Childish Architecture look at the thoughts and psychological of childhood world

Solmaz Amir Zadeh KHEIRABAD

1MA student of architecture, Payame Noor University unit of Bandar Abbas

Received: 22.03.2015; Accepted: 29.05.2015

Abstract

The purpose of this research is how to design architecture for child and should completely different and specific to he himself be done is the that by knowing full of personality and spiritually-the child and needs of he begins, because the soul is pure and simple a child is vulnerable and affected by social factors around them, and the need for research on how to design the most sensitive population is inevitable. After reviewing child psychology, in order to design an environment favorable to research on issues of aesthetics favored him and the expectations of the environment by examining the colors and forms of his thinking and identify measures commensurate with the need to be explored. In addition, library studies, field studies with the presence of the children, especially the study of paintings are also used and results of library studies as well as practical observed, because the expectations of the children space to play and drawings are also searched. Thus, a child's drawing can be seen as a bridge for linking the world of childhood and children with mental expectations designer. Citizen immature child that is born clean and feeling on top of things and his activities are not logic and argument. His world is a world of play and excitement, disproportionate violent and unsafe environments, scary and dark forms, colors and feelings of insecurity. His time with sports, poetry, music, painting and storytelling time and a keen interest in nature, touching the water, green space and it is fun to see the animals. Including cases where in architectural design to achieve project success to help children include: Use the form of a combination of creative and new, providing toys and entertainment, create curved lines in levels with an create difference level of by clear and obvious but secure in the body of and floor for the provision of accept Adjacent to and welding and Activity and curiosity child, create spaces cozy and private on the side of spaces game collective, the application of colors happy and proportional to the spiritually-children in different levels, Use of materials soft and flexible and diverse for of different land uses, observance of proportions childish, application of natural factors such as water and green space and animals in inside and outside, creating connecting bridge transparent among different spaces internal and external, securing child in the all accept game and activities. Beside these accept rest he also be provided, in such an environment sense of security and tranquility and sense of belonging in he is created and with the environment familiarity takes place.

Keywords: child architecture, child psychology, child thinking

1. INTRODUCTION

when mankind's understanding of the purpose of the architectural design has been dedicated to him, in every society and culture methods and criteria for this purpose has been different, in our society, the children's attention to the child and the architecture can be said is still in the beginning of the route and only in the last few years is paying particular attention to this issue and more generally for adults shaped cities. The purpose of this study was to investigate the character and needs of children and their architectural design criteria and result in the design of it is obtained. A city that does not pay attention to their children in past generations, and their future is not regarded. (Shia, 2006: 8) Children are the most vulnerable and the most affected age group make up society. Even his society and culture can be distinguished from others. Children with simple and clear thinking that after the family formed the basis of personality they are into the urban environment and expect the world simply and sincerely have designed a world-scale children's, a world of colors and forms attractive, a world of comfort and security, not fear and anxiety, and a world of dream and imagination it is clear that the role of children in cities that these suitable for the healthy upbringing of children in the community. Michel Mansiyo
believes that once the children were considered as the digestive system, and it was thought that the food does not require anything passed. This means that the growth and development of children, but there needs to sound human environment is required. (Shia, 26: 2006)

In order to achieve efficient design of the human environment must first understand the child and the child's personality and after reviewing his psychology, to research the issues and expectations of child desired aesthetics of the environment by examining the colors and forms of his thinking and identify appropriate measures to require him to be able to design an optimal environment for this segment of society was delicate and healthy growth and educational background to succeed. In this study, the first all those good and pleasant for the child is psychologically and social development and help create a better relationship with the environment and according to his mood raised and finally how to use them in architectural design has been efficient and accurate that can be to the design failed to comply with standards and provide functional features, the most important requirement is designed to reach children.

History and necessity of research

Due to the special design for children's issues in recent years has attracted special attention and studies on this subject, especially in our country is at the beginning of the route and most research in the form of books and articles have been published, is about 3 or 4 recent years, to increase awareness and understanding of the needs of the country most affected population, more and more research is needed that results are placed in the hands of designers and people involved, in the hope that architecture and urban design's role is not to forget.

Research Methodology

Based on purpose of this research is a fundamental research and from theoretical methods based on library studies and experimental method is based on field studies. Here's target population or mothers of children (aged under 15 years) and the selected samples included 150 children from the community who have been randomly selected. For achieving the research findings, conclusions and observations practical studies in any part of the research library that studies conducted on the sample. Of each selected samples were asked to individually draw a painting in which all the issues that they portray a pleasant and lovely, because painting is his favorite children simple vision of the world and to achieve the desired result, individual and group research by talking with them about their interests and a few days in the Games and gatherings in various places there and have monitored their behavior and attitudes.

Who is the child?

Several definitions explaining the meaning of the child can be seen in various countries: According to the definition Persian culture Moein, meaning small children, minors and children who have not reached puberty (boys or girls) or the child has been, in the American Heritage Dictionary of the child as a person between birth and puberty is mentioned. In two the above definition means a child is the same. (Shia, 13: 2006) Universal Declaration of the Universal Declaration of the Rights of the Child on the matter of a child who knows that less than 18 years old unless national laws recognize the age of puberty less. Piaget described children in different age classes have different cognitive skills of space and in terms of his mental development and mental development is analogous organs of the body as they walk towards a balance, and this progress is gradual and each step of the step by step development of mental balance, mental and psychological growth from birth has been completed in about 16 years. In general, according to various definitions can be criteria for the selection of the child before the age of 15 years maturity with a different mood and characteristics.

Childish expectations from space

Human feelings and actions made by the ability of the natural environment and cultural and inner character are limited. (Lang, 1938: 95) Always have your child's social world of adults who are willing and rules for outer and material world, he just does not realize that it is compatible children cannot think like adults and even their emotional needs not satisfied with the adjustments. The adults are almost completely compatible with the environment. (Piaget, 2004: 73) This is where the architect must take steps in the opposite direction, that is, instead of trying to adapt to the child consistent with the child's environment, address the child's environment and its design logic and reasoning rather than emotions take over, because children do with their lives in a world of illusion and recognize irrational thinking and reasoning in thinking has no right and wrong. From harsh environment insecure, scary and dark
forms and colors runs out of proportion. His life is happy with the commotion and activity. Children interested in playing with their environment, sports, poetry, music, reading, painting, feeling character, storytelling, seeing wildlife, open space and green, seeing the Sunnis, watching television and leisure time to time they make up the majority. (Karimian and others, 2001: 148) Plato taught music and physical education in children younger than 10 years of education. Aesthetics factors in the space are designed for the child shall be such that he will encourage training. Hence environment should be a happy and full of energy with respect to age group and by the colors and volumes created palpable. Enjoyable environment is a key factor for children providing the clarity and readability of the environment. Kevin Lynch says video pleasant environment makes a person a sense of security. He also, in order to have a clear picture of the environment such as that one can easily understand the components and put them together in your mind in terms of the relationship. In fact, the order of psychological security of the process that feels nice to the environment. (Architecture and culture, 46: 26)

Expectations of children space to play and drawings searched. Every detail exactly what is pleasant for children and simple way to depict their fashion, nature, animals, music, dance and play. Therefore, a child's drawing can be seen as a bridge for linking the world of childhood and children with mental expectations designer and researcher in the field. Most children love to draw and paint the differences between children of different ages but are more common concept of nature can be seen in all of them. Drawing the line, and that any activity could represent a form of primitive art and one of the game evolved and is more creative. The reason is that with such a visible feature is the ability to provide understanding of abstract and mental complicated scenarios. At this stage child is unconscious issues and problems that arise in relation to adults, he suggests and true to the concept of the game and especially for his paintings comes as a social activity. (Oliverio Ferrari, 9: 2008) Therefore painting is not only a means of fostering creativity and maturity of the child and it should be investigated as a means of exchange and social environment for adults and children considered as a sign of emotional states. According to the concepts of child psychology in the design and use of light, color, texture and helps to create innovative rhythm to help children with mental prosperity and help them to track individual identification. (Journal of Architecture and Culture, Number 46: 17)

**Child play**

**A- Effervescence and mobility**

A child's world is the world of games and commotion, running and jumping and friendly get together. Most healthy is always with those who move; move freely and without boundaries in large environments and natural. But, unfortunately today the possibility of life destroyed by urbanization. Children, in a small house without a yard and generally working for parents, they are without the presence part of the day, homes are getting smaller, tighter and are darker and feature games and free movement of children and parents are returned tired from work due to work pressures suffered during the day, generally from them expected to pull together and inactivity are associated with noise and children's play time.

Piaget, Swiss psychologists famous introduced five criteria to recognize playing: (Azmoudeh, 2011: 7)
- The game has its purpose.
- Play is voluntary, not mandatory.
- Play is nice and pleasant.
- Play lack of organization.
- Play is free from the shackles of conflict and aggression.

Gross Carl was the first time found meaning and function of children is essential not only for refreshment. But he knew things match practice for the introduction of future activities. (Piaget, 2004: 77) Providing toys and effervescence of design requirements is a place for children. Child playing with familiar objects and events to be repeated daily interactions in the game, and this experience led him to wonder and to better understand the use of objects and finally the results obtained from these experiments is that all this helps her to better mental development. Monte Surrey doctor knows a great school game in which your child is growing and the physical, mental and social development and be prepared for life in every way. (Azmoudeh, 2012: 6) Most children in the course of their work have a great interest in hiding and alone and one of them is the most enjoyable Games and generally when they are emotionally affected by a particular issue, corners and areas as a refuge for himself chooses and time spent, and this is relaxing.
B- Presence nature in the game

In general, children's games are along with gusto and enthusiasm and with a smile and leads to not isolation of children in the community. If children play in the natural environment and nature made the greatest impact on the growth of the child because he loves nature, trees, animals, birds, and soil and water the most. (Picture 1) In terms Jean-Jacques education should be child's normal growth and development during the streaming server and a good teacher to his nature and nature as far as possible to the child's release. (Shia, 64: 2006)

Image 1: The interest of the child to touch the water, soil and plasticity of the first months of life and play with it without any legal rule and maintain this interest with age but with a meaningful purpose and design. Reference: author - forum.mahdportal.com

In the study of 150 children of all ages from 5 years to 12 years with different social emotions were asked to do anything that is his favorite and these tend to spend their day to portray and while most of them were isolated and away from each other, after reviewing painting and talk to them the most important things that can be seen in the paintings and in terms of particular to explain the psychology or the children themselves, as shown in Table 1 were determined:

<table>
<thead>
<tr>
<th>Explanation</th>
<th>Drawn percent</th>
<th>Object</th>
</tr>
</thead>
<tbody>
<tr>
<td>Different animal can have difference reason and after talking children, the causes are cleared and always show interest of children to animal and to play them</td>
<td>57</td>
<td>Animals</td>
</tr>
<tr>
<td>Ground stability and the security indicator is Being green, the child goes back to the spirit of friendship and love of nature to comfort and safety while the children play on the floor.</td>
<td>55</td>
<td>Green ground</td>
</tr>
<tr>
<td>Every part of the tree draws particular interpretation of children's drawings, but in this study, most children trees with medium body and smooth, with branches regularly drawing that represents the aspirations and ambitions in terms of the psychology of the child and represents a highly sensitive child who simply understands the issues and is able to communicate with others, and sustainability.</td>
<td>54</td>
<td>Tree</td>
</tr>
<tr>
<td>Image of the Sun represents the life, security, happiness, heat, power and according to some researchers, the father symbol is desirable. In the rest of the paintings that depict the sun was not yet fully observed signs that the light of day, the presence of dark and the moon is not in the children's drawing symbol.</td>
<td>51</td>
<td>Sun</td>
</tr>
<tr>
<td>Cloud, in paintings of children is mother and is a sign of tranquility. If the relationship is good parents, take the cloud. The numbers of clouds, if two or more are good.</td>
<td>49</td>
<td>Cloud</td>
</tr>
</tbody>
</table>
Childish Architecture look at the thoughts and psychological

| Water is source of life and a symbol of motherhood, emotions, sensory perception and imagination. Lakes and the ocean needs the support of the child's mother is specified. But if the water in the act of painting represents have overcome with the excitement of extreme and widespread reception of the child. But since the water slope of the land is consistent with the expression of flexibility, compromises the moment, daydreaming and dreams processing. | 48 | Water |
| How shape and appearance of the house often in the form and returned the child's life, but the paintings are common in the heart of nature with open windows facing the outside of the house that represents the interests of children a sense the presence of nature and is natural factors in any situation. | 45 | House |
| Most of the time, children's play groups, children shows, and this type of painting take its real position and their relationship with others in the group and often self-children in the group, which is a sign of adaptation, is drawn. | 40 | Participating in group |
| Mark's interest in the effervescence and jumping up and down and even eat least and generally non-stationary and uniform. | 36 | Joint mountain |
| The allocation of part of daily time watching his mood cheerful and good fun | 32 | Television and characters |

Cases outlined in the table above natural factors and the presence of a child's interest in nature and tend to it. Although not all the paintings are a common but they are definitely one of the natural factors is drawn.

**Child and color**

Colors in personality, especially children, more effectively, causing emotional experience such joy, laughter, sadness, grief, tranquility, irritability, inertia and excitement is, this attribute the rise in children. Due to their pure and happy and vibrant spirit of its vivid colors and combined that with the right mix placed prefer, with different colors can be small or large size and weight of a certain object, lighter or heavier. (Hosseinpour, 2012: 83) psychologically warm colors are (red, yellow and orange) stimulating, because activities and effervescence, inspired by the light and joy of life and productive. While cool colors (green, blue and purple) states passive, are dead. Neutral colors (gray) represent introversion, reasoning, autonomy and productivity attack and tend to be impregnated. Can be see the colors in the painting deeply internal states and feelings children easily understand. (Picture 2)

![Figure 2](image_url)

**Figure 2:** This paintings drawn by children 4 years old and live more warm colors and it attracted my attention. Even the use of the spectrum of cool colors such as blue and green colors to warmest and most of them and to terms of review of social psychology, the painting represents, lively and dynamic and effervescence interest in this character is high. Reference: author

Colors are used in two ways:
1. The natural and physical prototyping - for example, sea blue and grass green
2. Unconscious use of colors without determined law

Of course sometimes children feel that the first method is based on the colors of the elements, etc. is like the sea change and in terms of them-selves have chosen the right way. Time passed it is possible to understand and correct. At reviews paintings drawn by children in the study in terms of how the painting and the use of colors, the results in Table 2 have been obtained. In fact enthusiasm of the child to communicate with colors helps to make contact with the surrounding environment.
Table 2: Results how to paint a painting for children, Reference: author

<table>
<thead>
<tr>
<th>Explanation</th>
<th>Drawn percent</th>
<th>Painting mode</th>
</tr>
</thead>
<tbody>
<tr>
<td>Represents consistent, active and vibrant spirit and social life</td>
<td>79</td>
<td>A variety of lively colors and bold</td>
</tr>
<tr>
<td>Represents isolation and lack of communication with the outside world</td>
<td>13</td>
<td>Use one or bicolor</td>
</tr>
<tr>
<td>Represents introversion, reasoning, self-determination and attack efficiency</td>
<td>3</td>
<td>Use neutral colors and spirit</td>
</tr>
<tr>
<td>Represents emotional vacuum or sometimes because of anti-social tendencies</td>
<td>5</td>
<td>No coloring</td>
</tr>
</tbody>
</table>

**Scale childish**

Architecture is necessary associated with the intake childish is in direct proportion. Requirements to ergonomics or physical characteristics of children interpreted, issues such as the physical scale of the child and what height the world and looks around. With the scale is designed to fit the child's sense of alienation and insecurity completely and totally space he sees his own. Of the most important cases which in accordance with the scale in their design to create a sense of security in the child can be to dining room and bedroom furniture and health services? Should strive be the size of a table and chairs, toy chests, door handles and valves height couches etc. designed to suit children's sense of security and belonging in his scale is created. (Picture 3)

**Image 3**: Dallas Public Library Children's Room (Lockwood branch) All chairs of the study, rest furniture, windows and shelves of books and materials fits perfectly with the physical dimensions of children and parents waiting room is separate from this department. Reference: msrdesign.com

**Light and ventilation**

Light is architectural principles in ensuring visual comfort space. The child afraid of the dark and light enough to show plenty of passion and desire and there is enough light for eye health and vision he is very important, his focus is increasing and later work and play tired, and her energy levels increased. Especially if natural light is used, the more positive effects, on affect his morale. Position place skylight openings for with course will have different effects. Especially if the place drop in proportion to his height be designed and easy to follow light during the day and add to their experiences. Ventilation is essential to work with minimum fatigue and health care for children. Among the actions that can be done:

- Determine the correct location of the openings to the direction of the wind
- Use of appropriate materials in walls
- Use of plants and trees for natural ventilation environment (News, Article codes 09256488)
- attention to locate the space designed for the child is important, space away from all the noise and environmental pollution in order to create a sense of space the child

**Architectural design guidelines for children**
Childish Architecture look at the thoughts and psychological

From start of the study to those of the child's interest and it is pleasant psychologically. But whether what form this architecture must be respected and the results obtained in the design is especially important.

Walter artery in his book Architecture for children translated doctor Ahmad Khoshnevis and engineer Elmira Amir Rahimi to investigate the 37 projects approved and documented in the world for children is designed as an aggregation of architectural design guidelines for children 1- indoor man-made, man-made, 2- life found that compliance with these requirements for the design quality of the experience. Architecture and design books for children written by Maryam Azmoudeh a similar result as design requirements. 1- Children playgrounds. 2- rooms for the child. Also, in an article entitled child nursery design and architecture books looking at the sacred architecture of the authoring Ali Hossein-Pour and Najafi Mohadesoh spaces for children as has been required in the design environment.

In this project aims to achieve an appropriate aggregation undertakes to study the items on each project and the following results were obtained:

**A- The requirements and design specifications environment for child:**

- Common room with good light: open and clear space for meetings and joint activities, such as games and music practice
- Niches, corners, bumps, cozy and attractive spaces for child with a sense of security in various forms (Fig. 4)
- Small and private spaces, can be a variety of shapes, small rooms for private activities such as reading or relaxing design
- Ability to move in height to create additional classes or use ladders and towers and tree houses in order to create a sense of excitement and fly (Figure 5)
- The structure of the house and childish furniture design and respect for child secure and usable scale furniture In order to comfort and style for the child and his game
- Experience in adults: use the tool to find the world of adults and particularly in cooking
- Shelves and drawer toys and library storage shelves and wardrobes and apparatuses in the presence book as the genius and fantasized
- Establish a clear link with the outside world using attractive windows and large terrace to enjoy the view (Figure 6)
- Transfer of nature and open space into the use of green space, water, and animal’s passion for child

![Figure 4: Private and cozy atmosphere and attractive for children. Reference tapja.com](image1)

![Figure 5: Create a new and interesting way to move in height. Reference: memarinews.com](image2)
B - Requirements and Specifications of life for child

- The use of natural factors such as water, plants, animals and wooden life: children and enjoys water services while reducing pollution, such as animals and plants are attractive to child and their life made the child feel tranquility.
- Create interesting and complex topography for adventure: the use of various forms and irregular, hills, slopes, caves and attractive elements (Figure 7)
- Road and flooring and a variety of body and safe for child: Isolation path of non-violent child-floor building with form and texture and colors, which change function depending on the color and texture to be observed.
- Due to the presence children with disabilities: create a gentle slope and protective enclosures designed to create a stronger connection between children with disabilities with others and their isolation.
- Location of rest: a good idea to create a zone of rest in large centers in certain intervals. If resting places designed to be comfortable for children to lie down on the soft ground as it adds to the charm
- Familiar and legible forms and views of children exposed to the elements and form a clear contrast to the baroque forms and new sense of pleasant and comfortable environment in which they are active and feel safe.
- There are toys and game accessories, providing toys and equipment for child to play in the external environment, while ensuring compliance and safety standards required of them.
- Respect factors aesthetics: Environmental Design happy and colorful and full of energy for each age group in order to strengthen child sense of learning

Figure 6: Typical communication between the external environment and the use of windows and large terraces, Reference: Azmoudeh: 2012

Figure 7: create interesting and complex topography for adventure. Reference: ketabak.org

Conclusion
Humans and their activities are important for children over architecture, this issue originated from the fact that states that man and his activities refer to the functional characteristics of the built environment by human qualities that are around them. Thus background and because of this preference, the children are not ready for a good figure and a beautiful cover operating deficits. (Coronar, 167: 2011) Providing functional characteristics and needs of the child in terms of his own, where he can play, (collectively or individually) to pay adventure game to see colors and shapes, according to the scale he made environment, it is bright enough, feel the presence of nature and with all the rest of these terms is also provided, in such an environment and feel safe and secure in his sense of belonging and familiarity with the environment, a child's world is a world of play and excitement, a world without logic and rules of dressing and unchangeable. The use of new forms with creative combinations while maintaining
readability environment, providing toys and entertainment, curved lines at different levels with create clear and obvious, but secure in the body and floor to provide active and working conditions of child, using different colors, happy and fit the mood of children in different levels of design, use of materials and a variety of soft and flexible for different applications, especially distinct paths of movement and respect for the proportions of childish, including child helps to achieve successful design.

Nature is also an essential complement to the man-made environment, if the building is a mix of child environmental context, it is unavoidable. Child with being in the natural environment is energy, seeing the plants, animals, soil and water and, most importantly, the architect must make every effort to apply and use of natural factors, whatever elaborate as the design and apply more creativity in this area to achieve a more successful project. To child and communicate with them and be familiarity, so he wants to participate in shaping and making changes to their terms and conditions of the preset and if the architect to change things for child's participation at different levels to consider, no doubt the child's sense of space has increased and stimulate the creativity.

Subject to all child-friendly design features a designer should not forget that security is especially important in these areas, this issue architecture should addition to be considered in the design and installation of structural details, because he knows and when the risk generally focuses on the issue may not realize the dangers that are around him.

REFERENCES


