

O 12. EXAMPLES OF WALKWAY FOR VISUALLY IMPAIRED PERSON

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ABSTRACT: Although steps have been taken to make life easier from the past to the present, special work has been carried out for the disabled in the last quarter century. In recent years, efforts have been made to create more comfortable movement areas for visually impaired individuals in Turkey. Landscape Architects have many duties in the social environment, sports fields, and public areas to remove the obstacles. Making designs that remove obstacles and controlling their applications are the most important points in projected areas. In the global world, by transforming technology and socialization into an advantage, analyzes can be made easily and new products can be designed for the comfort of individuals. Comparing correct and wrong applications, projects that can create functional areas in usage areas will carry Landscape Architecture to a more important point and will pave the way for new responsibilities. Within the scope of this study, new products will be more efficient with the integration of developing technology into projects. By solving such obstacles, it will be able to expand the comfort areas of person with disabilities.

Keywords: *Social environment, Landscape relationship, Comfort of individuals*

INTRODUCTION

Definition of Disability & Statistics

The concept of disability; It is the state of people's body or mind being different from normal. In general, individuals with disabilities perform activities in a limited way and have difficulty interacting with the social life around them (Gülgün et al., 2014; Gülgün et al., 2018)

Types of disabilities can be diversified as seeing, movement, thinking, remembering, learning, communication, hearing, mental health and social relations.

According to the World Health Organization, disability has three dimensions:

- Impairment in a person's body structure or function, or mental functioning; examples of impairments include loss of a limb, loss of vision, or memory loss.
- Activity limitation, such as difficulty seeing, hearing, walking, or problem-solving.
- Participation restrictions in normal daily activities, such as working, engaging in social and recreational activities, and obtaining health care and preventive services (Url, 1).

There are currently more than 2 billion disabled people in the world, which is 37.5% of the world's population, and disability prevalence is higher for developing countries.

* 1.3 billion people are affected by some form of blindness and visual impairment. This represents 17% of the world's population.

* 466 million people have a disabling deafness and hearing loss. This represents 6% of the world's population.

* About 200 million people have an intellectual disability (IQ below 75). This represents 2.6% of the world's population.

* 75 million people need a wheelchair on a daily basis. This represents 1% of the world's population.

These figures may remain an evolutionary average, but one thing is certain: the number of people affected by any form of disability represents a significant part of the world population, from adults to

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children. It is also important to underline the fact that some people are multi-handicapped and have multiple disabilities (Url, 2).

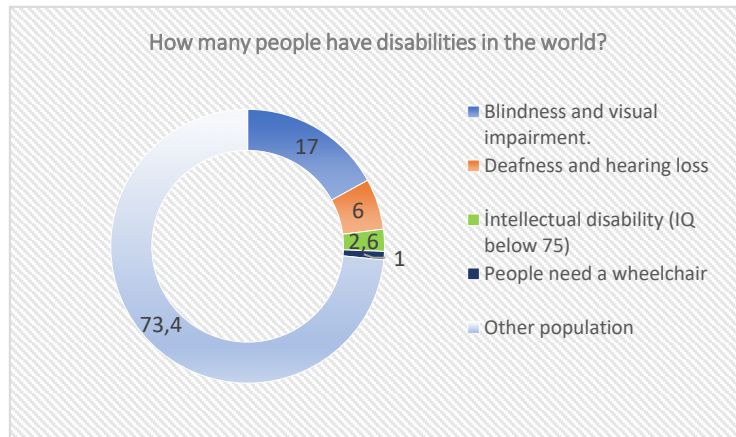


Figure 1. “A more accessible world!”

- * 1,4 % of Turkey’s population is affected by some form of blindness and visual impairment.
- * 1,1 % of Turkey’s population has disabling deafness and hearing loss.
- * 2 % of the population has been people with an intellectual disability.
- * 3,3 % of the population needs a wheelchair daily. This represents 1% of the world’s population ((Url 3;Url 4; Url 5).
- * “individuals with restricted limb use” constitute %4,1 of the population.

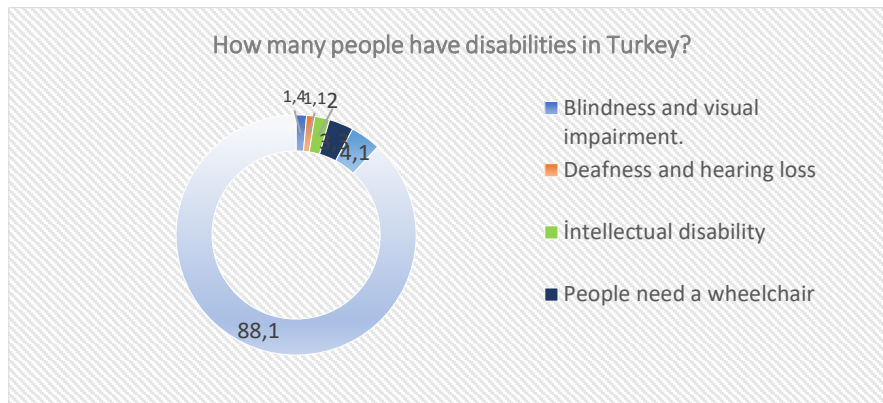


Figure 2. Indicators related with disability and old age, 2019

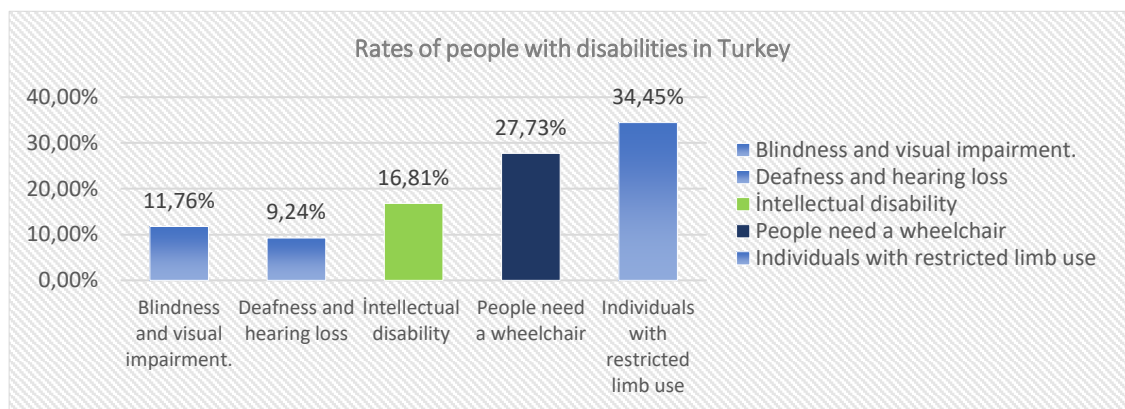


Figure 3. Turkey Health Interview Survey, TÜİK, 2019

In this context, the number of visually impaired people is substantially high in the world and in Turkey.

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Who Is Visually Impaired and Who Is Not?

Visually impaired people are not in need. They are not people who cannot meet their needs and they are not desperate. They are also not miraculous creatures, very different from other humans, possessing extraordinary abilities and hearing voices that others cannot hear.

“All the positive and negative traits that other people have” are present to them, too. In short, visually impaired individuals are human beings like everyone else.

According to "TÜİK" data, there are visually impaired individuals at a considerable degree in our country. The distribution ratios are detailed in the table below:

For the first time in Turkey, with the Decree Law No. 572 dated June 6, 1997 and the regulations made in the Zoning Legislation, it was aimed to make the built environment accessible to the disabled (Url 3).

Table 1. Respect for people with disabilities is respect for humanity

Görme sorunu olan bireylerin cinsiyet ve yaş grubuna göre dağılımı, 2008, 2010, 2012, 2014, 2016
The percentage of individuals having vision problem by sex and age group, 2008, 2010, 2012, 2014, 2016

(15+ yaş - age]															
Yaş grubu Age group	2008			2010			2012			2014			2016		
	Toplam Total	Erkek Male	Kadın Female	Toplam Total	Erkek Male	Kadın Female	Toplam Total	Erkek Male	Kadın Female	Toplam Total	Erkek Male	Kadın Female	Toplam Total	Erkek Male	Kadın Female
Toplam-Total	8,1	5,7	10,4	6,7	4,8	8,4	5,5	4,0	6,9	6,9	5,1	8,6	6,9	5,3	8,6
15-24	1,6	1,6	1,6	1,3	1,0	1,5	1,2	1,3	1,0	1,7	1,5	1,9	1,6	1,6	1,6
25-34	2,1	1,1	3,2	2,2	1,5	2,9	1,6	0,9	2,4	1,7	1,3	2,0	1,4	1,3	1,4
35-44	3,7	2,2	5,3	3,0	1,3	4,7	2,2	1,6	2,8	3,7	2,1	5,4	3,3	2,1	4,4
45-54	12,7	9,1	16,4	8,9	6,7	11,2	6,9	5,0	8,8	10,3	7,7	13,0	9,4	7,8	11,1
55-64	19,4	13,5	24,8	13,7	12,2	15,0	9,5	6,8	12,0	13,2	10,6	15,6	13,3	9,4	17,0
65-74	23,7	17,5	29,0	21,6	14,8	26,7	18,3	13,8	22,0	17,6	15,1	19,8	18,5	16,4	20,2
75+	36,0	32,9	38,1	34,2	28,1	39,3	33,1	28,3	36,3	28,8	23,1	32,5	31,9	23,8	37,2

Kaynak: Türkiye Sağlık Araştırması
Source: Turkey Health Interview Survey

Common Problems Encountered by Disabled People in Social Areas

In many cities with a high population in the globe and in our country, people with disabilities live and they face dozens of problems every day. There are many disability groups in societies and each one has its own specific struggles. In this presentation the materials which can be used to overcome the problems encountered by the visually impaired people will be submitted(Url 6).

APPLICATION SAMPLES FOR VISUALLY IMPAIRED PEOPLE

There are many exemplary applications in the world for disabled people to be more comfortable in social areas and public areas. These sample applications may facilitate the lives of the visually impaired to some extent.

Staircase handrails usually are not considered to be a great navigation, however, if we use Braille Staircase Handrail, it would be really handy for visually impaired and blind people.

Using perceptible guide tracks at level crossings to ensure the safe passage of visually impaired pedestrians in traffic.

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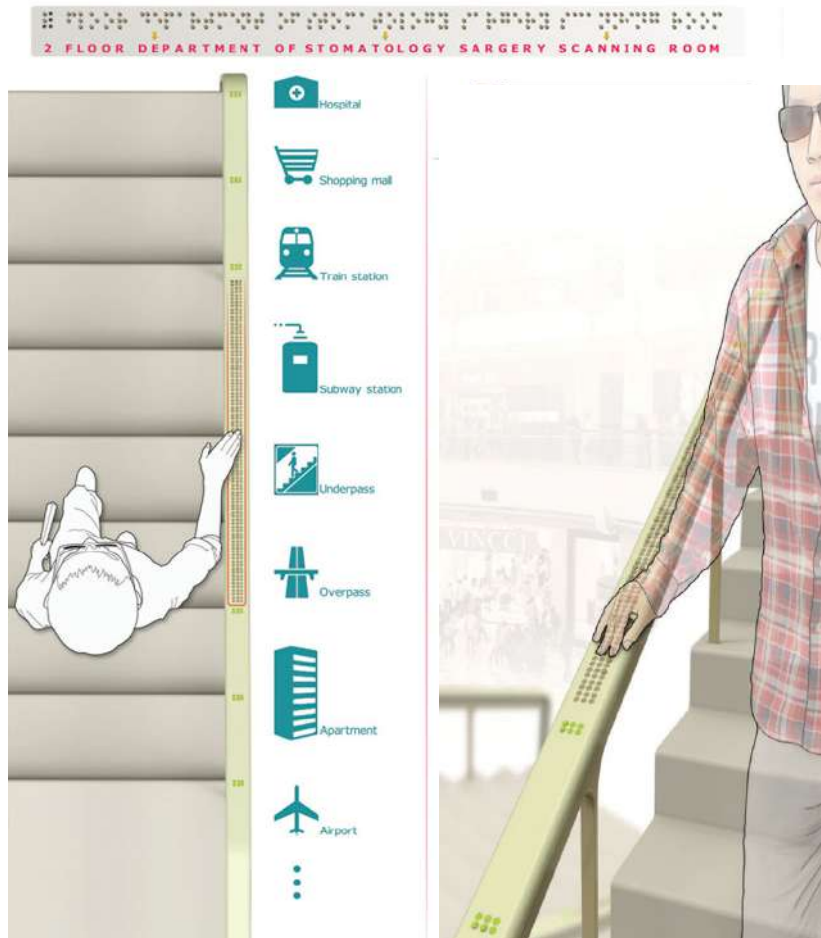


Figure 5.



Figure 6.

Using ramps in accordance with the standard to ensure safe passage in traffic in areas with elevation difference between the road and the pavement.

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Figure 7. Usage forms have been developed with different designs in the world.

In today's modern world, many product designs have emerged with the advantage of technology and socialization. The alternative products for the visually impaired are used in different ways with direction signs, tracks, and special colors (Url 8).



Figure 8.

In many countries, an exemplary application has been carried out and the applications have been continuously developed, especially in order to enable the visually impaired individuals to reach from one place to another on the walking paths.



Figure 9.

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SOME OF THE PRODUCTS DESIGNED AND APPLIED IN THE WORLD

In many areas, we can see examples that suggest that the elaborations are observed at the time of use with correct or incorrect use. The material to be used in the visual impairment paths which detailed in projects should be selected well in a sustainable way and its use should be well observed. While designing sustainable areas in projects, it should never be forgotten that the area appeals to everyone in its current use (Yazici and Temizel, 2020; Ankaya et al., 2018).

Remember that "Every person is a candidate for a disabled individual."

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