

JOURNAL  
OF THE  
ASIATIC SOCIETY.

No. I.—1855.

*Notes on Assam Temple Ruins, by Capt. E. TAITE DALTON, Principal Assistant of the Commissioner of Assam.*

The claim of Assam to a high position amongst the classic lands of the east, which has so long lain dormant, would, in all probability, have been earlier investigated, had not an idea generally prevailed that no works of antiquity were to be found in the valley to sustain it; that it was a country without such relics of past ages as are found in other parts of India, and therefore, without a history that was worth enquiring into.

But it is not thus barren; for from the Sub-Himalayas, which form its northern barrier, to the ranges of mountains separating it from Sylhet and from Bengal, and as far east, up the valley, as our knowledge extends, evidences are found of a once teeming population and a highly advanced state of art.

The trackless forests, in which most of these remains of human power and skill are found, and the present condition of Assam, with its scanty indolent population and vast wildernesses of waste, are melancholy indications that they are the works of an age and race long since passed away, and curiosity cannot fail to be excited as to who the people were that constructed them, and where they lived.

Having been authorized by Mr. Robinson to submit to the Society his views on the ancient history of Assam, I thought the subject might be made more interesting, if illustrated by some account of

the antiquities supposed to appertain to the period of which he treats, and this has induced me to string together and submit, with a few sketches my own, notes on the ruins I have visited.

Mr. Robinson has assumed that Gowhatty was the ancient, as it is the modern capital of the valley. Its former importance is indeed well attested by the immense extent of its fortifications, the profusion of carved stones which every excavation in the modern town brings to light, the remains of stone gateways, and the old stone bridges that are found within and without the city walls.

These walls, partly of masonry, embrace a tract several square miles in extent, including hills and plains, through the midst of which, confined to its main stream by natural bastions of rock, and broken and diversified by rocky islands, flows, in a basin from three-fourths of a mile to a mile in breadth, the noble Brahmaputra.

*Budh* could not have selected a more lovely spot for the dissemination of his doctrines or the close of his career.

The zeal and devotion of the age decorated every prominent point, in this beautiful scene, with a shrine or Choityo, in honor of the divinity or saint that hallowed it. Stone temples appeared blending with every rock; each island was adorned with a shrine; the peaks of the hills were similarly crowned; and for the pilgrim who sought retirement less obtrusive altars were raised in the recesses of valleys or groves.

But peace did not always reign in this holy vale, and the labour bestowed on the entrenchments, tells of many a hard fought struggle with an invading force.

In the fortifications of the old city care was taken to use and improve the natural defences afforded by the ranges of hills, which surround or are enclosed in them. In some precipitous places, a causeway with a breastwork, for the protection of the besieged, and semi-circular projections, as watch-towers and flanking defences, were all that were considered necessary; but, where the natural obstacle was wanting, a lavish expenditure of labour has raised embankments from hill to hill, from 25 to 40 feet in height, and not less than 30 feet in breadth on top, with a moat 100 feet wide.

The entrances to the city were by gateways of stone, some of which were subsequently replaced by archways of brick. On a

causeway, leading to the principal northern gate, is the remarkable stone bridge 146 feet in length with 22 waterways, described and illustrated in the Journal No. IV. of 1851.

Nothing approaching to the principle of an arch enters into the composition of this very extraordinary piece of architecture, the object was, evidently, to construct, in stone, a bridge on the same plan, as those the artificers had been accustomed to frame in wood. It is stone carpentry; we have posts, beams and planks, represented by columns, architraves and slabs.

Within the fortifications there is a smaller bridge, constructed on similar principles, now dismantled, and some arched stone-bridges, in good preservation, and still used, belonging doubtless to a more recent epoch. Of the religious edifices constructed within the walls, nothing but fragments remain. The Hindus have appropriated many of the most picturesque sites, and built brick temples, surrounded by the carefully dispersed stones, fragments of the old Choityos.

In some instances they have clumsily used the old materials, and in others, the ancient buildings have been dismantled to a certain extent only, and a superstructure placed on the old basement.

Some of these modern temples or clusters of temples are of considerable celebrity as holy places.

Within the old walls of Gowhatty is the temple of Kámikhyá, which is known wherever the Hindu religion prevails, and is resorted to by pilgrims from all parts of India. It is built on a hill, known as the Nil-á-chal, which rises from the banks of the Brahmaputra to 750 feet in perpendicular height, and has, doubtless, from its lofty, commanding and romantic position, always held a high place amongst the holy places of the land; but, from the different renovations it has undergone, it is of little use in exemplifying the ancient architecture of the valley.

The ancient temple must have been dismantled to within a few feet of the foundation, and covered as it is, by coatings of stucco and white-wash, we can scarce discern the beauty and elaboration of the tracery, except from fragments of detached friezes and cornices lying about.

The most singular relic is a huge finial, a stone vase measuring

(at a guess) 12 feet in circumference, which was originally the crowning ornament of the dome, but which all the power and skill of the renovators could not replace in its former position. It now lies on the ground, outside the enclosure, and a good sized tree has taken root in the bowl!

It will be seen from the note that the origin of this temple is ascribed to King Norok,\* or, at all events, that it was in existence in his days. In re-excavating a large tank, in the modern town of Gowahatty, which is named after that monarch, the fragments of more than one stone temple were found, and in every part of the station, carved stones are constantly being exhumed from deep below the surface.

The present Jail Hospital occupies what appears to have been the site of a stone temple of more than the ordinary dimensions, judging from the shaft and capital of a column, an altar block and other fragments, that were dug up there, much larger than the corresponding pieces of the temple ruins elsewhere. They were found, in levelling the compound, some depth below the surface, and further excavations would, in all probability, bring the whole of the fragments of this interesting temple to light. One of the most prominent objects in the view from Gowahatty is the Oománand, the "Isola bella" of the scene; the delight of Ooma and celebrated throughout India as a holy island.

It was here that Siva is said to have communicated to Párbati the prophetic history contained in the Jogini-tantra, and all evil omens are averted by one glance at the spot so honored.

It rises about 60 feet above the stream. Groves of trees, of varied foliage, drooping over the rocks, add to its height, and above them tower the minarets of brick temples dedicated to Siva and Párbati.

\* The Jogini Tantra, a work of high repute in Assam, as its contents are supposed to have been communicated by Siva to his consort Párbatí, states, regarding the king Norok, that, though an "Osir" infidel, he was in such favour with the gods, that they made him the guardian of the temple of Kámikhyá. It is not improbable, that the temple was originally erected by Norok, but of this we have no certain evidence. The assertion made in the Tantra, however, would, at least, lead us to suppose, that the temple was in existence in his days.

These have succeeded stone temples, the debris of which, embracing the usual proportion of columns, friezes, &c. lie scattered about.

Near the Oománand there is another mass of rock called Ooboo-see. This the river sweeps over when full, but in the dry season, there is a considerable group of rocks exposed, and upon them are carved representations of most of the principal Hindoo deities. I noticed Vishnoo, Siva and Nandi, and a female figure, seated cross-legged in a devotional attitude, with a conical cap.

Guarding a little flight of steps, there is an image of Gunesh, and the steps lead, I think, to the top of one of the rocks on which, cut in the living stone, there is a Siva and Yoni. Here too are indications of an attempt to lay the foundations of a temple, beds for the stones cut in the rock with holes for rivets.

So complete was the overthrow of the order of religious edifices we are considering, that, in many instances it is not easy to find one stone on another, as laid by those who originally constructed them. The fragments of the old temple are often degraded into the formation of steps, trodden on by the votaries of the new; but however found, there is sufficient analogy between them, to enable us to form some idea of the positions they were intended to hold, and to refer all the buildings they composed to one style of architecture, of which there appear to have been different phases, from plain to decorated.

In forming our ideas of these temples we are greatly aided by the discovery of one, which, from its secluded position, escaped the destroyer's hand, and which, though small, is very nearly perfect, and merits especial notice.

This is one of a group of temples in south Kamrup, 30 miles S. W. of Gowhatty. It consists of a shrine seven feet square, plainly but massively built of well cut blocks of granite, with a pyramidal roof, supported by horizontally placed slabs, bearing on its summit a heavy non-descript ornament which originally supported an uru.

The building contains a stone pedestal, on which there is at present, on a detached slab, a figure of Durgá, in high relief, but she, this figure at least, does not appear to have always been the goddess of the shrine. There is but one aperture, a doorway, with lintel and uprights of carved stone, having a figure of Gunesh over the

door, and two standing figures, each a foot high, on the uprights. In front of this building there is an open porch, of the same dimensions as the shrine itself, having, like it, a pyramidal roof supported on four columns. These columns are octagon, the shafts  $3\frac{1}{2}$  feet in length and 15 inches in diameter; the bases are also octagon, the surbase 20 inches in diameter. The shaft is capped by a circular slab of the same diameter as the base, the projection being hood-shaped; over this, the capital—four volutes, springing from a circle of 15 inches in diameter, supporting a cross-shaped àbacus. The inner limbs of the àbacus support the architraves; on the outer bracket-shaped projections, cut in the architrave, limbs rest and giving support to the protruding cornice, which completes the entablature, and forms the first step of the pyramidal roof. The interior of this roof has somewhat the appearance of a dome. On the four architraves, eight neatly cut stones lie horizontally, over-lapping the corners of the square and forming an octagon; over-lapping this octagon, another layer of slabs forms a circle, and three more such courses form as many more concentric circles, each projecting four inches beyond the one below it. The upper circle is capped by a deeply cut, eight-petalled podmo or lotus,  $2\frac{1}{2}$  feet in diameter, which forms the interior ornament of the top of the dome.

The roof of the shrine is precisely the same as that of the porch. The whole structure, including a solid basement or platform of stone, which raises it  $2\frac{1}{2}$  feet above the surface of the ground, is 14 feet in height.

The removal of a heap of stones in front of this edifice, disclosed the foundation of another shrine, that appears to have been surmounted by a circular or octagon temple. This covered a crypt, sunk  $3\frac{1}{2}$  feet below the surface, neatly faced with cut stone and having at the bottom, bedded in a circular slab or yoni, a Mahádeva, in the form of a Linga. To the south of these shrines, and originally I believe contained within the same enclosure, there is a third temple, in a very dilapidated state; a massive building of solid masonry, 12 feet square, exclusive of projecting base, with a circular roof on the same principle as that already described, formed the vestibule of the shrine. This was surmounted by a dome springing from an octagon-shaped base four sides plain and four broken into

salient and retreating angles, which being carried up into the dome made it appear ribbed. The stones forming the dome were all horizontally placed, and were supported by the courses of slabs forming the interior of the roof. The lintel and uprights of the doorway, leading from the vestibule into the shrine, are elaborately carved with scrolls and flowers.

These domes are said to have recently fallen in, from the effects of a severe earthquake. When complete that of the shrine was about 30 feet in height. It is decorated by rows of small grotesque monsters with large ears, whether intended for men or monkies I could not make out, for, though the temples do not appear to have suffered from wanton destruction, the exfoliation of time has effaced much of the ornament notwithstanding the durability of the materials. The stones are bound together by clamps and pins; but there is want of connection between the internal and external faces of the work, the intermediate space being filled up with rubble, and without bondstones. The effects of an earthquake would, therefore, be very likely to bring down the whole structure.

No inscription has been found amongst these ruins, nor is there any tradition regarding them worth quoting.

The next ruins I shall notice, are situated in the low hills, opposite Gowahatty, just outside the fortifications of the ancient city, and not far from the great stone bridge. I was informed that these hills contained the remains of eighteen temples. There were at all events that number of shrines: every eminence, and some of the ridges, having been furnished with them.

The most remarkable is still resorted to as a holy place. It is called *Modon Kamdeo*; the present objects of worship being two rude stone figures, villainously traducing the god of love and his mistress; but these figures were obviously never intended for the pedestal on which they rest.

The basement of the old temple to about six feet above the plinth, is all that is standing (plate II). It occupied a commanding position, on a prominent peak of the range, overlooking the plains. The top of the hill is scarped, and the holy buildings are contained in a quadrangle, which was surrounded by a wall of well cut stone, with gates guarded by large lions and groups of lions devouring elephants.

The temple encloses a crypt, eight feet square and sunk three feet below the surface, with well cut steps leading down to it. Within is an oblong stone block for the idol; it has a socket for the purpose, and a spout for carrying off the water used in bathing the image.

In front of the shrine and facing the vestibule of the temple, a single stone, ten feet in length, has two large lions in high relief carved on it, two large male figures crowned, and four female figures. This stone resembles figure, (plate IV. fig. 2,) of the Tezapore sculpture, which enables us to place the latter.

The shrine was covered with a dome-shaped roof, formed of horizontal slabs in overlapping circles, the base measures 28 feet both ways. It had originally an anteroom and vestibule of stone, in front of the shrine, the foundations of which still remain; and, from the fragments lying about, the handsome exterior moulding of the shrines, appears to have been continued round these additions.

The small bass reliefs, introduced into the external mouldings of the shrine, all represent groups of figures in obscene attitudes. The representations of the human figures are generally very much out of proportion, but apparently, purposely so, to make them more grotesque. The rendering of some of the animals is very good.

In modern times, the most frequented and celebrated of the shrines of Kamroop, is the temple of *Hajou*,\* situated on a hill, about 300 feet in height, on the north bank of the Brahmaputra, 12 miles N. W. from Gowahatty. Pilgrims of the bráhmancial faith from all parts of India, meet here, and make offerings in common with Buddhists from Nepal, Bhootan, Thibet and China.

The bráhmans call the object of worship Madhob, the Buddhists call it Mahamuni, the great sage. It is in fact simply a colossal image of Budh in stone, and perhaps, of all the idols now occupying the holiest places in temples, the only aboriginal one.

\* The other name by which the hill is designated is Nunnikote. The etymon of the word Hajou is traceable to the language of the Bows, who were for a long period the masters of the valley. It is composed Ha, a land and *jow* high.

This is doubtless the temple which the Mahomedan general Bukhtiyar Khiliji attempted to take possession of, when he found the stone bridge dismantled and was obliged to proceed lower down the stream in search of a ford.



Its modern votaries have, to conceal mutilation, given it a pair of silver goggle-eyes, and a hooked, gilt or silvered nose, and the form is concealed from view by cloths and chaplets of flowers: but remove these, and there is no doubt of the image having been intended for the "ruler of all, the propitious, the asylum of clemency, the all-wise, the lotus-eyed, the comprehensive Buddha."

The shrine is all of stone, octagon in the plan, 30 feet in diameter, with a pyramidal roof; but it will appear from the disarrangement of many of the mouldings and cornices, and awkward position of several bas-reliefs, that the upper portion of the temple has been re-constructed from the old materials, without much precision of arrangement.

The base, to about six feet in height above the plinth, is decidedly ancient, and is the best proportioned and handsomest part of the building. On\* a moulding of about two feet above the plinth a row of caparisoned elephants in high relief encircles the building, and appears to support it. The elephants are all facing outwards, stand each 16 inches in height, and are finely designed and executed; another moulding or frieze immediately above the elephants, apparently intended to represent the interlacing of reeds, is also of tasteful design and admirable execution.

The interior is a crypt, 14 feet square, into which you descend by a flight of stone steps. It contains the image and its pedestal. The door-case of the entrance to this shrine, is formed of four blocks of granite, and is ten feet high by five feet wide: a lotus over the door in the centre of the lintel, is the only ornament. The door opens into an anteroom, also of stone, ten feet by ten feet, having in niches of four feet square, stone screens, one on each side with apertures for the admission of light and air, cut in the form of lotus flowers.

Beyond the anteroom is a large vaulted vestibule measuring 40 feet by 20, built of brick and supported by massive pillars of the same material. "This† room forms no part of the original building. It is said to have been constructed by Noro Narayu, the Koch king of Kamroop, in A. D. 1550. He found the temple entirely deserted and almost lost in impenetrable jungle. Not only did he

\* Plate III.

† From Mr. Robinson's MS.

cause it to be repaired, and restored to something like its original form, but he endowed it with lands, priests, musicians and dancing girls." A large colony of the latter class have sprung up in the vicinity of the temple, and one set of performers daily exhibit before the shrine.

It is certain that the vaulted brick addition of *Noro Náráyn*, replaced a dismantled stone edifice, which they had not the skill to restore. The flight of stone steps, from the bottom to the top of the hill, is composed of slabs, which were never cut for such a purpose, and from the appearance of these and other stones lying about, it is evident, that the temple\* must have possessed other buildings of stone, besides those now extant. Not far from *Hajou*, and on a loftier hill, the ascent of which it facilitated by rude stone steps, is another temple composed entirely of granite now dedicated to the worship of *Kedár Náth*. The shrine appears to have survived the general overthrow of contemporaneous fanes, but the ancient vestibule is razed to the ground and a thatched shed covers its foundation.

Near the banks of the *Brahmaputra* below *Tezpore*, the temple known as *Singori* or *Gopeswar* next claims our attention; externally it presents a most uninviting appearance, and might be passed as a very ordinary brick building of no great antiquity; but this brick work is only a sheathing, as of lava, with which the old temple is covered: above ground, outside, about ten feet of the old shrine may still be seen.

The brick shell covers the remainder and all the vestibule. The interior is however in its original state, and is very worthy of notice. It gives us the whole plan of construction of the larger temples of antiquity, and the position of most of the columns and other frag-

\* The situation of these temples with reference to the town of *Kusha*, their site on the further bank of the *Hirango*, and one of them being to the present day consecrated to the worship of *Maha Muni*, together with the high degree of reverence paid to the place, by *Budhists*, would lead us to infer, with as much certainty as any short of positive testimony, that one of them was the *Choityo* adorned with the head ornament near which was the grove of *Sal trees* (there are plenty of them) where *Sákya Muni* went to his last sleeping bed, and near which also the rites of cremation were performed.—From *Mr. Robinson's MS.*

ments we find at Tezpore and elsewhere. By the deposit, for so many centuries, of the debris of the Singori hill, at the foot of which it is built, three or four feet of the most ornamental portion of the old temple is buried. Two hundred and fifty years ago, when the attempt to restore it with brick was made, the silt was removed from before the entrance only, and a flight of steps then added, to the extent of the silting, surmounted by an additional porch. As the site of the temple is high above the alluvial flats of river formation, its being thus buried is in itself an indication of great age, common to all antiquities of the same type similarly situated.

The sculptured stones found amongst the hills of Gowhatty have been dug up from deep below the surface. The great Kámikhya temple must have been thus found by its restorer, and exhumed by the removal of the earth from a broad area all round it.

The Singori temple consists of a shrine, externally octagon in the plan, and 18 feet in diameter. One side of the building is occupied by the door, the rear and two sides at right angles to this are plain, with the exception of having each a niche formed by two half-engaged fluted pillars supporting a pyramid with a melon-shaped finial,—a miniature representation of the pyramids that surmounted the vestibule. The remaining four sides of the octagon are curiously broken into angles very effective in regard to light and shade.

These salient angles meet and blend at the base of the ornament on the top of the temple, to which they ascend by a graceful parabolic curve.

The courses of stones however continuing perfectly horizontal, I have no measurement of the altitude of this or of any similar temple, but, judging from the eye, I believe they may be all estimated, like the Cashmerian temples described by Captain Cunningham, at double the diameter of the base; that would be, in the case of Gopeswar or Singori, only 38 feet. The interior is a chamber 8 feet 6 inches square. The roof is constructed, as those already described, of well cut slabs, forming a succession of circles, diminishing to about 3½ feet, and then capped by one slab, ornamentally filling up the remaining space with a deeply cut, expanded lotus.

Under this, in a crypt, to which you descend by a flight of stone

steps, is the object of worship, which I could not distinguish, as the crypt was nearly full of water, when I saw it.

The outer building or vestibule was originally 24 feet square. It has two stone windows with six lancet-shaped apertures, but these are now buried, and the entrance door alone most inadequately lights and airs the building.

The roof is supported, besides the outer walls, by four very massive columns and eight pilasters, eight feet four inches in height, dividing the building into nine compartments, each surmounted by pyramids, similar, in regard to their structure as seen from within, to that over the shrine.

The centre compartments, including the pillars, measure ten feet ten inches each way. The four corner compartments are also square in the plan, measuring each three feet nine inches, and the side compartments are consequently 10 feet 3 inches by 3 feet 9 inches; additional slabs are placed close together on the architraves of these oblong compartments, till the opening obtained at the base of the pyramid roof is a square.

The shafts of the columns are octagonal, to within a foot and a half of the capital; thence they are square, and the plinth of the capital, fitting on to them, is also square, in other respects they resemble the restored columns in plate VII.

The shafts measure 5 feet 10 inches in circumference, and their massiveness gives to the interior a very solemn, cave-like appearance.

This temple is held in great veneration by the Buddhist Thibetans and Bootias. They visit it annually and leave here their long tresses, cut off on assuming monastic garments.

#### TEZPORE OR PURA RUINS.

The fragments of columns, friezes, cornices and various other carved stones, known as the Tezpore or Pura ruins, are so found as to leave it to be implied, either that the structures for which they were intended were never completed, or, that having been built, they were so effectually overthrown that scarce one stone was left upon another. On a closer inspection both hypotheses are required to account for their present position. In some, and by far the

greater number, of the stones, there are, in the rusty rivets and clamps, and other appearances, evidences of their having been put together; in others, the absence of these indications, and the unfinished state of the chiselling, denote they were still in the hands of the stone-cutter, when the works were interrupted.

The contemplated number of temples had not then been completed when the work of destruction commenced. The blocks are all of the hardest granite, quarried from the neighbouring hills, and no little skill and taste were required to produce, out of such material, designs so graceful and so deeply and delicately carved, as we find them.

In the production of these works the art had reached its culminating point; it set in a blaze, like a meteor, never to appear again.

In the *Journal of the Asiatic Society* No. 40, for April, 1835, there is a paper, on these ruins, by Capt. G. E. Westmacott; it gives a fair idea of their vast extent and spirited execution, but the writer has so entirely mistaken the nature of some of the fragments, as to give very erroneous ideas of the style of architecture intended.

In his description of the columns, page 186, he uses as bases the cross-shaped blocks, which by reference to other temples, we find to be capitals. The large square slabs, referred to in page 192 as altars, measuring 46 feet all round, were each intended to form the entire flooring of a shrine. The raised position of one, alluded to by Captain W., with steps, is a fanciful arrangement of the loose stones by some modern devotee. The stones supposed by Captain W. to be voussoirs of arches, are the segments of the circles used in the formation of the pyramidal or conical roofs; those from the centre ornaments, mistaken for the key-stones, being the corner stones of the first course of the cone; the ornament filling up the angle exposed, where the cone rested on the square of the four architraves.

The square blocks referred to in the same page, as "measuring from 20 to 30 feet, concave in the centre, and sculptured in imitation of chaplets of flowers," supposed by Captain Westmacott to have been "beds, or altar places of Siva," were intended for the crowning slabs of the pyramidal roofs of the temples.

The carving represents the expanded petals of the lotus; and the

flattish surface of the seed-beds in the centre of the flowers, Captain Westmacott mistook for the rests of "Lingas." A few of these symbols are found in and about Tezporé. On the hill beyond the sepoy's lines, there is a shrine of brick, containing one, 7 feet in girth, in a circular Yoni between 7 and 8 feet in diameter. The others are fitted into Yonis, sometimes square and sometimes round, but the Lingas are all of the same form, square at the base, octagonal in the centre, and circular in the plan of the upper portion, which appears above the Yoni.

The socket of the Yoni is cut so as to accord with the square and octagonal portion of the inserted part of the Linga. It will be observed, from this mode of construction and insertion, that it was impossible, without moving the Yoni, to disturb the Linga; where the former is large and heavy and firmly fixed in masonry, by rivet or clamps, it would have been no easy matter to have moved either.

In the destruction of one of the temples dedicated to this worship, and which, till very recently had not been disturbed since its overthrow, a Yoni of vast weight, measuring three feet two inches square, was dislodged, and sent flying over the head of its Linga, which it fractured and caused to incline as it passed; by no agency, that I can think of, but gunpowder. There was also a stone door case, the lintel and uprights of which lie broken, by some force, that projected the pieces in the same direction as the Linga.

This Linga, four feet in length, was contained in a shrine of brick, and that was not the only brick edifice amongst the holy buildings of Pura, some of these appear to have been built as depositaries for cinerary urns.\* One solid mass of brick masonry, on being removed, was found to enclose a small square chamber, in which there was an urn, containing ashes and fragments of burnt bone.

The urn was unfortunately broken by the workmen. It was of very superior black pottery, ornamented with flowers in basso relievo, and from the fragments seen, the form is represented to me, as having been something like fig. 2 Plate VII.

\* In Col. Wilford's account of ancient India, the Rishis held sovereignty in Assam. The figure at the base of the large pillar (Plate V.) is recognised by intelligent Hindoos as Nareda Rishi and the Rishis burned their dead, preserving their ashes in Dagopes or Topes.—S. F. Hannay.

The bricks used in these buildings are very peculiar. They are moulded in the various forms required to suit the positions, for which they were destined, as constituents of domes, cornices, finials, &c. We find them, therefore of various forms and sizes, some with decorative mouldings, some plain.

From the appearance of the overthrown brick edifices, I think they had brick domes, but not arched, the bricks, like the stones, were moulded so as to form circles, overlapping till they, from all sides, met or nearly so. Very long, truncated, wedge-shaped bricks, adapted for such a formation, are found.

No lime appears to have been used in putting these buildings together, and from this and their construction, it must have been easy to overthrow them.

Captain Westmacott found no brick buildings, but the modern station of Tezpore has risen amidst the ruins he described; the dense forests, that impeded his observation, have been removed, and, though vast quantities of finely cut stones have been buried, to form the foundations of modern buildings, the more ornamental fragments were spared, and still remain in sufficient number and variety, to enable us to form some idea of the structures of which they were members.

In this we are assisted, by the uniformity of design to which the architect was reduced, by his ignorance of the principles of the arch, and poverty of invention.

In his stone buildings, he appears to have had but the one form of covering, well known in Indian architecture; and as he could not go beyond certain dimensions in the square, from which his pyramidal roofs sprang, he could only obtain additional space by a repetition of the squares and pyramids.

Had we, therefore, all the constituent parts of only one temple before us, however scattered, we might easily estimate its magnitude, and even put it together again; but we find at Tezpore, slabs for six or eight altars; each of these had its shrine and vestibule, and so the immense profusion of the ruins, indicate rather the number, than the magnitude of the Pura temples; and as the fragments that remain, are not all now, where they were first found, and so many have disappeared from the scene, it becomes impossi-

ble to assign to each shrine, its due proportion of columns and roof finials. I think, however, an effort was made to construct here one temple, in a more elaborate style of decoration, than any that had yet been attempted, and this temple I will endeavour to put together.

In plate IV. figures 1 and 2, and in plate V. I have given representations of the three most beautiful of the Tezapore sculptures. From adaptation, by measurement, and exact correspondence of ornamental borders, I find that figure 1 of plate IV. is the epistylum, which was supported, on two such pillars, as that represented in plate V. and these pillars had for their bases, the compartments of the stone, with the lines and urns, represented in figure 2 of plate IV. which contains the dancing girls and musicians.

A stone similar to this, I found, in situ, in another temple, as already noted; and I have no hesitation in placing these four in an analogous position.

They surrounded the entrance to the *adytum*, of the great temple of Pura, and by taking the largest slab of those described as the pavement of shrines, for our purpose, we find, that this *adytum*, which contained the object of worship, was 12 feet square inside. Externally, this shrine must have been covered by a dome, similar to the one described (ante p. 11) in the notice of the Singori temple, springing from a base octagon in the plan, thirty feet in diameter, and twice that in height; the whole basement of this dome was very floridly ornamented, with cornices of Satyr heads, and beadings in festoons, (vide figure 2, plate VI.) and other mouldings, and had also, on three sides, the niches as described for the Singori temple.

The vestibule, exteriorly and interiorly, was as highly decorated as the shrine itself. The capitals of nine pillars and pilasters were found by Captain W. In the spot I have selected for its site, I have no hesitation in saying, there must have been more; and supported by these pillars and pilasters, the vestibule was covered and adorned, with certainly not less than nine, but probably, twelve pyramids, externally supporting urns and other ornaments, and internally, presenting the conical roofs of ornamented circles, as seen at Singori and elsewhere. In plate VIII. I have attempted a perspective sketch of the internal appearance of such a temple



The epistylum, over the entrance to the shrine, has nine male figures, six represented as singing, and three in graver attitudes occupying more prominent positions, and each attended by two females; underneath, in the line of a richly chased border of scrolls, entwining birds and animals, executed with fidelity and grace, is a figure of Gunesh, who appears to hold a similar position, as custodian to the entrance of most of the shrines. In attendance upon him are, two slender-waisted females. The merry couples, in the side compartment of the stone, represented in figure 2, of the same plate, and to which, in my restoration, I have assigned the position of lower member of the door-case, are engaged in a dance, to this day, well known in Assam under the name of the Boisak Bihu dance.

The Mag and Boisak Bihus are the two national festivals of the Assamese. The observances connected with these festivals, have nothing to do with the Hindoo religion, and their origin is involved in some obscurity. They belong, not to the present, but to the ancient religion of the country, and what this was, may be indicated by the fact that the Buddhist Shyans and Burmese, on the borders of Assam, if not through all Burmah, at the same time of the year, or nearly so, have their two great festivals in honor of Buddh.\*

In the observances of the festivals, as held by the Assamese and Burmese, there is a remarkable resemblance.

Preparatory to the first festival, the young lads of both races, build up with care a lofty pile of firewood. After much feasting and dancing on the previous day and throughout the entire night, this is set fire to at early dawn.

The Khamptis call it *Moika Soomphoi*, and with them, it is, I believe, the anniversary of the birth of Buddh. The Assamese call it *meji*, but can assign to it no definite origin. In the second festival, the Khamptis commence by bathing all their images of Buddh, this is followed by sports and feastings, but the women do not dance.

The Assamese, on the first day of the Boisak Bihu, bathe all their cows, and subsequently, for seven days, devote themselves entirely

\* Called the Pocham and Pochi respectively: see ceremonies required to be performed on the death of Chakin in Turner's *Buddhistical Annals*.—S. F. Hannay.

to feasting and amusement. The inhabitants of a large circle of villages, meet daily in one place; lascivious\* dancing and singing are the chief attractions, and some of the attitudes and gestures used, are precisely those represented in the sculptures.

The upright stone in plate V. measures  $10 \times \frac{2}{3} \times 2$  feet. The small central figures, each 8 inches in height, represent five of the Avatars of Vishnu; the missing pillar, to correspond with this, may have represented the remaining Avatars: all these surrounded the entrance to the shrine, but no figure has been found, adapted to the altar that the shrine contained.

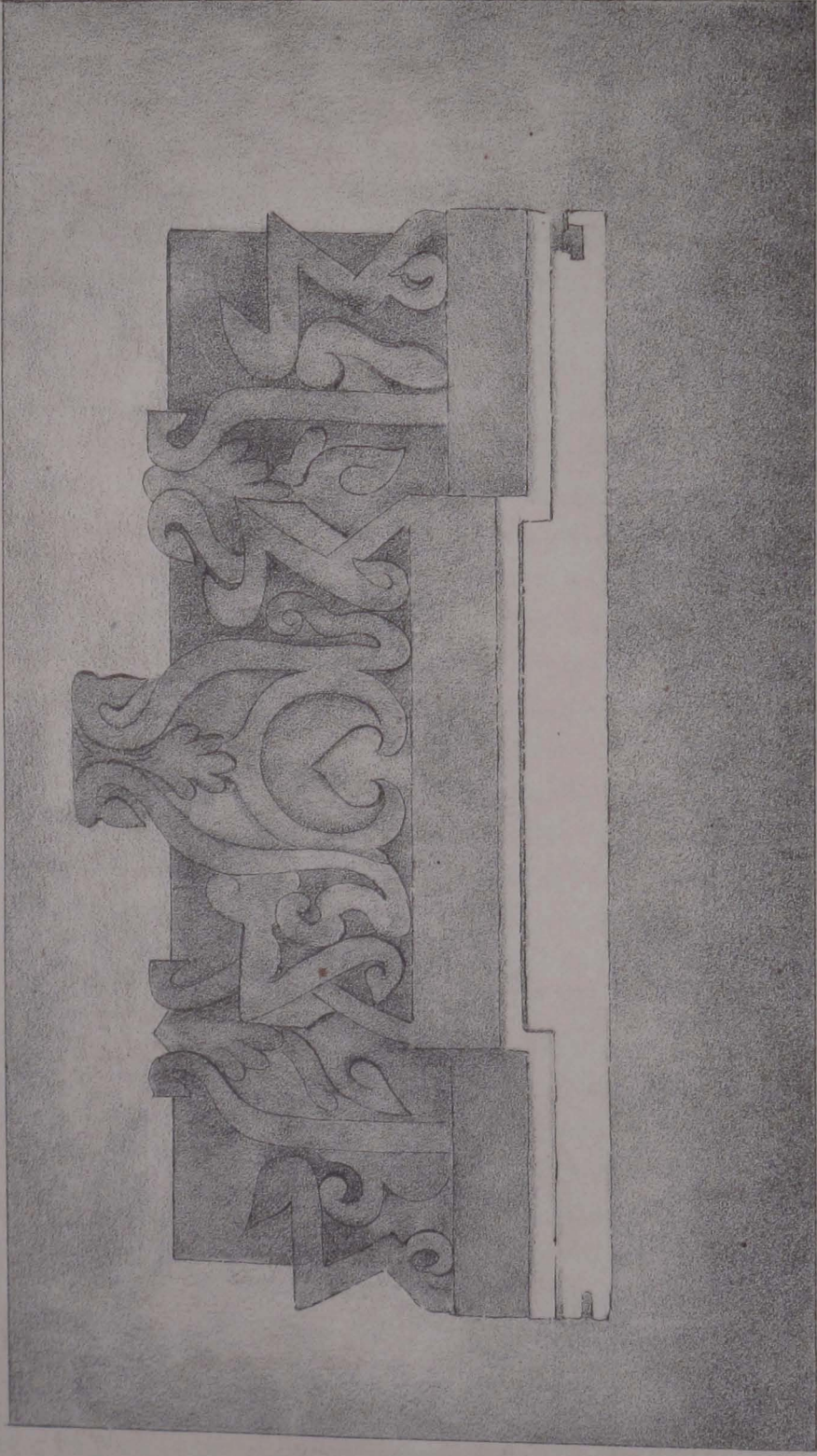
The shafts I have taken for the columns of the temple, I have been describing, are not more than  $6\frac{1}{2}$  feet in length. Besides these, four have been found amongst the ruins, ten feet long, and close to where they were discovered, Captain Westmacott observed "vast fragments of the epistylum and frieze, carved with beaded drapery, half buried in the soil."

These fragments which probably formed the entire entablature of the columns, have now disappeared; Captain Westmacott is, I think, correct in the position he assigns to them, but I have no precedent for, and would be at a loss to place, the Grecian style of portico he imagined them to have formed. I took considerable pains to find amongst the ruins the remaining members of the column, of which these were the shafts, and the result is shewn in plate VII. where I have given an elevation of the restored column. It is in four pieces; 1, the capital, from A. to B.; 2, the shaft, from B. to C. with an ornamented top, a cornice of Satyr heads and beading, surmounted by a double moulding; 3, the surbase, C. to D.; 4, the base, D. to E. My idea of these four columns is, that they supported the roof of an open detached building resembling the porch of the Choigong temple; such detached buildings are generally added to the modern temples, as a receptacle for the object of worship, when taken out for an *airing*; or they may have formed the covered entrance, to the walled enclosure containing the temples.

\* Into lasciviousness it may have degenerated in Assam, but originally it was not so intended. Nor do the Burmese or Shyans practise such at the present day. The contortions of the body, the "reeling to and fro" are intended to represent violent grief and distraction.—S. F. Hannay.



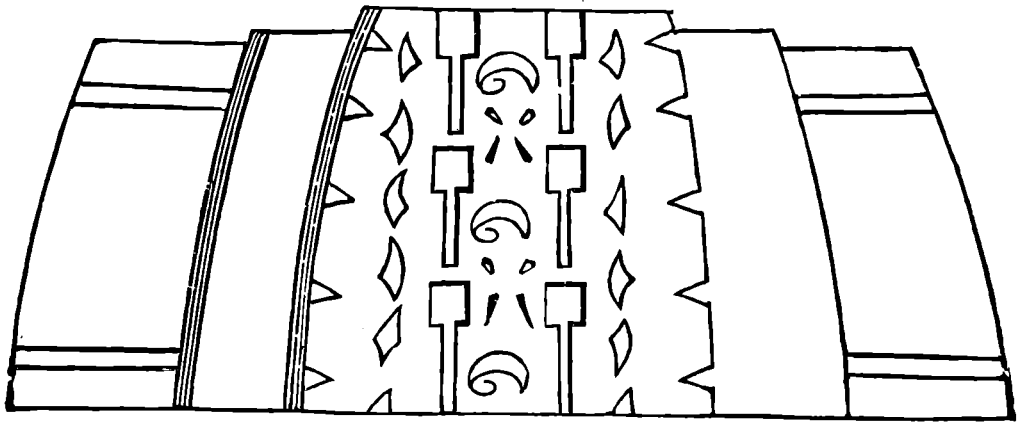
18A



Tez pore Sculpture.

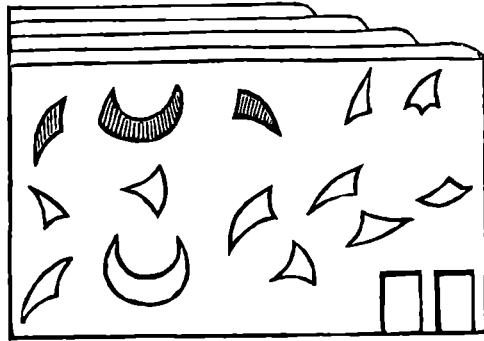
Captain Westmacott found stone walls running in various directions. These have now been removed ; but that the holy buildings were all contained within a spacious enclosure, sufficient for them and a large monastic establishment, is highly probable. We have it from Hiuan Tshang, the Chinese traveller in India, in the seventh century, that such existed in Assam in his day, though neglected and holding heterodox opinions. May not the extensive monastic establishments of Assam, Vishnuvis of the present day, have originated in ancient Buddhist monasteries ?

Of one of these modern institutions, I have given an account in Vol. XX. of the Journal. I have recently visited another, the Awoniáthi in the Majulé, the head priest, second priest and all the inmates of which are monks ; and the sacerdotal dress is a cloth of a garnet colour similar in hue to the robe worn in the Lamesories of Bootan. The huts of these monks form an extensive quadrangle, surrounding their place of worship, and no women are allowed to take up their quarters there. No inscriptions have been found appertaining to these ancient temples ; but in plate V. figure 3, and in plate XXXV. there is a representation of a stone, the carving on which is so singular, that it must surely have been intended, for something more than mere ornamentation, if this be doubtful, a symbolical object must be ascribed to the figures on the other stones represented below.



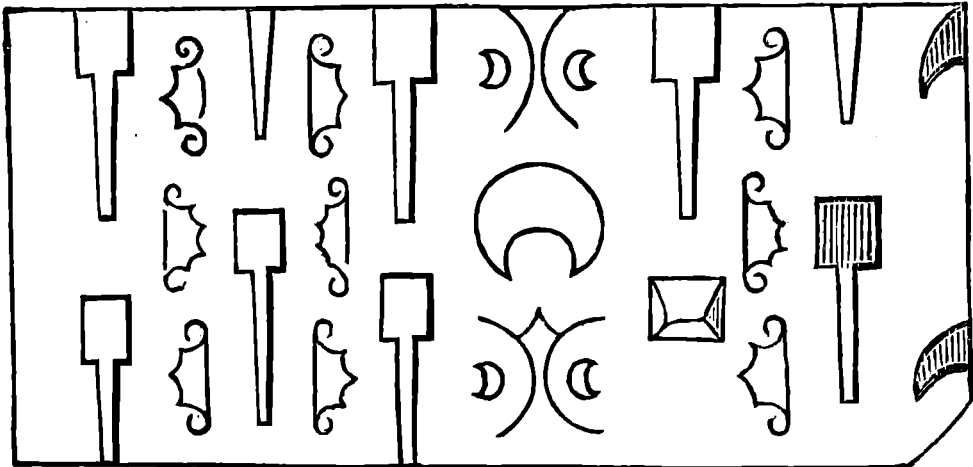
Sebsagur.

(But supposed to have originally been found in Central Assam.)

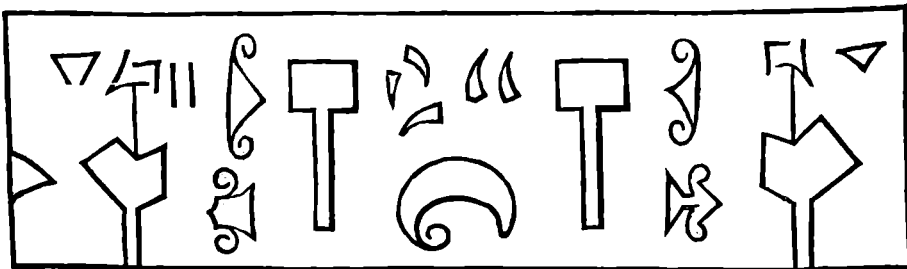


Singori Temple.

Stones, thus marked, are found amongst the ruins of all the old temples; the outer faces of the stones intended for the domes of the Tezpore temples, are covered with them. Two of them are shewn in the following cuts.



Tezpore.



Tezpore.

There is a large figure of Gunesh, cut in a rock, near what must have been the water-gate of the monastery. It is in high relief and well designed.

Ascending the river from Tezpore, we find ruins of ancient temples at Bishnauth, which was, no doubt at one time, a place of very holy repute, and one of the strongholds of the valley, there being here a fort of great extent ascribed to Arimút.

These military works abound in the valley, many of them, traditionally ascribed to apocryphal local heroes, are more likely to be the remains of fortified camps, occupied by invading armies, at times, when those who had anything to fear from the hostile force, betook themselves to the strong places constructed on both sides of the valley, in the passes into the hills.

I have seen some of these forts, and have heard of more. They are partly of masonry; well-cut and well-fitted blocks of stone, or huge ramparts of earth, faced with brick; and all so constructed, as to render it obvious that the intention was not to protect the plains from forays from the highlands, but to check the advance, towards the hills, of a hostile force from the plains. It is not likely that the hill savages could have raised such works, the inference is, that they must have been built by the inhabitants of the valley to cover the passes to the hills, in which they took refuge from the invading armies.

I shall conclude with a notice of some very interesting ruins, I recently visited, in the first range of hills due north of Dibrooghur, on the banks of a small river called the Gogra, an affluent of the Seesee. As it debouches from the hills, the Gogra takes a sweep round the last hill so as almost to encircle it. This hill is scarped, and upon the flat surface obtained, about 60 feet above the level of the water, we have the remains of three temples, 30 paces apart.

The existence of these ruins was unknown, even to the natives, till a few years ago their accidental discovery was communicated to Major Hannay, who visited them; they are in a part of the country fifteen miles distant from any village or habitation, and never frequented, except by gold-washers. However effected, the destruction of these temples was complete, three huge heaps of carved stones, some of them very large and heavy, consisting of shafts, capitals and bases of columns, cornices, architraves, friezes, massive door-cases, altar blocks and the component parts of pyramidal roofs or domes, are all found commingled confusedly, as if, after the overthrow, it had been intentionally done, to defy restoration. As they lie, however, it is obvious that each temple consisted of a shrine and vestibule, the latter supported on pillars and pilasters.

The pillars and architraves of the first and smallest temple, are

very singular, preserving in the plan, the cross shape of the capital (Fig. 1 Plate X.); heads, shoulders and arms, of human figures appear as the supports of the abacus, and the same arrangement is followed up in the architraves, from which spring the domes; and from other fragments found, there must have been a cornice, thus ornamented, all round the building.

The columns were not larger than those of the Choigong temple, and from the pilasters, these temples had all closed vestibules, not open porches like that represented in plate I. Round the base, above the plinth, the first and smallest of the Seesee temples, had a row of elephants shewing the head and fore-legs, in high relief, as in the Hazoo temple (vide plate XXVIII.)

In regard to the divinity, to which it was dedicated, a large figure of Durgah was found worthy of holding that position; and no doubt she was at some period, if not always, the object of worship there. The second temple, from the space covered by the ruins, appears to have been about 60 feet in length by 40 in breadth, including the shrine and vestibule. I extricated the altar block from the ruins of the shrine, and found, broken into several pieces, another figure of Durgah, the pedestal of which neatly fitted on to the block, and there could be no doubt that the one was intended for the other.

The figure and pedestal measured 5 feet 5 inches. The Durgah herself, when she possessed a head, which I could not find, must have measured 3 feet 6 inches from the crown to the feet; about one third larger than the Durgáh of the first temple.

The arrangement of the two figures is somewhat different, but both represent the goddess in her most terrific form, embodying by no means feebly, the power of the divine energy in action. Kálí or Durgáh appears to have been for some centuries, the favourite divinity in Eastern Assam, and it is possible, that the blood of human victims may have been shed before her altars here, as well as at the shrine dedicated to her, known as the copper temple, above Sudyá.

Yet, the figures on the lintels of the doorway and other parts of these and the third temple, do not appear to me to be emblematic of the Saktí form of worship. The grave figures, (Pl. IX. fig. 2, and Pl. X. fig. 3) seated cross-legged, in postures of profound meditation,



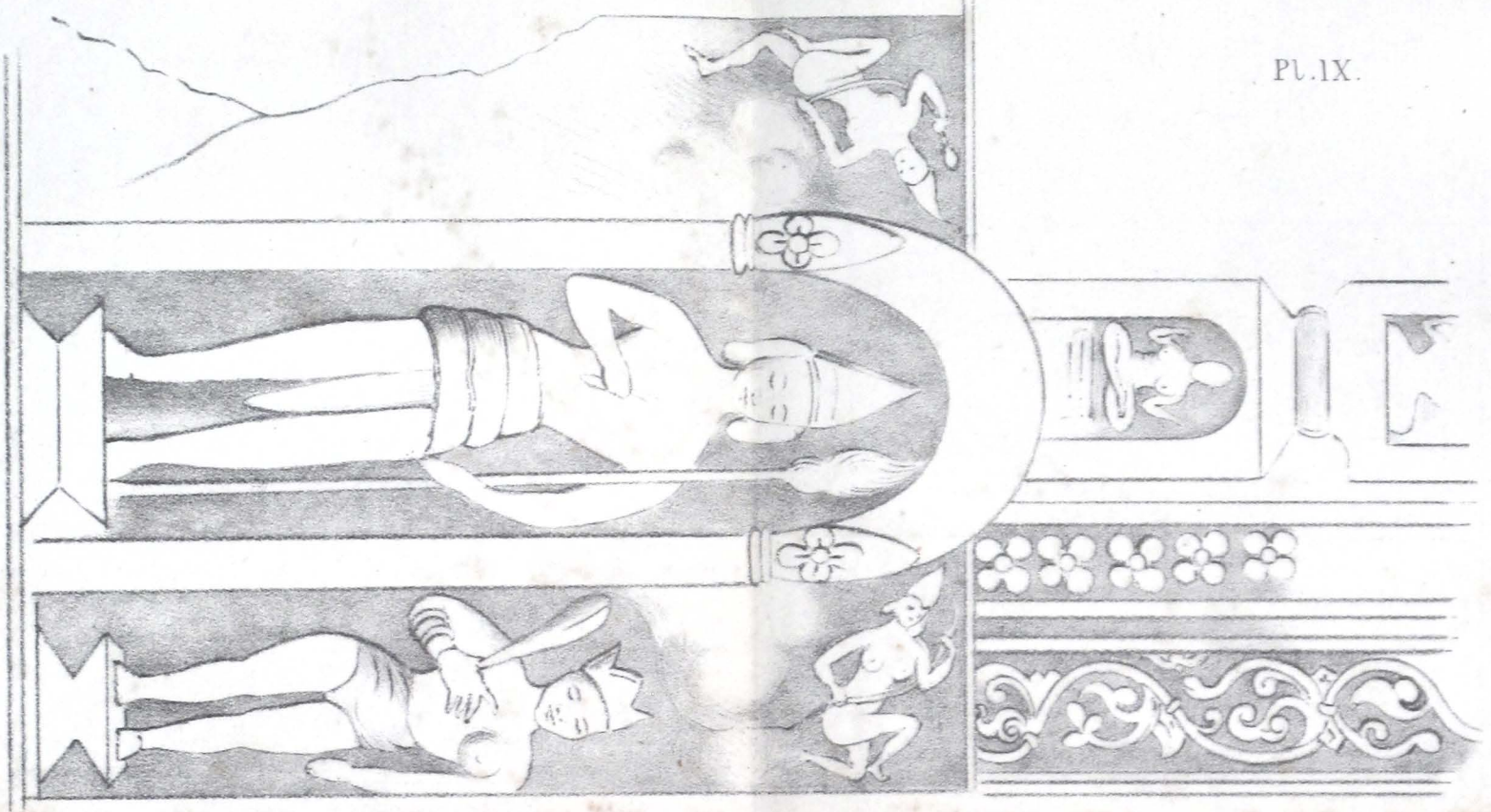
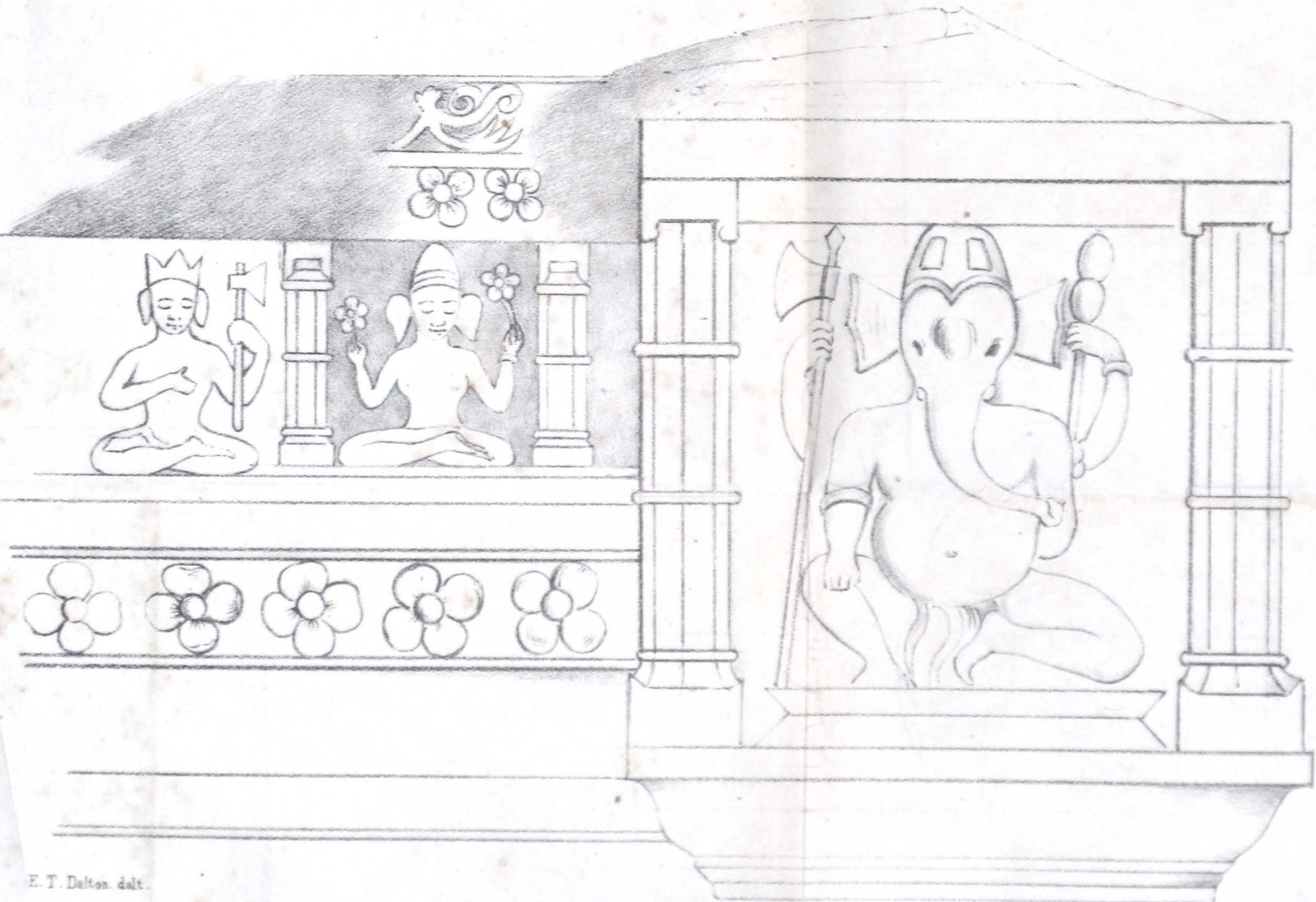


Fig 2.



E. T. Dalton del.



Fig. 2



Fig. 1

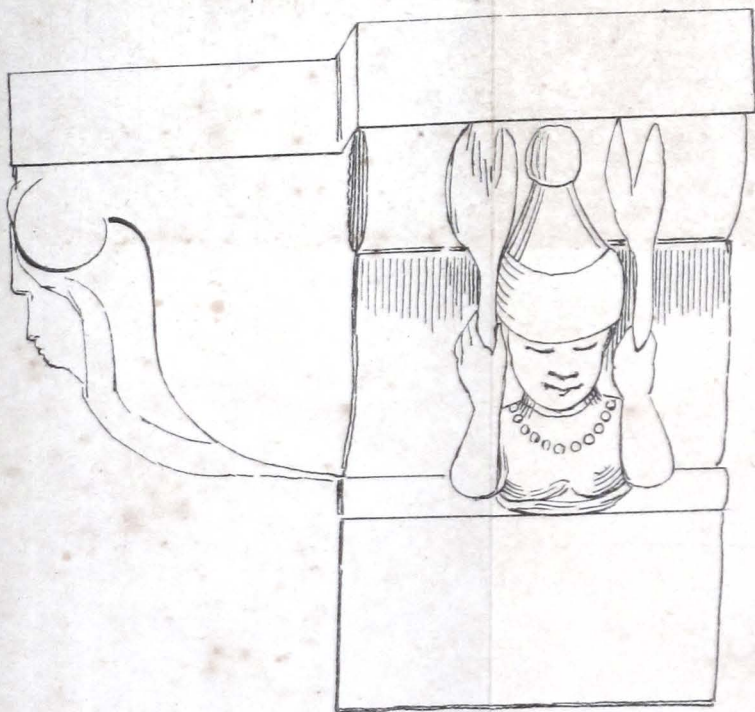


Fig. 4

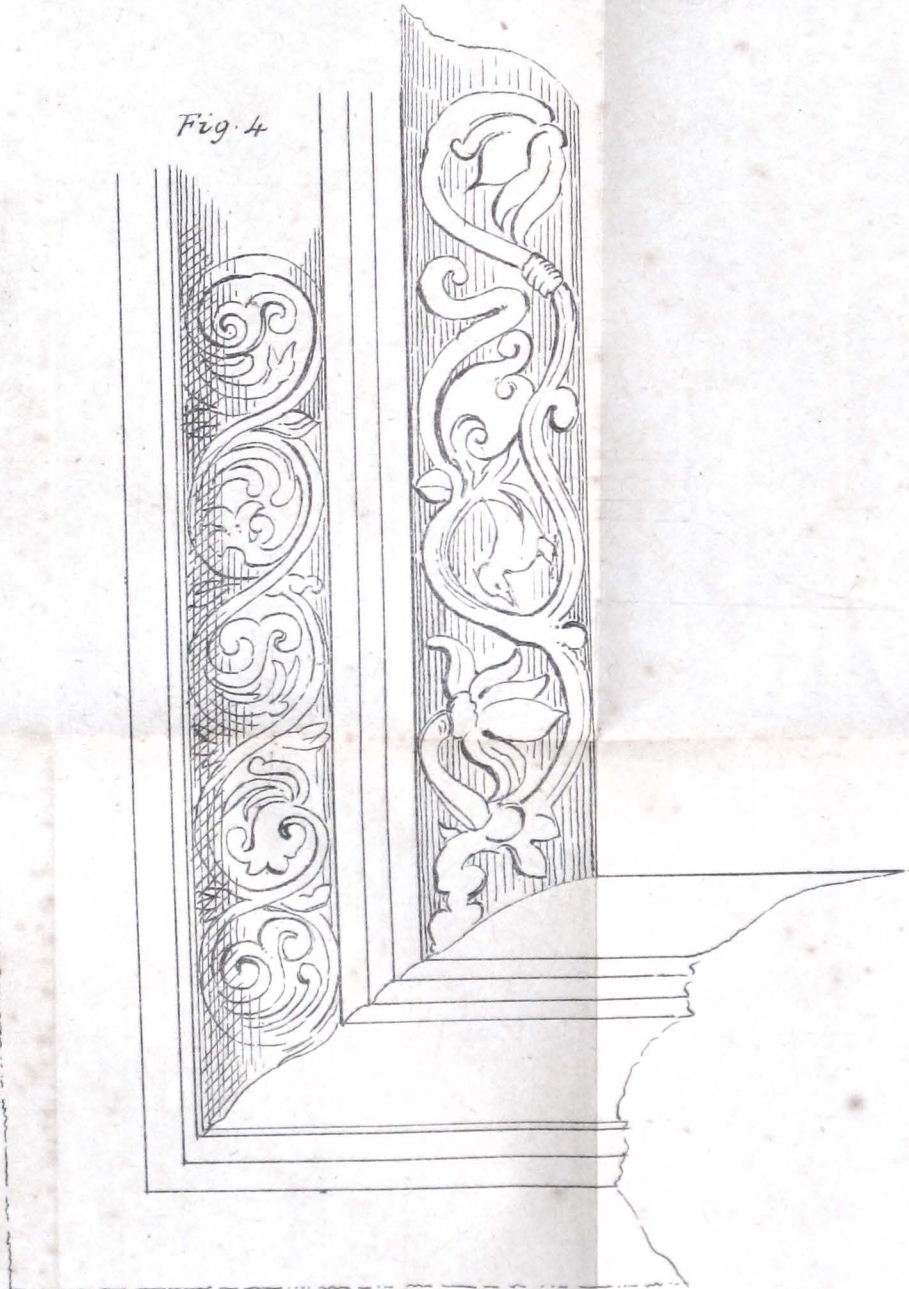
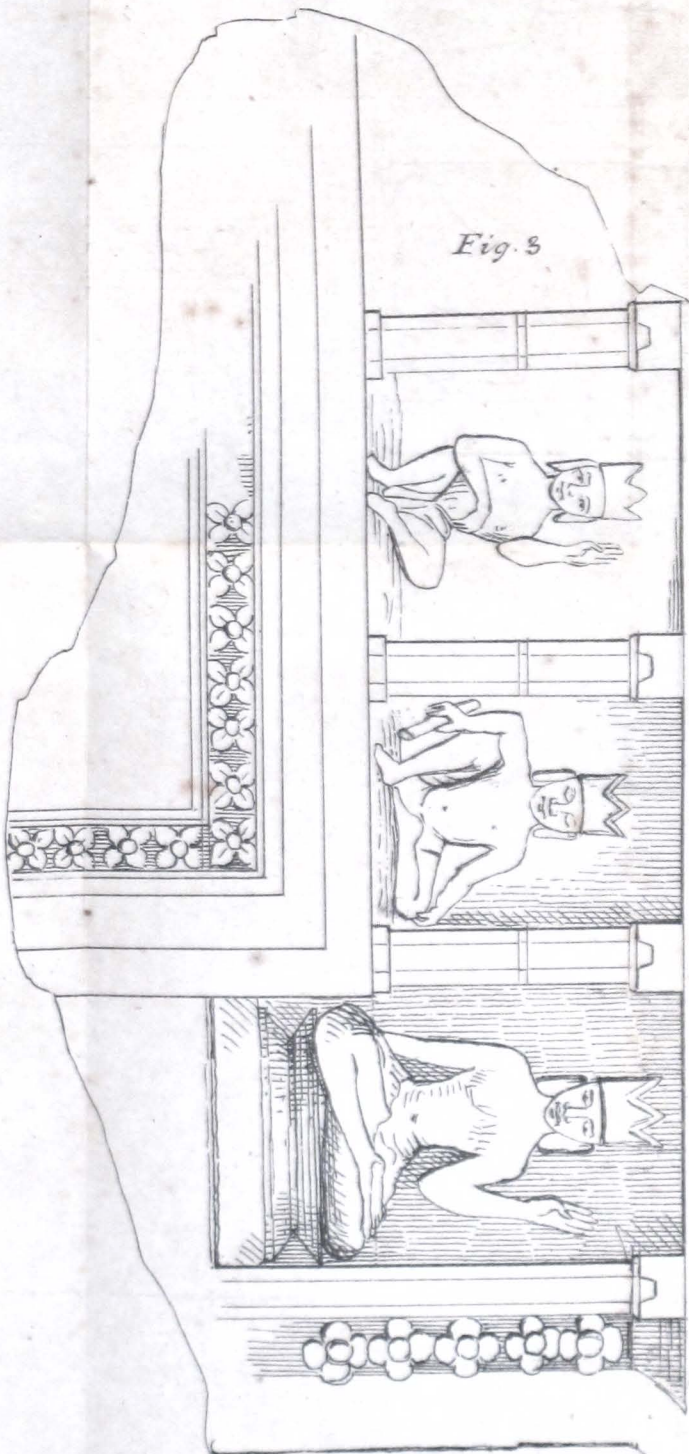


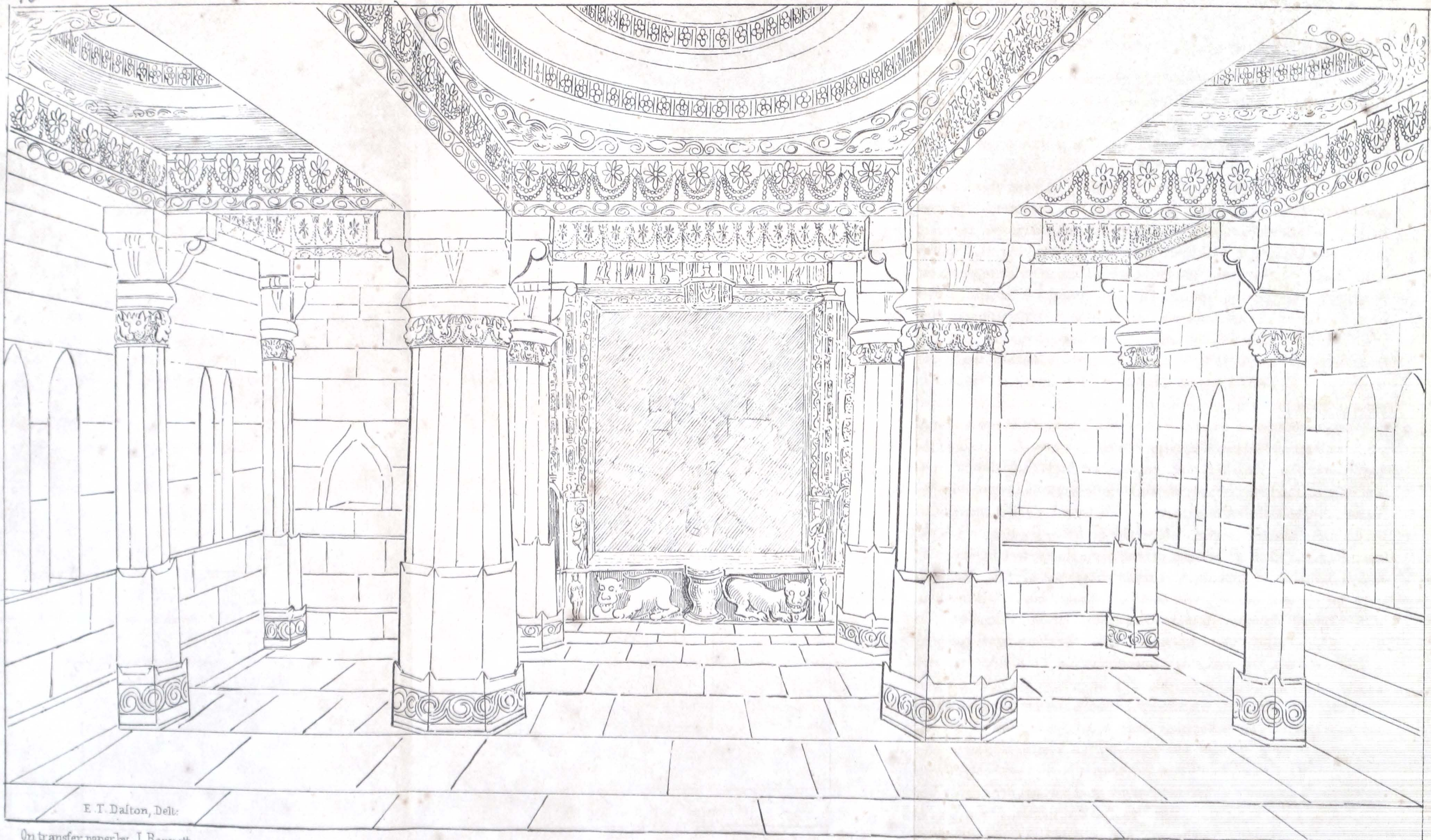
Fig. 3



E.T.D. Delt.

SEESEE TEMPLES.





E. T. Dalton, Delr.

On transfer paper by J. Bennett

T. Black, Lithr. Asiatic Litho Press Cal.

# TEZPORE TEMPLES

*Restoration of an interior  
The Vestibule looking towards  
The Shrine.*



12 A

Fig 1.

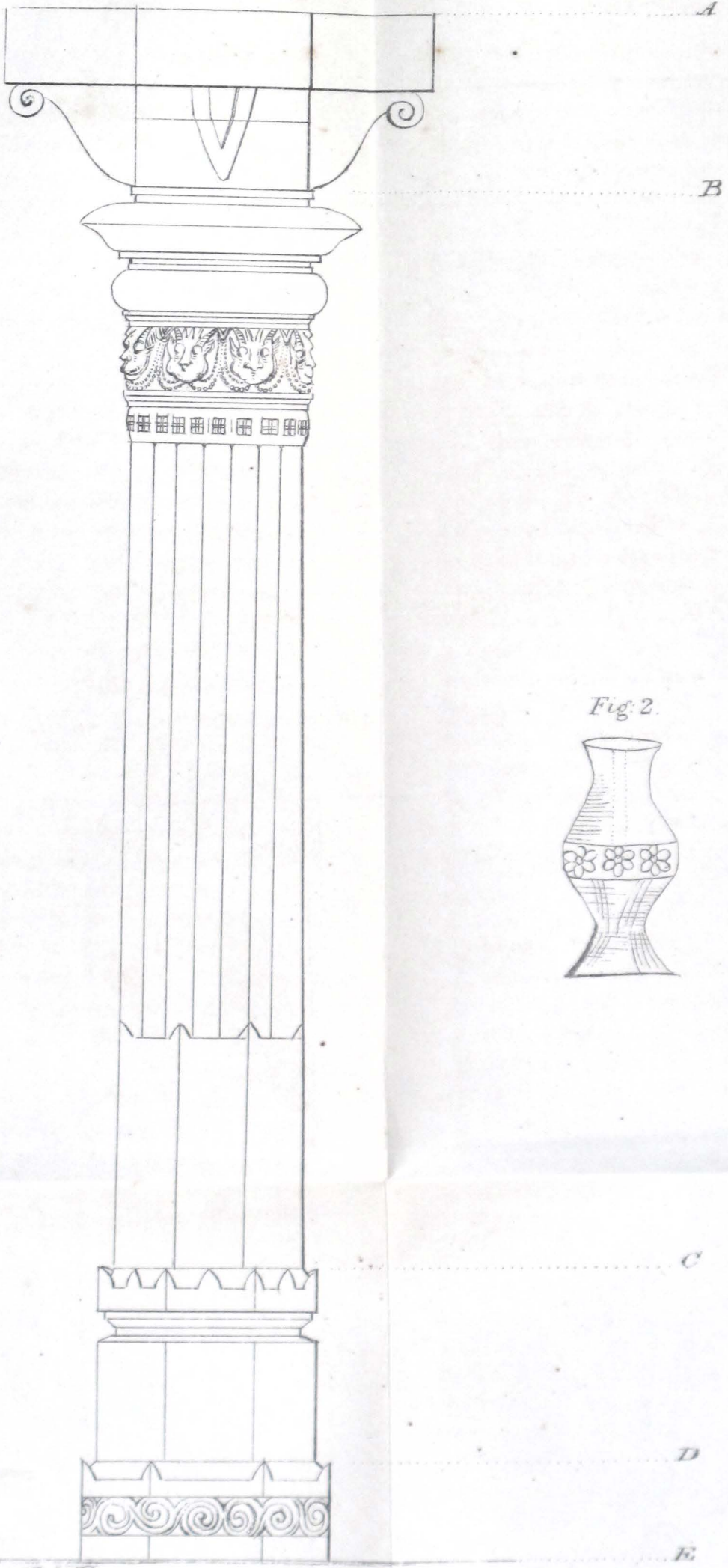
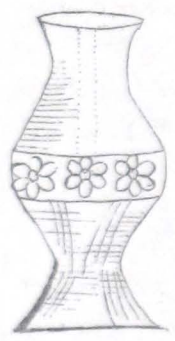


Fig 2.

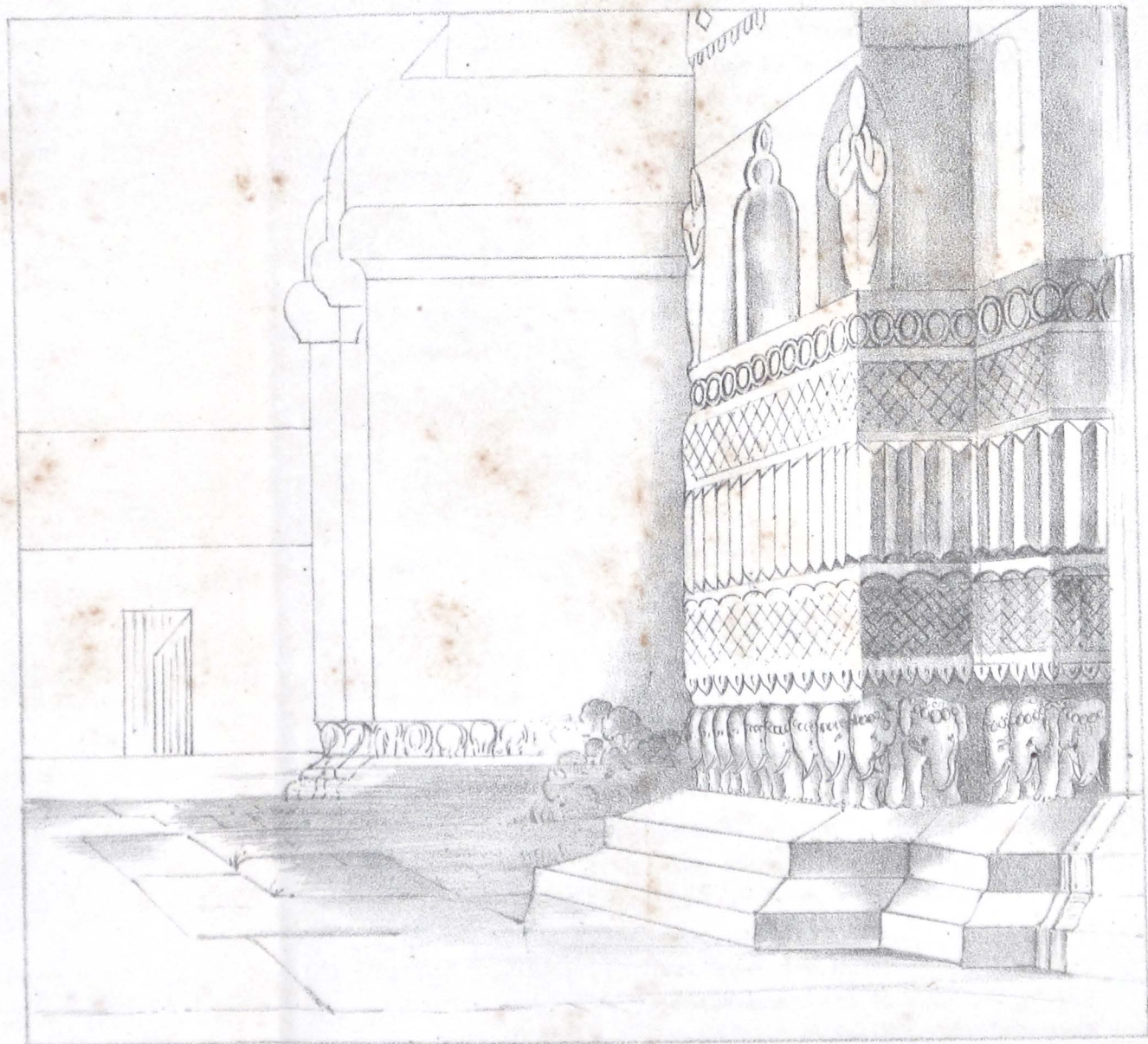


TEZPORE TEMPLES RESTORED COLUMN.

E.T.D. del.

T. Black Lith: Asiatic Lith. Press.

SCALE 1/2 INCH TO A FOOT.



Part of the Hazoo Temple.



Fig 1

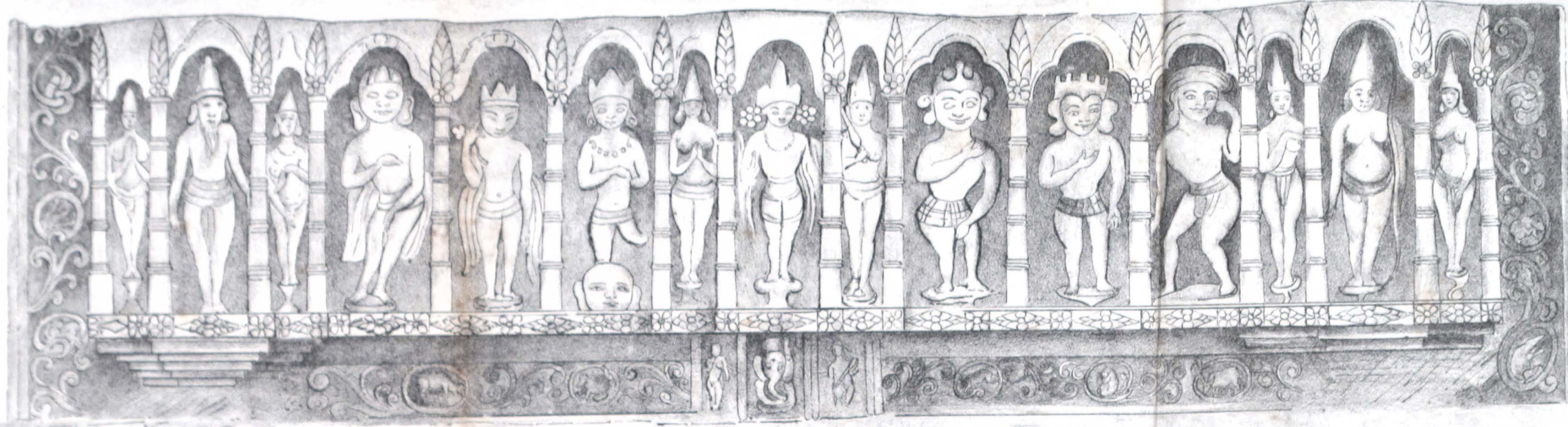
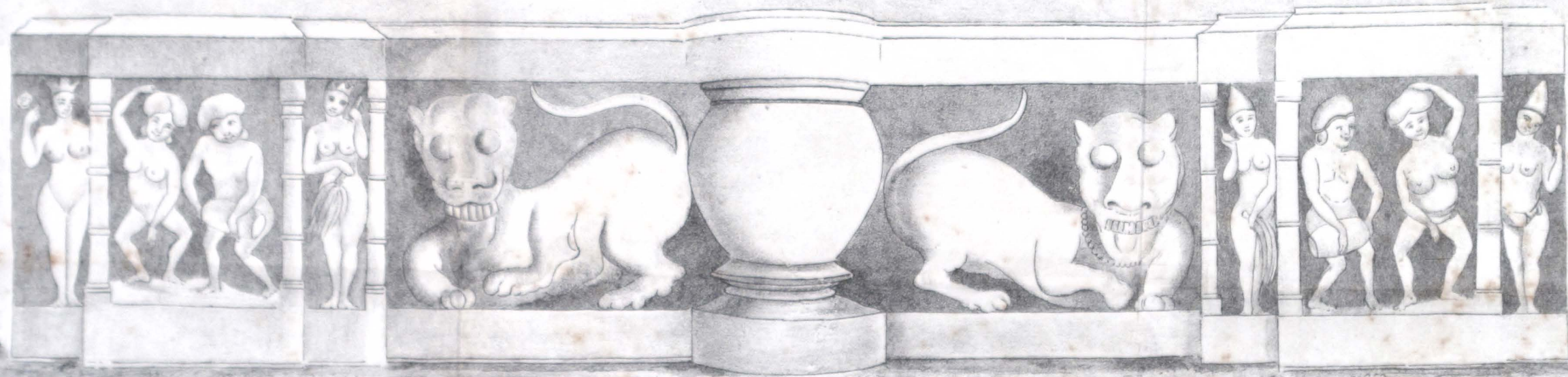
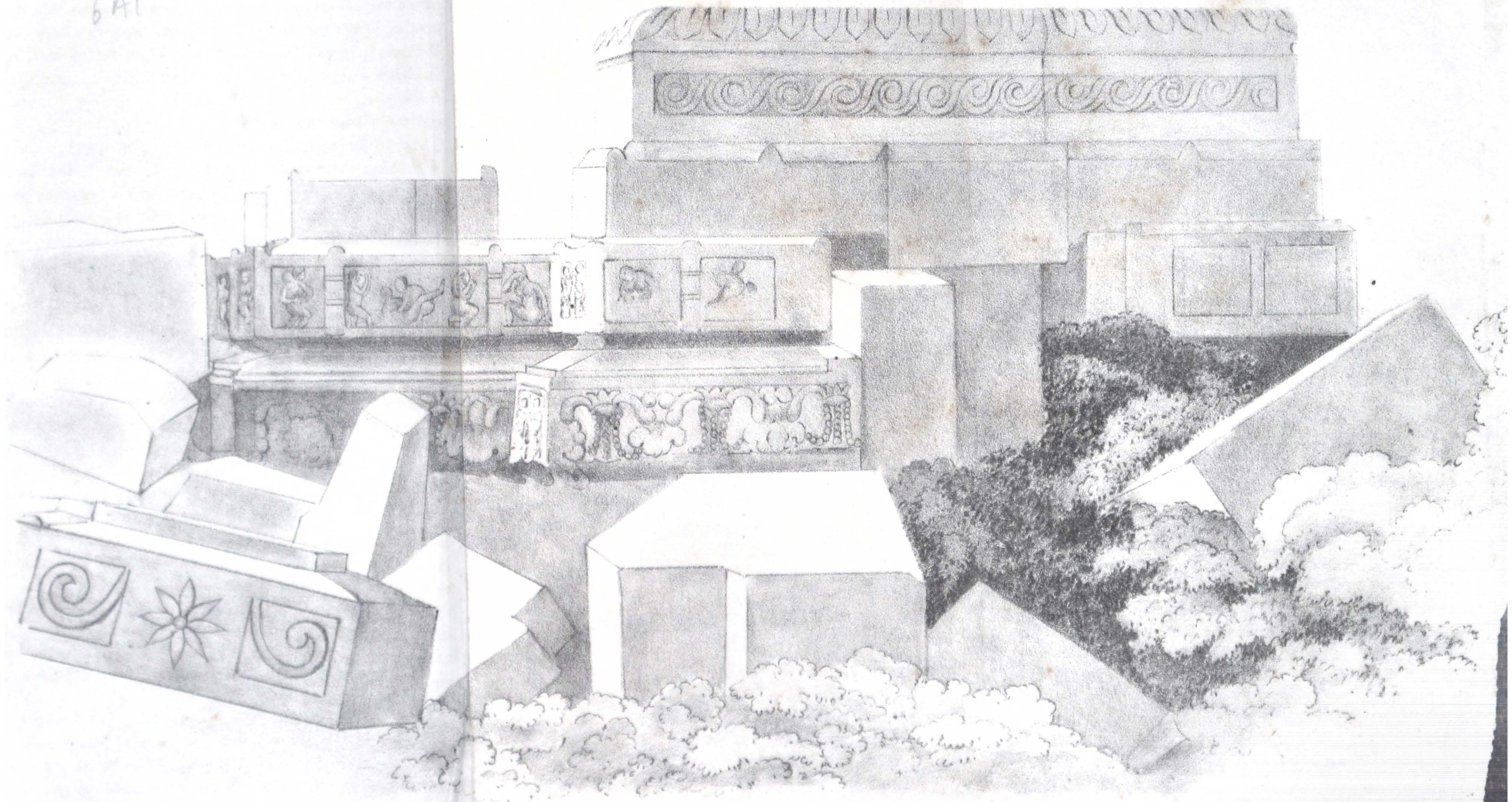


Fig 2





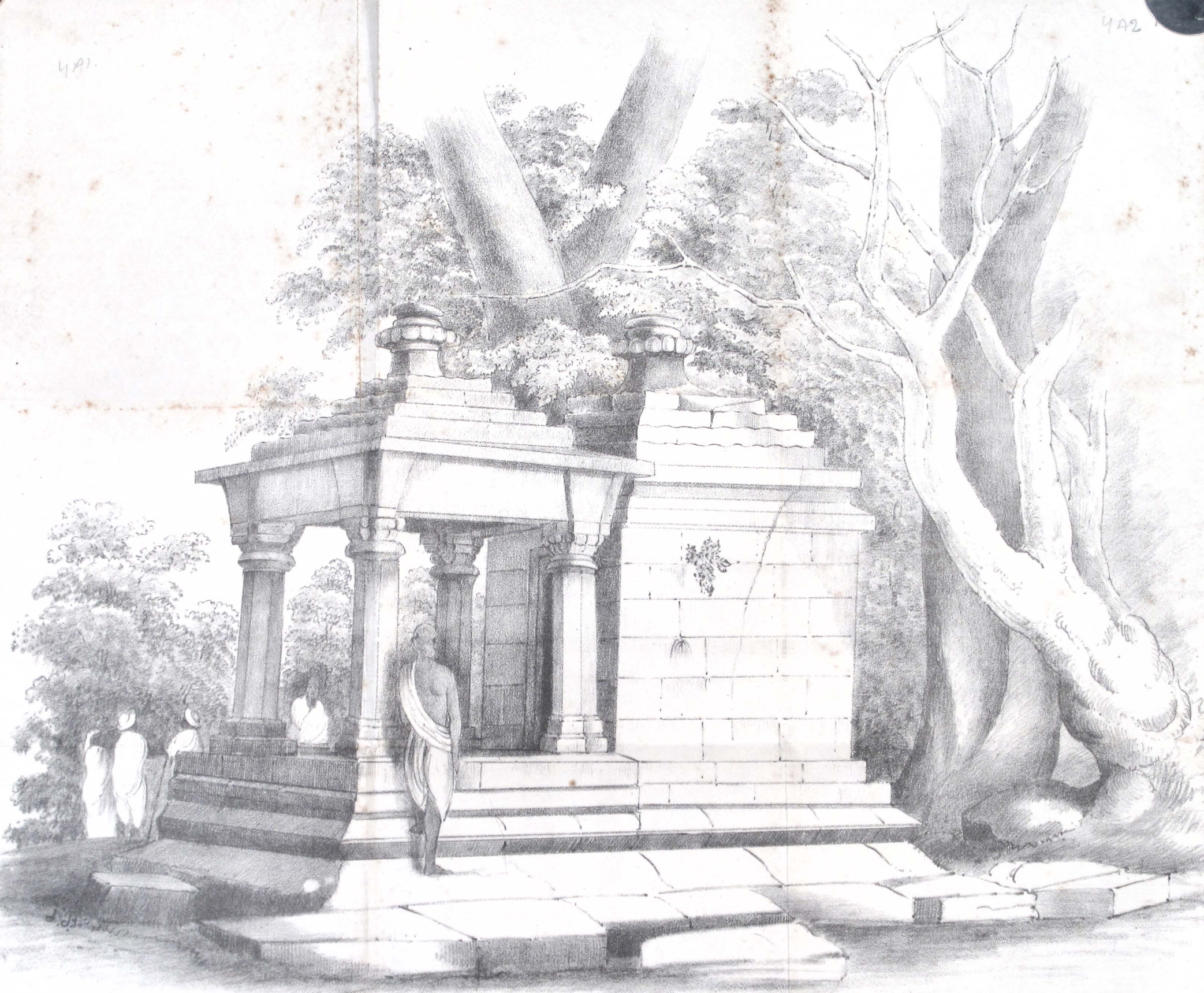
6A1





4A1

4A2



4B1

E. T. Dalton Delt.

CHOEGONG TEMPLE S. KAMROOP

T. Black, Asiatic Lith. Press, Calcutta.

4B2



some with uplifted hands in the attitudes of exhortation or benediction, are surely Buddhistical.

The third temple of this group, must have been on a larger scale than the other two. Its existence was previously unknown to my guides who had only told me of two, and, so dense was the jungle, it would have escaped my notice, had I not determined to cut through it and examine all the scarped portion of the hill. I soon saw that it was the principal temple of the group, and set to work to clear the jungle, so as to obtain an idea of its dimensions and form; but after this was effected, all the men I had with me were unable to move some vast slabs, used in the construction of the roofs, under which the more ornamental portions of the building and the altar and idol lay buried. The ruins did not cover a greater space than that occupied by the second temple, but the heap was higher, and the blocks, generally, twice the size of the fragments of the other two.

With great difficulty I managed to obtain such a view, as enabled me to sketch parts of a lintel and a pillar of a door-case, (plate X. fig. 4) the latter measured 6 feet 10 inches by one foot nine. Across the lintel, which was of sand-stone a ponderous architrave, of coarse granite, (measuring 11 feet 10 inches by 2 feet 8 inches and 1 foot 10 inches) had fallen and fractured it.

The pillars and pilasters used in this temple were about the same size as, and resembling exactly in form, those of the Singori temple.

The great proportion of these ruins are of sand-stone, of which, the first range of the neighbouring hills, for some miles, is chiefly composed; but there are also blocks of granite, of different degrees of fineness, and they must have been transported from a very great distance.

In point of execution, the carving of the sand-stone is equal to the Tezpore sculptures, but then, the latter are all of granite, and with the exception of the Durgahs, the granite blocks of the Seese temples are very rudely chiseled.

The carving of the sand-stone blocks of the first and second temple is very much mutilated and defaced; it is not so with the blocks you exhume of the third temple; they were doubtless in excellent

preservation, when the temple was destroyed, and having been soon covered by decayed vegetation, and perhaps undisturbed for centuries, the chiseling is as sharp and decided as if it were quite new.

Over the centre of the door was a well executed figure of Gunesh, in high relief, represented as seated on a platform under a portico. The other figures appear to be all Buddhist; and if so, is it not probable, that this was originally a Buddhist temple, subsequently dedicated to the Sakti worship?



*A Memoir on the Indian species of Shrews, by EDWARD BLYTH, Esq.*

As an incentive to the investigation of some of the most imperfectly known of Indian mammalia, and not the most inviting of groups to amateur students, we shall here endeavour to bring together, and to reduce or digest into intelligible form and order, the scattered materials available for a Monograph on the Indian Shrews. It may lead to the discovery of additional real species, and probably to the diminution of the number of present supposed species; besides conducing to the further elucidation of those at present known and recognised, and especially to a better knowledge of the extent of their geographical distributions.

In general, the Shrews of tropical and subtropical countries are distinguished by their comparatively large size, and slaty hue of every shade from pale grey to black, with rufous tips to the fur more or less developed, though in some scarcely noticeable;\* the ear-conch is conspicuously visible above the fur; the tail thick, tapering, and furnished with scattered long hairs, which certain species also exhibit upon the body; and the teeth are wholly white,† and of the following type of structure. The superior front-teeth or *quasi-incisors* (vide *J. A. S.* XX, 164), are large and strongly hooked, and much longer than their posterior spur; while

\* In at least some species, the rufous tips would appear to increase with age; and, to a considerable extent, the colour of these animals is darker, according to the increase of altitude inhabited by a species.

† While preparing this memoir, we discovered a remarkable exception in the instance of *Sorex melanodon*, n. s.