

# 'System of Settings' As A Tool of Assessing Users' Satisfaction

## Al-Azhar Park, Cairo, Egypt

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### Abstract

Being one of the most overpopulated and overcrowded cities in the world, Cairo suffers a significant lack of public open spaces. Therefore, the state adopted a policy considering the expansion of public open spaces. One such open space is Al-Azhar Park, the initiative of which was embarked and implemented by the Aga Khan Trust for Culture. The park is located at the eastern part of medieval Cairo, commanding panoramic views of the city.

It is advocated that parks play an important role in the social and personal wellbeing of the city's residents. This takes place at multiple layers, be it the socio-cultural subjective values or the tangible objective components. The current research examines the extent to which users' satisfaction is fulfilled in Al-Azhar Park. If successful, this contributes to the better of the social and personal wellbeing of Cairo's residents.

To examine such understanding, the research employs Rapoport's holistic approach of 'System of Settings', comprising 'System of Activities' and 'Types of Feature Elements'. In conclusion, the study realizes that the park is meeting the users' expectations.

**Keywords:** System of settings; System of activities / Activity system model; Types of feature elements; Al-Azhar Park.

### 1. Introduction

With a population of over eight million inhabitants, metropolitan Cairo has extremely grown and is still increasing – Thus, greater Cairo has over eighteen million inhabitants (CAPMAS, 2012). This results in a stressful life for the inhabitants of the city (Bell et al, 2001). Parks and open spaces are main destinations for city occupants who look for relaxed leisure time, because they give a refreshing feeling due to the breeze and the cooler temperature in summer. Furthermore, parks have an important role contributing to the social, cultural, entertainment, physical and psychological needs, for different age categories. These needs can be fulfilled through spaces like children playgrounds, jogging tracks, meditation places, family areas etc.

Nevertheless, over the past few decades, much of the public open spaces have been reduced in favour of concrete blocks. This unplanned occupation of the public open spaces has physically and visually congested the city's urban fabric, and accordingly disturbed the aesthetic qualities of the city. Therefore, the lack of public open spaces became a major crisis that the city of Cairo suffers.

During the last few years, the state became aware of this problem, and developed a different attitude towards this crisis, paying attention to the public open spaces to retrieve the valuable image of the city. The Governorate of Cairo together with the Aga Khan Trust for Culture, have constructed the Al-Azhar Park; one of the marvellous open spaces that is located in medieval Cairo. One major aim of constructing this park was to offer equal opportunities for all segments of the society seeking leisure time, as well as setting a lung for the congested city.

This study investigates the degree of users' satisfaction in the park. This investigation is being achieved by utilizing Rapoport's holistic approach of 'System of Settings'. Under this umbrella, the research addresses 'System of Activities', comprising the nature of the activity; the way the activity is performed; the associations amongst other activities' systems; and the meaning or the underlying facet of the activity. In addition, and under the same umbrella, the research addresses 'Types of Feature Elements', including fixed, semi-fixed, and non-fixed features elements. After laying down the theoretical framework for the Park's appraisal, the research introduces the case study; its backgrounds; methodology of field-work; as well as physical and non-physical settings of the park to provide an indication of its major successes and shortcomings. Follows, is a discussion of the findings. Finally, the research concludes that the park is performing good and meets the users' expectations and similar projects are needed. However, few recommendations are introduced to enhance the performance of the park and to increase the level of user-satisfaction.

## 2. Research Objectives

"If architecture encloses behaviour tightly, then activities will tend to shape architecture... Since, at least in principle, environments are created to be supportive for the activities and lifestyles of people, form tends to respond to activities" (Rapoport, 1993, p.11)

This paper aims to appraise the performance of the Al-Azhar Park, in terms of fulfilling the satisfactory level of the park's users. This chief aim is divided into three main objectives, the first is carried out by the description of users and their patterns of activities. The second is to understand the mutual relationship between architectural design and human behavior; particularly by unfolding the relationship of the subjectivities of people's behavior in parks and their activity needs from one hand and the surrounding physical environment on the other hand. To do so, the research is adopting Rapoport's holistic perspective of 'System of Settings', in line with his more in-depth theories of 'Types of feature elements' and 'System of activities and system of settings (Activity system model)'. This leads to the third objective of this research, which is to assess the subject of the study utilizing Rapoport's theories advocating that they are very significant means of understanding both the physical environment and people's behavior.

## 3. Research Methodology

The research is built upon two of Rapoport's theories: First is about fixed, semi fixed and non-fixed items of a space. Second, stems from the first and elaborates more on the non-fixed, it is Rapoport's activity system model (Rapoport, 1993). In this theory Rapoport showed that it is very important to regard activity systems in systems of settings in order to understand the urban form (Rapoport, 1982), the choice of housing (Rapoport, 1985a; 1985b), and the use of open space in an urban neighbourhood (Rapoport, 1986). Both theories emerged from Rapoport's perspective 'System of Settings' and are applied to the case study in order to come out with a clear understanding of the mutual relationship between the physical settings and the visitors activities in Al-Azhar Park; the first is utilised in the phases of description and observation, while the second functions in the analysis phase.

The research adopts a methodology that is based on two main parts: the first, is emerging from the literature, while the second addresses the empirical work. In fact, the research starts by introducing the theoretical framework upon which the study is built. Then it elaborates on the field study (Al-Azhar Park): its background; methodology of conduction; physical and non-physical settings of the park. Then a thorough discussion of the findings is introduced; Follows, are recommendations distilled from observations, discussion and the conducted interviews. Finally, conclusion is obtained.

## 4. Theoretical Framework

"Built environments influence behaviour .. " (Rapoport, 1993, p.11).

The research investigates the relationship between the park users and its features. In order to do so, it is a necessity to understand the park in terms of different types of features as well as users and their activities. This will contribute to building a clear perceptible to what extent the park was successful in fulfilling the satisfaction of the park's users; and how did the physical settings of the park affected the users' activities. Hence, the research needed to employ a tool that comprehends those two facets. This led to Rapoport's insight of 'System of Settings', along with his more in-depth theories of 'Types of feature elements' and 'System of activities and system of settings (Activity system model)'.

### 4.1 Types of Feature Elements

Building on Rapoport (1981), one can assume that a space is a system of settings in which particular activities are performed. He then, claims that the concept of dividing space elements (as a system of settings) into fixed, semi-fixed, and non-fixed features elements (Rapoport, 1983c), was first introduced by Hall (1966). He defines them as: fixed elements are those who rarely and slowly change, they are organized by laws and regulations; and resist changes. These comprise streets and buildings on cities level (and presumably the research subject); in addition to walls, ceilings, and floors on building level (Rapoport, 1983c). Furthermore, (Ahrentzen, 2002), claims that fixed feature elements have an important role in reflecting cultural, social, organizational and institutional meanings more than individuals. This is referred to the physical, political and economic difficulty that an individual faces in attempting to change such conditions.

Semi-fixed elements, on the other hand, could be changed more easily and often. These encompass usable contents of the physical setting i.e. furniture: in-door furniture (Curtains, plants ...etc); out-door furniture and street furniture (Advertising signs, shops' displays, garden layouts ...etc) (Rapoport, 1983c). In addition to Rapoport (Brown, 1987) argues that semi-fixed feature elements on a dwelling level are full of personal meanings and show the identity of the occupiers more than fixed-feature elements do. Hence, it could be argued that the park's furniture reflects the socio-cultural needs of the local community from the designer's perspective.

Finally, non-fixed elements: are those related to human beings using the subject space; their shifting spatial relations; their activities and non-verbal behavior (Rapoport, 1983c).

#### *4.2 System of Activities (Activity System Model)*

Responding to the paper's main objective; and to understand the behaviour of users in space, the research is capitalizing on Rapoport's theory discussed above, emphasising on the non-fixed elements, and is adopting the concept of activity system model. According to Rapoport (1993), this concept can have useful research and design implications towards the study of activities and use of spaces. This concept implies that the activity embraces four main aspects:

1. The apparent nature of the activity;
2. The way the activity is performed;
3. The associations amongst other activities and activities' systems;
4. The meaning or the underlying facet of the activity (ibid.).

This may be exemplified in the activity of feast celebration, which is an activity carried out by different people around the world. How people perform their celebrations varies from one culture to another. How feast celebration is associated with other activities, eating habits for instance, also varies. The underlying aspect, ritual meaning, and social significance of the event is more variable (ibid.).

Therefore, from the previous discussion and according to Rapoport (1993), it could be argued that: First, variation of built environments accommodating activities contributes to the reasons of the variability raise as one goes to the underlying meanings of activities. Second, meaning is not merely part of function but the most significant function. Third, one cannot consider a specific activity on its own, yet one has to consider it as a part of a holistic systems of activities, which again varies between cultures and amongst diverse groups within the same culture: for instance, males and females in Muslim societies (Wheatley, 1976), the elderly people and rest of the society in North America (Golant, 1972). To continue, one should bear in mind that the nature of these groups may also differ with respect to culture: i.e. tribes, families, clans are appropriate in some cases; classes, peer groups, occupational groups in others. In this regard it is worth mentioning that (Rapoport, 1983c) advocates that settings; users' behaviour and activities; and the relationship between both of them are specifically related to culture.

In addition, there are individual differences, which cannot be considered neither in research nor design. Nevertheless, it is valuable to study the variability within different groups as well as within one group (Rapoport, 1993). Accordingly, this research is being conducted regarding different types of users.

Furthermore, and grounding on (Coolen & Ozaki, 2004) the research advocates that culture rules how people think about and use a space. Moreover, it caters contextual information that facilitates understanding meanings.

## **5. Case study**

### *5.1 Backgrounds of Al-Azhar Park*

The Azhar Park (dating back to 1984) is located on a high contoured site in the eastern part of the medieval city of Cairo, commanding spectacular views all around. The garden has on its western side the old Fatimid city and its extension Darb Al Ahmar, with their rich heritage of architecture comprising mosques, madrasas and mausolea, with a view to a long line of minarets. On the southern side Sultan Hassan Mosque and its surroundings are found, as well as the Ayyubid Citadel. To the east of the garden lies the City of the Dead with its many Mamluks complexes (Bizzari, 2010) (figure 1-a).

In recent years, this area became central to Cairo, and lacked green space, the thing which lead His Highness the Aga Khan to donate the \$30 million (USD) park to the citizens of Cairo in 1984, of 30 hectares (74 acre). The park is part of a socio-cultural and economic development project of the whole area of Al-Darb Al-Ahmar

aiming to improve the life quality in the district (ibid.). In fact, the park was a result of a fruitful collaborative work of the Aga Khan Trust for Culture (AKTC); the Egyptian Government; local NGO's and the local community (AKTC, 2005).

Interestingly, the original site was a garden during the Fatimid period in the late 10th century. Then, almost 500 years ago the site was turned into a rubbish dump, which was a technical challenge because during the new park's construction a huge amount had to be removed. Furthermore, it is worth noting that the site clearance revealed a 1.5 km section of the historic Ayyubid Wall of Cairo (late 12th century), which necessitated more archaeological excavation and conservation work (ibid.).

### *5.2 Methodology of Field Work*

The methodology conducted for the field work employs both participants' observation and interviews as the main method of gathering the sought information (Bechtel & Zeisel, 1987; Jorgensen, 1989). The observation was based on Rapoport's (1993) argumentative question "who does what, where, when, including or excluding whom (and why)?" in which he believed that answers are cultural specific, hence 'design' is used referring to intentional changes introduced to the built environment (Rapoport, 1983a; 1983b; 1984; 1985a). While interviews, despite being very few and only carried out to clarify unclear reasons and/or backgrounds. Furthermore, conducted observation adopted Rapoport's (1983c) view focusing on two main parallel lines that contribute to the understanding of the park and its occupants in relation to different types of elements (fixed, semi-fixed and non-fixed), in addition to the nature of the occupants and their activities. Those two lines are: physical and non-physical elements. The former regards the park elements, buildings and furniture, which is correlated with Rapoport's first two divisions (of elements' types) and discussed under the title 'Physical Settings of the park'. While the latter concerns the users and their activities, which is more related to the non-fixed features and elaborated under the 'Non-Physical Elements of the Park' comprising activities taking place, performers, relationship amongst them, and the context that contained such activities.

Thus, the observation has applied a twofold method, first applied in weekdays, second applied in the weekends. As for the weekdays, observation was conducted on sessions of two hours; two sessions / day. First session started at late morning 11:00 am, while the second was performed during the evening starting at 7:00 pm. As for the weekends participants observed the users in a two hours / session; three sessions / day, morning 9:30 am to 11:30 pm; early evening from 5:00 to 7:00 pm; and at night from 8:00 to 10:00 pm. The total duration was for two weeks in July 2012, because the park is usually more occupied by users during summer (holiday season).

Then, due to the social and political unrest seriously developed in Egypt during the past few months (started around November 2012 and reached its peak during the summer 2013), a recent update was undertaken in August 2014 to verify the results that were reached in 2012 visits. This update followed the same observation protocol conducted in 2012. It is important to note that July 2014 was avoided for coinciding with the fasting month of Ramadan, in which social patterns and practices change significantly that affects the visit flow of the park and consequently is very likely to influence the findings.

It is worthy to mention here that the observers were the researcher assisted by two junior architects. During the process the observers documented their observations, including behavioral patterns of users, in order to simplify the recording process.



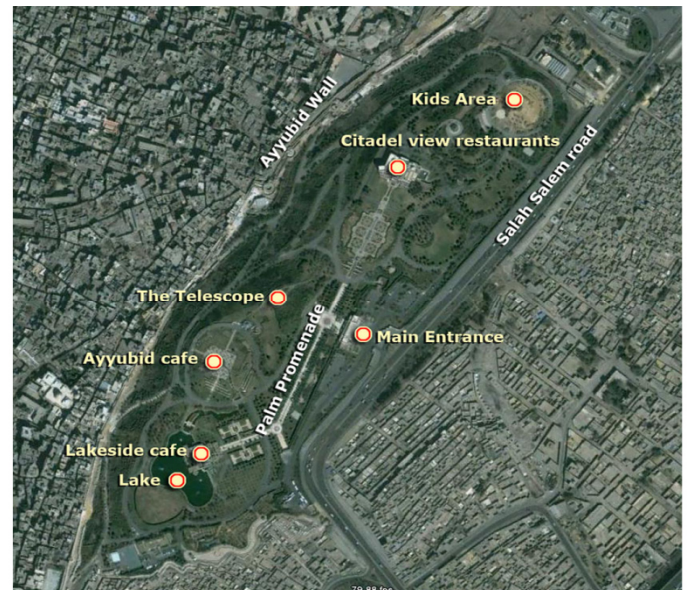
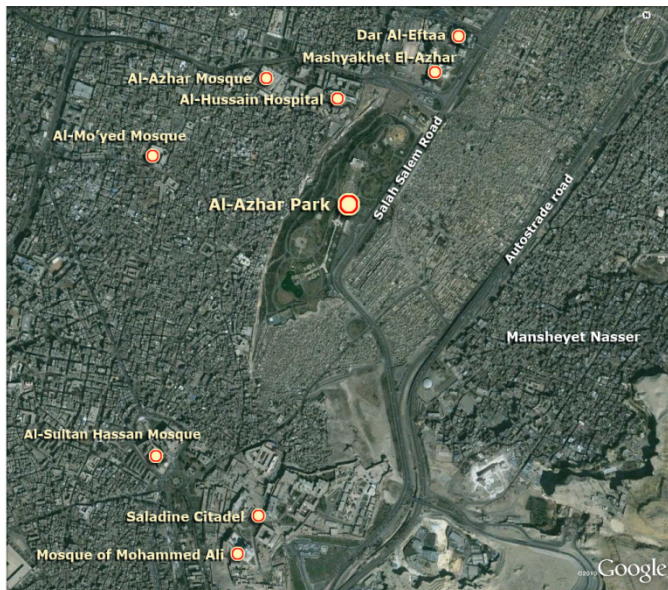


Figure (1-a): (Left) Map showing Al-Azhar Park within the context of the historic city of Cairo  
(Source: Google Earth, emphases by the author).

Figure (1-b): (Right) Park's layout (Source: Google Earth, emphases by the author).

### 5.3 Physical Settings of the Park

"One can observe which elements are used for what ..." (Rapoport, 1983c, p.94).

This section of the paper introduces the fixed and the semi-fixed feature elements of Al-Azhar Park throughout a description of its physical settings.

The park is accessed through a main gate on Salah Salem road. The gate allows both pedestrians and vehicles. Then pedestrians are lead to the tickets vendor followed by the park's entrance. While vehicles may go to the main parking area then follow the same procedure as pedestrians; or they may go to the hilltop restaurant to park there. There is another entrance from the Ayyubid Wall on the opposite side, connected to Aslan square at the old city. This entrance is mainly used by the residences of Al Darb Al Ahmer. Finally, a new entrance was recently added also at Salah Salem road from the new car parking building.

The central feature of the park is a main thoroughfare which penetrates the full length of the site as a promenade linking the hilltop restaurant at one end and lakeside pavilion at the other. The walkway is adding a sense of liveliness to the park by several water features, (i.e. fountains, pools and channels). These features were inspired from Islamic gardens (Bizzari, 2010) (figure 1-b).

Al Azhar Park has, in addition to the Royal Palm promenade, many shaded walkways; geometric garden; a children's play area; Southern lookout; Northern lookout plaza; historical wall promenade and amphitheatre; water cascade garden; an outdoor cafe 'Trianon'; a huge lake; a hilltop restaurant (Citadel view restaurants) and lakeside cafe (AKTC, 2005) (figure 2).

The hilltop restaurant, meets traditional Cairene architecture, having a central courtyard with a small traditional fountain. While the lakeside cafe, with its wooden screens and the cluster of white pavilions floating on a lake gives new life to the adopted traditional Islamic architecture (Bizzari, 2010) (figure 3).

Landscaper utilized the contoured levels of the park and used a diversity of trees and plants from around the world, with tags attached to each kind. Large areas of grass were one of his priorities to enable people to sit on and enjoy themselves. In addition, water elements played a vital role in the landscape design which added a sense of liveliness to the park. Although not enough and lack shading, seats are scattered here and there varying from fixed wooden seats to fixed benches made from brick covered with terrazzo (figure 4).

Lighting units are distributed all over the park with a hierarchy of strength, for example strong lighting units are available at children play area; medium strength next to seats and pergolas; while the low lighting units can be found scattered on the greenery. Signage (including maps) is spread here and there (figure 4).

The walkways have a hierarchy of widths and use of materials, i.e. the main walkways' material are asphalt; then walkways of interlocks, tiles and stone. This variation of material use proved success in the hard-scape of the park and being non-monotonous.

#### *5.4 Non-Physical Settings of the Park*

"One can observe which elements .... are changed how when uses change" (Rapoport, 1983c, p.94).

Following Rapoport's view of observation, this section elaborates on non-physical elements introducing the non-fixed feature elements of the park (users and their activities).

The park is usually full of visitors in evenings, which is considered the peak, despite the fact that it starts at 9:00 am. This is, basically, due to the hot weather of the summer and professionals' working-hours commitment.

During mid-day visitors of the park are, mostly, couples (both young and middle-aged). As for the evenings the predominant visitors are either families, extended families or even multiple families meeting together. Youngsters, middle-aged friends and elderly couples were also seen in the park, sometimes on their own, other times with their families.

As for activities, it was realized that there is a good blend of visitors and a pleasant experience with an activity for everybody. Most families were relaxing, chatting, playing with children, celebrating, dining or just sitting to enjoy the scenery (mostly the elderly). Youngsters were spread all over the park playing games and mingling in different activities. Some middle-aged visitors were seen wandering in groups of two to four and mostly around the lake's edge and along the main spine. Middle-aged couples were observed in the lake-side café as well as the hilltop restaurant, where a number of families were noticed as well. Children were playing in their specified area and running here and there. Lots of visitors liked the idea of having musical shows and attractions at the open theatre. In brief visitors became to be from many different standards all enjoying leisure, recreational activities and the spectacular place.



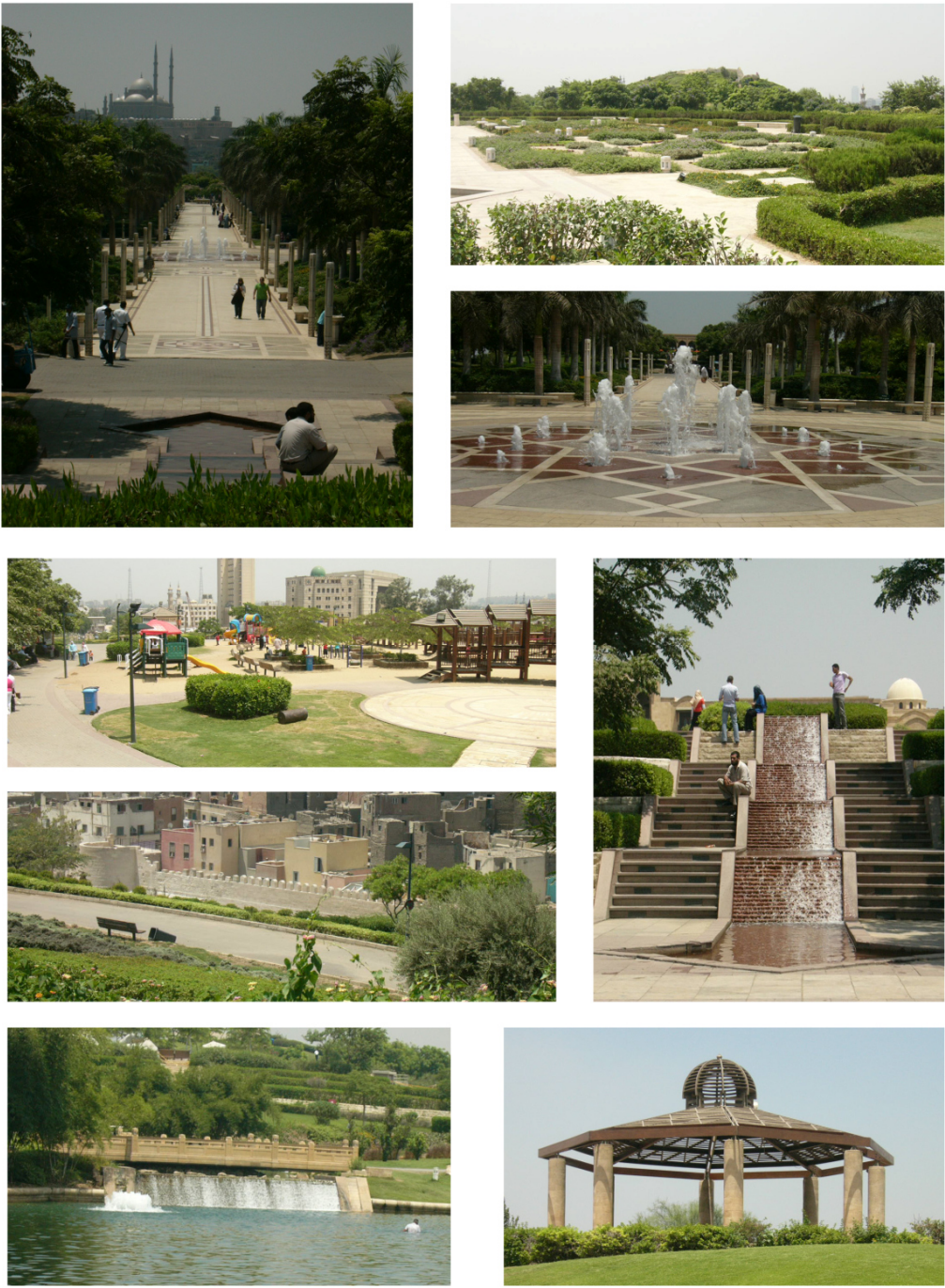


Figure (2): Some of Al-Azhar Park features (Source: Author).



(3): (Left) Main promenade. (Top) Right Hilltop restaurant. (Down) Right Lakeside café.

(Source: Author)

### 5.5 Discussion

The following discussion aims to analyze and interpret all results of the case study comprising observations and conducted interviews. This discussion has basically three main facets. First, sheds light on some general aspects of the park that were noted by the author and his team. Second relates to the cultural dimension of the performed activities as suggested by Rapoport (1993), which is built upon a clear understanding of the park's different types of elements (fixed, semi-fixed and non-fixed). Finally, the discussion goes through a thorough analysis of the performed activities in the light of Rapoport's activity system model

#### 5.5.1 General Aspects

In this section the paper elaborates on the design of the park. It starts by a brief discussion about the design concept of Al-Azhar Park. Then it sheds light on the impact of the design on the adjacent Salah Salem Road.

To start with, the conceptual design of the park is believed to be adopting the Islamic philosophy in its architecture and landscape. The main concept is based on a major axis penetrating the park from North to South, which resembles the 'Qasaba' of the Fatimid Cairo (figure 1-b). In addition, a number of other features can be found here and there, e.g. the seats in the shaded areas are inspired from the 'Takhtaboush'.

Furthermore, courtyards, domes & mashrebeyyas could also be found in the buildings, especially the hilltop restaurant, including a Takhtaboush, arcade and vaults as well.

As for the lakeside café, it inspires the philosophy of Islamic architecture. Its design is based on a number of compartments with a central square courtyard having palm trees and a water fountain with canals being inspired by the old Islamic gardens.

On another level, having the main access of the park on Salah Salem road (highway), resulted in a car congestion problem outside the park on the road. This could be justified by a number of reasons that are: a long car queue outside the park waiting to enter the park; a large number of taxis waiting for park visitors to drive them to their destinations after they finish their visit; a number of visitors cross the road (highway) to catch up with their means of transportation.



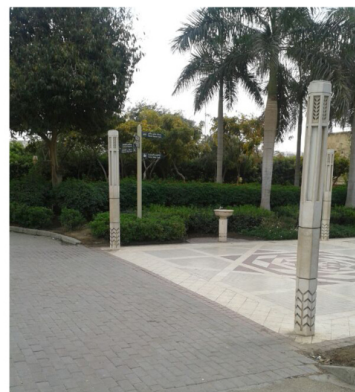


Figure (4): Park's furniture [Seats, Signage and Lighting units]. (Source: Author)

### 5.5.2 Cultural Dimensions in the Performed Activities

"Activities are direct expressions of lifestyle and ultimately of culture" (Rapoport, 1993, p.11).

Referring to the theoretical framework in regard to dealing with activities as a part of a holistic system of activities, the research is adopting a methodology within this respect considering that, more or less, all users of the park are from the same cultural backgrounds. However, they may be considered as variations within the same culture. In other words, the park users will be dealt with as different groups within the same culture. Hence, the study is conducted on two levels: first variability within different groups and second, variability within one group with respect to age, gender, interests ... etc.

Upon the observed activities in the park, motivations of visits were concluded. There were variability of activities within different groups, for instance, they had different preferences of the sought location whereby they carried out their activities (i.e. Hilltop restaurant, lakeside cafe and 'Trianon' outdoor cafe for food and beverages; some groups preferred to sit beside the lake, while others enjoyed sitting on the grass enjoying the scenery). This sheds light on the correlation between undertaken activities and spaces whereby they were performed. Moreover, it was clearly seen that there were also a diversity of activities within the same group (i.e.

family or extended family) with respect to age, gender and interests. For example, children enjoyed their play area; older groups better liked playing games; middle aged couples were wandering; while the elderly preferred sitting, relaxing and enjoying the view. On another level, this variability was also evident in relation to gender, as most of the male youngsters were very much enthusiast about football unlike females (despite being prohibited). Yet, those activities could be seen from the 'interests' perspective as well, i.e. eating, playing, wandering, chatting, ...etc.

### 5.5.3 Performed Activities in the Light of Activity System Model

"It is the relationships of these objects, behaviours, and people to the setting that have meaning and can be 'read'.." (Rapoport, 1983c, p.90).

The research is based on Rapoport's methodology, observing behaviours of the park's visitors. It explores various settings; the cues within them; and try to find out how do park users interpret them (Rapoport, 1983c). Hence, the research studies deep dimensions of activities - Rapoport's activity system model with its four main aspects (nature of activity, how is it performed; association with other activities; and its meanings). This is applied by observation of both semi-fixed feature elements and non-fixed feature elements (ibid.).

The research is attempting to interpret the previously mentioned observations in the light of Rapoport's activity system model. Firstly, in regard to the time of visiting the park, some couples prefer mid-day times to avoid the crowd in the evening to better enjoy the scenery without being disturbed. As for families, evening is the most preferred time for two reasons: one because of the hot weather of the summer; second it is due to the nature of the Egyptian families, evening is the time where everybody have finished his/her work, the father returned back home, the mother (housewife) has finished all house duties.

Secondly, in regard to activities, visitors enjoyed themselves performing outdoor activities. Those are either activities could not be performed at home due to their nature (running, jogging, kids play area, wandering enjoying the scenery ...) or activities needed to be performed involving large number of participants who could not be all accommodated at home as it adds to the participants pleasure performing some activities in large groups, not to mention enjoying the outdoor breeze.

Applying Rapoport's activity system model to the case study, it is claimed that the main activity is to enjoy outdoors, which is an activity carried out by different people around the globe. Egyptians carry out such activity in groups during evenings in the summer and day time in the winter due to the nature of the climate, in addition to the previously mentioned reasons. From what is mentioned earlier such activity is associated with other activities that are: relaxing, chatting, playing with children, celebrating, dining, playing games, wandering in groups, watching performances or just sitting enjoying the scenery. The underlying aspect, ritual meaning, and social significance lies, basically in the fact that although visitors are from various standards, there is always something for everybody to enjoy the park, which added to the value and the reputation of the park and consequently, the number of visitors was increased. Furthermore, as realized, most activities are performed on a non-individual basis, they are performed by couples or larger groups. This could be due to the Egyptian culture and the nature of Egyptians who enjoy performing entertaining and mingling in activities in groups rather than individually, unlike other places in the world where people enjoy more individual activities. This highlights the significance of the cultural backgrounds as cited by Rapoport.

## 6. Recommendations

Capitalizing on the previous discussion, it could be argued that the park is performing good and most of the users were satisfied that the park met their expectations. Nevertheless a number of recommendations emerged out from the researcher's observations, conducted interviews, and the preceding analysis as discussed below:

### 6.1 Physical Settings of the Park

Rapoport (1993) suggests that improper design decisions affect activities, may make them difficult, may distort them, or even may make them impossible. Hence, it affects the success of design and the level of satisfaction of the park's users. Noticeably, this is present in the park, as some of its design aspects support specific activities and constrain others. For example, the main entrance of the park results in the traffic congestion on the main road (Salah Salem). It might be better to consider the idea of promoting the other entrances and propagating for them. This will contribute to solving the congestion problem especially during holidays.

As for the landscape, the landscaper considered all details, which resulted out the fascinating look of the park. The contoured design idea of the park is successful in granting diversity of spaces for various activities. Children play area is well designed, secured and well taken care of, which attracts families to the park. A large variety of plants from different parts of the globe with attached tags are scattered throughout the whole park. Different types of seats scattered around the park, in spite of being exposed to the sun and not sufficient. More signage with better legibility is better to be added in various areas. Lighting units vary from the high, medium height and the floor leveled units, depending on the objects needed to be lit (pathways, trees, plants, seats, ... etc.). Yet, it is recommended to add some lighting units to the poor lit areas and to the fence surrounding the park, which will contribute to the aesthetics of the park from the outside.

### 6.2 Non-Physical Settings of the Park

Playing football is forbidden inside the park. In spite of the fact that there is a passion towards this sport and a wide range of the community consider this as best way of entertainment, especially amongst youngsters. This is an issue that needs re-consideration, as it upsets a large number of the visitors. However, playing football in the park may annoy those who came seeking peace and enjoying the good scenery, so it has to be dealt with carefully, possibly by specifying certain area for such activity.

## 7. Conclusion

As explained above the paper's main aim is to evaluate the extent of fulfilling users' satisfaction. To accomplish this objective, the paper discusses the users and their pattern of activities; as well as the influence of the park's design on their behaviour. In other words, the paper discusses the relationship between the physical environment of Al-Azhar park and the users' interaction on two levels. First, how physical arrangements of the park affect users' interaction. Second, how the physical environment expresses different identities of both individuals and groups. It correlates action language (walking, playing, ...), to object and spatial language (non-fixed, semi-fixed, and fixed-feature elements) (Rapoport, 1983c). This is where the need of a tool that acknowledges those two languages arises. Rapoport's theories were found appropriate for such purpose. Thus, Rapoport's theories well contributed to build a clear understanding of the park, the users and their activities.

Responding to Rapoport's question "who does what, where, when, including or excluding whom (and why)?" (Rapoport, 1993) the research findings and discussion complied with his belief that answers are culture specific (Rapoport, 1983a; 1983b; 1984; 1985a). Furthermore, he suggested that in order to understand the deep meaning or the underlying meaning of the conducted activities, it requires some cultural knowledge. Thus, the research was able to come out with different interpretations for activities conducted by the park's users. In this regard, it is very important to note that these readings and results go entirely in line with Rapoport's findings and conclusions.

However, it is worthy to mention that such social interaction is studied by observing the non-fixed feature elements and their consequent analysis. This facilitates analysing semi-fixed and fixed feature elements. In which, it came quite obvious that both fixed features and semi-fixed features have an important role guiding behaviour in settings and both are as much important as the non-fixed features (Rapoport, 1993).

As for the park, it succeeded in attracting a large number of visitors. This is confirmed by the congestion in and outside the park, especially during holidays. This indicates that the park met visitors' expectations and fulfilled their satisfaction to a far extent. Park users are, basically, couples, families and extended families. A wide diversity of recreational and leisure activities are being performed, which is a necessity to release life-stress in alive and dynamic cities such as Cairo. The design of the park promoted some types and patterns of activities and constrained others, which were adapted by the physical space in order to be accommodated.

Similar developments are highly needed to cover the lack of open spaces and give the public accessibility to destinations for relaxation, entertainment and leisure time.

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