

# Spatial Relationship in The Great Mosque of Surakarta

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**Abstract.** Surakarta city has several mosques that are included in the conservation efforts, one of which is Masjid Agung Surakarta (The Great Mosque of Surakarta) which is a mosque built by the Sultan's Palace. Surakarta Great Mosque was built by Sunan Paku Buwono II in 1763 AD or 1689 of the Javanese year and finished in 1768 AD during the reign of Sunan Paku Buwono III. This paper aims to identify the existence of spaces in the mosque and the conservation efforts that have been conducted, considering that this building is a cultural heritage building. This research employed descriptive research method using literature study, observation, and interviews with the administrators of Surakarta Great Mosque. Visual documentation was conducted to acquire photos of the spaces to be studied. Data analysis was presented by describing the data in the field and then classifying them into several categories namely space circulation and space hierarchy. The highest hierarchy of the room in the Great Mosque of Surakarta is the main spaces which is confirmed by the height of the floor surface, and is influenced by the functions of these spaces. The spatial relationship of the Surakarta Great Mosque is a centralized and clustered organization, and is included in adjacent space relationships that describe the functional needs [adjacent and interrelated].

**Keywords:** hierarchy, spatial relationship, Great Mosque of Surakarta.

## 1 Introduction

*Masjid Agung Surakarta* (Surakarta Great Mosque) is located in Kauman VII street, Kauman Village, Pasar Kliwon. The Great Mosque of Surakarta is a Palace mosque. This mosque is located near the city square, in the middle of Surakarta city. The northern part of this mosque is bordered by a residential area from the Kauman village. To the south of the mosque is Klewer Market. The east side of the mosque borders with the square, while the west side borders with residential areas. According to Basit Adnan, the Great Mosque was built by Sunan Paku Buwono II in 1763 AD or 1689 in Javanese year and was completed in 1768 during the reign of Sunan Paku Buwono III [6]. The Great Mosque is a building complex covering an area of 19,180 m<sup>2</sup> which is separated from the surrounding environment by a 3.25 m high fence wall. The building of the Surakarta Grand Mosque as a whole is a *tajug* building that has three layers of roof above with *mustaka* (crown) top.

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The Great Mosque has undergone several renovations. The first renovation was carried out to expand the mosque building which took place during the reign of Sri Susuhan Pakubuwono IV (1788-1820). Subsequent renovations were carried out to perfect the building of the mosque by building a porch which was carried out during the reign of Sri Susuhan Pakubuwono VII (1859-1861). During the reign of Sri Susuhan Pakubuwono X, the Surakarta Grand Mosque underwent a renovation, namely the construction of towers for the call to prayer and a sundial to determine prayer times, repairs to the front gate which originally had a Javanese style gate with *limasan* roofs replaced with Middle Eastern pattern consisting of three doors, and repairs on ablution areas. The latest renovation was carried out by the Government of Surakarta by adding several buildings with different functions, namely the library, management office, and polyclinic.

## 2 Literature and Theory

### 2.1 Javanese Mosque

The Javanese mosque has the following characteristics: (1) having a square shape, (2) not supported by pillars on the base of the building. (3) Having an overlapping roof of two to five levels. (4) Having an expansion of space on the west or northwest side which is used as *mihrab* (a place for *Imam* or prayer leader). (5) Having a mosque porch on the front or side, (6) having courtyard around the mosque which is covered by walls / fence with only one entrance through a gate on the front [1]

There are two types of Javanese Mosques; the first type is the original type which has a square plan with four pillars in the middle of the prayer room [2]. The second type is a variation type consisting of several types, namely: a square shape with a single pillar, a square shape without *sokoguru* (main pillars), a rectangular shape without *sokoguru*, a rectangular shape with more than four *sokoguru*, and a rectangular shape with four *sokoguru*. Bayu stated that the spatial structure of the Javanese Mosque consists of several parts, namely, the gate, the porch, the prayer room, the *mihrab*, the tomb [2].

There are six types of Javanese Mosque), namely: square plan, floor directly on the massive foundation or not having a space under the floor, having a three or five roof that cones up smaller, having additional space on the west or northwest for *mihrab*, having a porch, having an open space surrounding the mosque surrounded by a bordering fence with an entrance in the east [3].

### 2.2 Spatial Relation

Spatial relations include spaces in space, interlocking spaces, adjacent spaces, and spaces connected by a shared space [4]. Furthermore there is a space organization consisting of centralized, linear, radial, cluster and grid.

### 2.3 Page style

This article is based on a research conducted in 2015 using a qualitative descriptive method and inductive approach to analyze data collected from literature studies, observations, and interviews with managers of the Surakarta Grand Mosque, staff of Preservation of Cultural Heritage Areas and DTRK Surakarta. Creswell defined qualitative research as an approach or a search to explore and understand a central phenomenon [5].

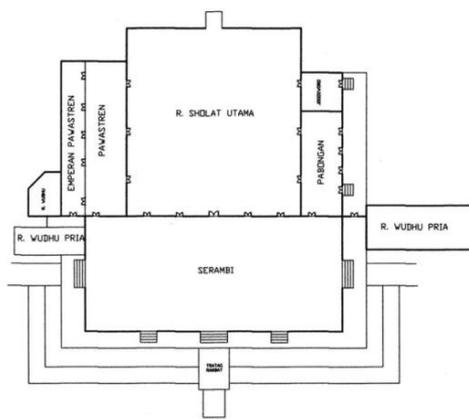
### 3 Result and Discussion

#### 3.1 Spatial Relation

There are several rooms in The Grand Mosque, namely:

- The main room which functions as the male praying room.
- *Pawastren* which functions as the female praying room.
- The porch which is an open space without separating walls used to accommodate pilgrims if the mosque is full. The porch also functions as a place of discussion, a place of recitation, a place to recite prayer, a place to perform a prayer service, and the location of a religious holiday celebrations.

The space relations at the Great Mosque of Surakarta are adjacent space relationships. The adjacent space relationship is a type of spatial relationship that allows each space to be clearly defined for functional or symbolic needs. The separating fields can limit physical and visual access between two adjacent spaces, strengthen the individuality of each space, and accommodate the differences. Besides, each space will look like a field that stands alone in a single space volume. Adjacent spaces can be defined by a column that allows visual and spatial continuity between the two spaces. Each space distinction is also presented only through changes in height or contrast to the material or contrast to the surface material or texture between the two spaces.



**Fig. 1.** The plan for *Masjid Agung Surakarta* (Source: Wieldina, 2015)

The activities at the Surakarta Grand Mosque are the five daily prayers, sunnah prayers, Friday prayers, and recitation activities. The space needed for Friday prayer is the *pawastren* and the main room. While the space used for recitation is the porch. These spaces are supported by the existence of ablution places for men or women, because before performing the prayer or following the recitation the pilgrims must be in a clean/pure state after taking ablution.

The spatial relations at the Great Mosque of Surakarta is adjacent space relationship. This can be seen in the relationship of the main room with the *pawastren* and the porch which are separated by walls and connected to the doors. In addition there are differences in floor height, in which the main space is made higher than the other spaces according to the criteria of the adjacent space relationship.

The following is the Spatial Relations chart at the Surakarta Grand Mosque.

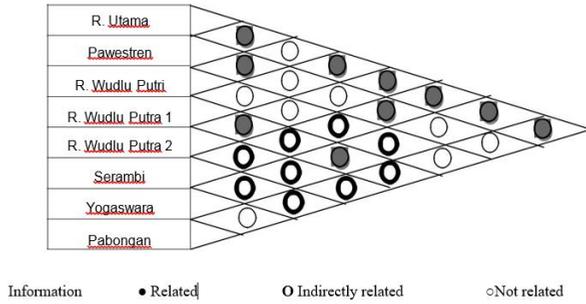


Fig. 2. Spatial relationship of Masjid Agung Surakarta

### 3.2 Space Hierarchy

At the front of the Great Mosque of Surakarta, there is *kuncungan* (cone-shaped building) which functions as a transitional building from the front yard to the mosque which is the lowest building in the Great Mosque of Surakarta. The porch is a space that is found after the *kuncungan* and *tratag rambat* that function as a place of discussion, place of recitation, and so on. The porch has floors that are higher than *kuncungan* and *tratag rambat*. Entering the rooms in the mosque, there is a *pawastren* room, main room, *pabongan* and *yogaswara*. The *Pawastren* room functions as a prayer room for female pilgrims with a floor position 18 cm higher than the porch room. *Pabongan* and *Yogaswara* have a floor surface 15 cm higher than the porch space. *Pabongan* serves as a circumcision room and *Yogaswara* serves as a space for mosque administrators. The main room is the highest room hierarchy in the Great Mosque of Surakarta. This is in accordance with the function of the main room as a place of worship so this room designed as the holiest room. The floor in the main room is 23 cm higher than the porch room. The level of space hierarchy in this mosque is in accordance with the functions of each of these spaces. Space that functions as a place of worship has a higher hierarchy of space than other spaces. The level of the hierarchy of space in the Surakarta Grand Mosque is increasingly emphasized by the height of the floor in each of its spaces. The hierarchy of space in the Great Mosque can be seen more clearly in the following figure.

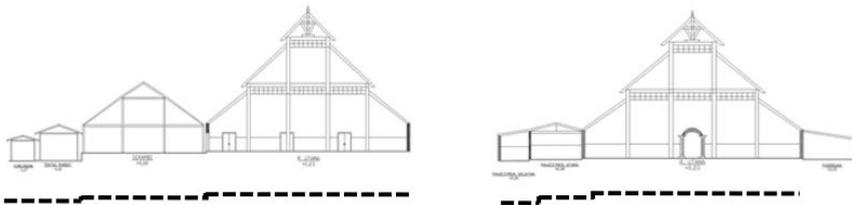


Fig. 3. Side plan of Masjid Agung Surakarta (Source: Wioldina, 2015)

## 4 Conclusion

The Spatial relation at the Great Mosque of Surakarta is adjacent spatial relationships. The adjacent spatial relationship describes the functional requirements of the interrelated adjacent spaces. The highest space hierarchy in the Great Mosque of Surakarta is the main room. In addition, the space hierarchy in the mosque is emphasized by the different level of floor surface in each space. The space hierarchy is influenced by the functions of these

spaces. The space that symbolizes the highest hierarchy is the space considered the most sacred used as a place for praying.

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