fact. Indeed all pyramidal kinds of buildings have been considered as emblems of the sun and of fire: some also have conjectured that obelisks were intended for a kind of dial, but this is disproved by the fact of their being found in situations where their shadow could not answer such a purpose, not to mention other objections. Pliny indeed remarks that when the obelisk in the Campus Martius was turned into a dial, this was an application of it to a new purpose; and it required a degree of labour to make it at all practically useful, even for a limited period, far beyond what we have any reason for supposing the Egyptians ever took. Those who have paid any attention at all to the symbolical language of the antient world, are aware what a number of wild conjectures have been

* P. 244.

started on the origin of almost every representation or form which enters into a religious system. This is particularly the case in the mythology of the Egyptians, the greatest part of whose pictorial or sculptured representations have received a variety of contradictory interpretations. The truth would seem to be, that as the human mind cannot create forms, it must find them in nature, and all it can do is to imitate individual types, and to combine them. Hence we see that in Egyptian paintings and sculpture nearly all the objects are such exact imitations of something real, that we can discover the original type ; or if not figures of visible objects, they are the representations of some mode of existence of certain powers, such as they make themselves known by their qualities. Now an obelisk is one of the simplest of all forms : it is an unmixed idea, embodied in an unmixed form. Whether then it may be emblematic of the sun's piercing rays, and at the same time a symbol of creative power, we leave to the judgment of those who are versed in such matters.

“ * An obelisk,” says an antient writer, “ is a very rough stone, in the shape of a kind of land-mark or boundary-stone, rising with a small inclination on all sides to a great height. In order that it may bear some resemblance to a solar ray by a gradual diminution of its bulk, it terminates in a prolongation of four faces united in a sharp point. It is smoothed with great accuracy. The innumerable sculptures cut all over the surface of these masses, which we call hieroglyphics, had their origin in the first rudiments of science, and were sanctioned by the remotest antiquity. The Egyptians cut on their obelisks many varieties of birds and animals, and even some that belong not to this world. They were intended to commemorate the vows of kings or

* Ammianus Marcellinus, xvii.

their gratitude to the gods, that the remembrance of past events might be more extensively known to future ages. For the antient Egyptians did not write, as we do now, with a limited and easily acquired number of characters expressing every possible idea, but with them each symbol expressed a name and a word; and sometimes a single symbol conveyed an entire and complete sense."

The twelve obelisks of Rome are arranged below, in the order of their modern restitution, and with the name of the Pope in whose pontificate they were raised*.

I.—Sixtus V. 1586.

The Vatican, in front of St. Peter's, where it was removed by Fontana from the Vatican Circus. On the side facing the church and on the opposite side we see the dedication to Augustus and Tiberius.

	ft.	in.
Whole height	132	2
Ditto without base and modern ornaments at top, cross, &c.	83	2½

Without hieroglyphics, and still entire.

II.—Sixtus V. 1587.

In front of the church of Santa Maria Maggiore, erected by Fontana.

	ft.	in.
Whole height	83	9½
Ditto without base and modern ornaments at top, cross, &c.	48	4½

Without hieroglyphics; broken in three or more places.

III.—Sixtus V. 1588.

In front of the St. John Lateran church, erected by Fontana.

* This list and classification are partly founded on a synoptical view entitled 'Dodici Obelischii Egizj che si osservano rialzati ad ornamento della città di Roma posti secondo l'ordine della loro rilevazione'; and partly on Nibby's Guide-Book of Rome, and Zoëga's work. Some of the dimensions may not be very exact. The dimensions as given in Roman palms and French *mètres* by various authorities do not always agree.

	ft.	in.
Whole height	149	7½
Without base, &c.	105	7½

Hieroglyphics; broken in three pieces.

IV.—Sixtus V. 1589.

Flaminio del popolo, erected by Fontana.

	ft.	in.
Whole height about	116	0
Without base, &c. about	78	5½

Hieroglyphics; broken in three places.

V.—Innocent X. 1651.

In the Piazza Navona; sometimes called the Pamphilian obelisk.

	ft.	in.
Whole height about	99	0
Without base, &c.	54	3½?

Hieroglyphics; fountain round the base.

VI.—Alexander VII. 1667.

Minerveo della Minerva, erected by Bernini.

This obelisk, with singular bad taste, is placed on the back of a horrible elephant, the work of Bernini.

	ft.	in.
Whole height about	39	7½
Without base, &c. about	17	0?

Hieroglyphics.

VII.—Clement XI. 1711.

Mahuteo della Rotonda, in front of the Pantheon of Agrippa.

	ft.	in.
Whole height	47	8
Ditto without base, &c.	19	8½?

Hieroglyphics; probably the pendant of No. 6:
Fountain round the base.

VIII.—Pius VI. 1786.

Quirinale di Monte Cavallo, erected by Antinori.

	ft.	in.
Whole height	94	11¼
Ditto without base, &c.	47	8?

No hieroglyphics; appears broken in two or three places.—See Zoëga, pl. 6.

IX.—Pius VI. 1789.

Sallustiano della Trinitá di Monte, erected by Antinori.

	ft.	in.
Whole height	99	11
Ditto without base, &c.	about 43	6

Hieroglyphics.—Zoëga, pl. 7.

X.—Pius VI. 1792.

Campense di Monte Citorio, by Antinori.

	ft.	in.
Whole height	110	0
Ditto without base, &c.	71	6

Hieroglyphics.—Zoëga, pl. 8.

XI.—Pius VII. 1822.

Aureliano della Passeggiata, on the Monte Pincio.

	ft.	in.
Whole height	56	7 $\frac{1}{2}$
Ditto without base, &c.	30	0 $\frac{1}{2}$

Hieroglyphics: this is called by Zoëga the Barberini obelisk, of which he says, "Hic e Romanis obeliscis adhuc cognitis solus expectat sospitatorem."

XII.—1817.

Private obelisk on the Cœlian Hill, in the gardens of the Villa Mattei; hardly worth mentioning. It is a small fragment of a real obelisk mounted on a piece of modern granite.

. One of the obelisks represented in the cut (p. 64) as standing in front of the temple of Luxor, is now arrived at Paris, where it is to be erected, as we are informed, on the base of Louis XV.'s intended statue, in the Place opposite the Chamber of Deputies.

The word *obelisk* is a Greek word (*ὀβελίσκος*), and is a diminutive of the word *obelos* (*ὀβελός*), which Herodotus uses to signify an obelisk. The word *obelus* (*ὀβελος, βίλος*) is properly a *sharp-pointed thing, a skewer, or needle*: Herodotus himself uses it in the sense of a *skewer* or *spit* (ii. 41). Hence we may see why an obelisk is called in Italian *Aguglia*, and in French *Aiguille*. (See p. 330.) There is no Egyptian name for obelisk, unless it be the word *Pyramid*. See the chapter on Pyramids, vol. ii.

CHAPTER XVI.

STONE QUARRIES.

WE have traced the granite obelisks of Egypt from the island rock of Philæ to the extremity of the Delta, where the column of Diocletian and the obelisk of Cleopatra still tower over the ruins of antient Alexandria : we have found them in the metropolis of the Ottoman empire, and adorning the public places of antient and modern Rome. We will now notice more particularly their native quarries. The granite* region of Syene extends from the island of Philæ along the whole line of the cataracts as far as the modern town of Assouan, the northern point of Elephantine forming its limit in that direction. It extends also from east to west, on both sides of the river ; but the best specimens lie near the stream, and the granite loses its beautiful appearance the further we recede from the east bank towards the desert. The red granite thus occupies only a small space, forming a kind of portal or entrance through which the Nile bursts into Egypt, forcing its way amidst innumerable isolated cliffs, consisting of the most beautiful rose-coloured granite. This red granite (the Syenite of Pliny, but not the Syenite of modern geologists) is known by its beautiful colour, the magnitude of its crystallized component parts, and its hardness ; owing to which latter quality it receives that exquisite polish which is observable on some of the Roman obelisks, and on the colossal statues of the Museum. The rose-coloured feldspath, which sometimes approaches to

* Ritter. Africa, p. 697, &c.

a brick-red, forms about two-thirds of the mass; the intermediate spaces are filled with the sparkling mica and the glassy transparent-looking quartz. Hornblend is seldom found mixed with it.

As the Theban obelisks and many other works of art were made of this material, it is sometimes called *Theban stone (Thebaicus lapis) by Pliny, and also by some modern writers; but this is an improper use of the term, and one likely to cause misconceptions as to its true locality. In Upper Egypt the dryness of the atmosphere, and the general steadiness of the temperature, have contributed, with the hardness of the material, to preserve the polished surfaces of the obelisks, and their more delicate sculptures, uninjured during so many centuries. But those near the sea coast, particularly at Alexandria, as we have already remarked, have had their surfaces decomposed by the action of the moist atmosphere. This effect is also partially observable on some granite sarcophagi lying in the court of the Museum, while those in the Egyptian gallery will certainly preserve their outer surfaces much longer, from being never exposed to damp or any great change of temperature.

Near the limits of the red granite are found several varieties, occupying a still more limited space, and forming a transition series between this and the common granite. They differ from the red granite and from one another, both in colour, component parts, and the magnitude of the component parts, some of which are very coarse, and others small and fine. We see in the existing specimens of Egyptian sculpture that they often selected some of these varieties in preference to the red-coloured one. There is the fine-grained granite; the grey granite, with grey-coloured feldspath; black and white granite, so called from the white feldspath and black flakes of mica; and

* It is true that the name of 'Theban' once comprehended *all* the region between Thebes and Syene. See Herod. ii. 28.

oriental basalt, so called from the dark homogeneous substance which is embedded in large kidney-formed pieces in the red-coloured granite, and owes its origin to the prevalence of the particles of mica and hornblend over the feldspath. Occasionally the granite is very dark, owing to the abundance of mica. The Memnon's head of the Museum is composed of one piece of granite, which presents different characteristics: the upper part is a fine-grained, rose-coloured granite, while the lower part is dark-coloured; and both present a striking contrast with the granite material of the colossal head (No. 8) opposite to them.

The stone quarries of Egypt and Nubia show distinctly to the present day the mode in which the stones were got out. Gau has given a view (plate 9) of those of Gartaas. In the face of the rock we observe a number of long horizontal lines one above another: the vertical distance between any two adjoining lines shows the thickness of the piece cut out, while the length is very clearly marked in several cases, either by the termination of the face of the rock on each side, or by a vertical mark on it, extending from one horizontal line to the next. Gau remarks*, that the stones were taken out of the quarry just in the shape and size which they required, and were detached from the mass one after another, by means of little wedges inserted in holes made on the two faces of the stone †. Though this is a slow process, it is economical as far as the material of the rock is concerned, and was employed both in the granite quarries of Syene, and in those of Carrara, in the time of the Romans. At the latter place it is the practice at present to blast the marble, by which about three fourths of the material are wasted. The same process which Gau supposes to have been employed at Gartaas was used in the granite quarries of Syene. The same horizontal

* Preface.

† See his drawing, pl. 9.

and vertical lines are visible on the face of the rock, from which the masses must have been detached (according to Denon) either by iron wedges which were struck all at once, or by wooden wedges which were moistened so as to swell and start the stone from its position. All observers in fact agree as to the general principle by which the blocks were got out of the quarry. The great French work (*Antiq. i. pl. 32*) contains a view of a rock of granite which shows the way in which it was worked.

It might be asked, what became of all the stone that was taken out of the excavation of Ipsambul? We are not aware that any traveller has carefully examined the vicinity of the temple so far as to ascertain whether there are any traces of the enormous quantity of rubbish that must have been produced by such an excavation. It is not probable that it would be carried far, and therefore it may possibly be discovered in the vicinity of the temple, unless it be buried under the sand. Gau does not allow that any of the excavated temples of Nubia and the tombs of Egypt were ever used as stone-quarries; an opinion to which were we to assent, it would not be for the reason which he gives—because they are so regular. There can be little doubt that the catacombs of Alexandria were quarries; and they are regular enough. The practice of converting subterraneous excavations, which were originally nothing more than quarries, into tombs, and then decorating and finishing them, is nothing surprising. Nor do we see any great difficulty in assigning such an origin to the Nubian excavated temples, if we allow them to be tombs. We may still reconcile with this notion the theory of excavations being prior to constructed edifices. The rude and simple excavation would be the first step; the pyramidal building of stone the next; the materials for which might be partly procured by enlarging the

excavation already made ; and, finally, the excavation itself might receive decorations suitable to the tomb of a monarch or a priest.

The quarry of Gartaas contains a small Egyptian chapel, not of great antiquity, cut in the rock. Gau's drawing shows the doorway, which is in the ordinary Egyptian style. Similar doorways are found in the face of the sandstone quarries of Hadjar Selseleh, fronting the river, and forming the entrance to the long open galleries, which conduct to the extensive excavations. In a large quarry on the west bank of the river (for they lie on both sides), there is a small chapel, excavated in the rock, as at Gartaas, probably for the use of the workmen. The quarries on the east side contain representations, cut in the stone, of the implements used in quarrying*. It is, perhaps, not easy to make out what they are. Two of them appear to be wedges, somewhat differing in shape ; and another is in form precisely like the modern lewis, which is used by masons for raising stones. It has a circular top, which might be a kind of ring, then a horizontal bar or bolt, while the lower part is a truncated triangle, with the base forming the lowest part of the instrument. We cannot tell from the drawing (and probably the original figure on the face of the stone quarries may be merely an outline) whether this instrument was made up of several parts or not. But even if it were a single piece, it could be inserted in the stone by undercutting. If this instrument is not a lewis, we cannot imagine what it is. Supposing it to be what we have conjectured, this will not prove that this mechanical contrivance was known to the antient Egyptians ; for the Egyptian quarries were worked both under the Greeks and Romans. This is clear from the inscriptions, which are both Egyptian, Greek, and

* Hamilton, p. 85. See accompanying plates, No. 21.

Roman, as is also the case in the quarries of Syene and Nubia. This, then, confirms the opinion of extensive works being carried on under the dominion of the Greek kings of Egypt* and the Roman Cæsars. The Greek inscriptions on the quarries generally contain little more than the name of some individual, with an expression of devotion to the guardian deity or deities of the place. Belzoni found a column, lying on the ground, in the granite quarries a few miles south-east of Assouan, which contains a distinct record of certain works being commenced in the reign of Septimius Severus, and the material being employed for the walls of buildings and for columns. The inscription, as far as it is intelligible, is to the following effect:—

“To Jupiter Hammon, Centubis, Queen Juno, under whose guardianship this mountain is—since first under the empire of the Roman people, in the most happy age of the invincible Imperatores, Severus and Antoninus, most Pious, Augusti, and of Geta, and Julia Domna Augusta, the mother, new quarries were found near Philæ, and many and large *rectangular columns and pillars taken from them under Subatianus* †.”

The quarries of Hadjar Selseh furnished the chief materials for the temples, as those of Syene did for the obelisks and colossal statues. They lie in the sand-

* See Mr. Wilkinson's paper on the quarries of Jebel Dokhan, &c. London Geograph. Journal, No. II.

† This inscription is probably both carelessly cut and incorrectly copied. It is worth giving in its original state (Belzoni, p. 106). “Iom Hammoni Cenubidi Ivnoni reginae qvor. svb tvtela hic mons est, qvod primitur svb Imperio P R felicissimo saeculo, D.DNN invictor. Imp. Severi et Antonini Piissimorum Aug. C. et Getae (Geta's name erased) . . . ISSI . . . Ivliae Domnae Aug M. Kivxsta Philas novae lapicaedinae adinventae, tractaeque sunt parastaticae et columnae grandes et multae svb Svbatiano, AQVILAE · PR' AEG - CVRAM · AGENEOPDOMINIC · AVREL - HERACLIDAE · DECAL - MAVR .”—The parts that appear doubtful are in Roman characters.

stone district, the second great geological division of Egypt, following the course of the Nile; the granite being the first, and the limestone the third, or most northerly. The sandstone region extends over about one degree of latitude from Assouan as far as Esneh.

The sandstone is compared by the French geologists* with the grès de Fontainebleau, or rather with the stone known by the name of molasse de Genève. It often contains a number of micaceous particles, and is generally of a very clear, yellow, whitish, or greyish colour. It only grows black or dark-coloured on the temple walls, when it contains a more than usual quantity of mica particles and metallic oxides. The Egyptians were careful to cut out such pieces as suited their purpose best from among the several varieties; and it is as easy to find large unbroken masses here as in the quarries of Syene. Beams for architraves, to the length of 25 or 30 feet, and large pieces, suitable for colossal sphinxes of nearly equal length, were easily procured in these quarries. The stone is soft, and very easily worked. The colossal sphinx-head of the Museum, which we presume came originally from these quarries, is indeed so soft that it has suffered considerably from the effect of the atmosphere, and is probably now undergoing a more rapid change than for centuries before it became an inmate of the Museum. The finer projecting parts will not bear the least rubbing without suffering some damage. It is probable that the paint with which the Egyptians covered nearly every part of the walls of their temples, was partly intended to protect them against the effects of the atmosphere.

We may judge of the enormous size of the stones that were transported from the quarries of Syene to the most remote parts of Egypt, from the colossal statues, the obelisks, and the monolith temples. At

* Bitter's Africa, p. 710.

the present day there is a huge cubical block lying on the road between the granite quarries and Syene, which, from some cause or other, has never reached its destination. It is represented in Denon's sixty-seventh plate, with sculptures on two of its vertical faces; and, to judge of its mass by the figures placed near it as a scale, it seems large enough to form another monolith, even superior to that of Amasis. Jomard observed, about 900 paces south-east of Syene, a block which had been intended for a colossus about 68 feet high. It is generally supposed that the masses of rock used in constructing temples, &c. were taken in the rough to the place where they were to stand, and that they only received their full shape and complete decoration when they had arrived at their journey's end. This would appear to be somewhat confirmed by the fact of this rude block near Syene having been carried so far in its primitive shape, and also from the consideration that the more delicate edges and sculptures of large masses would be liable to injury from transportation, after they were completed. But Mr. Hamilton found, at Hadjar Selseh, blocks with half-finished figures and architectural ornaments, intended for entablatures, cornices, and small propyla; and the colossus, represented in Minutoli's drawing as riding in state to his new home, is apparently in full dress, and has even received his last decoration from the hands of the painter. But, for aught we know, he may have been finished near the temple, and this picture may merely represent the ceremonial of his taking possession. It seems not unlikely that the smaller members of the architecture may have been nearly completed in the quarry, while the larger part would be transported in a rough form.

We have attempted to show, from the history of the Seringapatam obelisk, by what simple methods it is

possible to raise large masses. It would be still easier to seat a colossus on his pedestal than to deal with an obelisk, the former having a comparatively larger base, and being less liable to snap asunder. But it is another curious inquiry to ascertain how the immense masses that form the entablature, some near 30 feet long, were safely lodged in their present position. Tradition had preserved, to the time of Herodotus, an account of the simple contrivance used in building the pyramids, which may have been followed also in the construction of other edifices. The pyramid was built in receding stages, the area of each stage being less than that below it. When the first level was finished, the stones intended for the second course were lifted upon it by means of levers, and then removed to the proper distance from the edge of the platform. In the same way, the stones intended for the third level were raised upon the first step, and from that transferred to the next above it, and so on to the top of the pyramid*. The advantage of this method, which indeed was the only one they could have well used in building the pyramids, consists in the small height to which each stone was to be raised at once. A number of repeated efforts, each of which allowed a pause, placed the stone in safety on the very top of the Pyramid.

We do not know whether the stones in Egyptian buildings show any traces of having been raised by such mechanical processes as were used by the later Greeks, and are employed by us at the present day. It seems most probable, that banks of earth in the form of inclined planes, or some simple contrivance like that used in the construction of the pyramids, was employed, rather than more complicated mechanical powers. In some Greek edifices, the holes in the stones of the en-

* Gouget, in his *Origin of Laws*, has given a plate of what he conceives to be the meaning of Herodotus, (ii. 125).

tablature are visible by which they were elevated to the proper level by means of ropes or chains, passed through two holes cut near the angles of the stone. Some stones are said to show angular incisions, probably something like what are made at the present day, when three pieces of iron, altogether forming a truncated triangle, are inserted in a triangular hole in the stone, under the name of a lewis. But even if such mechanical contrivances had been known to the Egyptians, it may be questioned if it was not easier for them to raise their stones by a frame-work and earth with receding stages, than to trust the prodigious masses of their architraves and cornices to any mechanical power which they could command. It was often the practice in Egyptian buildings to fasten the stones together by clamps of various kinds. This was observed by Abd-allatif in the buildings of Memphis. “* Notwithstanding the accuracy with which the stones of these buildings were placed, they had moreover made holes in the adjoining stones of about a span in length and two fingers’ (breadth) deep. In these holes the rust of the copper might be observed, from which I conclude that pieces of copper had been placed in them to bind the stones together, the metal being held fast by melted lead poured upon it. Some vile wretches have sought after these copper bolts and have carried off a great quantity. To get at the copper they have been obliged to break many of the stones. In truth they have given themselves a great deal of trouble to get at the metal, and have shown to the world their baseness and sordid cupidity.”

We have remarked that holes of this description are cut in one of the friezes of the Museum. (See p. 123.) The great temple at Koum Ombou, which is built of fine sandstone of a greyish yellow colour, has a reddish cement between the joinings of the

* Sacy, p. 187.

stone; and also wooden pins of sycamore wood, which together with the cement have been intended to hold the blocks more firmly together. The wooden pins seem to have been smeared with bitumen or pitch to preserve them better. But yet this building is in a very dilapidated state, which from its position is not so likely to be the effect of violence as of other causes, not yet carefully investigated. The very different degrees of preservation of such a temple as that at Edfou and this of Ombou, which probably belong to nearly the same epoch, may be attributed to some difference in the structure, or to the foundations in one case being better chosen or prepared than in the other. To earthquakes we cannot attribute any very great effect, as the whole continent of Africa is less exposed to these disturbances of the surface than any other large division of the world; and Egypt, though occasionally visited by shocks, has perhaps suffered less in its buildings from this cause, than any other part of the antient world. The great earthquake which shook the Delta in the time of Abdallatif, was of Syrian origin, and was probably only felt in any great degree in the parts of Egypt nearest that country. It seems to us therefore not unlikely that the foundation ground of some temples was so injudiciously chosen, that the enormous weight of the upper parts has gradually overcome the resistance of the base.

We may suppose that in Upper Egypt the temples generally rest on a solid foundation, which, in some cases, may be the rock itself. If any were ever built on the alluvium of the Nile without a good foundation, this may be one of the reasons why they have cracked and fallen down. In the Delta at Sais, Bubastis, and Atarbechis, some other substratum would be required than the yielding earth of that alluvial district. The following short notice

in Pliny will show that Greek architects at least

were not inattentive to such matters:—it will also serve to give some idea of the prodigious structures which Asia Minor once contained, in magnitude not inferior to the greatest works that line the valley of the Nile. “The temple of Diana at Ephesus is an object truly worthy of admiration: it was erected in two hundred and twenty years at the expense of all Asia, and on a marshy soil, that it might not suffer from earthquakes and openings of the ground. But that the foundation of so enormous a mass might not rest on unstable soil, a stratum of charcoal well rammed down, with bags of wool thrown upon it, supported the weight of the building. The whole length of the temple is 425 feet, the breadth 220, and the columns are in number one hundred and twenty-seven, each made at the expense of a king. They are 60 feet high; thirty-six are sculptured (fluted?), and one of them by Scopas. The architect (we presume there must have been more than one during two hundred and twenty years: the one here spoken of seems to have finished it) was Ctesiphon. The great wonder is that architraves (epistylia) of such an enormous size could ever have been raised. This the architect managed by bags of sand, which were heaped up till they formed a soft cushion on the capitals of the pillars, and the sand was then allowed to run out by degrees so as to let the stone gently settle down in its place. The great difficulty was with the lintel of the door, which was the largest mass of all. The architect never retired to bed, as he had vowed not to survive a failure. The story goes, that one night while wearied with pondering on his undertaking, the deity to whose honour the temple was erected, appeared to him in his sleep, and bade him live, for she had fixed the stone all right. At day-break the stone was seen settled firmly in its place.”—Pliny, xxxvi. 14.

CHAPTER XVII.

EGYPTIAN SCULPTURE.

HAVING treated of Egyptian temples, colossal figures, and obelisks, we shall find it convenient to consider most of their remaining works of art under the two heads of sculpture and painting. Though we have already discussed their colossal figures as one of the greater appendages of a temple, many of our remarks on Egyptian sculpture in general will apply equally well to them, and perhaps be better understood by the reader, from the notions which he may have already acquired from our description and the accompanying prints.

It is, perhaps, not necessary to look for the *origin* of sculpture and painting in any nation elsewhere than in the nation itself, though we readily admit that the art of one country may even in its infancy have been much modified by the introduction of new ideas and forms from another country. The sculpture of the Indians, Persians, Egyptians, and the people of Europe, may have originated in their respective countries, while, at certain epochs, owing to commercial intercourse or conquest, very great changes may have been introduced into the imitative art of one people from that of others who had obtained an earlier and higher degree of skill. When therefore we point out, as we shall do occasionally, certain resemblances between the forms of Egyptian and Indian sculptures, we wish to be understood as simply

presenting a number of facts, without deducing from them any hypothesis. We leave that to others.

The proper and highest subject of sculpture and painting, but more particularly of sculpture, is the human form. It is in this department that the Greeks attained unrivalled superiority. But Egyptian art was applied no less to the representation of other forms both animal and vegetable, and we may safely affirm of them as of the Hindoos, that in general their best specimens of art are not the representation of the human figure. This depended on their religious system; into the discussion of which we cannot now enter further than may be necessary to explain the state of art among them. In Egypt it was the practice to represent superior powers under the visible forms both of men and animals, or under forms combined of both. Examples of this are plentifully supplied by the specimens in the Museum, from which some of the prints in this volume are taken. Now we find both in the painted reliefs on the walls, and in all the various kinds of sculpture, that certain *fixed* forms, attitudes, and emblems are assigned to the representation of the deity and his worship. The art of sculpture, then, as well as painting, became subject to strict laws which the priest caste were careful not to let the artists violate. Hence we see in all the sacred figures of Egypt a resemblance, or rather identity, which renders it very difficult to fix the relative antiquity of the remaining specimens of Egyptian sculpture, unless this is indicated by the antiquity of the building of which they form a part, or by some evident traces of the intermixture of Grecian art. The representation of pure animal or vegetable forms could hardly be subject to the same strict laws with the sculpture of the human figure as a representation of deity. The objects were daily before the artist's eyes, and there is no reason for doubting

that he represented them to the best of his ability: though even here we often observe something approaching to *conventional* form. On many monuments, however, we see animals delineated with much more correctness of proportions and more natural roundness of limb than are shown in the sculpture of the human figure. If we may judge from the specimens in the Museum, the face in the human figure is more correct in its outline, though not free from defects, than any other part of the body.

The materials used in Egyptian sculpture were wood and stone, to which we may add metal and clay, which were employed respectively for the casting or hammering of bronze figures, and for the earthen jars or canopuses of which so many specimens remain. Porcelain figures also are found in Egypt. It appears from the small wooden figures so often found on mummies that the wood was the native sycamore of Egypt, the same that was applied to the making of mummy cases. There are several specimens of these small wooden figures and of others in baked clay and bronze in the Museum*, some with hieroglyphic marks cut on them and some without any. Wood was also used in the construction of large figures by the Egyptians, as we learn from Herodotus†, who tells us that King Amasis sent two wooden statues of himself as a present to the temple of Hera (Juno) in Samos, where the historian saw them standing within the doorway, probably one on each side, according to the Egyptian fashion. The high priests of Jupiter at Thebes preserved, we are told, the remembrance of their priesthood by each making during his lifetime a colossal wooden figure of himself; and of these uncouth looking objects, Herodotus ‡

* Eighth room, Egypt. Antiq.

† ii, 182.

‡ ii, 143.

says, as many as three hundred and forty-five were to be seen at Thebes when he visited that city. If this be true, neither Cambyses nor any former ravagers of Thebes did quite so much mischief as is attributed to them; for three hundred and forty-five colossal figures of wood could scarcely have escaped in the general conflagration. We read also of a wooden cow * being made by King Mycerinus, in which he interred his daughter. This cow was about the size of a large animal of the species, the head and neck were ornamented with thick gilding, an art well known to the Egyptians, and on the head between the horns a gilded circular ball was placed, which Herodotus took to be a representation of the sun. In this, however, he was probably deceived, as this cow with the gilded orb must have been a representation of Isis. The animal was placed in an apartment by itself, in a reclining posture with its knees bent under it. A large red mantle covered every part but the head and neck. In India it is not unusual to represent, under the form of a bull, Siva, one of the Indian trinity; and there now exists at Tanjore in the Carnatic, a colossal figure of a Siva bull in a reclining posture, which has been already described, (p. 291) †.

The small Egyptian wooden figures appear to be very little more than the representation of a mummy case on a reduced scale. We see a head with the usual dress on it, the arms folded on the breast, and the lower part terminating in a case or box-like form resembling that of a mummy. But we may easily collect from what Herodotus tells us of the wooden statues that stood in the apartment near the cow of Mycerinus, that the artist had attempted to give them a little more shape. These figures were naked, and once had *hands*, which, when the Greek traveller

* ii. 131, 132.

† See Daniell's Views, pt. ii. pl. 22.

was in Egypt, had fallen off and were lying at their feet; which, he supposes, was the effect of time, though much more probably it was the result of violence. Belzoni also found two wooden figures of very fine workmanship about 7 feet high in the tombs of the kings of Thebes. "They were in a standing position with one arm extended as if holding a torch."

Whatever may be the real origin of sculpture—whether it took its rise, as some suppose, in imitation of the human form in a plastic matter such as clay, or whether, as others with much more probability conjecture, its origin must be traced to drawing an outline on a flat surface, which was then cut into relief—we may safely assume that wooden figures were among the oldest and rudest specimens of sculpture. To cut a hard piece of stone into a resemblance to any animal form, is a work that requires more skill and better tools. Wooden statues were common among the early Greeks who called them ξόανα, and they are rightly considered by Pausanias as one of the earliest forms of statuary. "The most remarkable temple in the city * of Argos," says this traveller, "is one of Apollo Lycius. The present statue of the god is the work of Attalus, an Athenian, a cotemporary of mine; but the old temple was dedicated by Danaus, and the statue at that time was a wooden one (ξόανον), and indeed it is my opinion that all the statues of that remote period were of wood, and particularly those made in Egypt." Danaus, according to his mythical history, was an Egyptian who settled in the Peloponnesus.

It is curious to trace in Pausanias the numerous short notices which he gives of wooden statues existing in Greece during his travels in that country. Though many of them were undoubtedly modern, they still preserved the rude character of the primitive

* ii. 19, 3. This passage is misinterpreted by M. Q. de Quincy in his 'Jupiter Olympien,' p. 4.

type from which they were derived; and this, in several instances, the Greek antiquary pronounces to be *Egyptian*, a style with which, from his travels* in Egypt, he could not fail to be well acquainted. Yet there were other wooden statues in Greece to which tradition assigned the highest antiquity, and which belonged to the very infancy of the imitative art. As in the political history of nations the first links of the chain which joins the present with the past are invisible, so the connection between Egyptian and Grecian art cannot be traced to its origin; yet it is undeniable that as far back as any evidence extends, we find it impossible to separate the arts in Greece from associations with Egypt. The materials used by the ancient Greeks for their wooden statues were more varied than those which Egypt could supply—† ebony, cypress, cedar, oak, the smilax, the lotus; to which we may add olive wood, of which the Epidaurians made their statues of Damia and Auxesia‡. In Greece the rude statue in wood, though often retained in a later age with that conservative tenacity which is a characteristic of religious ceremonies, was gradually changed into a nobler form, and finally became the kernel of Chrys-elephantine statues, on which the genius of Phidias lavished the utmost efforts of his art.

If ever the Egyptians in their statuary ventured to detach the legs and arms from the rest of the body (of which we know no instance), it must have been in their wooden statues, the larger specimens of which were probably composed of several parts: and this may help to explain what Herodotus tells us of the hands having fallen off from the wooden colossi of

* i. 42, 3.

† Pausan. viii. 17, 1; other woods are mentioned in other passages. See Q. de Quincy, p. 25.

‡ Herod. v. 82

Mycerinus through length of time; which might very easily be the case if the hands were attached to the arms. Belzoni's description of the wooden statue with out-stretched arm is unfortunately not minute enough to enable us to judge whether it was really a figure standing free and without a further support except such as we see in Greek statues, or whether the back was supported against a wooden block after the manner of the Egyptian statues of stone. It is not difficult to trace Egyptian sculpture to its elementary essays. Rude outlines on the smoothed face of a rock were the sculptor's first attempt. He would then try to give roundness and relief by cutting away the stone all about the figures; and as it would be an unnecessary labour to cut away a large surface of the rock, this process resulted in the deep niche containing a statue in high relief, as we see on the face of the smaller rock-cut temple at Ipsambul. That Hindoo sculpture on stone might have had a similar origin we are inclined to believe, both from the facilities presented for such essays in the enormous rocky masses which the Indian peninsula contains, and from Daniell's drawings of the figures on the Fakir's rock in the Ganges. These are figures in high relief, but sunk deep in a niche, the plane of which appears considerably below that of the general surface of the rock: many of the sculptures at Elephanta also are only just fastened with their backs to the wall. The huge colossi of the great temple of Ipsambul are also attached by their backs to the native rock. Though the Egyptian artist at last learned to separate the block of stone from the parent mountain, he never ventured to deprive his statue of the squared pillar at the back, which remained to the latest age of genuine Egyptian sculpture as a memorial of the earliest efforts of its art. Egyptian statues, even those of the most colossal dimensions, are formed of a single

block ; and as this *unity of mass* seems to have been the leading idea of the artist, (which, as we have remarked, had its origin in the sculptures of the native rock,) the whole attitude of the detached figure was made subordinate to this principle. Hence attitudes of repose, with the limbs on both sides placed in exactly the same position, became the authorized and sanctioned style of Egyptian sculpture. We may consider that there is partly an exception to this principle in some of the standing colossi, which have one leg advanced a little before the other.

The rectangular pillar by which the back of Egyptian statues is supported, is generally of somewhat wider dimensions in the lower than in the upper parts. In sitting figures, this column, after descending nearly as far as the middle of the statue, widens into the back of a chair, as we may observe in the colossus, p. 277. The print No. 52 will give a correct idea of the columnar support at the back of an Egyptian statue.

The following are the dimensions of this figure:—

Height from base of plinth (at back) to top of rectangular pillar	in.	22 $\frac{1}{2}$ nearly
Thickness of plinth		5 $\frac{1}{4}$
Width of ditto at base		8
Width of rectangular pillar at base		3 $\frac{3}{8}$

The width at the highest part of the plinth is somewhat diminished, being a little less than eight inches ; and the same almost imperceptible diminution is observable in the rectangular column. The latter contains a double row of well-cut hieroglyphics arranged in two vertical compartments. There are six vertical rows on the back of the plinth, but no cartouche among them. But at the bottom of the left-hand row, we observe a seated human figure preceded by eight symbols, which probably may represent the name of some private individual, as on the Benevento *

* Champoll. Précis, p. 95, &c.



British Museum.—No. 69.

obelisk, and on other Egyptian monuments. The front view of this piece of sculpture is still more curious.

On the left-hand side of the plinth there are thirteen vertical rows of hieroglyphics, and on the corresponding opposite side only eleven; one of the rows (that nearest the front of the plinth) being double the width of the rest. The vertical face of the plinth contains seven rows of hieroglyphics, which, like those on the other parts, present some varieties not of common occurrence. We may remark that it is quite in accordance with Egyptian style to find such irregularities in the number of hieroglyphic columns on the different faces of a figure.

Statues of this class are now commonly called *Pastophori* or *Thalamephori*, from their supporting a small niche or chamber, or a kind of pedestal ornamented with one or more* figures. The whole height of the chamber in this instance, including its base, is 14 inches: it has both sloping sides and a sloping face, and preserves completely the type of the truncated pyramid of the Egyptian propylon. The basement of the chamber is $3\frac{1}{4}$ inches high, and its sloping face has five rows of hieroglyphics. A margin of figures, about $\frac{3}{4}$ inch wide, runs up the jambs of the chamber, and is continued along the lintel with a breadth somewhat increased. On each of the jambs near the bottom there is a single cartouche: that on the left side is nearly erased; the other might perhaps be made out with tolerable probability by comparing it with cartouches on other statues.

The chamber itself is sunk about $1\frac{1}{2}$ inch below the level of the frame-work at the base, but only about 1 inch below at the top: the width of the doorway also is somewhat less over the lintel than at the sill. The figure contained in this hollowed space is a female with bare breasts, the arms close to the side,

* Winkelmann, i. pl. 7, 8.



No. 52.

the feet and legs in the usual constrained attitude, and a high cap on the head. Near the feet, just above the ankles, we observe indications of the hem of the vest, but it is difficult to trace it upwards on the body. The front of the cap and the profile of the face are raised very nearly to the level of the margin of hieroglyphics.

The figure that holds this chamber is a male, naked downwards as far as the loins, where a slight elevation in the stone marks a belt or girdle, the termination of which is probably denoted by an irregularity in the sculpture near the knee. The stone is nearly black, and so close-grained that it looks almost like a piece of iron or dark-coloured bronze. As to the execution of the figure, it is by no means without merit, being round and full in the limbs, while the feet and hands, particularly the latter, are better formed than usual. The real fault to be found with the attitude is, that it is one too constrained and painful for any but a devotee performing penance to continue in more than a few minutes.

The small figure we must admit to be a sacred one. The high cap, and the peak rising above it, appear to be something like an imitation of the high cap on the colossus No. 8. But we doubt much whether the cap is genuine Egyptian, and still more whether figures of this class really belong to the antient age of Egyptian sculpture. The most generally received opinion is that these Pastophori, which we see also in standing attitudes, represent priests and priestesses, or perhaps persons of rank also, who carried these small representations of the deity in the public religious processions, which we know both from early and late writers formed as important a part of the Egyptian* as of the Greek ritual. At the close of the ceremony the images were probably depo-

* Herod. ii. 48, 49.

sited in the temple, after the priest who carried them had on bended knee turned the symbol of the deity towards the attendant crowd to excite their feelings of religious awe. It may be conjectured also that during the procession, which no doubt would halt occasionally, the bearers might turn the statues round for the people to gaze upon*.

Diodorus informs us (i. 97) that the attitude (*ρῦθμὸς*) of the ancient Egyptian statues is the same as that of the statues which Dædalus made in Greece. Though we set no value on this assertion by itself, it shows, when combined with numerous other passages, that there was a strong tradition among the Greeks that the great founder of their imitative art visited Egypt and derived from thence some of his knowledge. Nay, we learn from the same authority just referred to that Dædalus built the largest of the four propyla of the temple of Hephæstus at Memphis, and that he was allowed to put his own statue in the temple. This was of *wood*, and we may therefore reasonably conclude from the story, that at Memphis as well as at Thebes, it was customary to preserve the remembrance of the chief priests by making wooden statues of them.

“†The most distinguished of the ancient Greek statuaries spent some time in Egypt, such as Telecles and Theodorus, the sons of Rhoecus, who made for the Samians the wooden statue (*ξύανον*) of the Pythian Apollo. It is said that half of this statue was made at Samos by Telecles, and the other half at Ephesus by his brother Theodorus; and that the two parts, when put together, fitted so exactly that the whole might be taken for the work of one person. This part of the mechanical execution is by no means

* Winkelmann, vol. i. p. 112, note.

† Diod. i. 98. We are not certain that Diodorus means a *wooden statue* by this word, *ξύανον*.

in use among the Greeks, but in Egypt it is carried to the greatest perfection. For the Egyptians do not judge of the proportions of a statue by the eye alone, as the Greeks do, but when they have cut out a block of stone and finished it, they divide it into a number of parts, and then using this small statue as a model they apply the same proportion of parts to the large one. They divide the whole figure into twenty-one parts and a fourth, in which are comprised all the proportions of the body. Therefore when the sculptors have agreed on the size of the statue, they can work separately each on his portion of the figure, and it is surprising how well they succeed in producing pieces that will exactly fit to one another. The statue at Samos, conformably to the rules of Egyptian sculpture, was made in two pieces, the line of division running down from the crown of the head to the lowest part of the body at the junction of the thighs. The two parts are exactly the same. It is said to be as like as possible to an Egyptian statue, having the hands stretched out flat and the legs apart."

This is a remarkable passage in many respects. In the first place all Egyptian statues are formed of a single block, and it is impossible to believe the truth of Diodorus' assertion, unless perhaps we apply it solely to wooden statues, which, however, we do not believe to be his meaning. Winkelmann endeavours to get over the difficulty by saying that Diodorus must mean colossal statues, for he adds, "all other Egyptian statues are made of a single block." But this is equally true of colossal statues; nor is the matter mended by one of Winkelmann's commentators appealing to the Theban Memnon, (which moreover he calls the Osymandyas of Diodorus,) and to the five tiers of stone composing its upper part. It is clear that the head and chest of this statue are a restoration made after the time of Strabo, for which the restorer

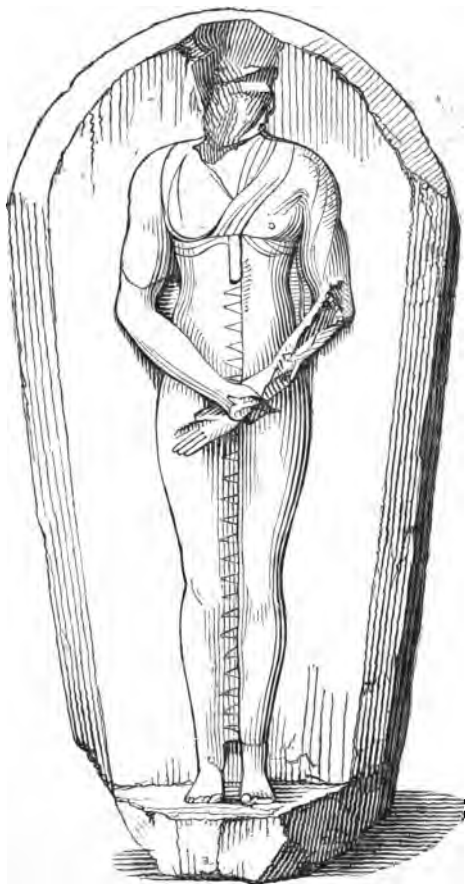
deserves no great credit. The other part of the story about the Samian statue in the Egyptian style is probable enough, and is a curious instance of a Greek people adopting the sacred form of a deity from an Egyptian model. The sculptors were the sons of Rhoecus*, who built the great temple of Hera (Juno), at Samos, into which island we may perhaps date the introduction of Egyptian art from the time that Amasis sent his two colossi as a present. Samos was one of those Greek states which possessed a factory in Egypt, and had received the privilege of building a temple to Hera †, and warehouses at Naucratis.

The sculpture of the Egyptians properly so called, that in stone, may be divided into three kinds. The first is the bas-relief, or the figure raised above the tablet or flat surface, to which it is attached, by cutting away the stone all around it. This is not the most common kind of relief, though abundant specimens of it may be seen in the painted figures in the tombs, and also among the stones of the Museum. † Winkelmann indeed denies that the Egyptian artists executed bas-reliefs except in bronze, which were formed, as usual with such works of art, in a mould made for the purpose. But this hastily advanced opinion, like many others of the same writer, is corrected by the more accurate knowledge which we now possess of Egyptian antiquities. The Museum contains, besides many specimens of bas-reliefs, a large slab (No. 22), probably once a covering of some stone mummy case, on which we have a full-length figure in very high relief.

The second kind of sculpture is formed by cutting *into* the flat surface of the stone, and thus forming the outline of the object to be represented. But within this sunk space the Egyptian artist contrived to raise

* Herod. Comp. iii. 60; and ii. 182. † Herod. ii. 178.

‡ Histoire de l'Art, book ii. chap. 2, p. 162. French trans.



British Museum.—No. 22.

the figure by cutting it deepest all round the edges, and allowing it to rise in a curved form towards the central parts. The degree of elevation given to this sunk relief is very different in various specimens: in some it is scarcely perceptible, or rather does not exist at all, while in others the central parts of the relief are almost on a level with the tablet. The Italians give the name of *intaglio rilevato* to this kind of work.

An inspection of the figures on the two Museum obelisks, and on the friezes (of one of which we have given a drawing), as well as those at the back of the Memnon's head, will show the wonderful degree of attention which the Egyptians paid to these embellishments, and the weary, painful labour that they must have had in impressing correct forms on such hard surfaces. As a general rule, it may also be observed that the parts of objects which are least seen, are worked with the same care as those more exposed to view; and this applies even to the figures on the highest parts of the obelisks, as was ascertained by examining some of those at Rome, which were lying on the ground, about the close of the last century*. In the great profusion of sculptured ornament with which the Hindoo temples are decorated, and in the excessive minuteness of their detail, we find another parallel between Indian and Egyptian art.

The third kind of sculpture is that of the complete figure, both colossal and of the natural size.

The general character of the Egyptian figures in relief may be given in few words. The most common attitudes are those of figures walking in processions, standing in some posture seldom varied, and seated or lying in a certain form sanctioned, we

* The sphinxes, for example, on the top of the obelisk of the Campus Martius.

presume, by the taste and critical judgment of the college of priests, who kept art in check for fear it might run into some extravagances. But though this is the general character of the reliefs, we must not suppose that the same monotonous scene is found on all the sculptured walls of Egyptian temples. The great battles which decorate the front of the propylæa of Luxor present as animated a picture as we can well conceive, which both in the execution of its principal figures and its general composition, is justly entitled to rank high among works of ancient art. This battle scene is cut in *intaglio rilevato* on the propylæa which stand behind the two obelisks, as represented in our drawing (p. 64), which also shows the figures on the wall, but from the smallness of the scale it is totally inadequate to give in any degree the effect of the picture. Our readers who have the opportunity may examine the plates in the great French work on Egypt*, or in the absence of these spirited drawings, we recommend the description of Mr. Hamilton †, from which the following extract is taken.

“The attention of the traveller is soon directed from these masses (the obelisks and colossi) to the sculptures which cover the eastern wing of the north front of the propylæa, on which is a very animated description of a remarkable event in the campaigns of some Osymandyas or Sesostris. The disposition of the figures and the execution of the picture are equally admirable, and far surpass all ideas that have ever been formed, of the state of the arts in Egypt at the era to which they must be attributed. The moment chosen for the representation of the battle is that, when the troops of the enemy are driven back on their fortress, and the Egyptians in the full career of victory will soon be masters of the citadel.

“The conqueror, behind whom is borne aloft the

* Antiquités, vol. ii.

† *Ægyptiaca*, p. 115.

royal standard*, is of a colossal size, that is, far larger than all the other warriors, standing up in a car drawn by two horses. His helmet is adorned with a globe, with a serpent on each side. He is in the act of shooting an arrow from a bow, which is full stretched; around him are quivers, and at his feet is a lion in the act of rushing forward. There is a great deal of life and spirit in the form and attitude of the horses, which are in full gallop, feathers waving over their heads, and the reins lashed round the body of the conqueror. Under the wheels of the car, and under the horses' hoofs and bellies, are crowds of dying and slain; some stretched on the ground, others falling. On the enemy's side, horses in full speed with empty cars; others heedless of the rein; and all at last rushing headlong down a precipice into a broad and deep river, which washes the walls of the town. The expression is exceedingly good; and nowhere has the artist shown more skill than in two groups, in one of which the horses arrived at the edge of the precipice instantly fall down; and the driver, clinging with one hand to the car, the reins and whip falling from the other, his body trembling with despair, is about to be hurled over the backs of the horses. In the other, the horses still find a footing on the side of the hill, and are hurrying forward their drivers to inevitable destruction: these throw themselves back upon the car in vain. Some that are yet unwounded pray for mercy on their knees, and others in their flight cast behind a look of anxious entreaty: their limbs, their eyes and hands, sufficiently declare their fears. The *equi exanimis* are admirable, whether fainting from loss of blood, or rearing up, and plunging in the excess of torture.

“Immediately in front of the conqueror are several

* This is of the form of the leaf of the Doum tree, or Palma Thebaica.—Hamilton.

cars in full speed for the walls of the town ; but even in these the charioteers and men of war are not safe from the arrows shot from his unerring bow ; and, when wounded, they look back on their pursuer as they fall. Further on, more fortunate fugitives are passing the river ; in which are mingled horses, chariots, arms, and men, expressed in the most faithful manner, floating or sunk. Some have already reached the opposite bank, where their friends, who are drawn up in order of battle, but venture not to go out to the fight, drag them to the shore. Others, having escaped by another road, are entering the gates of the town amid the shrieks and lamentations of those within. Towers, ramparts, and battlements are crowded with inhabitants, who are chiefly bearded old men, and women. A party of the former are seen sallying forth, headed by a youth, whose different dress and high turban mark him out as some distinguished chieftain : on each side of the town are large bodies of infantry and a great force of chariots issuing out of the gates, and advancing seemingly by different routes to attack the besiegers.

“ The impetuosity with which the hero of the picture has moved, has already carried him far beyond the main body of his own army, and he is there alone, amid the dying and the slain, victims of his valour and prowess. Behind this scene, the two lines of the enemy join their forces, and attack in a body the army of the invaders, which advances to meet them in a regular line. Besides the peculiarities of the incidents recorded in this interesting piece of sculpture, we evidently traced a distinction between the short dresses of the Egyptians and the long robes of their Oriental enemies, whether Indians, Persians, or Bactrians ; the uncovered and the covered heads ; the different forms of the cars, of which the Egyptian contains two, and the others three warriors ; and, above

all, the difference of the arms, the Egyptian shield being square at one end, and round at the other; their arms a bow and arrows*. The enemy's shield is of the form of the common Theban buckler; their infantry are armed with spears, their charioteers with short javelins †.

“At one extremity of the west wing of the gateway, the beginning of this engagement appears to be represented; the same monarch being seen at the head of his troops, advancing against the double line of the enemy, and first breaking their ranks. At the other extremity of the same wing the conqueror is seated on his throne after the victory, holding a sceptre in his left hand, and enjoying the cruel spectacle of eleven of the principal chieftains among his captives, lashed together in a row, with a rope about their necks: the foremost stretches out his arms for pity, and in vain implores for a reprieve from the fate of his companions: close to him is the twelfth on his knees, just going to be put to death by the hands of two executioners. Above them is the captive sovereign, tied with his hands behind him to a car, to which two horses are harnessed; these are checked from rushing onward by the attendant, till the monarch shall mount and drag behind him the unfortunate victim of his triumphs. Behind the throne different captives are suffering death in various ways: some like the Briareus, the executioner holding them by the hair of their head; others dragged by chariots, or slain by the arrow or the scimitar. There is then the conqueror's camp, round which are placed his treasures,

* These arms are now in disuse in Egypt; but in Nubia they are still the most common: there likewise the warriors and their chargers are clothed in iron coats of mail.—Hamilton.

† The number of human figures in this battle-scene is not less than one thousand five hundred; five hundred of which are on foot, the rest in chariots.—Hamilton.

and where the servants prepare a feast to celebrate his victory.

“ It was impossible to view and to reflect upon a picture so copious and so detailed as this I have just described, without fancying that I saw here the original of many of Homer's battles, the portrait of some of the historical narratives of Herodotus, and one of the principal ground-works of the descriptions of Diodorus: and, to complete the gratification, we felt that had the artist been better acquainted with the rules and use of perspective, the performance might have done credit to the genius of a Michael Angelo, or a Julio Romano. To add to the effect, in front of this wall had been erected a row of colossal figures of granite; fragments of some of them, still there, sufficiently attest their size, their character, and the exquisite polish of the stone.”

We make no apology for the length of this spirited extract, as no short and unconnected description could give the reader any accurate idea of the wonderful sculptures that decorate the walls of the Theban temples. But independently of the value of these sculptures as specimens of antient art, we cannot help considering them as the historical records of some great political event in Egyptian history. That Egypt has more than once been invaded by a foreign race, and at periods long before the conquest of the Persian Cambyses, is rendered probable, both by the short notices of Scripture history, and by the traditions preserved by the Greek writers. It is therefore, perhaps, impossible to assign with any degree of precision, the events depicted on the walls of Thebes to any certain epoch; we are rather inclined to think that they may refer to various eras widely separated, and that both the triumph over the Shepherd Kings or Hyksos, probably of Arab stock, and the defeat of Ethiopians or invaders from the south, may have formed the ma-

terials of the epic poems cut in imperishable characters on the colossal propyla and massy walls of antient Thebes.

But it is not only on the propyla of Luxor that these historical sculptures are found. On the walls of the great temple of Carnak, and both on the inside and outside walls of Medinet-Abou which is on the west side of the river, we find representations of scenes similar to those of Luxor, in addition to others representing hunting *, and the occupations of peace. Many of these sculptures are painted bas-reliefs, in the proper sense of the word ; and though we are told that on the outer walls of Medinet-Abou the foreigners who are conquered in the land engagement appear not to be the same people as those whose defeat is portrayed at Luxor, yet we find everywhere the gigantic figure of the conqueror mounted on his car, dealing destruction among his enemies. At Medinet-Abou there is also the representation of a sea-fight.

This † is one of the most curious of all the historical pictures, for such these sculptured scenes undoubtedly are. Here we see four Egyptian vessels, which we recognize to be such by the lion-headed prow, and the distinctive dress of the Egyptians and their allies. The former have as usual long shields, bows and arrows, and the close fitting cap ; the latter have clubs. The other five vessels which belong to the enemy are somewhat different, and the men on board have the round shield, and swords for offensive weapons. In two of the boats the enemy wears a cap with two peaks or horns, which has very much the appearance of being the skin of some animal with the ears left on. The head-dress of those in the other three boats is a kind of helmet surmounted by a circular upright row

* A lion-hunt in bas-relief is on the outer face of Medinet-Abou towards the north.—*Antiquités*, ii. pl. 9.

† *Antiq.* ii. pl. 10. Heeren, *Egypt*. p. 290, &c.

of feathers or some similar ornament: it is indeed not unlike the head-dress of the Persepolis figures in the Townley gallery. But these figures (as well as those in the other two boats) are beardless, and the outline and expression of countenance different from the Persian figures just alluded to. Indeed it is almost impossible not to recognize at first sight in these high helmeted heroes a nation of Indian race, and, however startling this may appear, it is strictly in accordance with the traditions which Herodotus gathered in Egypt. Sesostris is said to have sailed out of the Arabian Gulph (the Red Sea) with a fleet of ships of war, and to have conquered the nations dwelling on the Indian Ocean. If then we believe one set of the figures in this picture to represent the Indians, their allies with the skin caps may be, as Heeren suggests, the Asiatic Ethiopians on the coast of Carmania and Gedrosia, who at a later period served in the army of Xerxes*, and wore for helmets the skin of horses' heads with the ears sticking upright. In other respects they were equipped, says the historian, like the Indians; and so they are in this picture. In this sea-fight we observe as usual the tall figure of the monarch, who is standing on the shore, and appears rather to be defending his own country than invading the territories of others. This is the impression which an examination of the picture in the French work produces; and it is confirmed also by eye-witnesses. "The sovereign †, alighted from his car and attended by his sons, has already laid low ten of the invaders who had effected a landing, tramples on their necks, and is assisting with arrows shot from his bow, the active exertions of his own fleet. The Egyptians are seen equally successful on the sea as on shore: their boats are crowded with prisoners, who have exchanged their round shields, spears, and

* Herod. vii. 70.

† Hamilton, p. 143.

daggers, for hand-cuffs. The usual punishments and offerings to the gods occupy the two following compartments."

It cannot be doubted that such scenes as these and others of a similar kind have a real historical value, when we see the costume of the Egyptians, and that of their enemies so distinctly characterized, and so regularly observed. The naval fight just described, if the interpretation given be correct, is a memorial of fights with an Indian race. The pictures that preserve the tradition of wars with other Asiatic tribes, probably of Arab stock, are still more common. The beards, and long clothing of the Asiatic foes, their small shields, sometimes round, sometimes rectangular, with the representation of the storming of forts, battles in the neighbourhood of precipitous rocks and on the banks of rivers—these are so many particulars in strict accordance with tradition of Asiatic conquests by Egyptian monarchs, as to leave little doubt of the main fact. The epoch and other chief actors in such stirring scenes may remain as doubtful as ever. In these reliefs the Egyptians are seen with long shields, square at one end and rounded at the other; their proper arms are the bow and arrow. Sometimes the shields are so large as to cover nearly the whole body; and are such as the Egyptians used in the time of Xenophon*, who describes those in the army of Artaxerxes at the battle of Cunaxa as having "long wooden shields reaching down to the feet."

There is one more historical series in the small rock-hewn temple of Kalapsché in Nubia, that possesses a most surpassing interest. These sculptures are in the highest style of execution, and of a different age from some ruder and earlier forms which were in harmony with the prior destination of the building. On one † wall we see the warrior in his chariot, drawn

* Anab. i. 8, 9.

† Gau, pl. 14.

by two horses, putting to flight bearded men with short clothes, who are armed with bows and arrows and a curved sword or knife not unlike a sickle. The hero has sandals on his feet. In another compartment the hero has before him a bearded captive, whom he holds by the hair of the head with one hand, while with the other he is preparing to cut off his head with the curved sword which he has taken from his enemy. But this curved sword is also Egyptian, for we see it employed both on other occasions, and as a phonetic hieroglyphic in the cartouches. The conquered figure, who is probably a chieftain, has pendants in his ears.

But it* is another relief, arranged in two compartments one over the other, which is the most remarkable. It represents apparently the booty obtained after a victory. The king is seated on his lion-formed chair, with the insignia of regal and priestly pomp, and the skate-formed sandals on his feet: the compartment in which he is placed takes up the whole breadth or height assigned to the two compartments just mentioned. The first figure nearest the king is probably a warrior: he also wears sandals, like one of the Museum figures: in one hand he holds the long sword or knife such as we often see in the claws of the vulture, and with it the crosier. He appears to be presenting a male† figure (also sandaled), to whom two children (apparently females) are clinging. Behind these last we see the spoils of war, lion-headed and lion-clawed chairs, like that which the king is sitting on, knives, loaves, sandals, skins of animals, &c. Next we see a man leading a lion, followed by another with an antelope, and then comes a third leading a pair of bulls. By the

* Gau, pl. 15.

† Heeren calls this figure a female, and the two children he takes for boys. We think he is mistaken.

side of the bulls we see a man with a young antelope in his arms, and another with an elephant's tusk on his shoulder, and a skin with the tail and legs adhering to it, dangling from one arm. Then we see a band of soldiers with spears, followed by another man carrying skins, who closes the first compartment.

The second contains (beginning with those nearest to the king) three sandaled figures in long dresses: the first is bare-headed, but the other two have the bushy head-dress. All of them hold in one hand the long knife and the crossier. The next is a figure without sandals, and with a long garment and head-dress, bearing a pole on his shoulder, which supports a number of flowers standing upright, and also skins of animals which hang down loosely, just as they had been flayed. Then we see two captives dressed in skins, with the animal's tail and legs hanging down, led forwards each by another figure. One of the captives has a rope round his neck, and both have their hands tied.

The next figure in the procession is a man with an elephant's tusk on his shoulder, and a monkey perched on one end of it examining his master's head. Another monkey is taking a leap. Here we see a greyhound accompanying his master and the monkeys. Next a man with a young deer or antelope, followed by another conducting a giraffe. This stately animal is in excellent attitude; and the drawing conveys as exact an idea of his figure and appearance as the real stuffed specimens of the Museum: his keeper is dressed in skins. Two more bulls are next seen, led by a man carrying a tusk of ivory, and followed by another. The next figure is a female with pendent breasts, leading by a rope a small figure, on whose shoulders a monkey is mounted; while another monkey, which seems to have broken loose from their company, is taking a flying leap on the back of the bulls

before him. Other figures with a species of antelope, a tall ostrich, and a greyhound, close the scene. The greyhound has his long tail curled in the fashion of our own dogs: the form of his body and legs is as nearly the same as possible, but the head is very small, and the ears appear to be erect.

Our interpretation of two parts of the details of this relief differs from that of Heeren. He calls the third figure in the first compartment the captive queen. We believe it to be a male, partly because it has sandals, and partly from the dress and attitude. The two smaller figures near it seem to us to be undoubtedly females. Heeren also supposes what we have called pieces of ivory to be ebony wood, which is mentioned as one of the articles of tribute that the Ethiopians*, south of Egypt, used to bring every three years to the Persian monarch. But they brought also ivory, and a few slaves. We think it is clear from the curved form of the material and its diminishing size at one end (though it does not come to a point), that elephants' tusks are intended. The giraffe†, the ostrich, and the various skins, point clearly to a southern country of Africa, as the region from which the spoils of war were brought to the victorious monarch. Tradition, as usual, has only one great name to bear so many titles of honour; and to Sesostris‡ is assigned the conquest of the southern Ethiopians, who probably belonged to the antient kingdom of Meroe.

Herodotus (ii. 106) describes an antient specimen of Egyptian sculpture in Ionia, which appears to confirm the tradition of Sesostris carrying his victorious arms as far as the coasts of the Ægean. "There are in Ionia," says this admirable traveller, "two figures

* Herod. iii. 97.

† We believe the first mention of this animal by any Greek writer is in Agatharchides.

‡ See p. 341.

of Sesostris, cut on the solid rock: one is on the road which leads from the territory of Ephesus to Phocæa, and the other on the road from Sardis to Smyrna. In each instance we have a figure of a man 6½ (Greek) feet high: in his right hand he holds a spear, in his left a bow and arrow. The rest of his armour is in a similar style, for it is both Ethiopian and Egyptian. From one shoulder to the other, across the breast, sacred Egyptian characters are cut, of which the following is the interpretation:—‘I acquired this country by my shoulders.’ But who the conqueror is, and whence he came, is not mentioned there, though it is mentioned in other places. (See chap. cii.) Some who have seen these reliefs imagine them to be representations of Memnon, in which they are much mistaken.”

Had almost any ancient writer, except Herodotus, told us this story, we should have doubted the facts. But who that is well read in the father of history, can doubt his veracity, or the accuracy of his observation? We consider it then a positive fact that reliefs in the Egyptian style existed in Ionia in the fifth century before our æra, and that they were inscribed with what we now generally call hieroglyphics. How it happened that Herodotus could interpret these sacred characters, we are at a loss to imagine. When he was in Egypt, he had an interpreter. No one can suppose that Herodotus did not know a piece of Egyptian sculpture when he saw it. The critical remark at the end of the chapter shows the minuteness of his observation, when he distinguishes these figures from the Great Memnon of Thebes, with which he must have been well acquainted. We have often occasion to regret that the plan of Herodotus’ work did not allow him to enlarge more on objects not connected with his main design.

Tradition has attributed the most memorable ex-

plots of Egyptian history to a Sesostris, who is in fact the great Egyptian hero, and probably only a name by the aid of which the imperfect traditions of remote times were bound together in somewhat of an historical form. Most nations of antiquity have had their great hero, who centres in his supposed person the early annals of the nation to which he belongs. The historical records of Herodotus and Diodorus, it must be remembered, were received from oral information obtained in Egypt, mixed no doubt with much that was false or at least inexact. Whether we choose to suppose that the Egyptian priests had historical records or not (if we believe Herodotus*, we may rather suppose they had), we must acknowledge that from the time that the Greeks began to explore Egypt, the priest caste had sunk in importance, their learning, if they ever had much, was half forgotten, and artful trickery was used to maintain their declining rank—hence their knowledge of the early history of their own country could hardly ascend beyond a traditional interpretation of the monumental records. Consequently the accounts of the Greek writers also could be nothing more than traditional explanations of the forms cut on the temples, and in the grottos of the antient kings.

Should it be objected to this that we find, even under the Ptolemies, magnificent temples erected in the Egyptian style, and that this must indicate a corresponding degree of importance in the caste of priests,—we reply that the oldest age of Egyptian art is easily distinguished from that of the Roman, the Ptolemaic, and even the age preceding the forcible occupation of this country by the Greeks; and that from the time of Amasis, about 569 B. C., when the Greeks were freely allowed to settle in Egypt, and to build temples on this foreign soil, they began to impress their

* Book ii.

religious ideas and their forms of art on the solid masses of Egyptian architecture, half adopting its most striking characteristics, and mingling their own with the gods of Egypt, till at last the Isiac worship became a part of Greek and Roman superstition, on European soil, and the Greeks of Egypt themselves almost forgot their primitive character. How intimately blended the two nations became, is apparent from the works of art that belong to the age of the Ptolemies and the Romans; while the fact of the extension of the Greek language is proved by inscriptions scattered over the Nile valley from the Delta to the obelisk of Axum in Abyssinia. And not only did Greeks of a genuine race penetrate by conquest to these remote regions, but they mingled in marriage with barbarian stock, and gave a language to the Nubian chiefs, which they were unable to preserve in its purity though they long maintained its outward form.

Hence, under Greek influence and the tolerant government of the early Ptolemies, a new importance appears to have been given to the class of priests who, in their turn, might make concessions to the spirit of Greek superstition. So closely, in fact, were Egyptian and Greek notions interwoven by the intercourse of the people, that it is almost impossible to separate with precision one set from the other, or to define with accuracy the era at which Egyptian art must be considered as free from Grecian intermixture. But if the precise era of the commencement of this union cannot be determined, we may safely take our stand among the ruins of Thebes, and point to them and to their sculptures as to the genuine arts of Egypt and the memorials of its existence prior to the dominion of Grecian influence.

It is a striking fact that we find among the sculptured reliefs of the great rock-hewn temple of Ipsambul a battle-scene similar to those on the temples of

Thebes. In one apartment we see a group of painted reliefs, representing the triumph of the great conqueror, who is standing in his chariot, drawn by two horses*, and shooting his arrows at some men in a castle, who have black beards. The men are on their knees in a suppliant attitude. An arrow is flying from the bow of the gigantic figure right towards a female on the castle walls, who is holding a child in her hand. At the back of the castle a man with a black beard is driving off his cow and calf, in hasty flight †. The hero and his attendants are painted red; the vanquished men are yellow. The hero's name is enclosed in two adjoining rings ‡.

* Οἱ δὲ ἵπποι, ὡς μὲν εἰκάζει τῇ γραφῇ, ἐνὸρχίς εἰσι.

† On the north wall of the great temple of Carnak, a peasant is represented driving away from the field of battle a herd of oxen with bunches on their shoulders, similar to those of India. See the plates of oxen in vol. ii. of this work.

‡ See Gau's Nubien, pl. 61.

END OF THE FIRST VOLUME.

ERRATA.

In part of the impression the name of Bohlen has in a few instances been incorrectly printed Böhlen.

In p. 142, l. 4, *for form, read forms.*

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