



Architectural Features

General temple layout:

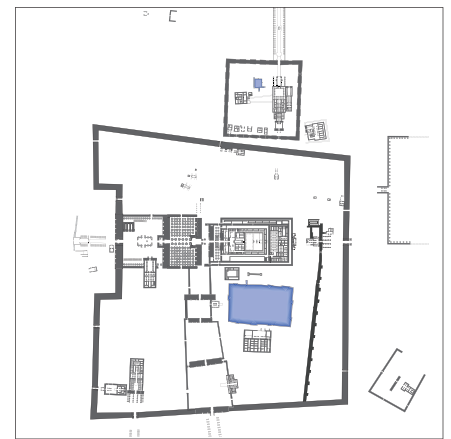
Many of the best preserved examples of Egyptian temples date to the New Kingdom (1550-1069 BCE), a period of national wealth and renewed interest in monumental building. Although each temple's layout is unique, these buildings show a remarkable unity of plan, demonstrating that Egyptian architects envisioned the temple as composed of a series of core parts. Temples built in subsequent periods were greatly influenced by this design, and they generally retain the basic plan developed in the late 18th Dynasty.¹ The basic layout of these temples consisted of the following features:

- entrance gateway or pylon
- open court
- columned/hypostyle hall
- rear sanctuary with side rooms
- naos (central shrine)

A priest, moving from the front rooms of the temple to the innermost sanctuary, would find that the floor level rose and the ceiling level lowered, creating a visible narrowing of space. As he approached the shrine, the diminishing light must have accentuated the feeling of privacy, as open courts gave way to partly lit halls and darkened interior cult rooms.²

Each temple combined these elements in distinct ways, differing due to location, the god to whom it was dedicated, and royal patronage. Some temples, like Karnak, became important show places for the king, expressed in continued building efforts. As a result, temples expanded significantly as multiple features, such as courts and halls, were appended onto the original structures. At Karnak, this sustained expansion and replacement has produced in a series of pylons and open courts along the western and southern entranceways of the Amun temple, as well as numerous columned halls before the sanctuary. The impetus for this continuous enlargement of the temple may have stemmed from both the king's desire to highlight his power and importance as the gods' greatest patron, as well as his wish to "extend the existing," enlarging and expanding what had been created by his ancestors.³

The orientation of Egyptian temples was influenced by a number of factors, with local topography greatly affecting the siting. Most of the temples in Thebes are situated perpendicular to the banks of the Nile, and this appears to have deter-



General overview of the Karnak temple precinct.



The pillared courtyard of the Ramesses III Temple.

1 Van Siclen 1986
 2 Badawy 1968
 3 Hornung 1992: 91; Shafer 1997: 6

mined the east/west axis of Karnak. However, the location of other temples in an area also often shaped a temple's orientation, and this is true at Karnak as well. The temple's north/south axis, following the line of the seventh to tenth pylons, gradually shifted to better align with the temple of Mut to the south. Luxor temple, the core section of which was constructed perpendicular to the river, had its northern courts and colonnade skewed slightly east, in order to more closely align with Karnak.⁴

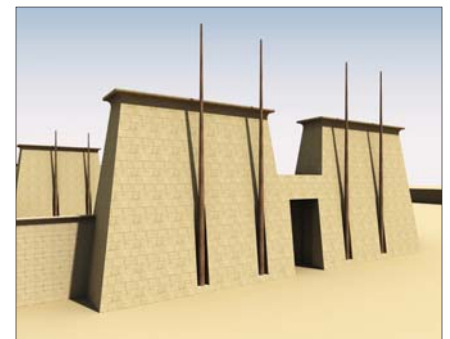
Architectural terms and definitions

Pylon

Pylons are large stone or brick entranceways to Egyptian temples or sacred areas formed by two trapezoidal towers split by a gateway, originally outfitted with a large wooden door.⁵ The towers are battered, rimmed with a torus molding, and topped with a cavetto cornice. Egyptian texts suggest that the pylons symbolically represented two mountains on the horizon, a symbol well known from the hieroglyphic script, between which the sun rose to start life anew each day.⁶ In its latest form, Karnak temple boasted ten monumental stone pylons, all arranged along the temple's east/west and north/south axis routes. Pylons, including those numbered seven and eight at Karnak, were frequently decorated with carved relief scenes depicting the pharaoh smiting foreign enemies or hunting wild animals, imagery that related the king to the maintenance of world order and control.⁷ Karnak's gigantic first pylon, measuring 113 meters wide at the base, was never completed. Forty-five courses of stone were added to its south wing, and 32 to its north wing before construction halted.⁸ The remains of mud brick ramps used for raising the stone blocks were left in place at the time of cessation, and remains of these ramps are still visible in the temple's first court today.

Flagstaff

Pylons at Egyptian temples were often adorned with large wooden flagstaffs topped by colorful cloth banners. The tall poles stood on stone bases, and were arranged within square notches left in the pylon's exterior masonry. Clamps secured to the pylon itself further stabilized their upper portions, holes for which are still visible today.⁹ While the wooden flagstaffs have long since disappeared, carved and painted scenes in Theban temples and tombs depict a number of these from Karnak,¹⁰ showing that they would have extended even above the giant pylon towers. Research at Karnak's ninth pylon shows that the base of one of its wooden poles measured over a meter wide.¹¹



Digital rendering of the reconstruction of Pylon X.



Pylon I with remnants of mud brick ramp in the Shoshenq I Court.

- 4 Badawy 1968
- 5 Arnold 2003
- 6 Badawy 1968
- 7 Arnold 2003
- 8 Legrain 1929
- 9 Arnold 2003
- 10 Azim and Traunecker 1982
- 11 Azim and Traunecker 1982

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Court

A court is a space that is open to the sky, enclosed by surrounding structures. In Egyptian temples, the court usually followed the entrance pylon or gateway, and fronted a columned hall. The court was the site of the few events accessible by the public that took place within the temple walls, as access to the inner sections of Egyptian temples was limited to the priests servicing the deities.¹²

Colonnade

Colonnades are formed by aligned columns, often supporting a roof.¹³ Colonnades front several building entrances in Thebes, including the porches of the temples of Khonsu and “Amun-Ra-who-hears-prayers” at Karnak and the area between the second pylon and hypostyle hall in Luxor temple. In addition, colonnades were used to create a partial roofed area along the walls of open courts, such as along the north and south sides of the first court at Karnak.

Bark shrine

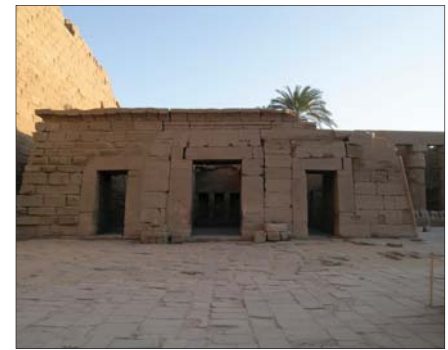
A bark shrine is a room or structure, usually including a stone platform or ledge, meant for the placement of the god’s portable bark (the sacred boat). These could be located within the core, central section of the temple (sometimes more specifically called the bark chamber), or along processional routes, sometimes outside the temple proper (sometimes more specifically called the bark station).¹⁴ Karnak temple was equipped with numerous examples of bark shrines, including the “white chapel” of Senusret I, the “red chapel” of Hatshepsut, the shrine of Philip Arrhidæus, a shrine of Thutmose III on the east side of the court of the eighth pylon near the sacred lake, and the chapel of Sety II in the temple’s first court.

Screen walls and frieze

Screen walls are low walls that serve to divide two spaces, as well as restrict the view of one area from another. When placed between pillars or columns, screen walls extend only part way up the height of the support. A frieze is a type of decorative band or border, carved or painted with a series of designs. Monumental screen walls are distinctive features of Greco-Roman Period temples, such as Dendera, Esna, and Edfu.¹⁵ However, they are found as early as the New Kingdom. An example from Karnak comes from inside the temple of Ramesses III in the first court. Here, the temple’s rear rooms are sectioned off from the open courtyard by a low screen wall bordered by a frieze of uraei (snakes linked iconographically with the royal house).



Reconstruction of the Taharqo Colonnade at the Ramesses II Eastern Temple.



Sety II shrine in the Shoshenq I Court. The building originally stood outside the western entrance of the temple.

- 12 Bell 1992; Shafer 1997
- 13 Ching, Jarzombek and Prakash 2007
- 14 Arnold 2003
- 15 Finnestad 1997

Hypostyle hall

A hypostyle hall is a flat-roofed room supported by a series of columns or pillars.¹⁶ In Egyptian temples, these columned halls usually stand perpendicular to the central axis line.¹⁷ The great hypostyle hall at Karnak is the largest in Egypt, and one of the largest examples in the world. Covering 5500 square meters,¹⁸ its side halls are supported by a series of 122 columns standing 12 meters (40 feet) high. These are bisected along the temple's east/west axis by a central nave, supported by an additional 12 columns rising 21 meters (70 feet) high.¹⁹ Light illuminates the hall via clerestory windows.

Clerestory lighting

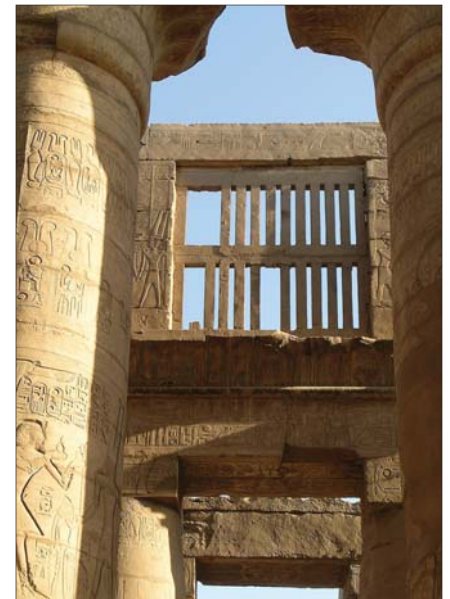
Lighting a room via clerestory windows is accomplished by raising one section of the roof higher than the neighboring sections, then lining the raised area with windows. This design allows light to enter along the sides of the elevated roof section. At Karnak, the great hypostyle hall is most famous for the clerestory lighting that illuminated the primary axis. Large stone grills, 24 meters (80 feet) above the hall's floor, allowed light to pierce the otherwise dark hall.²⁰ Other buildings, including the *Akhmenu* and the *Wadjet* hall constructed by Thutmose III utilized clerestory lighting to illuminate their interiors.²¹ In the New Kingdom, clerestory lighting was also commonly used to allow daylight inside houses.

Architrave

Architraves are a vital architectural component of many buildings, functioning as a lintel connecting the columns and pillars supporting a roof, or as an articulation surrounding doorframes, walls and other structural elements. At Karnak's hypostyle hall, the size of the architraves (the largest around seven meters in length) needed to support the huge stone roofing slabs (up to 9 meters in length) was so unwieldy that architects were forced to use multiple blocks of stone for each architrave.²² Although serving a functional purpose, the Egyptians frequently decorated these elements, and examples with carved and painted lines of text can be seen in both the great hypostyle hall and the *Akhmenu*.

Cavetto cornice

A cavetto cornice is a decorative ledge crowning the top of pylons, gateways, screen walls, and other structural parts of Egyptian buildings. The form harkens back to the appearance of walls constructed using palm fronds, a material used by early Egyptian builders; the cornice provided a deep shadow line to define architectural components.²³ At Karnak today, pylons nine and ten still retain portions of their original cavetto cornices, as do the southern and eastern monumental gateways through the temple enclosure wall.



A surviving clerestory window from the hypostyle hall.

- 16 Ching et al. 2007
- 17 Badawy 1968
- 18 Arnold 2003
- 19 Brand 2004
- 20 Brand 2004
- 21 Carlotti 2001; Personal communication, Emmanuel Laroze
- 22 Arnold 1991; Rondot 1997: 5
- 23 Arnold 2003

Torus molding

A torus molding is a type of rounded, decorative band used by Egyptian architects to frame architectural features such as pylons and gateways. It is often found in concert with the cavetto cornice.²⁴ The torus molding represents the poles of an enormous tent structure; the lashings, which tied these poles to matting forming the front of these light shrines, were carved in stone on the pylon corners. Such details harken back to the cult shrines of pre-dynastic Egypt. These moldings often were accented with painted patterns mimicking the lines of the natural construction materials like reeds used in Egypt's early history.²⁵

Talatat blocks

In the reign of king Amenhotep IV/Akhenaten, Egyptian builders began using a new size of stone block, measuring approximately 52x26x24 cm,²⁶ about 1x1/2x1/2 Egyptian cubits, significantly smaller than the traditional form of stone building materials. The small size of this block allowed for easy movement of the stones, facilitating the rapid construction of new buildings demanded by that king's religious innovations.²⁷ At Karnak, four new structures were erected by Akhenaten, one of which, the *Gem-pa-Aten*, has been located east of the present Amun precinct. All of the structures were later torn down by kings rejecting the religious changes of Akhenaten, and tens of thousands of talatat blocks have been found in modern times within the foundations and cores of later constructions, including the second, ninth, and tenth pylons.²⁸

Sacred lake

Many Egyptian temple precincts included a lake, often artificial, with built steps to reach the water where a variety of practical and cultic activities took place. Water related activities not only included purification of the priests and the temple, but could have other functions as well. At the Amun temple, a building located directly to the south of the lake seems to have held sacred geese that spent their days floating on the lake's surface.²⁹ At south Karnak, a horse-shoe shaped sacred lake, probably the remnant of an ancient branch of the Nile, partly encircled the temple of the goddess Mut. A New Kingdom tomb painting shows the sailing of sacred barks on its waters.³⁰

Catacomb

Catacombs are galleries of subterranean rooms and niches designed for the interment of humans or animals.³¹ A recently re-investigated part of the Karnak complex devoted to the god Osiris has allowed the reconstruction of one such structure. It consisted of a series of three galleries, each with a vaulted ceiling, containing hundreds of small niches along the walls. Instead of holding animal remains however, these openings were for the placement of small figures of Osiris.³²



A general view showing the Sacred Lake with Pylon VIII and Pylon IX in the distance.

- 24 Arnold 1991
- 25 Arnold 2003
- 26 Redford 1984
- 27 Arnold 2003
- 28 Redford 1984
- 29 Lauffray 1979
- 30 Cabrol 1995
- 31 Ching et al. 2007
- 32 Coulon, Le Clère and Marchand 1995; Leclère 1996

Obelisk

Egyptian obelisks were standing stone monoliths, carved with four flat sides that slightly tapered upward from the base. They culminated in a pyramid-shaped tip called a “pyramidion” (Greek for “small pyramid”) sometimes gilded to reflect the sun’s rays. Obelisks were generally erected in pairs, although a “single” obelisk is known from the eastern section of Karnak temple. Scholars usually trace the origin of their form to the *benben* stone, a stone with a pointed tip linked to the mound of creation in Egyptian mythology, in which the first land rising above the primordial waters was touched by the light of the sun.³³

Peristyle court

A series of columns or pillars encircling a court creates a peristyle.³⁴ At Karnak, king Thutmose IV erected a series of beautifully carved and painted square pillars ringing the festival hall of king Thutmose II. This was subsequently removed by his son Amenhotep III, but part of the building has been reconstructed today in the temple’s Open Air museum.

Sanctuary

The sanctuary consists of the inner-most section of rooms within the Egyptian temple. Typically, it was the darkest and highest part of the temple proper, as the floor and ceiling of the temple sloped in as one progressed inward. It was here that the statue of the god would be kept secure within the naos and attended by the priests during multiple daily ceremonies. In some temples, a bark chapel was included in the rooms of the sanctuary to accommodate the boat of the god when his or her statue was placed within for festival processions.³⁵

Naos (cella, shrine)

The statues of Egyptian gods were protected not only within the temple’s walls, but also within a small, rectangular shrine called the naos. This structure, usually located in the innermost room of the temple’s core, was equipped with doors to guard the god from interaction with the profane.³⁶

Columns

Egyptian architecture included a variety of different column forms. Important types and associated architectural elements found at Karnak include:

Open papyrus form column

This type of column echoes the form of a papyrus plant with an open flower. The most impressive examples from Karnak stand in the great hypostyle hall. These



The only two standing obelisks at Karnak today. The left one belongs to Thutmose I and the right one to Hatshepsut.

33 Habachi and Van Siclen 1977

34 Ching et al. 2007

35 Badawy 1968

36 Arnold 2003

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have circular shafts with a slight ridging in imitation of the triangular shape of the actual plant's stem.³⁷ The inverted bell-shaped capital is adorned with colorfully painted leaf designs representing the petals of the papyrus.

Abacus

The stone support that stands directly atop the shaft (and capital) of a column is the abacus.³⁸ These are usually simple, undecorated squares, but a number of examples at Karnak include pictorial or textual decoration.

Shaft

The shaft is the body of the column. In Egyptian structures, these are often highly decorated, with inscribed and painted text and imagery. While the ancient Greeks often designed their column shafts with a slight convexity to correct for the optical illusion straight shafts gave of concavity,³⁹ the Egyptians preferred straight shafts.⁴⁰

Plinth/base

The stone support that stands directly beneath the shaft of a column is the plinth or base.⁴¹

Pillar

Pillars are square, rectangular, or octagon-shaped supports, and serve the same function as rounded or fluted columns.⁴² In Egyptian architecture, colossal royal statues are often carved directly from the stone blocks of the pillar, half of which still forms the backing of the statue and roof support. In the court of the temple of Ramesses III at Karnak, one can still see preserved examples of this type of royal statue pillar.

Fluted/fasciculated column

Fluted columns have shafts decorated with a series of 16 or more facets or sides. Examples with vertical bands of inscription running down one or more sides of the column are known. While sometimes referred to a "proto-Doric," these columns are not related to the development of the fluted Greek column.⁴³ Examples from Karnak occur in the *Akhmenu* festival hall of Thutmose III, the temple of Ptah, and the *Wadjet* festival hall of Thutmose I.

Tent-pole form column

These columns, a form only rarely preserved from ancient Egypt, mimic in stone the wooden poles used to support lightweight tents or reed shelters. The king



An open papyrus column with abacus on top. The column is the only example from the Taharqo kiosk standing to its full height today.

- 37 Brand 2004
- 38 Ching et al. 2007
- 39 Ching et al. 2007
- 40 Arnold 2003
- 41 Ching et al. 2007
- 42 Arnold 2003
- 43 Arnold 2003

and his entourage seemingly carried such portable structures when on military campaign. The poles may have served to hold up *sed*-festival kiosks as well. Widening as they rise, the column shafts culminating in a “bell-shaped” top. Beautiful stone examples of these columns with polychrome paint adorn the interior hall of the *Akhmenu* festival hall at Karnak. These may have been selected to evoke the many military successes of Thutmose III.⁴⁴

closed papyrus form column

This type of column depicts the papyrus plant with a closed umbel (*Cyperus papyrus*). Examples in the “botanical room” at the *Akhmenu* at Karnak have shafts designed as bundles of multiple plant stems (with slight bulging at the base) and representations of closed papyrus flowers as capitals. Those in the great hypostyle hall are more stylized, with straight shafts and slightly angled capitals. Their bases were originally decorated with triangular representations of papyrus leaves.⁴⁵

Hathor-headed composite column

Composite columns, commonly found in Greco-Roman period temples, have capitals adorned with a combination of a number of types of plant forms and other elements.⁴⁶ At the Opet temple in Karnak, these elaborate floral capitals are topped with an abacus decorated with the image of the goddess Hathor carved on its four sides.

Temple decoration and landscaping

Decoration

Egyptian architects capitalized on the many varieties of colored and patterned stone available for the construction and decoration of their temples. While walls and roofing were usually built from white or golden-hued blocks of limestone and sandstone, these were set off by the use of red granite, red quartzite, grey/black granite, and veined calcite (“Egyptian alabaster”) in the decorative features like obelisks, door frames, and shrines that adorned Karnak temple. Remains of plastered and painted stone reliefs show that many surfaces (including walls, architraves, columns, and ceilings) were also further embellished with vibrant red, yellow, blue, green and black painted figurative scenes and hieroglyphic texts. At Karnak, some of the brilliant colors are still visible today in the *Akhmenu* festival hall of Thutmose III. In other cases, paint was only applied as an accent, highlighting the hieroglyphs carved into a stone doorframe or obelisk, leaving the majority of stone bare to create a pleasing visual contrast.



Closed papyrus form columns from the Akhmenu’s “botanical room.” On the right are an example of fluted/fasciculated columns.



Decoration on the Philip Arrhidaeus shrine.

44 Arnold 2003; Badawy 1968

45 Brand 2007

46 Arnold 2003

Gilding, the covering of surfaces with metal plating, also distinguished certain special elements of the temple. A number of the pyramidions of Karnak's obelisks were originally capped with gold or electrum sheets that no doubt splendidly reflected the rays of the sun.⁴⁷ An inscription found at Karnak mentions that the pine columns of Hatshepsut in the *Wadjet* hall had been gilded.⁴⁸ Large wooden doors that originally would have controlled passage through the pylon gateways were also decorated with gilding, usually of copper or bronze, but sometimes even of silver, gold, or electrum.⁴⁹

The relief scenes carved into temple walls, architraves, columns, and other architectural features were executed in two different styles. The first, low (or *bas*) relief, involved the artist cutting back the stone around a drawn figure or hieroglyphic sign. Once the background was removed, the figure or letter itself (now slightly raised up from the flat background) could be modeled in more detail. In the second technique, sunk relief, artists instead left the background flat and removed stone from within the outline of the figure or letter. The sunken figure or sign could then also be modeled in further detail. When carried out with skill, both styles resulted in walls covered with beautiful scenes and texts with subtle details.

Landscaping

Unfortunately, little is known about the original appearance of the grounds around the Karnak precinct. A tomb on Thebes' west bank (TT 49 of Neferhotep) offers a rare clue. A painted scene on the tomb's wall depicts what was probably the western entrance into the Amun temple of the late 18th Dynasty. In front of the pylon and lining the T-shaped basin and canal west of the temple entrance are four rows of neatly arranged trees. More groups of leafy green trees are shown behind the pylon, possibly some of which are to be understood as within the temple's enclosure wall. Two fruit trees and bunches of papyrus edge the scene along the Nile canal. The basin itself is filled with water lilies.⁵⁰

A few other tomb scenes also include representations of what may have been the gardens at Karnak. These depict vineyards, date palm and sycamore trees, and small pools. Inscriptions and relief scenes from other contexts refer to gardens around the temple of "Amun-Ra-who-hears-prayers" in the eastern section of the precinct, as well as a "northern" and "southern" lake at the temple (in addition to the main sacred lake of Thutmose III).⁵¹

While the remains of temple gardens have not been discovered at Karnak, it is clear that these areas were an important feature of most temples. A temple's gardens supplied the flower bouquets, tree and plant products (such as fruit, oils, scented woods or incense), and fowl (usually geese or ducks) presented to



Battle relief from the exterior of the hypostyle hall showing the use of sunk relief.

- 47 Bell 2002: 22; Habachi and Van Siclen 1977: 60-62
- 48 Larché and Grimal 2003: 16-17
- 49 Arnold 2003: 183; Golvin and Goyon 1987: 60
- 50 Davies 1933a: pl. XLI-XLII, 1933b: pl. III and IV
- 51 Wilkinson, A. 1998: 130-141

the god as offerings.⁵² A number of prominent Thebans held titles associated with the gardens of the temple of Amun, including Sennefer, the “overseer of the gardens of Amun” in the reign of Hatshepsut (TT96), and Nakht, the “gardener of the offerings of Amun” in the late 18th Dynasty (TT161).⁵³ An inscription in Sennefer’s tomb explains that his duties included bringing “... flowers, and ... all kinds of plants from among the finest of the orchard which his Majesty has made anew for his Father Amun-Ra.”⁵⁴

The ritual roads linking Karnak with the other west bank temples of Thebes were also adorned with foliage. Excavations of the sphinx-lined pathway between Karnak and Luxor have uncovered brick planters between each sphinx plinth where trees were planted along the route.⁵⁵ An inscription of Nectanebo I, the sponsor of the sphinx road, explains that the king “Built a beautiful road for his father Amun, bordered by walls, planted with trees and decorated with flowers.”⁵⁶

Changing styles of temple architecture

The enduring characteristics of Egyptian art and architecture over long periods of time have tended to minimize evolving changes in form and ornament. However, temple architecture altered substantially from the beginning of the 18th Dynasty through the Greco-Roman Period, with new ground plans, column types, and decorative schemes developing as earlier forms lost their popularity.

Early 18th Dynasty

Early 18th Dynasty architecture, usually called “Thutmoside” after the dominant family line of the time, differed significantly from the temple architecture of king Amenhotep III and after. During the Thutmoside period, cult temples were often small, simple structures with a set of rooms to hold and worship the statue of the god. The temples did not display the multiplicity of relief scenes and inscribed texts that seem to have covered the later New Kingdom temples; on the contrary, they were usually only minimally decorated.⁵⁷ Fluted/fasciculated columns often adorned interior spaces. The typical free-standing cult temple of the early 18th Dynasty can be imagined as a square or rectangular structure, fronted by a portico or with a peripteral (on all sides) configuration of square pillars. Inside some examples, a single roomed bark chapel stood, ready to receive the bark of the god. Within the small sanctuary area, the shrine of the god was placed along the temple’s central axis. An excellent illustration of this type comes from the Hatshepsut/Thutmose III “small temple” at Medinet Habu in Thebes.⁵⁸ At Karnak, some of these traits can be identified in the bark chapel of Thutmose III near the sacred lake and the “edifice of Amenhotep II,” moved and rebuilt by Horemheb.⁵⁹ The simplicity of the Thutmoside temples is well represented at the temple of Ptah to the north of the Amun temple, also originally constructed by Thutmose III.



The sphinx alleyway leading to the Mut temple precinct.



Ruins of the Ptah temple.

52 Wilkinson, A. 1998: 123-124, 130-136

53 Wilkinson, A. 1998: 130-136

54 Wilkinson, A. 1998: 130

55 Es-Saghir 1992

56 Wilkinson, A. 1998: 135

57 Van Siclen 1986

58 Badawy 1968

59 Van Siclen 2005. Although this structure was moved from its original location south of the VIIIth pylon to the court of the Xth pylon by Horemheb or Sety I, Van Siclen’s investigations of the monument suggest to him that it originally would have looked quite similar.

Mid-18th Dynasty

In the reign of Amenhotep III, the temple began to develop into the form we now identify as the “typical” New Kingdom style, with the elaborate series of columned halls, open courts, and colonnades. This style was utilized for the design of the king’s funerary temple, as well as cult temples dedicated to specific deities.⁶⁰ The square pillar, although still utilized in conjunction with standing statues, often gave way to the increasingly common column with a rounded or plant-stem shaft.⁶¹

Dynasty 20

While basic temple forms and layout were maintained in the new constructions at the end of the New Kingdom, Ramesside buildings often showed a narrowing of space within temple interiors. Courtyards were now hemmed in by rows of squat columns, whose diameter to height proportions usually measured 1:4 or 1:5, instead of the slimmer columns typical of other periods. This change, and the increasing narrowness of the other parts of the temple, meant that the late New Kingdom structures lacked the feeling of verticality and openness of their 18th and 19th Dynasty forerunners.⁶² Both the temple of Ramesses III in the first court and the Khonsu temple at Karnak display this tendency.

25th Dynasty

With the advent of the 25th Dynasty, a number of important architectural features rose to prominence at temples built or added to by the Kushite kings. Although these forms often have precedents in the mid to late New Kingdom, they were changed and adapted to create new structures that characterize temples of the Late and Greco-Roman Periods.⁶³

The first example, the entrance porch, stood directly against the front façade of the temple. It was formed of two or four rows of columns, roofed, and connected by low screen walls running along the temple axis. These porches appear to have been a shaded location for the interaction of the local administration and priesthood with the populace – who petitioned there for advice, oracles from the god, or legal justice.⁶⁴ Karnak has a number of good examples of these structures, as Taharqo added entrance porches to the front of the Khonsu temple, the eastern Temple of Ramesses II, the Montu temple and the temple of Mut outside of the Amun precinct (the last two sites had their porches later replaced by similar structures under the Ptolemies).⁶⁵

Another innovation of this period was the freestanding kiosk. These kiosks consisted of a rectangular line of columns, sometimes covered, and frequently joined by low screen walls. The structures were placed on the direct axis of the temple



Squat columns in the Ramesses III temple.



A reconstruction of the Taharqo kiosk.

60 Wilkinson, R. 2000

61 Arnold 1999: 282-285

62 Arnold 1999: 27, 49

63 Arnold 1999: 44

64 Arnold 1999: 282-284

65 Arnold 1999: 57-58; Fazzini 1999

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or festival procession route. A kiosk's main entrance door was usually covered with a broken lintel, while secondary entrances merely pierced the screen walls. These freestanding buildings functioned to hold the statue or bark of the god for specific cult rituals. Examples are known from many temple sites in Nubia, and Taharqo built a magnificent one at Karnak, located in the central part of the first court. It had two rows of five giant papyrus columns, topped with a square abacus.⁶⁶ While only one of its complete columns still stands today, the model reconstruction shows the great visual impact the original structure would have had on the entrance to the temple.

Greco-Roman Period

Invasion and threat from outside the country's borders marred the stability of Dynasties 26 through 30, the Egyptian Late Period. Despite these uncertainties, the rulers of this period often maintained the tradition of temple building and decoration, especially in the area of the Nile Delta. While the rulers of Egypt in the Greco-Roman Period may have come from Mediterranean religious traditions, they too actively supported the worship of many Egyptian gods. The Ptolemaic and Roman rulers built new temples and restored venerable cults throughout the nation. Their contributions were steeped in the religious traditions Egypt's glorious past, but they also showed much innovation in temple architecture and decoration.⁶⁷

The Late and Greco-Roman Periods witnessed a number of striking developments in Egyptian temple architecture. The most remarkable of these was the transformation of the temple's façade, first seen in the 26th Dynasty. The main entrance to the temple, reached after entering through a pylon or gateway and moving through a court, had been designed as a pylon or solid wall in the New Kingdom and Third Intermediate Period. A new form to this entrance, originating in the Late Period and flourishing in the Ptolemaic and Roman Periods, was designed with a series of monumental columns, flanked by screen walls rising up to usually half the column's height. This entrance fronted a columned hall, and the combined form is called a *pronaos*.⁶⁸ Excellent examples of this new form can be seen at the temples of Dendera, Esna, and Edfu.

Column forms significantly evolved in the Ptolemaic and Roman Periods, with those adorned with images of Hathor becoming more common as cults to female deities like Isis, Opet, and Hathor grew in number and importance.⁶⁹ Starting from the 30th Dynasty, and increasing in popularity in the Greek and Roman temples, column capitals within a single building could vary greatly. The Egyptian sense of order that necessitated almost total symmetry and uniformity within a structure was broken down, and instead variation ruled – albeit within certain limits.⁷⁰



The Bab el-Amara gate south of the Khonsu temple. This gate was built by Ptolemy III.

- 66 Arnold 1999: 51
- 67 Arnold 1999: 64, 93-94; Finnestad 1997
- 68 Arnold 1999: 277-282, 306
- 69 Arnold 1999: 309
- 70 Arnold 1999: 149

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Architectural Features

Other new architectural features of these periods included roof chapels, where the statue of the god would be brought to experience the rays of the sun in special ceremonies of the New Year's festival, and subterranean crypts, small rooms hidden within the walls or floor, usually for the storage of sacred implements.⁷¹ The temple of Opet at Karnak possessed a crypt running down through the temple's platform to below ground level.⁷² This appears to have served a special purpose – to link the temple with the primeval waters of creation (*Nun*) flowing beneath the earth's surface.

'Birth houses,' temples that celebrated the birth of the child god in a divine trio, also became common within the cult precinct. The Opet temple is an example of this type of structure, dating to the Ptolemaic Period. Earlier examples from the late New Kingdom and 29th Dynasties can be found at the precinct of Mut at south Karnak and the precinct of Montu at north Karnak.⁷³

Conclusion

Similar to the country's art, ancient Egyptian architecture showed a great deal of conservatism, with tradition playing a large role in the constructions of each age. However, architectural styles experienced many phases of innovation and change, with new forms emerging and old forms disappearing or undergoing modification in imaginative ways. The Egyptians found inspiration in the land around them, emulating the natural world and modest architectural forms in monumental structures. Although it had a great sense of continuity and cohesiveness, the architecture of each period showed its own creativity and style.



A general view looking westward.

71 Finnestad 1997
72 Arnold 1999: fig. 110
73 Arnold 1999: 285-288

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