only a height of 50 feet, or 20 less than Manikyála. The general outline of the building too is somewhat varied, but the small pilasters are to be recognized, though the mouldings are numerous. The tope of Belar too has been opened from the top at some former period, and a section of it would present a counterpart of the plan of Manikyála. The few coins which I found here are similar to those of that tope, but no where did I receive the least trace or tradition regarding these buildings.

Like one in search of the philosopher's stone, I found myself referred from place to place, and at Usmán heard of a "tope" near Pesháwar, which I afterwards visited. It is about five miles from the city, but in so decayed a condition that the remains would not suggest any idea of the design without seeing those of the Panjáb, though they were one hundred feet high. There is however a "tope" in a perfect state of repair in the great Khyber pass to Cábul, and about 20 miles from Pesháwar, but I could not visit that building from the troubled state of the country. The natives of Pesháwar assured me also that there were 8 or 10 such "topes" in their neighborhood towards the Kaár country in Swat and Búneir, but the extent of their information leads no further than that they are "topes" or mounds of a prior age.

Seeing that the structures of *Manikyála* and *Belar* are both pierced by a shaft or well, descending into the building, I incline to an opinion that in these "topes" we have the tombs of a race of princes who once reigned in upper India; and that they are either the sepulchres of the *Bactrian* dynasty or their Indo-Scythic successors, mentioned in the Periplus of the second Arrian.

V.—Note on Lieutenant Burnes' Collection of Ancient Coins. By James
Prinsep, Sec. &c.
[Read 29th May, 1833.]

Considering the short space of time allowed to a traveller, in his rapid passage through a foreign country, for the pursuit of objects not immediately connected with his errand; and the disadvantages which his own disguise, and the suspicions of the natives oppose to his search after the very rare relics of antiquity, which may have escaped destruction for twenty centuries in their country:—considering too that the inhabitants are unable to appreciate the value of such objects, and mostly ignorant of the demand for them among the inquisitive natives of the west; Lieutenant Burnes may be deemed very successful in the

store of coins he has brought back from the Panjáb and from the valley of the Oxus.

Of pure Bactrian coins, he will be able to add at least three to the cabinets of Europe; upon one of which the name of EUTHYDEMUS is quite distinct: while of the Indo-Scythic or subsequent dynasties his store is so ample as to afford ten for the Bombay Literary Society, and as many more for our own cabinet, besides those he takes to Europe; and among the latter is one coin of the dynasty which supplanted the Macedonian princes of Bactria, calculated to excite much curiosity among antiquarians.

This abstruse subject is already deriving elucidation from the discovery of coins in many places, which is a forcible proof of the advantage of giving early publicity to such discoveries, and to the comments of antiquarians upon them : already has Dr. Swingy at Karnal, following up his former researches, fallen upon two silver coins of APOLLODOTUS and MENANDER, neither of them duplicates of the two which rewarded Colonel Top's labours. I hope soon to have it in my power to engrave these coins as a continuation of the plate I am now about to describe, in illustration of some of Lieutenant BURNES' collection. Captain WADE has also presented me with a few coins, obtained in his recent tour down the Satlej. To General VENTURA however we still look for our richest harvest, because his coins have a definite connection with an existing monument; and when that meritorious officer shall see how Lieutenant Burnes has taught us to appreciate his labours at Manikyála, we hope he will no longer think us unworthy of being made the medium of their introduction to the knowledge of the world.

Macedonian and Syrian Coins.

Having given in Plate V. a type of the coins of ALEXANDER, I need not stop to describe those brought from Persia by our traveller, a tetradrachma and two small coins of that conqueror in excellent preservation; the larger coin has a curious cypher composed of the letters PMH enclosed in a wreath; in numerals this would represent 148.

Captain WADE has presented me with a rarer silver coin of ALEXANDER, having a fine juvenile portrait of the conqueror before he assumed the horn of Ammon; and, on the reverse, Apollo seated on the peculiar oracular seat, holding an arrow pointed downwards, in the right hand (denoting clemency); his left hand resting upon a bow.

The epigraphe is BAZIAEGE AAEEANAPOT GEORATOPOE ETEPTETOT. On the exergue, the letter c; and on the left, a peculiar three-pronged monogram, resembling the letter A.

This coin is not mentioned by PINKERTON, and would doubtless be designated by him RRRR or rarissimus. It is engraved as fig. 1 of Plate VIII. (of coins); it was procured in Asia Minor by Dr. Martin, the German physician, lately in Ranji't Singh's service, and by him given to Captain Wade.

To return to Lieutenant Burnes' collection.

- Pl. VII. fig. 1, represents one of three beautiful coins of Antiochus VI. or Theos, of Syria, during whose war with Ptolemy Philadelphus, Bactria revolted. These are supposed by Pinkerton to exhibit the most perfect examples, both of manly and of monetal beauty, to be found among ancient medals. They are however common enough. The Epigraphe is, BAXIAEGE ANTIOXOT ETHEANOTE. Device, Jupiter seated, holding a small victory.
- Fig. 2. Another Antiochus, probably struck in Parthia, from the figure of the javelin-thrower.

Bactrian Coins.

- Figs. 3, 4, 5, 6. These silver coins, tetradrachms, are known at once to be of Bactrian origin, from the sitting figure of Hercules holding his club, on the reverse, much in the same posture as that of Jupiter on the Syro-Macedonian coins. The epigraphe on fig. 3, a valuable coin and in fine preservation, is BAZIAEGE ETGTAHM.. or "of king EUTHYDEMUS," the third king of Bactria. The only coin of this monarch hitherto known in Europe is described in Mionner's Description de Medailles Antiques; Pinkerton says it is a gold coin, having "two horsemen with Bactrian tiaras, palms, and long spears" on the reverse; it is therefore quite different from the unique specimen before us.
- Fig. 4 has the features of a different prince; the reverse is however similar to the last, and the three final letters of BAXIAEGX are visible: as are ... HM... which can only form part either of Euglo HMOS or of 3HM779105 his son.
- Fig. 5, of which there is a duplicate, is of a similar nature; the features corresponding with No. 3 or EUTHYDEMUS. There are two others of still ruder fabrication, distinguished by a more projecting forehead: they are illegible on the reverse.
- Fig. 6. One of two silver tetradachms. These are more like Arsacidan coins, the stool on which the figure on the reverse sits having the form of those depicted in Vaillant, although the connection, with the foregoing coins is very strong, the head dress and

formal curls, appertain to the Persian monarchs. The inscription is in the *Pehlevi* character: some of the letters resemble badly executed Greek.

These coins are all from Khoja-o-bán, the ruins of an ancient city N. W. of Bokhara, whence numerous gems and antiques were also procured.

- Fig. 8, was obtained from the same place. A gold coin of one of the Sassanian kings of Persia, supposed to be Sapor (Shápár). The name and titles are very distinct in the Pehlevi character. It is remarkable that the usual supporters of the fire altar, two priests or kings, are omitted; unless indeed the rude ornaments on each side are intended to represent human figures holding swords. A silver Sassanian coin delineated in Hyde's Religio Veterum Persarum has similar supporters. Lieut. Burnes has also a silver Sassanian coin; it is curious from the contour of the fire altar being fashioned into a human profile; it was found at Khiva. I have not found room to insert it.
- Fig. 9. One of twenty small Sassanian copper coins, which are very abundant in the same neighbourhood. They have a good head on the obverse, and a very rudely executed fire altar on the reverse*.
- Fig. 7. A square copper coin from Shorkot, h, a fortress twenty miles from the junction of the Jelum and the Chundb (the Hydaspes and Acesines) where Alexander lost his fleet in a storm. It is by some thought to be the fortress of the Malli, in the assault of which he was wounded. All that can be read of the inscription is BANIAEDN.... On the other side the inscription is in Pehlevi. This coin may be ascribed with tolerable certainty to Menander, both because it resembles in shape the coin of that prince in Col.Tod's plate, and because the three first letters of the word which follows BANIAEDN have much the appearance of NIK, or NIKATOPON, the epithet applied to Menander according to Schlegel. Journal Asiatique, Nov. 1828. The standing figure however, on the obverse, and the curious emblem on the reverse, supposed by Col. Tod to be a portable altar, agree rather with his coin of Apollodotus.
- Pl. VIII. fig. 2. I must here introduce a coin procured from the same place by General Ventura, for which I am indebted to Captain
- A gold solidus of the lower empire was also found at KAoja-o-bóm, of rude fabrication:—it is either of Marcianus, or more probably Mauricius—inscription DN MAVRC..TID PP AVG. On the reverse, an angel holding the cross and globe with VICTORIA AVGGG. and below, CONOB.

WADE; it is a copper or brass coin of Antiochus, BANIARON ANTIOXOT, with a Grecian head on the obverse, and the perspective view of the after part of a boat on the reverse: the tiller of the rudder is worked from behind, as is even now the case in the river craft of the Indus.

A ruby seal antique, with a well-executed head of a Grecian female, was found at the same place.

Figs. 11, 12, 13, 15. The series of small copper coins found near Manikyala, and generally throughout upper India, which have a head on the obverse and a Bactrian horseman on the reverse, may be referred to the reign of Euchartons I. since the gold coin from the neighbourhood of the Caspian Sea, described by BAYER, as having the same device on the reverse bears in legible characters the epigraphe "of the great king Euchations."

Our coins of this type have never shewn us more than the words "King of kings," and in most of them (as fig. 13, BACIAET BACIAET) the Greek is so corrupted as to give the idea of a later epoch.

The type of the horse seems to have prevailed long afterwards in that part of the world, as fig. 14 evinces: it is a Hindá coin, of much later though of unknown date. The nagri letters appear to be part of a larger inscription: their purport is therefore uncertain.

Fig. 10. A copper coin procured by Lieut. Bunnus, in the neighbour-hood of Manikyála.

Obverse. A king or warrior holding a spear in the left hand; and with the right sacrificing on a small altar (?). Epigraphe BACIAETC BAC.....KANHPKOT,

Reverse. A priest or sage standing, and holding a flower in his right hand; a glory encircles his head; on the left, the letters NAMAIA

—on the right, the usual Bactrian monogram with four prongs.

This coin is of very great value, from the circumstance of its being the only one out of many discovered in the same neighbourhood, upon which the characters are sufficiently legible to afford a clue to the Prince's name. In the onset however we are disappointed to find

Prince's name. In the onset however we are disappointed to find that none of the recorded names of the Bactrian kings at all resemble that before us*; yet there can be no doubt about any letter but that

By way of convenience to those who have not the power of reference respecting the history of Bactria, to which I may often have to allude in the discussion of these coins, I subjoin a catalogue of its Kings, according to the authority of Schlegel.—Journal Asiatique, 1828, p. 326.

preceding Kor, which may be either , , or C. By assuming this latitude in the reading I discovered a name which would agree as nearly as it could be expressed in Greek, with KANHOKOT OF KANHOKOT; and should my conjecture prove correct, the discovery of this coin will be hailed as of the greatest value by all who are engaged in the newly developed study of Bactrian antiquity. The coin was at first placed with the Society by Lieut. BURNES, but seeing its value, I thought it but just, after taking impressions and drawings of it, to place it in the discoverer's hands, for the personal satisfaction of numismatologists in Europe. I suppose it to be a coin of KANISHKA, a Tartar or Scythic conqueror of Bactria.

According to Mr. Csoma de Körös, the name of Kaniska occurs in the Tibetan works as a celebrated king in the north of India, who reigned at Kapila, which is supposed to have been in Rokilkhand, or near Hardwár. His reign dates about 400 years after Sakya, when the followers of the Buddha religion had become divided into eighteen sects (the Sakya tribes, or Saca) under four principal divisions, of which the names both Sanscrit and Tibetan are on record*.

In Mr. Wilson's Chronological Table of the History of Kashmir (As. Res. xv. p. 81,) we find "Hushca, Jushca, and Canishca, three Tartar princes, who succeeded Domodara, in the kingdom of Kashmir, either reigning successively or synchronously. They introduced the Buddha religion under a hierarch named Nágársuna, and were, according to the Raja Taringini, of Turushca or Tatar origin. The Sanscrit MS. places their reign 150 years before Sacaysinka (or Sakya Singh), but the learned translator in a note proves that the text was at first misun-

```
B. C. 255. THEODOTUS I.
```

195. Apollodotus soter. Menander nikator.

HELIOCLES DIKATOS.

DEMETRIUS.

181. EUCRATIDES I.

146. EUCRATIDES II.

Alluded to by Plutarch Trogus and Arrian, their coins prevalent in Baroach, A. D. 200.

On the authority of Visconti and Mionnet, from a single medal.

Son of Euthydemus, doubtful if he reigned in Bactria.

Artemidorus calls him the "Great King."

Murdered his father and was himself slain.

^{243.} THEODOTUS II.

^{220.} EUTHTDEMUS of Magnesia.

Fixed historically by Strabo, &c.

^{125.} Destruction of the empire by the Tartars and the Scythians or Sacre.

* Csoma's Life of Sarya, MS.

derstood, and that the passage intended to express "150 years after the emancipation of the Lord SAKYA SINHA."

The epoch of Sakya, (the fifth Buddha, or Goutama,) is determined by concurrent testimony of the Ceylonese, Siamese, Pegue, Burmese, and Chinese eras, which are all founded on the birth or death of the Buddha legislator, and, though all differing more or less, concur in placing him between the limits of 544 and 638 years B. C.: the Raj Gúrá of Asam, a Pundit well versed in Buddha literature, fixes the Nirsus or emancipation of Sakya-Muni in 520 B. C.* Taking then from this epoch an interval of four hundred years to the reign of Kanska, the latter would fall near the end of the second century B. C. We know from other sources, that the overthrow of the Bactrian dynasty by the Scythian or Sakyan tribes happened in 134 B. C. (125 by Schlegel.) The present coin therefore confirms the fidelity of the Rajs Turingini as a historical work, and leaves no doubt of the epoch of Sakya.

Mr. Wilson finds grounds for throwing back the termination of the reign of Abhimanya Canishca's successor, from B. C. 118, as given in the Raja Taringini, to B. C. 388, because "Kashmir became a Buddha country under Tartar princes shortly after the death of Sakya;" but from Mr. Csoma's subsequent examination of the Tibetan sacred books, in which the three periods of their compilation are expressly stated; "first, under Sakya himself (520—638 B. C.) then under Ashoka, king of Pataliputra, 110 years after the decease of Sakya, and lastly by Kaniska, upwards of 400 years after Sakya"—little doubt can remain that the epoch as it stands in the Raja Taringini is correct,

There are other circumstances connected with the Bactrian coins, which tend to confirm the supposition of a Buddhist succession to the Greek princes. In the first place, the reverse ceases to bear the formerly national emblem of the Bactrian horseman with the Macedonian spear, and in its place a sage appears holding a flower, and invariably having a glory round his head, proving him to be a sacred personage; secondly, although upon the first coins of the dynasty we find the inscription in Greek characters—(a custom which prevailed under the Arsacide also, and continued under the first Sassanian princes;) still upon coins of the same device, but probably of later fabric, we find the same kind of character which appears upon the Delhi and Allahabad pillars:—the same which is found at Ellora and in many ancient caves and temples

[•] Orient, Mag. iv. 108.

^{† (}See Col. Top's Coins 11, 14; Mr. Wilson's Plates, fig. 1, 2, 6, 7; and this Journal, Plate ii. figs. 17, 18.)

of central India, and is held in abhorrence by the Brahmans, as belonging to the Buddhist religion*.

I need not repeat Mr. Wilson's opinion, drawn from other grounds, that the tope of Manikyála, in the neighbourhood of which these coins are found, is a Buddhist monument, but it receives much confirmation from the discovery of this coin of the Sakyan hero Kanishka.

Having thus far endeavoured to reconcile the coin before us, and others of the same class to the Sakyan dynasty, to which the term Indo-Scythic very aptly applies, we may reasonably follow up the same train by ascribing the next series, which exhibit, on the reverse, a Brahmaní bull, accompanied by a priest in the common Indian dhoti. as the coins of the Brahmanical dynasty which in its turn overcame the Buddhist line. Colonel Top includes these coins in the same class as the last, and adduces his reasons for referring them to Mithridates. or his successors, of the Arsacidan dynasty, whose dominions extended from the Indus to the Ganges, and to whom Bactria was latterly tributary. Greek legends "of the King of kings," &c. are visible on some. and what he supposes to be Pehlevi characters on the reverse: but I incline to think these characters of the Delhi type, and the Bactrian Monogram should decide their locality. Mr. WILSON and SCHLEGEL. both call them Indo-Scythic, and the latter, with Col. Top, names the figure "SIVA with his bull Nandit." Mr. SCHLEGEL thinks it curious that such marks of the Hindú faith should appear on these Tartar coins. but considering the Indian origin of the Sacæ, does not this rather prove the same of their successors, instead of their Tartar descent? It is more curious that the fire-altar should continue on all of the series. but the fact of its being a fire-altar at all is still matter of great uncertainty.



See translation of portions of the Salsette and Ellora inscriptions by Major Wilford, As. Res. v. 140, which shews them all to refer by name to Sarya. Mr. A. Stirling, As. Res. xv. 314, says of some similar inscriptions on the *Udaya Giri* hill in Orissa. "The Brahmans refer the inscription with horror and disgust to the time when the Buddhist doctrines prevailed. I cannot however divest myself of the motion that the character has some connection with the ancient *Prakrit*, and I think an explanation is to be looked for only from some of the learned of the Jain sect." What has become of the key to this and other ancient Sanskrit alphabets, which Wilford says he fortunately discovered in the possession of an ancient sage at Benares?

^{† &}quot;Ce qui me parait la circonstance la plus remarquable dans ces medailles, ce sont ces preuves du culte brahmanique adopté par les rois Tartares. Ils regnaient donc certainement sur des provinces ou ce culte était etabli."—Jeurnal Asiatique, Nov. 1828.

- Hig. 16. Copper coins of this device are met with throughout Upper Hindústan:—they constitute the third series of Colonel Top's plate, and some in his possession have decided Greek characters upon them. On the obverse is the same warrior with spear and altar. On the reverse is what he supposes to be a priest about to sacrifice the bull; but in the coin before us the dhot is so precisely the costume of the Brahmans, that it inclines rather to look upon the animal (especially as he has the hump) as the sacred bull of this country, denoting the prevalence or predominance of the Brahmanical faith in the Indian dependencies of Menander or Eucratides' dominion.
- Fig. 18. This type of coin is if any thing more common than the last: and the inscriptions are no longer Greek; but either of the unknown character of the Delhi column or genuine Hindi. The figure astride upon the elephant is always much out of proportion, and the Raja with the altar more rudely executed. The elephant is, like the horse, preserved in subsequent coins of the Hindús; thus
- Fig. 17 represents one of these procured by Lieut. Bunnes in his tour. The same device is still common in Southern India. The form of the Nagrí characters on this and fig. 14 agrees with those on copper grants of land 7 or 800 years old.

I do not mention Lieut. Burnes' Muhammedan coins, as it is better to keep them distinct from the present engraved series, to which I may have soon to add a valuable supplement, containing a selection from Dr. Swiney's and General Ventura's discoveries. My task increases upon me daily, but I shall be amply rewarded if my humble notice of the discoveries of others shall, by connecting them with ancient history, eventually turn these most interesting reliques to the true end of numismatic study.

VI .- Astronomical Observations at Barelly. By H. S. Boulderson, Esq.

The 4th No. of the Journal of Science for Oct. 1832 contains observations of the transit of Mercury in May last made at Hull, Let. 58° 45′ 57″ N. Long. 1′ 21″ W. As the longitude of the place of observation at Hull is probably very correct, this gives the means of gaining to some degree of certainty the longitude of the few places in India where the transit was observed. There is a considerable uncertainty in the place of Mercury at the transit. At least the times of conjunction in AR. gained from the elements given in the Naut. Alm.

