



DIFFERENCES IN INCIDENCES OF UNDESIRABLE BEHAVIOR PATTERNS IN CHILDREN WITH VISUAL IMPAIREMENT BASED ON EDUCATIONAL CONDITIONS

RAZLIKE U ZASTUPLJENOSTI NEPOŽELJNIH OBLIKA PONAŠANJA KOD DJECE OŠTEĆENOG VIDA U ODNOSU NA USLOVE OBRAZOVANJA

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ABSTRACT

The aim of this research was to examine incidences of undesirable behavior patterns in children with visual impairment in relation to educational conditions. The sample consisted of two groups of visually impaired children: blind children (N=19), visually impaired children (N=44), selected from the population of visually impaired children from the first to eighth grades in regular elementary schools in the Tuzla Canton, and the population of blind and visually impaired children in special education boarding schools, also from the first to eighth grades in Centers for Blind and Visually Impaired Children and Youth in Nedžarići, Sarajevo, and the Center "Budućnost" in Derventa. The variables were divided into two groups: independent variables and variables for assessing the incidence of undesirable behavior patterns. The obtained results were processed using descriptive analysis and analysis of variance. By analyzing the results on variables assessing the incidence of undesirable behavior patterns, we can conclude that there is a statistically significant difference in the incidence of undesirable behavior patterns between the two examined groups, among children with visual impairment who are educated in special education boarding schools and regular schools, specifically in the variables of unacceptable speech habits and psychological disorders. These undesirable behavior patterns are more prevalent in children attending regular schools compared to those in special education boarding schools, which can be attributed to inadequate acceptance by the social environment and a lack of adequate rehabilitation treatment.

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SAŽETAK

Cilj ovog istraživanja je bio ispitati zastupljenost nepoželjnih oblika ponašanja kod djece oštećenog vida u odnosu na uslove obrazovanja. Uzorak ispitanika sačinjavale su dvije grupe djece oštećenog vida: slijepa djeca (N=19), slabovidna djeca (N=44), dobivena iz populacije djece oštećenog vida od prvog do osmog razreda redovnih osnovnih škola na području Tuzlanskog kantona i populacije slijepa i slabovidna djece internatskog smještaja također od prvog do osmog razreda u Centrima za slijepu i slabovidnu djecu i omladinu Nedžarići u Sarajevu i Centru „Budućnost“ u Derventi. Varijable su podijeljene u 2 grupa: nezavisne varijable i varijable za procjenu zastupljenosti nepoželjnih oblika ponašanja. Dobiveni rezultati su obrađeni deskriptivnom analizom i analizom varijanse. Analizom rezultata na varijablama za procjenu zastupljenosti nepoželjnih oblika ponašanja možemo zaključiti da između dvije ispitivane grupe postoji statistički značajna razlika u zastupljenosti nepoželjnih oblika ponašanja između djece oštećenog vida koji se obrazuju u internatu i redovnim školama i to kod varijable neprihvatljive govorne navike i kod varijable psihički poremećaji. Ovi nepoželjni oblici ponašanja više su zastupljeni kod djece koja su na školovanju u redovnim školama u odnosu na djecu internatskog smještaja, što možemo vezati za neadekvatno prihvatanje od strane socijalne sredine i nedostatak adekvatnog rehabilitacijskog tretmana.

Ključne riječi: slijepa djeca, slabovidna djeca, nepoželjni oblici ponašanja, uslovi obrazovanja.

INTRODUCTION

Behavior is a series of actions through which we satisfy our needs and which over time become habits (Sullo, 1995). Disturbances in personality functioning, which can manifest in thinking, experiencing, perception, psychomotor skills, and consciousness, are often conditioned by influences of upbringing in early childhood (Sulejman, Sejdo et al., 2005). Children at an early age are particularly sensitive to emotional deprivation and social isolation, resulting in a general stagnation of psychophysical development with the appearance of neurotic disturbances (Stevanović, 2001). Emotional disorders typically stem from patterns of emotional reactions rather than individual emotions, and these reaction patterns impair a child's ability to function normally in everyday life (Oatly, Jenkins, 2003). Children with visual impairments are treated differently from their sighted peers. They are treated differently by parents, family members, teachers, and others, and all these differences affect both their success in the educational process, their personality development and social adaptation (Ćehić, 1990). Adaptive behavior is defined as behavior that satisfies the natural and social demands of the environment (Cattell, 1950; Babić, 2005). Undesirable behaviors can occur as direct or indirect consequences of visual impairment. Therefore, a lack of eye contact, the inability to visually track reactions to one's nonverbal activity and to synchronize it with contextual demands, can be interpreted by typically developing peers as inadequate

social behavior of a blind child (Vučinić et al., 2013). In children with visual impairment, behavioral problems can also result from fundamental insecurity and constant fear of rejection (Grbović, 2011). The high frequency of anxiety in children with visual impairments may be attributed to environmental conditions and risks they face due to the psychosocial effects of visual impairment (Bakla et al., 2011). The most common behavioral problems in children with visual impairment, including withdrawal, hyperactivity, irritability, and aggression (Sharma et al., 2002). Hollos and Cowan (2003), highlight the role of speech in the growth of social cognition. The speech development of children with visual impairment depends not only on sensory stimulation but also on intelligence, the degree of visual impairment, the age of the student, the time of onset of the impairment, and the time when the blind or visually impaired student is included in rehabilitation (Tulumović, 2008). If a child has any developmental difficulties, interaction and communication with peers become difficult. Over time, the child becomes increasingly isolated, resulting in stagnation in all aspects of child development: intellectual, emotional, physical, and social (Hrnjica et al., 2004). It is crucial to help children with visual impairments achieve rich sensory-perceptual, emotional, motor, communication, and social development. Rehabilitation programs should start as early as possible to minimize the impact of these difficulties on the educational process, socialization, and professional integration of children with visual impairments (Tulumović, 2013).

RESEARCH METHODS

Sample of respondents

The sample consisted of two groups of children: blind and visually impaired children. The sample included 63 children, of which there were 19 blind children, 11 males and 8 females. There were 44 visually impaired children, 24 males and 20 females. The sample was obtained from the population of blind and visually impaired children attending regular schools in the Tuzla Canton from the first to eighth grades, and the population of blind and visually impaired children attending school and rehabilitation at the "Center for Blind and Visually Impaired Children and Youth" in Nedžarići, Sarajevo, and the "Institute for Blind and Visually Impaired Budućnost" in Derventa. The selection criteria were: children with visual impairment, without intellectual disabilities, of both genders, aged 6 to 15 years.

Variable Sample

For collecting general data, an Anamnesis sheet was used, and data from the medical record, which is an integral part of the student's file, were also utilized. A standardized Adaptive Behavior Scale AAMD II part (Igrić, Fulgosi-Masnjak, 1991) was applied to examine the prevalence of undesirable behaviors.

Research Implementation Method

Prior to conducting the study, support was obtained from the institutions where the research was conducted, and the parents of the children involved in the study. Ethical considerations were observed during the data collection and analysis process. The scale was based on recording observed behaviors, so the data were collected from teachers and educators who were most in contact with the participants.

Data Analysis Methods

The SPSS 17.0 for Windows software package was used for data analysis. Several types of statistical tests were used in the process. In addition to calculating descriptive-statistical parameters, measures of central tendency and variability, parametric tests such as the test of difference between means of two or more basic sets and analysis of variance were used.

RESULTS AND DISCUSSION

Table 1 presents the research results related to the structure of children according to the degree of visual impairment and the type of institution. From the table, 17 (89.47%) blind children are enrolled in special education boarding schools, while only 2 (10.53%) blind children attend regular schools. There are 17 (38.64%) visually impaired children in special education boarding schools, while 27 (61.36%) attend regular schools. According to the results in Table 1, with values of χ^2 and where $p < 0.05$, that is, less than the 5% level of significance (risk) at which the testing was performed, the conclusion is that there is a statistically significant association between the category of impairment and the type of institution. This means that there is a statistically significant difference in the proportional representation of a certain type of institution between blind and visually impaired children. From the Table, it is evident that the percentage of children in special education boarding schools is much higher among blind children compared to visually impaired children, among whom the percentage of children in regular schools is higher.

Table 1. Number and structure of respondents according to the degree of impairment and type of institution

INSTITUTION	IMPAIRED CATEGORY					
	Blind		Visually impaired		Total	
	f	%	f	%	f	%
Special education boarding school	17	89.47	17	38.64	34	53.97
Regular school	2	10.53	27	61.36	29	46.03
Total	19	100.00	44	100.00	63	100.00

$\chi^2 = 13.805; v = 1; p = 0.000;$

Table 2 presents the results of the test for the existence of differences in undesirable behaviors between visually impaired children educated in special education boarding schools and those educated in regular schools. According to the test results, since $p < 0.05$ at the level of significance, for the forms of unacceptable speech habits and psychological disorders, we conclude that with 95% confidence or a 5% risk, there is a statistically significant difference in these forms of behavior between children educated in special education boarding schools and those in regular schools. A higher percentile rank is characteristic of children educated in regular schools, hence a higher level of representation of the mentioned undesirable behaviors. Based on the obtained results in Table 2, we see that there are statistically significant differences in the variable of unacceptable speech habits, where the average value for children educated in special education boarding schools is 50.59 with an average deviation of 3.43, while for children attending regular school, the average value was 56.90, with an average deviation of 13.65. Based on the average values, it is evident that unacceptable speech habits were more prevalent in children in regular schools than in children in special education boarding schools, which is most likely a consequence of inadequate rehabilitation. Similar results were obtained in a study examining expressive vocabulary in 25 visually impaired children and 57 children with normal language development, assessing the ability to use linguistic symbols in 16 tactile-kinesthetic tasks. The results showed poorer vocabulary in children with visual impairment compared to children with normal language development (KieseHimme, 1995). Additionally, Harley (1963; cited in Tulumović et al., 2012) conducted a study on the use of verbalisms in 40 children aged 7 to 14 attending two special schools. Children were asked to define certain words taken from the elementary school dictionary and then identify them through touch, which was correctly defined. The results showed a significant negative correlation between IQ and verbalisms, as well as chronological age, experience, and verbalisms.

Similarly, a statistically significant difference was shown in the variable of psychological disorders, with an average value of 20.15 and an average deviation of 15.59 for children attending special education boarding schools, while for children attending regular schools, the average value was 28.62 with an average deviation of 16.42. It is evident that psychological disorders are more common in children attending regular schools, which can be attributed to inadequate acceptance by the social environment and a lack of adequate rehabilitation treatment. Similar results were found by Kaffemaniene (2000), who conducted a study on 50 children with visual impairment aged 5 to 7 years, and found mild emotional difficulties and mild deviations in behavior in 34% of children, a combination of mild emotional and moderate symptoms of behavior problems in 26% of children, and a combination of more severe emotional and behavioral problems in 34% of children.

For other undesirable behaviors, there is no statistically significant difference in percentile ranks between visually impaired students educated in regular schools and special education boarding schools, considering the time of onset of impairment, as $p > 0.05$.

Table 2. Differences in the prevalence of undesirable behaviors in blind and visually impaired children in relation to educational conditions

UNDESIRABLE BEHAVIOR PATTERN	RESPONDENT GROUP	Arithmetic mean (μ)	Standard deviation (σ)	F	Significance (P)
Tendency towards aggressive behavior and destruction	Special education boarding school	41.18	11.49	0.065	0.799
	Regular school	41.90	10.72		
Anti-social behavior	Special education boarding school	26.38	14.67	0.403	0.528
	Regular school	28.97	17.65		
Resistance to authority	Special education boarding school	26.38	14.07	0.043	0.836
	Regular school	27.24	18.64		
Irresponsible behavior	Special education boarding school	52.35	9.87	0.707	0.404
	Regular school	54.48	10.21		
Withdrawn behavior	Special education boarding school	37.94	16.61	3.260	0.076
	Regular school	46.38	0.00		
Stereotypical behavior and manners	Special education boarding school	59.85	12.94	0.791	0.377
	Regular school	63.10	16.06		
Inappropriate interpersonal habits	Special education boarding school	54.41	8.24	0.001	0.976
	Regular school	54.48	10.21		
Unacceptable speech habits	Special education boarding school	50.59	3.43	6.774	0.012
	Regular school	56.90	13.65		
Unacceptable and unusual habits	Special education boarding school	46.47	5.44	1.126	0.293
	Regular school	48.62	10.26		
Self-directed misbehavior	Special education boarding school	65.29	16.00	0.478	0.492
	Regular school	62.41	17.04		
Tendency of hyperactive behavior	Special education boarding school	54.56	12.21	3.516	0.066
	Regular school	61.21	15.90		
Unacceptable sexual behavior	Special education	85.29	5.07	1.406	0.240

	boarding school				
	Regular school	83.79	4.94		
	Special education				
Psychological disorders	boarding school	20.15	15.59	4.403	0.040
	Regular school	28.62	16.42		
	Special education				
Medicine use	boarding school	70.59	6.94	0.003	0.957
	Regular school	70.69	7.99		

CONCLUSION

Based on the interpretation of the obtained results, we can conclude that there are statistically significant differences in the prevalence of undesirable behaviors between blind and visually impaired children educated in regular schools and those in special education boarding schools. Undesirable behavior patterns, especially concerning unacceptable speech, were more prevalent among students in regular schools than among those in special education boarding schools, which likely stems from inadequate rehabilitation. Additionally, a statistically significant difference was observed in the case of psychological disorders, which are more common among students in regular schools compared to those in special education boarding schools, possibly due to inadequate acceptance by the social environment and lack of appropriate rehabilitation treatment. There were no statistically significant differences observed for other undesirable behavior patterns. Timely educational and rehabilitative interventions for blind and visually impaired students can positively impact reducing the prevalence of undesirable behaviors and improving the educational process, social integration, and professional inclusion of visually impaired children.

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