

# Accessibility for all: Role of Architects in Shaping a Barrier Free Environment

Mr. Shahidul Haque

## INTRODUCTION:

In Bangladesh we do not know the accurate percentage of disabled population, as we do not have any national census on them. Still we are quoting from WHO's (World Health Organization) statistics which was conducted nearly two decades ago. According to WHO, 10% of world population are suffering from some sort of disabilities. Total population of Dhaka City is 14 million which means 1.4 million are disabled if we follow WHO's statistics.

From two micro level sample surveys in our country we have found that, 8-9% of total population of Bangladesh are suffering from disabilities in one way or another<sup>(1)</sup>.

The prevalence of single disability that of visual is the highest, the percentage of prevalence is 24.2%. Other than single disability, multiple disability amounts 33.7%, and Leprosy only 0.2% in prevalence. According to the rate of prevalence other disabilities are in ascending order hearing (22.4%), orthopedic (10.2%), speech (5.2), mental retardation (3.1%), mental illness (0.6%) and epilepsy (0.5%) respectively.

The prevalence of disability irrespective of gender rises with the increase of age after 35 years. But after the age of 20 years the prevalence rate is higher in females than in males. And the prevalence of disability among females is much higher for ages over 55 years than among males.

<sup>1</sup> Two micro level survey conducted by SARPV in 1994 and 1995 (one was in Mohammadpur area of Dhaka city and another was in Jamalpur) to estimate the percentage of disabled population in those two areas.

Life of disabled people in our country is such that survival is a way of existence. Disabled people in Bangladesh are disgraced by unfair, unjust and undue freedom of nondisabled section of their families and of the society.

There has been much talk about improving the subjugated position of disabled people; equal rights for them and so on, which still is a far cry. Society is not allowing them to enjoy a normal social life, a secured economic life, and a humane life with prestige and honor.

Mobility of our disabled people is intensely restrained due to inaccessible infrastructure (both physical and social). In this unreachable condition of existing infrastructure and socioeconomic reality it is not possible to integrate them in the mainstream social life and thus allow them live an independent life rigged with humane features.

Primary objective of this paper is to find out a relation between architectural design and quality of living condition of disabled people. This paper will help us to comprehend, how only a single predicament i.e. architectural design is holding them back from very personal to economic spheres of life.

## INACCESSIBILITY AND DEPENDENCY GOES HAND IN HAND FROM PRIVATE TO PUBLIC LIVES:

It's a matter of humiliation and direly unfortunate for disabled people that their own home is not safeguarded for their

independent and unrestrained movement. As, there is no facility for a disabled person to lead his/her life in a safe and comfortable way he or she has to depend on others just to accomplish the routine activities of daily life. From birth to graveyard he/she needs help simply because of unawareness about his/her possibility for a life, which he/she can control, to a larger magnitude. A disabled person's physical existence in the family does not predominate mentality of the family members. Consequently, they do not consider him/her in any planning like construction of the house and any other decision making process for family development. So, there is nothing for a disabled person to feel at home or to live a life with minimum comfort and safety. Rather slowly but surely it is creating a frustrating environment for everyone of the family including the disabled person him/herself.

The way disabled people are living their life due to inaccessible infrastructure is neither desirable nor should be acceptable by anyone. The following subheads will help us to visualize the dejected situation of disabled people, which in-turn will help us to perceive the role of architects in improving the whole situation.

### **CONSTRUCTION OF SCHOOL, COLLEGE, AND UNIVERSITY:**

Is there any educational institute, which is accessible for all types of impaired children, from where they would educate themselves and would learn to lead their life independently? Unfortunately, in

Bangladesh, yet there is not a single educational institute with accessible physical infrastructure, which can make evident that we are trying to ensure education for all. Inaccessible physical infrastructure of educational institutes is simply depriving the disabled children from one of their basic human rights i.e. rights to education. If the architects come forward with disability concern while designing the educational institutes the overall situation can improve to a larger extent.

### **CONSTRUCTION OF PRIVATE AND PUBLIC BUILDINGS:**

Inaccessible work place and home is lucidly holding disabled people back from productive spheres of the society. Entrances and staircases of almost every public and private buildings are not at all accessible for people with disabilities especially for a wheel chair user. Even inside the buildings doors of bathrooms and kitchens are not wide enough to enter with a wheel chair. Architects have to come forward to ensure a safe and comfortable life at home together with turning the inaccessible environment into an accessible one and thus allow disabled people be integrated into an active economic life.

### **CONSTRUCTION OF HOSPITAL, CLINICS:**

In most of the cases, there is no arrangement of ramp facilities at the entrance of hospitals, clinics, diagnosis centers. Consequently people with disabilities cannot enter inside of these places to avail of their treatment whenever

it is necessary. Architects have an indispensable role to play to allow disabled people to avail of necessary treatment, which to a larger extent is impeded by the unapproachable nature of physical infrastructure of all these places.

### **CONSTRUCTION OF RECREATION CENTERS AND GROUNDS:**

Every human being has a right to some sort of recreation for the development of his or her mental aptitude. Nevertheless, without exception all the recreational locales and premises are not reachable for all Entrance of zoo, parks, amusement park for children, sitting arrangement in the cinema hall and theater are steered in such a way that disabled people, children, and elderly people can not enter inside of these places for enjoying some relaxation if they want. If architects take a little bit of concern for their right to recreation, the physical appearance of all these locality will be different in their entirety which will permit disabled people to procure this right, no matter when it will be possible for them.

### **CONSTRUCTION OF NATIONAL MONUMENTS AND OTHER HISTORICAL PLACES:**

Govt. of the People's Republic of Bangladesh has been constructing and preserving national monuments so that, mass people can go and pay their tributes to the national heroes who sacrificed their lives to make Bangla a national language and to build Bangladesh as an independent sovereign state. Disabled

people (among whom a huge number of people who became disabled during the independence war) are deprived of such mental contentment because of the inaccessible nature of all these national monuments, which is simply a result of lack of disability concern among the designers of these national spots.

### **CONSTRUCTION OF SHOPPING CENTER:**

Inappropriate designing of market, shopping center is not an outcome of technological in-competency rather, simply is a consequence of lack of disability concern among the building designers. Markets, shopping center even kancha bazaars are not accessible for a wheel chair/crutch user, and elderly people. Subsequently, they are deprived of buying something by their own choice in one hand and they have to remain dependent on others for whatever they require to buy on the other hand. Once architects will discover the relation between architectural design and existing distressed living condition of disabled people it will be possible to improve the quality of their lives by improving the physical infrastructure of all these significant places.

### **CONSTRUCTION OF MOSQUE, CHURCH, TEMPLE, PEGODA AND GRAVEYARD:**

Without getting help from others it is not at all possible for disabled people to go the above- mentioned places for prayer. It is not even possible for them to visit any graveyard just to pray for peace of soul of his/her beloved one's whom he /she lost forever.

It is, in fact, very torturous for a disabled person when he/she finds that he/she cannot exercise his/her own will to visit such places to get a bit little of mental contentedness. It is not necessary to say much, to see how inhuman such attitude is. This is not only unbearable for disabled people but is a great shame for us who claim ourselves as development thinker, planner and policy/decision maker.

For any development thinkers, to obtain the right to think about development of the human being, it is elementary for them to perceive the need of every section of our society regardless of disability, class, and caste. By developing appropriate designing of all these places architects can play a crucial role to allow disabled people to get little bit of mental exhilaration which does not cost money but a belief in equal rights for all in every spheres of life.

### **CONSTRUCTION OF FOOTPATHS FLYOVERS:**

Lack of simple slopes at the both ends of footpaths is not only inaccessible it is inconvenient for everyone especially for people with disabilities; old aged people, children and women. Disabled people do not perceive encouragement rather become tormented to come out and face such difficult physical environment. Responsibility of architects is expansive in devising a barrier free physical environment, which will expedite easy and unrestrained movement of disabled people, which again, is one of the rudimental constituents for their cohesion into the mainstream socioeconomic life.

To improve the quality of traffic system govt. is constructing flyovers one after another without any disability concern.

### **CONSTRUCTION OF TERMINALS:**

Bus stations, platform of railway stations, steamer and launch and boat terminals, premises of ferry, are not accessible for all. Staircases which passengers use to get in and out from steamers, launches and boats are entirely inaccessible for these particular groups and of course are awfully troubling for any one else especially for children, and they are under high risk to become disabled by mishaps (if/any).

Such deterrence compels disabled and elderly people to remain imprisoned within a particular place. Here, architects have an indispensable role to change the whole physical infrastructures of these significant places and thus let disabled people and other vulnerable group's move unhindered and safe.

### **CONSTRUCTION OF GROUNDS AND FLOORS:**

To make the buildings more attractive, impressive and good looking it has become a trend to make the floors and grounds of any buildings and premises as smooth as possible which makes these places almost a sheet of ice. These smooth floors are not only inaccessible for disabled people but is a great threat for any non-disabled people by any misfortune (if/any).

## **CONSTRUCTION OF INSIDE LIVING CONDITIONS:**

Living condition inside every public and private building is absolutely inaccessible for disabled people. Oven/burner, sink, washbasin, and switchboard are few among every other facility, which are essential for everyday life, are not at all approachable by disabled people especially for a wheel chair user.

## **RECOMMENDATIONS:**

After disclosure of the undeniable fact about inaccessible nature of the physical infrastructure of the country as a whole, we perceive to make following recommendations.

01. Architect with special knowledge about the need of disabled people should be appointed in the design approval committee.
02. DIT (Dhaka Improvement Trust), which is the approval authority of all architectural design, must commission architect with disability experience.
03. Architects association should solicit opinion from disabled people about their problem, which will be more effective to build a barrier free environment for all. This opinion exchange can be done through "Dialogue Forum".
04. Local Government Engineering Division must recruit an architect with knowledge about disability since they are designing school, college and other infrastructure in the rural areas of the country

05. Municipality and roads and highway department should also recruit an architect with disability expertise so that market and footpaths will be barrier free for all.

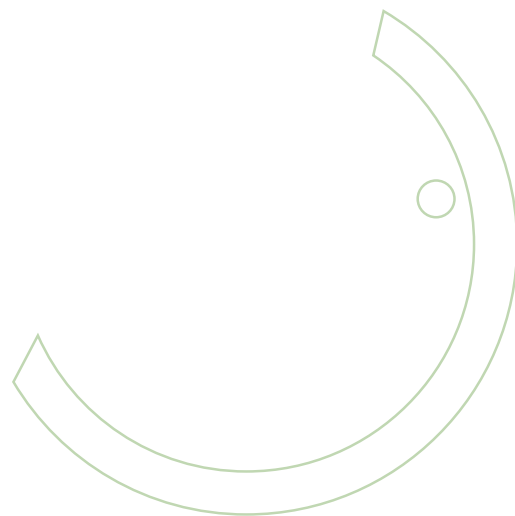
06. Architects must ensure that all designs will be accessible not only for disabled people but also for children, ill and old aged,

07. Communication ministry should also include disability expert. So that all disabled and old people can move from here and there safely.

## **CONCLUSION:**

After going through this paper I assume it is not necessary to state anything more to comprehend the attitude of mass people, family, civil society, decision-makers and policy makers for equalization of rights and opportunities for disabled people in every spheres of life. No vigorous step has yet been taken by the govt. of the people's republic of Bangladesh to ensure equal rights and opportunities for disabled people despite its commitment to the ESCAP to ensure their equal rights and opportunities. Is there any firm action, which can reflect that there is a good will among the development planners to create a better environment for the vulnerable groups those who are victimized by the conventional development plans? If not it is the time for state to become sensible towards the needs of sufferers and thus take necessary steps to come out this agonizing environment by creating a safe

and just Community for all. *Subsequently, let a disabled person feel his/her home is for him/her, his/her country/state is for him/her and she/he can enjoy in home and anywhere just like anyone else.*



**Shahidul Haque (Ashoka & A.I Fellow)  
Chief Executive  
SARPV-Bangladesh.**

Mr. Shahidul Haque, born on 3rd of November 1956, is the founder and Chief Executive of SARPV-Bangladesh. Being disabled by polio in childhood Mr. haque has done his Masters in Public Administration in 1981 from the University of Dhaka and after finishing the education he has worked as a banker for a period of ten years. From 1987 he has been working in the disability field to establish the "Right to say" about the problems of disabled people. By this time he has written two books on disability, one is named CBR a case study approach in Bangladesh and the other is "Feelings" regarding the situation and attitudes of people towards disability. More than 30 articles written by him have been published in different national and international newspapers, journals on this issue. He has been awarded Ashoka Fellowship in 1991 for establishing disability as a development issue not a welfare or charity concern.

Mr. Haque has conducted several researches on Disability and Disaster. With the support from UNICEF, he has made the first move in Bangladesh, to take care of people who become psychologically traumatized after any disaster.

He, for the first time has apprehended the relationship between rickets and childhood disability in Bangladesh.

While doing relief work for the disabled people in Cox's bazaar in 1991 he found a huge number of children of that area were becoming disabled by rickets, neither the govt. nor the doctors community were ready to accept the reality that rickets does exist in Bangladesh. Cornell University, USA, Institute of Child and Mother health (ICMH), SARPV and UNICEF jointly conducted a study in 1998 to find out facts about rickets in Bangladesh. The study shows that around 9% of children under 15 years are suffering from rickets and hundred percent of them are becoming physically disabled.

To make the overall physical infrastructure of the country accessible for disabled people he has raised his voice strongly and pioneered dialogue with different professional groups in that regard.

Mr. Shahidul Haque is involved with many social organizations in home and abroad. South Asian Net work on disability, Shahidul's Association in French and Federation of NGOs are few of them.

3/8, Block-F. Lalmatia, Dhaka-1207.  
Tel: 880-2-8119271, 880-2-9124522  
Facsimile: 880-2-8119774  
Email: shaque@bd.drik.net,shahidul@eudoramail.com

## Abstract

Mobility of our disabled people is intensely restrained due to inaccessible infrastructure (both physical and social). In this unreachable condition of existing infrastructure and socioeconomic reality it is not possible to integrate them in the mainstream social life and thus allow them live an independent life rigged with humane feature.

Total population of Dhaka City is 14 million which means 1.4 million are disabled if we follow WHO's statistics.

Here, we will try to present some concrete data on disability situation in Bangladesh, which we have found from our two micro level surveys from rural and urban settings.

The prevalence of single disability that of visual is the highest, the percentage of prevalence is 24.2%. Other than single disability, multiple disability amounts 33.7%, and Leprosy only 0.2% in prevalence. According to the rate of prevalence other disabilities are in ascending order hearing (22.4%), orthopedic (10.2%), speech (5.2), mental retardation (3.1%), mental illness (0.6%) and epilepsy (0.5%) respectively.

The prevalence of disability irrespective of gender rises with the increase of age after 35 years. But after the age of 20 years the prevalence rate is higher in females than in males. And the prevalence of disability among females is much higher for ages over 55 years than among males.

Primary objective of this paper is to find out a relation between architectural design and quality of living condition of disabled people. This paper will help us to comprehend how only a single predicament i.e. architectural design is holding them back from very personal to economic spheres of their lives.

The present paper is divided into five subsections. Introduction, which is the first subsection, covers the background information while the second subsection endeavors to think about a relation between architectural design and dependency.

The third subsection assists us to visualize the existing nature of inaccessibility, and also aids us to perceive how this inaccessibility is distressing the everyday life of disabled people of Bangladesh.

Fourth subsection is developed on the basis of the third subsections, which mainly necessitates some recommendations to improve the existing situation and thus permits disabled people enjoy a life with dignity, honor, joy and safety.

Fifth subsection, which is labeled as conclusion, is basically summing up of the paper.