



Designing for Children

- With focus on 'Play + Learn'

Design of Play Spaces in the Context of Modern Dwellings

Anirudh, Natuu, Symbiosis Institute of Design, Pune, India, dy_director@symbiosisdesign.ac.in
Shetall, Natuu, Symbiosis Institute of Design, Pune, India, shetall@symbiosisdesign.ac.in

Abstract: The changing urban spaces of the Modern Cities are depriving our children of their natural right to freedom and expression. Multi storey flat culture “the modern enemy of kids and mankind” has to be combated with innovative and comprehensive solutions, to attain the way our ancestors lived in a sublime nature. The changing social and physical behaviors of children with nuclear or single parenting family are leading to issues such as couch potatoes and digital recreation modes, resulting in growing obesity and introvert behaviors.

The value base of play which builds society brings leadership, group dynamics, cultural tolerance, risk management, should be the core to these problem solving initiatives. The paper describes how children in our societies adjust themselves to the circumstances and compromise the free spirit of play. Indian solutions and approach have to be distinctly different within the given cultural structure.

Some of the guidelines and solutions could be system based such as, solutions for play diet, solutions intrinsic to its environment, directions for a mixed community, interactive spaces that grow with the growing age of children .Spaces which are open for discovery and exploring. If we have to really improve the quality of play opportunities, we need to provide natural and creative play settings to our children. These will help them stimulate the senses and encourage their imagination. Problems if dealt today through conscious efforts, will lead to healthy children of tomorrow.

Key words: *Play environment, modern culture, innovative spaces, free play, obesity epidemic, design guidelines for play spaces, unstructured play.*

1. Introduction

Play is so important to optimal child development that it has been recognized by the United Nations High Commission for Human Rights as a right of every child.¹ This Birthright is challenged by many forces such as war, child labor or domestic violence. However, even

the children who have adequate resources and who live in relative peace may not receive the full benefits of play.

The lives of children today are more structured and supervised with few opportunities for free play. The physical spaces in metros have shrunk, today kids have only parking lots, building premises, societies or streets to play. The community spaces and parks are disappearing or are not easily accessible. The area left for children's play are structured and bounded, driving away the real nature of free and active play. Other reasons which are instrumental for the compromised child play could be related to hurried lifestyle as well as an increased focus on the fundamentals of academic preparation in view of children's education.³ New age parents are ambitious, upwardly mobile, resulting in a need for both the parents to work. Nuclear single families and with working parents the interaction time between the parents and children has reduced. Some families can't supervise their children after school, giving rise to 'latchkey children' who stay indoors and attend supervised after school activities².

We start with the premise that play spaces are disappearing or changing. The purpose of this paper is to ponder over this occurrence, to describe the change in social values, to aim the attributes of play, most importantly the need to restore free play in the lives of our children. Play has the potential to improve overall well being of a child: physical, emotional, social and cognitive. The paper offers guideline on how design can advocate for children and families, societies and communities who need to consider and ensure that play is protected, as they seek the balance in kids lives to create the optimal developmental future.

2. Lack of Outdoor Activity a Universal Phenomenon:

The September 10, 2009 headlines of BBC news service states that 'No outdoor play is hurting children'. About 300 signatories consisting of writers, novelists, academics, child psychologists and concerned parents have written a letter to the Daily Telegraph pointing out that "Adults' anxieties are damaging children. Children's health is suffering because they are losing a chance to play outside. Over anxious parents, computer games and school tests are to be blamed for this disturbing trend."⁴

Recently UNICEF conducted research in 22 industrial nations to track down the ill effects of lack of outdoor play. The 22 nations were spread across the world, and the results were not very encouraging. Children all over the world are spending less time playing in the parks and beaches. In short they are confined to indoors. The situation in Modern Indian cities is no different.

The reasons behind these global phenomena majorly can be listed as

- In availability of spaces: This typical urban phenomena has been on arise in a race to maximise profits, and utilise every square inch of available space, leaving children with almost no free space to indulge in themselves.

- Over protective parents: Many over protective parents don't send their children to open spaces, where they might get hurt.
- Absence of and adult care taker: A situation arising in nuclear families, and absence of grandparents at most of the times.
- Highly competitive parents: Over ambitious parents who want their child to be more academically strong, do not give due care and focus to the child's overall development.
- Schools giving out huge amount of home works: This results in virtually no time for the child to breathe fresh air but get the home work done.
- Screen time: Screen time is the amount of time that a child spends sitting down engaging in activity that includes a screen. Screen time includes television, video games, computer gaming, movies etc. With a lack of clear guideline from parents and lack of parental monitoring, the screen time is on a rise.⁴

3. The Effects of lack of Outdoor play activities in Children:

If we take the problem further, to analyse the effects of lack of outdoor activities in children, we come across several articles which elaborately talk of the ill effects due to lack of exercise in children. Referring to the growing inactivity in children in various countries the problem is commonly termed as 'Obesity Epidemic'⁸. Through the statistics available on the US Society -obesity journal and various articles we can see that,

- Reports state that an average US Child spends around 43 minutes in moderate physical activity.
- 15.5 Percentage of adolescents (age 12-19) and 15.3 percent of children (ages 6 to 11) are obese.
- Average US Child spends 20% of his/her waking time watching TV.
- 9/10 parents think that their children are fit, when only 3/10 are.⁵
- Children exercise less as they get older, boys about 3% less each year and girls 7.5%.

Attention deficit disorder:

In a recent national survey of 500 public school teachers and 800 parents, 90% of teachers and 86% of parents believed that physically active children are better able to learn and better behaved in the classroom^{7,11}. Experts say that the children's connection with nature is essential for their development, outdoor play and games are good for kids. Author Richard Long claims that lack of direct contact with nature is leaving our children with attention deficit, hyperactivity disorder, performing poorly in schools and more stressed than generation ago.

These results are really alarming, especially to the Indian Context. With most of the western culture especially food, gaming, socializing being aped by the youngsters. The western culture, western food has already made strong inroads in the Indian Culture. The situation should be of great concern to us.

4. The Benefits of Play:

Play has the potential to improve all aspects of children's well being: Physical, emotional, social and cognitive ⁷. It allows children to use their creativity while developing their imagination, analytical and emotional strengths. Play is important to healthy brain development ⁶. Play ensures that proper interaction of children happens with the world around them. They overcome fear, and can develop confidence of working in a group. They learn to share, to negotiate, to resolve conflicts and self advocacy skills. Unstructured play offers high level of physical activity.

The parent-child interaction helps build a strong bond and gives a sense that parents are paying full attention to them. Less verbal children may be able to express their views, experiences through play. Play and unscheduled time allow for peer interactions which are important components of social -emotional learning.

Play is the spontaneous activity in which children engage to amuse and to occupy themselves. In Contrast to passive entertainment, play builds active healthy bodies. Encouraging unstructured play may be an exceptional way to increase physical activity levels in children, which is one important strategy in the resolution of the obesity epidemic ⁸.

Perhaps above all, play is a simple joy that is a cherished part of childhood, and it is the happiness that children can achieve through play that may be the most important message to communicate to parents about the benefits of physical activity in children. Free play has the potential to improve many aspects of emotional well being such as minimizing anxiety, depression, aggression and sleep problem. Studies have shown that improved mood and emotional well being are associated with play and physical activities. Mood may be affected not only by the physical activity itself, but also by exposure to sunlight if the activity occurs outdoors ⁹.

5. The need of planning and guidelines for modern societies:

In India unlike the west, space is a very crucial issue. With empty plots giving way to brick and mortar and playgrounds being eaten up, space is at a premium in all Indian bustling cities. In the west "Come outside and Play"¹² would be needed to pursue, while it would not perhaps be right to call the metro Indian children to come and play, without there being places to play. Indian cities and metros have very dense population, and their growth over the years has been organic in nature and not in a planned manner. Hence problems of India are local in nature and very peculiar.

Indian cities are over crowded. Public spaces are few in numbers which are open to all communities, resulting in crammed spaces to play. When manned by the local authorities they have fixed timings and have restricted access and hence many children in metros land up playing on the street. Play on the street occurs mainly because of its availability & close proximity, it is used and enjoyed even at odd hours of the day, and moreover streets are free of cost.

Area available to play per child is far lesser in India. The growth in urban population is clear from the statistics. The general observation of children playing cricket, football or badminton on streets is very common. They adjust and make themselves comfortable by not swinging their arms freely to strike a six. The fear of being yelled at or not being allowed to play, because of likely damage caused to public property is always there. Kites have to be flown only from the roof-tops which within minutes get entangled in the network of wires. The sky, the land and the roads are so busy that the child and their games have to evolve in these circumstantial spaces. The basic essentials of play like run, jump, hide, slide, exhilarate etc have been restricted due to space.

If we want to give our children the nostalgic freedom that we cherished, things have to change. In view of producing healthy youth and having a healthy next generation, we need to strategically invest in our children of today. Several solutions will have to be looked at, evaluated and modified from time to time. Few of the solutions will have to be joint efforts; few would be left at individual levels as one size dose not fit all.

Solutions will have to be looked at from different socio-economic conditions as well as the nature and extent of improvisation possible. In an economically disadvantaged strata the solutions may be more community centric, whereas in an economically advantaged they could be child centric. Some strategies could be community based, few school based and many could be family based, while others must remain entirely child driven, with parents not present in some situations.

6. Designing outdoor spaces for children in modern Indian societies:

When we have to design play spaces for children, mostly we rely on the common experience of our own generation. When most adults or designers were children, playgrounds were asphalted areas with play equipments such as swings, slides and other play stations. Most adults see this as their model for a children's playground.

So when it comes to planning and designing a playground, most of the architects and designers search through the playground equipment catalogues, pick a piece or two that looks good to the adult and place that in the outdoor space which suffices the playground requirement from administrative point of view. However, limiting outdoor playgrounds to grossly manufactured equipments fall way short of the potential of outdoor areas to be rich in play and learning environments for children.

While designing these spaces the design process should be participatory in nature. The end users should be an integral part of the process, right from planning, to prototyping and to actual implementation of these spaces. Collaborative sessions should be held between local community members, children as well as designers to educate them with the needs and desires of those for whom these spaces are to be constructed.

While designing these environments one should understand that Children's outdoor play is different from time spent indoors. The sensory experiences have to be different. Children should have the freedom of doing 'messy' activities of outdoors which otherwise are not possible in the indoors. Natural outdoors have three qualities that should be unique and

appealing to children as play environments- their unending diversity, the fact that they are not created by adults and their feeling of timelessness.

While designing these spaces one should keep in mind the sensory stimulus that could be created in these spaces which will give unique experiences of touch, smell, feel etc. to a child. Tactile feels can be brought in through intelligent play of various textures available through natural materials. Natural feel of water can be brought through ponds and flowing water. Different landscapes with variety of herbs, shrubs of medicinal value can be planted which have their unique aroma and are healing in nature.

Mud slides and puddles, can be created through the landscapes which are natural points of interactions for the children in the rainy season. Gushing water from the societies if channelized can make interesting boat paths for children. Thoughtfully designed canopies and enrooting flowing water through pavements, in a designed manner could create showery pathways, interesting for children as well as adults to enjoy.

These possibilities can be very much seasonal in nature, and can be created all over the place. With countries like India blessed with three seasons like rains, winter and summers the spaces could also be fused with a lot of scientific principals. Principles of wind and water can be demonstrated to develop live sculptures, with which children can interact. Water and sun can create beautiful kaleidoscopes .It will give rise to spaces which are not monotonous, but change everyday.

Basement parking's could be doubled up as kids play zones for few restricted hours of the day .Special provisions to play games like hide and seek can be designed. Basements also can turn up in basket ball courts for the kids for a few hours .In case access to basement is landscaped they also can turn up into interesting slides for children with grass paths around them.

Play zones can be organic in nature and should be re-orienting based on the number of kids in a specific age group. It also needs to have a nature to accommodate different games. Kids should learn to interact with environments that are 'safe fail' ensuring that their risk taking ability is developed and they learn to accommodate moderate level of pain if hurt. The spaces should have some scope for personalization and can have some unique cultural identity based on the people occupying or interacting with it.

Fencings of buildings and societies can have dead wall converted to rock climbing zones for the enthusiast teenagers. Provisions could be also made to have variable complexities in these zones as the kids get acquainted to the sport. Fences can also provide unique cutouts and interaction spaces within two societies to build a strong inter society bond.

Traffic calming interventions can be planned jointly. In metros kids are also deprived of play due to heavy vehicular traffic and we find kids enjoying themselves at the odd night hours under street lights, or after the shops shut down. Because of the restricted space, the space has to re-arrange, to include the kids requirements. For example few streets could be turned into no entry zones for few hours of the day based on the needs of kids play times .Cycling and moped learning zones for young teens could be developed as special zone of no traffic .Ward officers, society representatives, builders, parents bodies

as well as NGO's can do study of various aspects related to this matter and strategically take these decisions.

Possibilities are enormous in nature, and we will find that none of these are very difficult to implement. What is needed is a very conscious effort to look at this problem that stands in front of modern Indian society. If looked at, addressed properly and dealt intelligently these problems will fade away, even without one needing to take a note of it. The 'Obesity Epidemic'¹⁰ of the west may just turn out to be western phenomena and no more can be an Indian Problem area.

7. Conclusions

Play is a cherished part of every child's childhood and the benefits are enormous. However due to the modern lifestyles the role of play in a child's life itself is at a questionable situation. All efforts should be done in this direction, to enhance the level of outdoor play in the children. Architects, educationists, Doctors, Parents, schools, should address this issue more seriously.

Appropriate research is needed to explore more possibilities to bring forward the importance of this issue. Parents have to understand the importance of outdoor play for children and take necessary lifestyle changes to facilitate this. Local authorities should work with local partners, such as builders and voluntary organizations, to create and manage more safe spaces for incidental and planned physical activity. Facilities and schemes such as cycling and walking routes, cycle parking, area maps and safe play areas should be planned.

Designing for children is a part of every individual's social responsibility and should be looked at beyond bright colours and scaled down equipments. In reality the design job, is rewarding, though filled with constraints, right from budget, schedules, guidelines to accessibility. Still we must strive to invest in our children's future; to create quality experience and environment¹³. Solutions of socio-economic nature have to be developed on a continuous basis to tackle the problem of today.

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