MESOPOTAMIAN ARCHITECTURE
“The land between two rivers”

(Gk mesos = middle + potamos = river)

The Two (2) Rivers:
1. Euphrates
2. Tigris

- The river comprises the land of Sumer, Akkad and occupied successively by the Sumerians, Babylonians, Assyrians and Persians.

- The world’s oldest civilization, Mesopotamia, was built by the Sumerians on the fertile land between the rivers Tigris and Euphrates, 5000 years ago.

- The Sumerians invented cuneiform characters, and built city states. This is the ancient city of Ur, built around 2000 BC, by Ur Nammu, the founder of the third Ur dynasty.

Cuneiform - the oldest writing known to mankind; An ancient wedge-shaped script used in Mesopotamia and Persia

Ur - An ancient city of Sumer located on a former channel of the Euphrates River (Birthplace of Abraham)

- Literally means very “old”
- The cult center of Nannar/Sin (moon gods).

The Ziggurat of Ur (c. 2100 BCE)
- E. KISH. NU GAL (“House of Thirty, The Great Seed”)
- Dedicated to Nannar/Sin
  - Already very old, remodeled by Ur-Nammu (The Joy of Ur), first ruler of Dynasty III.

FERTEILE CRESENT
An agricultural region arching from the Eastern shores of the Mediterranean Sea in the west to Iraq and in: the location of humankind’s earliest cultures.

A. Massive architecture
- Mud brick construction set with clay mortar
- Heavy walls articulated by pilasters and recesses and faced with glazed bricks
- Columns were rare
- Small and infrequent windows
B. Actuated architecture system
   • Doorways were spanned by double semi circular arches.

C. Buildings were designed for both internal and external effects.

D. Roofs were burnt brick vault.

E. Mouldings were rare.

F. Temples:
   • Principal Building type
   • Tripartite Plan
      o The standard and basic layout of Mesopotamian cult structures.
      o Originally employed in ziggurats of Sumer

MESOPOTAMIAN ART AND ARCHITECTURE

Mesopotamian art and architecture were produced by the diverse peoples who occupied the land between the Tigris and Euphrates rivers from about 3500 to 539 BC. The earliest civilization of MESOPOTAMIA was created by Sumerian-speaking people, and although their Sumerian language was preserved, the original inhabitants eventually either died out or were absorbed into the population of SEMITES who moved into this area at various periods in history.

Elaboration of irrigation technology and cultivation of the date palm and barley made possible the growth of cities in the south. With changing patterns of land use and cultivation, the center of Mesopotamian civilization moved slowly north from Sumer in southernmost Babylonia to Akkad in northern Babylonia and finally to Assyria in the far north.

Sumer - An ancient region in southern Mesopotamia, where a number of independent cities and city-states were established as early as 6000 BCE.

Major cities and archaeological sites:
   o Eridu
   o Uruk
   o Ur
   o Lagash
   o Kish
   o Nippur

The land was the first known and fully documented civilization sprang up after the Deluge

As did the architecture, Mesopotamian art had two major preoccupations—man’s relationship to the gods and conflict on either a real or mythological plane. Although art was primarily created for temple or king, a number of small objects were also produced, such as cylinder seals and clay plaques with mythological scenes. These objects were probably owned to a great extent by the population at large.

Early Mesopotamian art was usually small in scale, because the south was poor in natural resources, and materials like stone and metals had to be imported. Later, Assyrian palaces were decorated with large stone-relief sculptures and immense gate guardian figures of animal or monstrous form.
PROTOTERP PERIOD (c.3500–2900 BC) The first period of Mesopotamian civilization is the Protoliterate. This phase is most clearly seen at the southern city of URUK and indeed may have arisen there. However, Uruk’s architecture is based on earlier forms at ERIDU, and during the Protoliterate period several southern cities—and even some cities in northern Mesopotamia and Syria—shared cultural traits with Uruk. Although there is little historical evidence, this cultural network was probably based on trade.

FIRST PRE-DELUVIAL SETTLEMENTS/CITIES
1. E.RI.DU (House in a Faraway Built)
2. BAD.TIBIRA (Bright Place Where the Ores are Made Final)
3. LA.RA.AK (Seeing the Bright Glow)
4. SIPPAR (Bird City)
5. SHU.RUP.PAK (The Place of the Utmost Being)

Uruk is the largest Sumerian cities.

- More than 9 km (6 miles) perimeter
- Archaeological findings
  - First colored pottery baked in a kiln.
  - Evidence of the first use of potter’s wheel.
  - Oldest limestone pavement construction.
  - First inscribed texts.
  - First cylinder seals.
  - Other sites bear evidence of the emergence of the metal age.

First ziggurat, on the top of which stood a white temple and red temple.

Southern Mesopotamian cities were built around temples, and the main temple in each city was dedicated to the chief god or goddess of that city. The White Temple on the Anu Ziggurat at Uruk is a characteristic example of Protoliterate temple architecture. The whitewashed outer walls of this small rectangular mudbrick structure are formed into the niches and buttresses that are a typical feature of all Mesopotamian temples. The temple stands on a ZIGGURAT, a tall artificial mountain formed from the remains of temples built and rebuilt on this site for centuries.

The Protoliterate art at Uruk, largely religious in theme, exists principally in the form of temple furnishings. Typical objects of the period include the so-called cult vase of Uruk, a 1-m-high (3-ft) alabaster vessel decorated with scenes of offerings brought to the temple (Iraq Museum, Baghdad) and a beautiful stone head, 22 cm high (8.6 in.), of a woman perhaps representing the fertility goddess Inanna (Iraq Museum). This image had probably been set into a temple wall as part of a cult relief made of various materials. The face is softly and realistically modeled; the white stone must have looked like flesh when surrounded by its original colorful inlays for the eyes, eyebrows, and headdress.

EARLY DYNASTIC PERIOD (c.2900–2370 BC) During the Early Dynastic period, independent city-states flourished in southern Mesopotamia, in MARI on the middle Euphrates River, and as far north as the city of Assur, as well as the Syrian city known today as Tell Khuera. The southern cities were the Sumerian heartland, while Semitic-speaking peoples inhabited the northern city-states. Trade networks united these distant places, and toward the end of the period kings began to conquer and rule over several city-states.
POST DELUVIAL CITIES
ERIDU

- 3 principal temples
  1. The E.EN.GUR.RA
     o Also known as the Temple of Anu.
       - No less than 18 strata or district phases were discovered.
       - Cones of baked clay were set in mud plaster over many of the wall faces.
       - Traditions maintained that the Great Gods (Anunnakis) themselves "had fashioned its parts."
       - Built by the Annunakis for the celestial visit and for the honor of Anu.
  2. The BIT-RESH ("Main Temple"), also a stage tower.
  3. The IRIGAL temple dedicated to In.Anna/Ishtar.

A high pyramidal staged tower, of which the angles were oriented to cardinal points, which formed an important element in ancient Mesopotamian temple complexes. The number of stage rises from one to seven.

The E.ANNA
(House of Anu) Ziggurat the White Temple (4000 BCE)
- Believed to be the predecessor of the ziggurat.

ZIGGURAT

A high pyramidal staged tower, of which the angles were oriented to cardinal points, which formed an important element in ancient Mesopotamian temple complexes. The number of stage rises from one to seven.

The E.ANNA
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Architecture

In the flourishing cities of this period, temples were numerous. The exact form might vary because of local traditions and the particular shape of the site, but most temples had a rectangular CELLA (the inner sacred chamber), with some sort of indirect access to the statue of the god that stood within it. For large and important temples of this period, an unusual form appeared which has so far been discovered at three cities—LAGASH, Khafaje, and Al 'Ubaid. This was the temple oval, an immense oval platform on which a temple was constructed, with a second outer oval wall surrounding the entire temple complex. Large palaces have been excavated at KISH and Mari, evidence of the rising power of local city rulers during the Early Dynastic period. Similarly, the city walls of Uruk testify to the growing need to fortify cities in this period of increasing warfare.

The Palace of Sargon (Shuru-kin), Khorsabad
- The citadel:
  - Covered 23 acres
- Three main parts:
  - A group of 3 large and 3 small temples on the left.
  - Administrative offices and service quarters on the right.
  - Private and residential apartments and state chambers behind.
- The main portal:
  - Flanked by great towers
  - Guarded by LAMASSUS
  - Approached from a broad ramp

The Ziggurat of Khorsabad
- 7 stages
- Square in volume
  - 45 m (148 ft) both in height and base
- Ascended by winding ramp
  - 1.80 m (6 ft) wide

The kings of Ur continued to express a similar tone in their attitudes toward the gods. Much architecture of the city of Ur during the Neo-Sumerian period has been excavated, and it is apparent that although these rulers had great political power, their architectural efforts were largely devoted to religious expression.

At the center of Ur was the religious precinct, which contained a large and elaborate ziggurat to the moon god Nannar (the chief deity of Ur), a smaller temple to Nannar's wife, and a still smaller royal palace. The ziggurat of Nannar was built in stages and was faced with a niched surface of baked...
brick. A temple to the god, which could be reached by three ramps, was placed atop the ziggurat. A smaller temple was located at the ziggurat’s base. Other such ziggurats were built in many cities throughout the empire.

A characteristic form of temple used during this period was the so-called broad cella—a broad and shallow room approached through a series of entrance halls and courts. In this temple the statue of the god, or in some cases the deified ruler, could be glimpsed from afar. The statue was kept separate from the worshiper not by the layout of the temple as in earlier times, but by the many axially arranged spaces that separated the worshiper from his god.

Compared to the architectural remains, Neo-Sumerian art is scarce. Those pieces which have been preserved are religious and conservative, yet exquisitely crafted, as is the art of Gudea. The designs of cylinder seals are rigidly composed, with a similar preponderance of religious themes.

**ISIN-LARSA AND OLD BABYLONIAN PERIODS** (c.2006-c.1600 BC) In 2000 BC the rulers of Ur fell before invading AMORITES, a new wave of Semitic-speaking people who eventually were absorbed into the city-states of Babylonia. From then on, Semitic languages were to dominate Mesopotamian life. Early in the 2d millennium BC a number of independent city-states flourished, but an empire of small proportions was formed by King HAMMURABI of Babylon in the 18th century BC and was maintained by his successors.

The architectural evidence of these two periods is not very extensive. Nothing is known of Babylon at this time, and the most impressive building yet excavated is the palace at Mari, a powerful trading center before it fell (c.1760 BC) to Hammurabi.

The vast palace, with its complex ground plan, was an administrative, political, and religious center for the ruler of the city-state. Large wall paintings here of human figures and mythological animals are rare examples of the monumental art of this period.

The best-known piece of art of the Old Babylonian period is the stone stele inscribed with the law code of Hammurabi (Louvre, Paris). At the top of this 2.3-m-high (90.5-in) stele Hammurabi is shown worshiping Shamash, the god of justice, who handed down the laws (inscribed beneath this relief sculpture) to the king who would enforce them.

The images of the pious king and the powerful god are based on Neo-Sumerian prototypes, and the use of a picture to explain and justify the written law illustrates the close interrelationship between art and writing in ancient Mesopotamia. Cylinder seals of these periods show much the same themes as in the Neo-Sumerian period.

**NEO-ASSYRIAN PERIOD** (c.1000-612 BC) little outstanding art or architecture was produced during the Middle Babylonian and Middle Assyrian periods of the second half of the 2d millennium BC. However, the succeeding Assyrian Empire, formed in the first half of the 1st millennium BC, became the most extensive Mesopotamian kingdom, and its material culture represents the crowning glory of Mesopotamian art and architecture.

Warfare and trade were the two main concerns of Assyrian kings, and their art and architecture were cleverly designed to further these two concerns. Assyrian cities such as Calah (NIMRUD), Nineveh, and Dur Sharrukin (KHORSABAD) were military fortresses. The latter, built by King Sargon II (r. 721-705 BC), is a splendid example of Assyrian city architecture. The city was surrounded by heavy walls with powerful gates. Guarding the main gate was a small fortress built over the city wall, and the main citadel rose over the wall at the rear of the city. The inner area was perhaps filled with tents or
other light structures, because no architectural remains have been found there. The main citadel was itself a small walled city with palaces and temples.

The most important building in the city was the huge royal palace, built at the very back of the inner citadel. Within the palace were public rooms and courtyards, private apartments for the king, and an entire temple complex with a freestanding ziggurat.

Unlike southern cities, which were built around central temple areas, Assyrian cities had a peripheral emphasis, with the most important structure being the royal palace. Also unlike that of the south, Assyrian architecture could make use of local stone for orthostats, monumental vertical slabs that lined walls and gates. Notwithstanding these differences in architectural style and material, both northern and southern cities were planned to make it difficult for invaders to penetrate the main civic center, because warfare was a constant threat in Mesopotamian life.

Assyrian art was largely architectural decoration in the form of relief sculptures on the walls of palaces and of huge guardian figures at gate entrances. This sculpture was meant to impress and intimidate people with the power and sanctity of the Assyrian king. The relief sculptures depict the endless battles of the Assyrian armies; inevitably, the king is shown triumphant over everyone who had dared to oppose the mighty empire. Sometimes the king is portrayed in a ritual stressing his religious powers, or else he is shown accepting the tribute brought him by the many peoples of the empire. The king might also be shown as a skillful hunter who could dispatch dangerous wild animals like lions and bulls as easily as he could conquer his enemies.

A remarkable series of sculptures (now preserved in the British Museum, London) was discovered in the palace of King Ashurbanipal (r. 668-627 BC) at Nineveh. This king was particularly fond of sports, and the magnificent reliefs show many aspects of lion hunts as well as hunts of less dangerous animals. All Assyrian relief sculptures reveal a fascination with detail, with history, and with combat, an enduring theme throughout the history of Mesopotamian art. Cylinder seals of this period also frequently depict combat, often between a superhuman hero and a monster.

**NEO-BABYLONIAN PERIOD** (609-539 BC) In 609 BC the Assyrian Empire was conquered by an army of Medes and Babylonians, and the last Mesopotamian culture was that of the short-lived Neo-Babylonian Empire. The city of Babylon during this period displayed a combination of northern and southern architectural traditions. The city was built around a huge temple complex sacred to MARDUK, the chief Babylonian god; here stood the traditional temples as well as the ziggurat known in the Bible as the Tower of BABEL. The royal palace was built out over the city wall, perhaps in imitation of Assyrian palace architecture, although its rambling layout and hanging gardens, or planted terraces, were stylistically far more southern than northern.

Also typically southern was the wall decoration used in the city. Instead of the grim and powerful themes of Assyrian relief sculptures, Babylon was adorned with colorful glazed bricks on the wall of the massive ISHTAR Gate on the main road or procession way, and on the facade of the throne room in the royal palace. These glazed brick panels, usually in the form of molded reliefs of lions, bulls, and strange monsters, gave an elegant and sophisticated air to the city. Proud of their millennia of historic tradition, the rulers of Babylon chose to emphasize beauty rather than power in their art.
The Babylonian Empire fell to the Persians in 539 BC, and thus the final Mesopotamian kingdom was supplanted as the center of Near Eastern civilization. However, the traditions of Mesopotamian art and architecture were so rich and enduring that they enhanced the cultures of surrounding peoples, left their imprint in the Bible, and inspired many aspects of Greek art and architecture.

ASSYRIAN ARCHITECTURE

- Assyria (Gen.10:11)
- Mesopotamian architecture developed by Assyrian king-emperors.
- Cities:
  - Fortified with crenellated and battlemented towers.
- Palaces:
  - Large and emphasizing the central role of the monarchy.
  - Took precedence over religious buildings.
- Externals:
  - Ornamented in carved relief or polychrome glazed bricks (originated by the Assyrians).
  - Use of high plinths or dadoes of great stone slabs placed on edged and usually carved with relief sculpture.
- Employment of the brick barrel-vaulting.
- Columns:
  - Filled the interior courts.
  - Slender with high molded bases, fluted shafts, and capital of recurring vertical scroll.
  - Widely spaced to support timber and clay roofs.
- Openings:
  - Doorways:
    - With semicircular arches
    - With glazed bricks around the circumference
- Windows:
  - Square-headed and high up in the wall.

THE CITY OF NINEVEH

- Capital of Assyrian empire, built by Sargon’s son Sennacherib (705-681 BC).
- Contained the following structures:
  - The Palace of Sennacherib (The South-West Palace)
  - The ‘Palace Without a Rival’
    - Undergone a massive labor in securing the foundation.
    - Platform on the mound formed by successive levels of earlier occupation
- Further developed by successors (Esarhaddon and Ashurbanipal)
- Finally fell in 612 BC after a prolonged assault by the Medes and the Babylonians, and was never to rise again.

THE CITY OF ASHUR

- The ancient and religious center of the Assyrian state
- Dedicated to Ashur, Assyrian’s national god
- Always important wherever the administrative capital might be built on high rocky headland above the Tigris.
- Surrounded by a strong defensive wall (2nd mil. BCE)
- Contained:
  - The temple of In.Anna/ Ishtar
    - First shrine (early dynastic period)
The ziggurat temple of Ashur

The double temple of Anu and Adad - With twin ziggurats

THE CITY OF NIMRUD Modern Calah

- Restored and enlarged as capital by Ashurnasirpal II (c. 883-859 BCE).
- The city layout with ziggurat complex, throne room, administrative block and residential wing, all enclosing large public court, became standard.

The Temple of Nabu (Ezida, The God of Writing), Nimrud

- Built toward the end of 9C BCE.
- A double sanctuary in the main wing for the deity in his consort.
- A well located in front of the sanctuary: A source of water in mixing the finest clay used for the tablets for writing by the scribes in cuneiform.
- A double sanctuary in the north wing: Used for the New Year festival each spring.

BABYLONIAN ARCHITECTURE (2000-1600 BCE)

- Characterized by:
  - Mud brick walls articulated by pilasters and faced with glazed brick.

THE CITY OF BABYLON

- Contained the Tower of Babel (the famed Hanging Garden of Semiramis) and the Ishtar Gate.
  - Dominated the region in 6 BC and was heavily fortified.
The Ishtar Gate
- This strong gatehouse is adorned with colored bricks showing animal symbols of Babylonian gods on a blue background.

Reliefs of bulls and dragons
Glazed bricks

HITTITE ARCHITECTURE (2000–1200 BCE)
- Found in northern Syria and Asia Minor
  - Centered in Lake Van
- Characterized by:
  - Fortifications constructed with stone masonry and gateways ornamented with a sculpture.
  - Massive fortifications

PERSIAN ARCHITECTURE (550–330 BCE)
- Developed under the kings who ruled ancient Persia during the Achaemenid Dynasty.
- Characterized by:
  - A synthesis of architectural elements from surrounding countries such as Assyria, Egypt, and Greece.

The Palace of Persepolis
- Begun in 518 BCE by Darius
- Mostly executed by Xerxes (486–465 BCE)
- Finished by Artaxerxes