



# The Formation and Evolution of the Anatolian Mosques Architecture

**Taymour Akbari**

*Assistant Professor, Department of Archaeology, Faculty Humanites, Varamin Branch, Islamic Azad University, Varamin, Iran*

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**Abstract:** In the 5th AH / 11th AD century, the Seljuk government was formed in Iran, and over time, they were able to defeat the Abbasid caliphs in Baghdad and the Eastern Roman empire in Anatolia. Before the 5th AH / 11th AD, the Anatolian region was under the domination of the Christian Romans and the churches were considered the religious architecture in this region. The purpose of this research is to investigate the evolution of Seljuks of Rum and Ottoman mosque architecture and the influencing factors in the formation of mosque architecture in the Anatolian region, which was carried out by field, library and descriptive, adaptive and analytical approaches. The results show that the architecture of early Islamic mosques, Roman architecture and Seljuks of Iran played a significant role in the formation of Seljuk architecture in Anatolia, and local architecture played an important role in the formation and evolution of Anatolian mosque architecture.

**Keywords:** *Mosques, Seljuk, Ottoman, Islamic architecture, Beylik.*

\* Corresponding Author

Email Address: [akbaritaymour@yahoo.com](mailto:akbaritaymour@yahoo.com) (Taymour Akbari)

## ***Introduction***

Before the Muslims occupied the Asia Minor region in the 5th AH /11thAD century, this region was in the possession of the Eastern Roman Emperor with the centrality of Constantinople or modern Istanbul. In the 5th century A.H/11th AD, with the victory of newly Muslim convert Seljuks over the Roman Christian emperors, a large part of western Anatolia, with Konya as its center, became a part of the territory of Islamic lands. The Seljuks were a branch of the Oghuz Turks who lived in Central Asia and Transoxiana in the time of the Qaznavids, and at the beginning of the 5th AH/11th AD century, they gradually conquered more regions of Iran by defeating the Qaznavids in Khorasan and in 429 AH/1037 AD succeeded to annexed Isfahan city to their territory. After capturing Isfahan, Tughril Beg the commander of Seljuks also conquered the Islamic caliphate, but kept the caliph in place and after receiving the title of Sultan from the caliphate the spiritual leader of the Islamic world, he and his successors carried out many missions in the expansion of the Islamic territory and also the fight against the Romans.

The successor of Toghrol Beyg, namely Alb Arslan, in 464 AH/1071 AD, by winning over the Eastern Roman Empire in the Battle of Molazgerd (464 AH/1071 AD /) near Lake Van, opened the gate of Asia Minor to the Muslim forces, and from this time, this region was r assigned to the Muslim Turks forever. Even though the Byzantine government continued to exist until the Ottomans got the power in the western parts of Anatolia. Malik Shah, the son of Alp Arslan, the ruler of the Seljuks of Iran, appointed one of the Seljuks descendants named "Suleiman Qutalmish" as the representative of the Seljuks of Iran in Anatolia in Asia Minor. In the later periods, Suleiman and his sons, including Qilich Arslan, Masoud I, Kaykhosro, Kaykavus, Kayqobad, etc., by capturing more regions in Anatolia, formed a powerful and independent government called the Roman Seljuks in Asia Minor. they continued their reign under the title of sultans in the Konya city. The art that was created by the Roman Seljuks in Anatolia continued for 170 years until the invasion of the Mongols. Roman Seljuks art is basically the continuation of Iranian Seljuk art in Anatolia along with the influence of the historical and local conditions of this region . The Seljuks in Iran succeed the Muslim dynasties such as the Qaznavids and were deeply influenced by the artistic and architectural style of the Iranian Muslims , even though they brought about changes in the Iranian architecture gradually.Unlike the Iranian Seljuks, conquering Muslims in Anatolian had converted their occupied lands from the Christian Romans, as a result, they became familiar with new traditions, so that Islamic culture and civilization in Anatolia was created with the help of the Iranians and under the influence of Roman and local architecture. The hypothesis of the research is that Iranian architecture during the Seljuk period played a key and important role in the formation of early mosque architecture in Anatolia, and the Roman architecture, early Islamic mosque architecture, Iranian Seljuk architecture and local architecture are among the influential factors in architectural developments in Anatolian mosque architecture. The research questions are included:

Did the Seljuk architecture in Iran play an important role in the formation of Anatolian mosque architecture?

What has been the role and importance of the Roman architecture, early Islamic mosques, Seljuk mosques in Iran, and local architecture in the evolution of Anatolian mosque architecture?

## ***Research Methodology***

This research has been carried out by field library method. First, the plan, pictures and information of Anatolian and Iranian mosques were prepared, and then descriptive-analytical and adaptive methods were used to study how the Anatolian mosques were formed, the course of

evolution and the Proving the influence of the Anatolian mosque architecture from the Seljuk of Iran, local and Roman architecture.

### ***Research background***

In various books, Anatolian architecture has been introduced during the Seljuk, Roman and Ottoman periods. Researchers such as: Robert Hillen Brand in the book of Islamic Art and Architecture, Ettinghausen in the book of Islamic Art and Architecture, and John Hoag in the book of Islamic Architecture examined Turkiye architecture during the Seljuk, Roman and Ottoman periods. In none of the mentioned cases, the influential factors in the formation and evolution of Anatolian architecture have been paid attention to. In this article, in addition to examining the evolution of the architecture of Anatolian mosques, the author has also discussed the influential factors in the formation of the mosques of the Roman Seljuks and the Ottomans in a comparative way.

### ***Discussion:***

#### ***The architecture of the Roman Seljuk mosques***

The absence of mosques in the conquered regions in Anatolia forced the Seljuks to take quick measures in the creation and establishment of this type of religious buildings. In the beginning, regardless of the geographical conditions, they followed the Iranian mosques and sometimes they built mosques in the style of the early Islamic mosques, such as the Seljuk Mosque of Malatya. And then, under the geographical conditions of the region, they proceeded to build completely covered mosques without an open court and in terms of plain decorations with a flat or domed ceiling, such as the Great Mosque of Sivas and Afyon Kara Hisar (Hillendbrand, 1994: 40). Most of the materials used in the construction of mosques in Anatolia are stones, which are used in architecture due to the abundance of these materials in the region. In addition to stone, materials such as bricks and wood are also used in the construction of mosques and other structures. Decorations in Roman Seljuk architecture are in the form of relief carving on the stones, especially those used at the entrance of buildings. The construction of religious buildings, especially mosques, in Anatolia started about 4 centuries later than other Islamic lands, and Islamic architects in Anatolia saw themselves in competition with the flourishing civilization of Eastern Rum, especially the architecture of churches, so despite preserving the non-Islamic buildings that were built during the greatness of the Byzantine Empire, they tried to build such buildings that express the greatness and preeminence of Islamic architectural art. One of the great examples of this type of mosque architecture is the Selimiye Mosque in Edirne, which is located in the borders of the Western Roman Empire and is more magnificent than the Saint Sophia Christian Church. It was built by the Ottomans and the Ottoman Turks in the 11th /16th AH century were able to show the greatness of the art of Islamic architects to the Christians by building this mosque (Blair, 2002: 258).

In Anatolia, mosques became a cultural and social complex gradually, and along with them, tombs, hospitals, libraries, guest houses and other public buildings were constructed. One of the first examples of Anatolian mosques is the Alaeddin Mosque in the Konya city. According to the inscription in this mosque, its construction was completed in 616 A.H/1219 A.D. and during the reign of Alaeddin Keyqobad, the Seljuk ruler of Rum. The plan of this mosque consists of a domed space in front of the altar and columned hall with a flat ceiling around the central domed space (Figure.1). The flat ceiling of the halls is formed by placing the arches on the columns. These types of plans are reminiscent of the early Islamic mosques, especially the Grand Mosque of Damascus and the Kairouan in Tunisia (Figures. 2 and 3). As mentioned, one of the charac-

teristics of Anatolian mosques is that they are a complex, and this characteristic is also evident in this mosque, as there are two tomb towers with an octagonal plan belonging to the Roman Seljuk rulers (Goodwin, 2009:28).

During the Seljuk period, small domed mosques were built in Anatolia from brick and stone materials, which are similar to the domes of Khaje Nezam al-Molk and Taj al-Molk in the Grand Mosque of Isfahan. Probably, the method of dome building in the construction of Anatolian mosques by Iranian architects in the construction of the Seljuk mosques of Rome, who were the descendants of the Iranian Seljuk dynasty, was common among the examples of these mosques, Tashi and Sarchali Mosques can be mentioned (Hatam, 2000:pp16-50). The Tashi mosque is made entirely of stone materials and has a square domed space with an entrance (Figure. 4). The domed space is similar to the Nezam al-Molk dome in the Grand Mosque of Isfahan, with the difference that the Nizam al-Malik dome is made of brick and Tashi mosque has stone materials, of course, there is a difference in the decorations of these two buildings, such that the decorations of the Tashi mosque are carved on stone, but the decorations of the Khaje Nezam al-Molk dome include brickwork and tilework (Hatam, 2000:p28). Sarchali Mosque in Konya city is completely made of bricks and has tilework decorations. This mosque has a square domed space with three entrance openings in front (Figure .5).

### ***The Mosques in the Anatolian Beyliks period***

The Roman Seljuks were defeated by the Mongols in the Battle of Kuse Daq in 1243 A.D and they were forced to pay substantial tribute, although they prepared to overthrow the Ilkhanid governorship in 676 AH/1277 AD, but were defeated again. A dynasty of Seljuks until the beginning of the 8th A.H / 13th AD century reigned a small part of Anatolia without having any power. Simultaneous with the weakness of the Roman Seljuks and the invasion of the Mongols, small governments such as the Karamanid, Mentashid, Aydinids and most importantly the Ottomans were formed in Anatolia, and until the Ottomans gained power and dominated Anatolia in 857 A.H/ 1453 AD some of these governments continue to exist. (Blair, 2002:154).

In the east and center of Anatolia, during the period of beyliks, the Seljuk style continued in the construction of mosques, among these styles that were used in the construction of mosques, there were those with the columned style and flat wooden ceiling that were supported on numerous columns. One of these mosques is the "Eshrefoglu" mosque in Beyshehir. This rectangular mosque has 48 wooden columns with carved capitals. In front of the altar of the Eshrefoglu mosque, there are 7 rug areas perpendicular to the Qiblah wall, and the central rug area is tiled and perpendicular to the altar and like early Islamic mosques, it is wider and taller than other Hami carpet areas. Decorative elements such as stone carving, faience mosaic and colored woodwork, which is the peak of the Seljuk style, are displayed in this mosque. The tomb of Eshrefoglu, the founder of this mosque, can be seen next to this mosque (Akbari, 2013:15).

During the beyliks period, the Ottoman government of western Anatolia faced new ideas such as Byzantine architecture and treasures of ancient and medieval materials in the construction of mosques and other buildings, and therefore in the mentioned territory, there were somewhat different methods from the eastern region of Anatolia. In this period a mosque namely Isa Bey with dimensions of 53 x 57 meters was built in the city of Seljuk from unhewn stones, which consists of two rectangular halls and domes in a center part of these spaces and two-story porches around the courtyard (Goodwin, 2009:121). The minarets of this mosque have a cylindrical body and are made of bricks (Figures. 6 and 7).

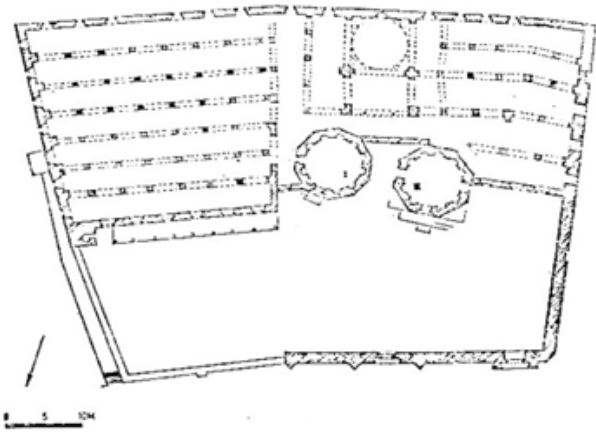


Figure .1: Alaeddin Keyqobad Mosque, Konya city (Ettinghausen, 2005 :283).



Figure .2: A picture of Alaeddin Keyqobad Mosque, (Akbari: 2005 :138).



Figure .3: Hall of Alaeddin Mosque (Akbari ,2005: 137)

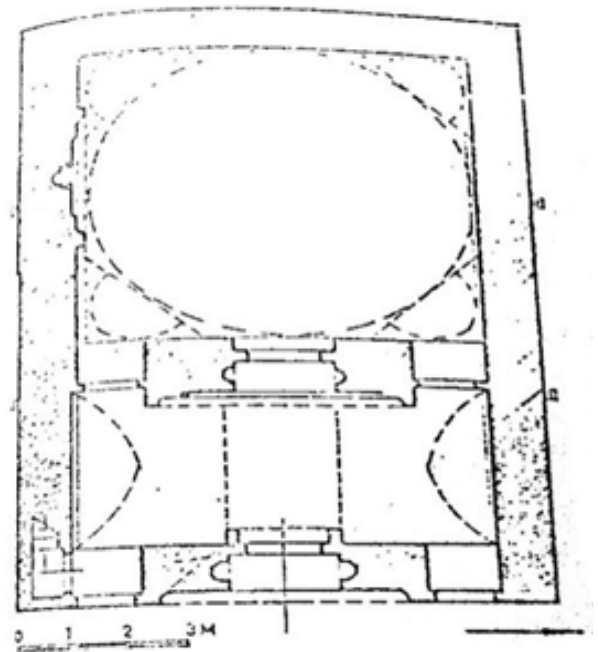


Figure .4: Tashi Mosque in Konya (Akbari, 2005: 1994)

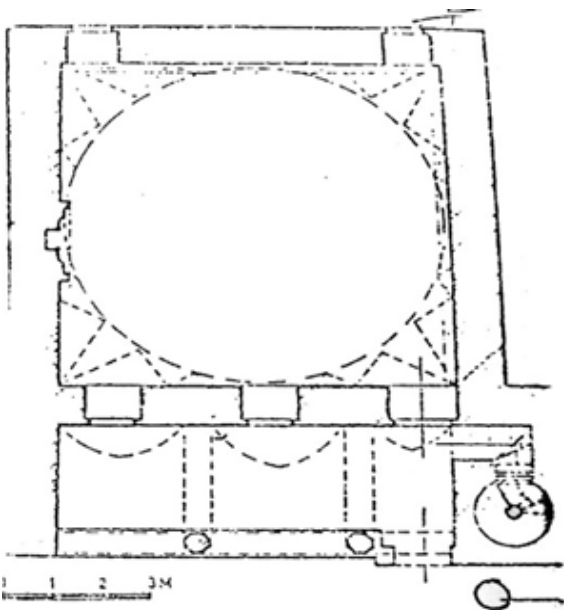


Figure. 5: Plan of Sarchali Mosque in Konya (Akbari, 39: 2015).

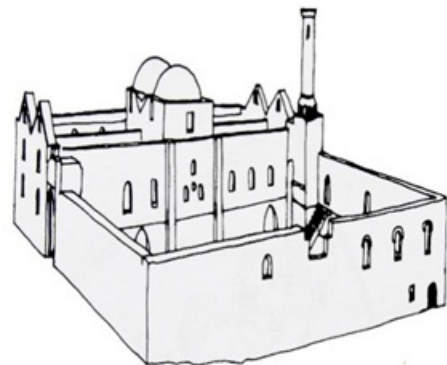


Figure. 6: 3D picture of Isa Beg Mosque in Seljuk (Goodwin, 2009:122).

Haji Uzbek Mosque is another mosque that was built around the year 734 A.H/ 1333 A.D with a special feature in Iznik or Nicaea of Byzantium, simultaneous with the reign of Orhan Qazi, the Ottoman ruler (725-762 AH/1324-1360 AD) (Brand, 2004: 256). This religious building is a quadrangular space (each side is 92.7 meters) with a hemispherical dome on an octagonal squinch, the materials used in this building are a combination of brick and stone and it does not have a minaret (Figure. 8).

### ***Mosques in the period of Ottomans formation***

During the period of the Ottomans formation, a mosque was built in the early centers of the Ottomans, especially in Bursa, which later would become known as angled, porched, T shape, Bursa-type and multi-purpose mosques. One of these types of mosques is Orhan Qazi's mosque, the Ottoman ruler, in the Bursa city. In this mosque, there are five openings with a small domed space at the entrance, which lead to a large central dome through a small domed corridor. Around this space, there are rectangular rooms called prayer corner. In the southern part of the central space, there is another domed space. There is an altar on its southern side (Figure .9). Bursa Mosque is one of the oldest Ottoman mosques (Hug, 1989: pp40-90). Sultan Murad I (762-793 AH/1360/1390 AD) built a combination of a mosque and a two story madrasa in the Bursa city, in the first floor, in the front of the entrance there are five square openings, which, like the Orhan Mosque, lead to the corridor and a domed space behind that with a dome diameter of 11 meters and a height of 23 meters, and six small domed rooms can be seen on each side of this space. Inside the corridors there are stairs that can be used to reach the upper floor (Blair, 2002: 158). The second floor has five openings of porch and large rooms and small cells with dimensions of 2.5 x 3.5 around the central space (Figures .10 and 11). One of the most important Ottoman mosques before the conquest of Istanbul is the "Yeshil Jami" Mosque or the Green Mosque in Bursa (Figure.12). This mosque was built in the tomb complex of the Ottoman sultans in an angular style and with a plan almost similar to the of Bayezid I and Orhan Qazi mosques between 815 - 828 AH (1412 - 1424 AD). At the entrance of this mosque, there are five domed space, which leads to the main domed space through a vertical corridor (Talbot Rice, 2014: 204).

In the south of this domed space, there is a quadrangular space and to the left and right part, there are two smaller domed quadrangular spaces on each side (Figure 13). In an inscription from this mosque, it is written "the work of the masters from Tabriz" (Blair: 2002. pp. 164-165). The overall space of Yeshil Cami Mosque, except for its five entrances, is very similar to the Kabud Mosque in Tabriz (Figure.14 and 15). It is necessary to explain that the Kabud Mosque was built in the late 9th century AH/15th AD during the reign of Jahanshah (842-872 AH/1438/1467 AD) who was the ruler of Qara Qoyunlus (873-782 AH/1468/1380 AD) in a covered and multi-domed style (Akbari, 2022: 210). Some parts of the tilework decorations in the Yeshil Jami and the Kabud Mosque are similar. The blue and green tiles with hexagonal designs are common features in the aforementioned mosques (Figures.16 and 17). The similarity of the decorations of these two buildings shows the architectural technical connections between Iran and the Ottoman period (Akbari, 2013: 151). Sultan Murad II (851-841 AH) started the construction of the "Och Sharefeli" mosque in the Adrina city near the borders of the Western Roman Empire. This mosque is known as "Och Sharefeli" or "Three story staircase" due to the presence of three staircases in one of its minarets. (Figure .18).

This mosque consists of the following two parts: the first part: a central courtyard and 22 small domed spaces around it, and the second part, which is located in the south of the court-



Figure.7: A view of Isa Bey Mosque in Seljuk (Goodwin, 2009:122).



Figure. 8: A view of Haji Uzbek Mosque in Iznik city (Blair, 2002:155).

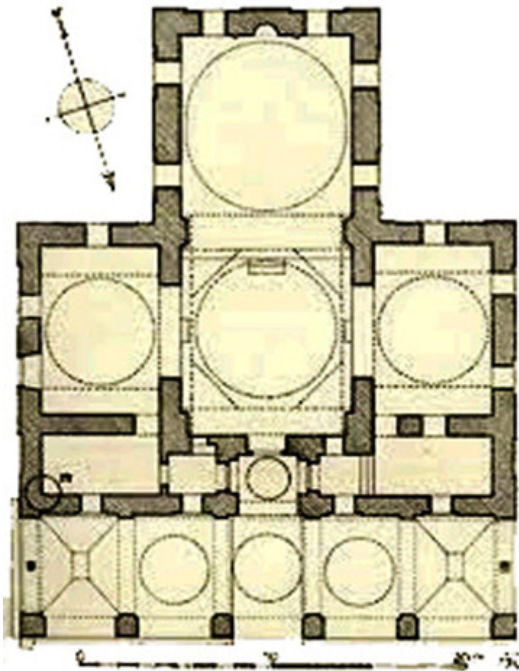


Figure .9: Plan of Orhan Qazi Mosque in Bursa (Blair, 2002:156).



Figure. 10:A view of Sultan Murad I mosque in Bursa (Blair, 2002:158)

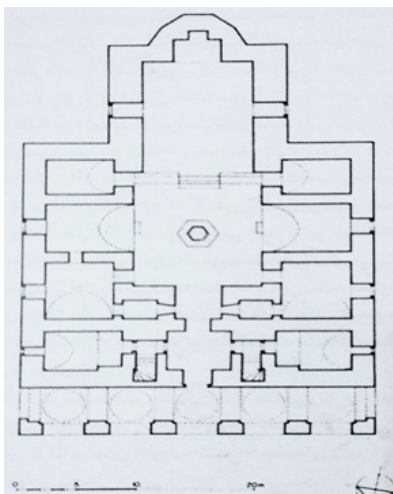


Figure. 11: Plan of the first floor of Sultan Murad I mosque (Blair, 2002:158).



Figure. 12: A picture of Yeshil Jami Mosque in Bursa (Akbari, 2015:151).

yard, has a central large dome space with a dome diameter of about 24 meters and two small domed spaces on both sides of central domed space (Hug, 1989:90). This mosque can be considered the first example of the developed Ottoman mosques. The use of four minarets in the four sides of the courtyard and multiple quadrangle domed spaces around the courtyard are among the architectural innovations of this mosque (Brand,1987:158). As it mentioned above, at the end of the 7th AH/ 14th century AD, the political power of the Anatolian region, which was in the hands of the Roman Seljuks, was divided among several local governments until finally all the power fell into the hands of one of the Seljuk tribes called the Ottomans. At the beginning, Osman, the founder of the Ottoman empire, captured a part of Asia Minor that was in the hands of Romans and made the city of Bursa his capital, and a few years after the capture of Edirne, the capital was moved to this city, and it is because of the centrality of these two cities. that most of the Ottoman architectural monuments were created in the mentioned cities during the formation period, that is, before the conquest of Constantinople (Blair,2002: pp250-255).

### ***Anatolian mosques during the Ottoman Empire period***

Sultan Mahmmmed the conqueror (848 - 886 AH /1444 - 1481 AD) conquered Constantinople, the center of the Byzantine Empire, in 857 AH/1453 AD. By changing the name of this city to Istanbul, he made this city the center of the new Ottoman Empire. Simultaneous with conquest of Istanbul, there were changes in Ottoman architecture. After the conquest of Istanbul, Sultan Mehmed converted the Santa Sofia into a mosque with a few changes, and the great architecture of this church with its large dome became a pattern for the architecture of later Ottoman mosques(Akbari,2013:73). The long reign of the Ottomans led to the spread of a certain style , which , with the expansion of their territory, caused the gradual emergence and spread of this method in Anatolia , the Balkan Peninsula, and finally all the parts of the Mediterranean basin. The basic foundations of Ottoman art and architecture were created first in the Seljuk period and then in the early Ottoman centers such as Bursa and Edirne, and then in the Ottoman Empire period, a special style of Ottoman architecture was formed by combining the architectural styles of the aforementioned periods and the architectural influence of Christian churches that survived until the end of the Ottoman empire(Blair,2002:pp245-250).

Among the common styles in the construction of Ottoman Empire mosques are multi-domed and single-domed mosques. Multi-domed and porched mosques were built in the early Ottoman period and were not used in the construction of grand mosques after the conquest of Istanbul. The only architectural method that continued and evolved in the construction of Ottoman mosques was the construction of single-domed mosques, which were mostly built in the Edirne and Istanbul cities(Blair,2002:164). The single-domed mosques in the Ottoman period are considered to be the developed forms of Seljuk mosques. Seljuk mosques consisted of a quadrangular domed room with one or more entrances, which reached its peak in the Ottoman period by the famous Ottoman architect namely Mimar Sinan in continuation of the Seljuk style (Hug,1989: pp87-95). Among the most important mosques in the Ottoman Empire period are the Sultan Mehmed the conqueror Mosque (848-886 AH/1444-1481 AD), the Shehzade Mosque (952-955 AH/1545-1548 AD), Rostam Pasha Mosque (969 AH/1561 AD), Bayazid II Mosque (906-911/1500-1505 AH) and the Sultan Suleiman I mosque (957-965 AH/1557-1550AD) . As it was said, Selimiye Mosque, a masterpiece of Sinan Pasha, was built during the reign of Sultan Selim II (982-974 AH) near the borders of the Western Roman Empire. Selimiye Mosque includes a central domed space with a four three story staircase striated minarets with a height of about 89.70 meters in its four corners (Figure.19).





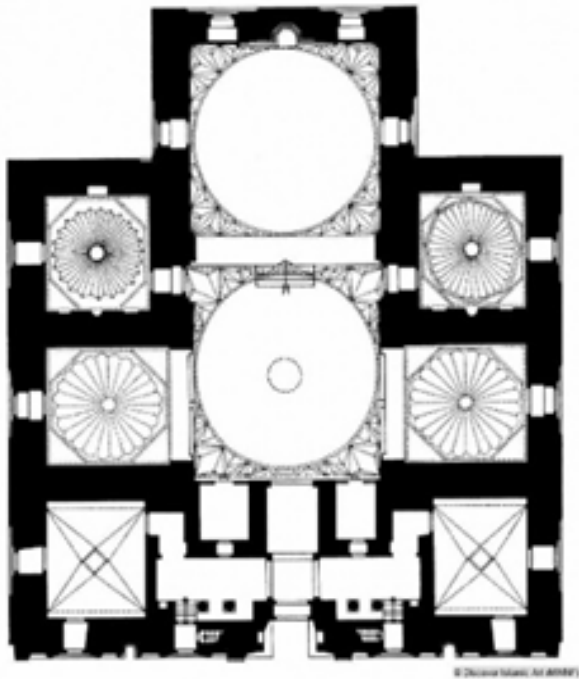


Figure.13:Plane of Yashil Jami mosque(Blair,200:63)

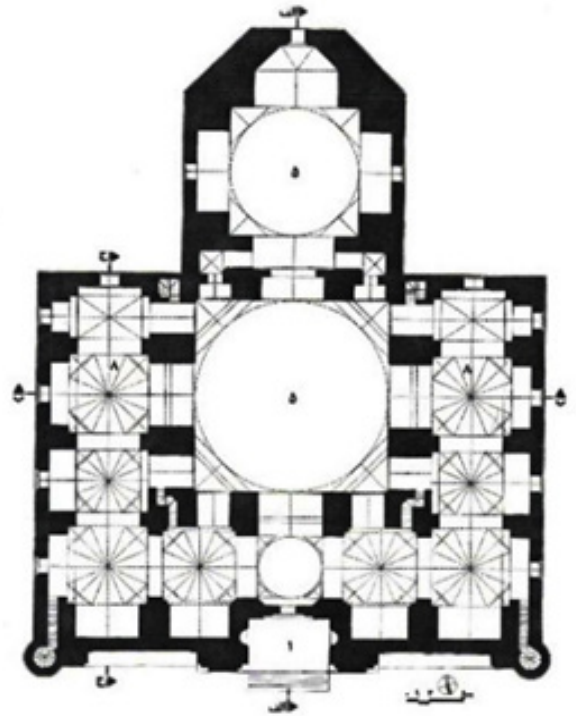


Figure. 14: the plan Kabud mosque in Tabriz (Blair, 2002: 63).

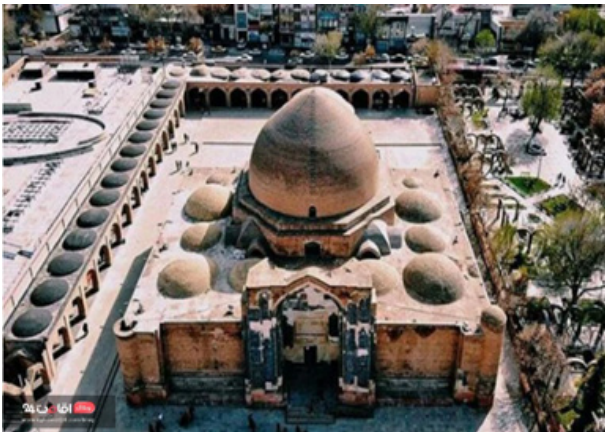


Figure .15: Perspective view of Kabud Mosque in Tabriz (Akbari, 2015:149).



Figure .16: Tiling of Yeshil Jami mosque with hexagonal design (Akbari, 2015:150)



Figure. 17: Tiles of Kabud Mosque in Tabriz with hexagonal design (Akbari,2015: 151).

The large dome of this mosque with a diameter of 32 meters is supported on eight large 12-sided columns (Figure. 20). In the other part of this mosque, there is a central courtyard surrounded by domed porches (Figure.21(. Another feature of this great Ottoman mosque is the six-meter depth altar with a half-dome above it (Blair, 2002:258.).

### ***Conclusion***

The construction of mosques in Anatolia is influenced by the architecture of the Seljuks of Iran and the early Islamic mosques for the first time by the Seljuqs of Rum. Available materials and the existing architecture of the region before the arrival of the Muslims played an important role in the formation of the architecture of Anatolian mosques. During the Roman Seljuk period, the construction of domed mosques influenced by the Seljuk mosques in Iran also mosques with columned halls imitating the early Islamic mosques was more common. The construction of mosques with flat ceiling and wooden columns become common in the villages according to the popular native architecture. In the period of the Anatolian Beyliks, that is, from around the 7th century AH, with the emergence of various small states in Anatolia, various styles were used along with Seljuk architectural styles. In the mentioned period, which continued until the conquest of Istanbul in 957 AH / 1550 AD, mosques with a columned style with a flat ceiling were built, such as: Ashrefoglu Mosque in Beyshehir, domed mosques in Anatolian villages, and angled mosques like Orhan Qazi Mosque. At the end of the Anatolian beyliks period, with the evolution of the Ottoman angled mosques, a mosque named Och Sherefeli was built in the Edirne. This type of mosques was built in the period after the conquest of Istanbul by combining the architectural style of Christian churches, Seljuk domed mosques and also the angled mosques of the formation period. Ottoman influence along with new innovations created a style in the architecture of Anatolia and Asia Minor during the Ottoman Empire period, which became common in the construction of mosques until the end of the Ottoman period in the territory of this empire. In this style, mosques consist of two parts: the courtyard and the domed porches on its four sides and the domed hall.

***Conflict of Interest:*** The authors declare that they agreed to participate in the present paper and there is no competing interests.



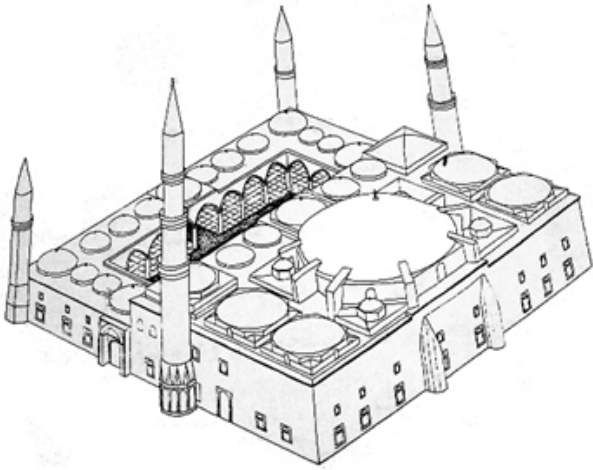


Figure .18: 3D picture of the Och Sherefeli mosque (Brand, 1987: 159).



Figure. 19: Salimiye Mosque in Edirne city (Blairr, 2002: 258) .

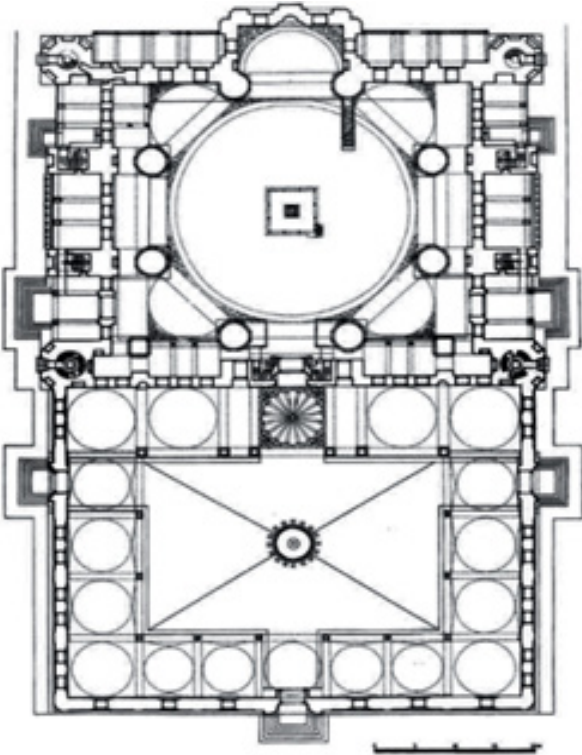


Figure .20: Plan of Salimiye mosque in Edirne (Blair: 20015.158).



Figure. 21: Hall and under the dome of Salimiye Mosque (Akbari, 2015:158,).

### ***Bibliographical References***

- Akbari, T., 2013. The architecture of Turkish mosques. Tehran, Hampa. [in Persian]
- Akbari, T., 2022. Iranian Architecture in the Islamic middle ages. Tehran, Samira. [in Persian]
- Blair, Sh., Bloom, J. 2002. The Art and Architecture of Islam. translator: Eshragi, Ardashir. Tehran, Sroosh. [in Persian]
- Goodwin, G. O., & Consensus Group of the British Association for Psychopharmacology. 2009. Evidence-based guidelines for treating bipolar disorder: revised second edition—recommendations from the British Association for Psychopharmacology. *Journal of Psychopharmacology*, 23(4), 346-388.
- Hatam, Gh. A. .2000. Islamic Architecture of Iran during the Seljuk period, Tehran, Jahadeh Daneshgahi. [in Persian]
- Hug, J., Hanr. M 1989, Architecture of Islamic lands. Translator: Varjavan, Parvize. Tehran, Elmi va Farhangheh. [in Persian]
- Hillenbrand, R. 1994. the art of the saljogs in Iran and Anatoli. California. Mazda publisher.
- Hillendbran, R., 2004. Islamic Architecture, Translator: Etasam, Ira. Tehran, Pardazesheh Shahri. [in Persian]
- Hillendbran, R. 2007. The Art and Architecture of Islam. Translator: Etasam, Eraj. Tehran, Farhanghestaneh Honar. [in Persian]
- Grabar, O., Ettinghusen. R. 1999. The Art and Architecture of Islam. Translator: Aghand, Yaghub. Tehran, Samt. [in Persian]
- Rice, T. 2005, The Art of Islam, translator: Bahar, Mahmalak. Tehran, Almi Farhanghi. [in Persian].