

SELF-CONCEPT AND SOCIAL SUPPORT AMONG ADOLESCENTS WITH DISABILITIES ATTENDING SPECIAL AND MAINSTREAM SCHOOLS

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Abstract: *The main research goal was to investigate the self-concept, self-esteem and social support among adolescents with special needs, concentrating on the differences between adolescents who are attending regular schools and those who receive their education in special institutions. Participants filled in three questionnaires: Self-description Questionnaire (Marsh, 1992), Self-Liking/Competence Scale (Tafarodi and Swann, 2001) and Child and Adolescent Social Support Scale (Malecki, Demaray and Elliott, 2000). The results show that the educational institution and type of disability affect students' self-concept, self-esteem and social support, while parents' disability only has a minor influence on these characteristics. Positive correlations between types of self-concept and social support can also be observed. The results therefore show inclusion's positive effect on students' personal and social functioning: students attending inclusive education have better self-concepts and receive more social support than students attending special schools.*

Keywords: *self-concept, self-esteem, social support, special needs, special education, inclusive education*

INTRODUCTION

Integration and inclusion

Social integration is the key factor for the optimal inclusion of children with special needs into social environment (Topping and Malloney, 2005). It is the bridge between integration *per se* and inclusion – the bridge that leads to optimal inclusion of ALL children and other participants in the educational system to everyday life and work. Why?

Porter (1995) defined three educational systems: (i) segregation system, (ii) traditional integration system, and (iii) inclusive system. The *traditional integration* system is defined by the following characteristics: orientation towards the student, evaluation of students by specialists, emphasis on the diagnostics and prediction of success, indi-

vidualized student plans, introducing students into specific programmes and carrying out the plans. *Inclusion model* on the other hand includes orientation towards the class, verification of teaching and learning methods, collaboration in solving problems, strategies for teachers, and adaptable and supportive class environment (Porter, 1995). It is clear that the traditional integration system does not include *social aspects*. The student is judged, valued and positioned mainly by specialists, who are the only ones in this model with an active part. By considering social relations between participants in the educational process the roles of every single participant change. The student is no longer just an inactive observer of the events in the classroom but takes part in them. Specialists are no longer the only ones to possess professional knowledge but share it with teachers, and teachers actively perfect teaching methods through collaboration and through creating flexible, supportive learning

environment. Researches (Broadhead, 2006; Clever et al., 1992) show that inclusion enables a more balanced personal development, greater motivation and better productivity for students with special needs. It is stated that social inclusion enables optimal cognitive functioning for these students, prevents pathological social phenomena and delinquency, enables effective usage of sources intended for education, increases the number of academically successful children and contributes to satisfactory social climate in the classroom through stimulating cooperation, friendship and equality (Broadhead, 2006; Clever et al., 1992).

Integration and inclusion in Slovenia

Educational system in Slovenia includes four levels: pre-primary education, elementary education, secondary education and higher education (Eurydice, 2010). Children aged from 1 to 5 years enter *pre-primary education* (kindergartens), which integrates child care and early general pre-school education. At age 6, pupils enter the 9-year elementary education. Unlike pre-school, elementary education is obligatory and divided into 3-year cycles. The majority (approximately 99%) of pre-school children, and elementary and secondary school pupils attend public kindergartens and schools, others attend private institutions (Waldorf or Catholic schools). *Elementary education* is followed by secondary education, which is not mandatory. Despite that, 98% of youth between ages 15 and 19 attend to secondary schools. Secondary education is divided into general secondary education (so called gimnazija; 4 years) and technical and vocational education, which includes secondary technical and professional education (4 years), secondary vocational education (3 years), and short-term vocational education (2 years). *Tertiary education* in Slovenia includes higher vocational college education, where the study programmes are extremely practice-oriented, and higher academic and professional education (university study programmes). The second level of higher education includes Master's study programmes and the third level incorporates the Doctoral study programmes.

The *education of children with special needs* in Slovenia is defined by the Placement of Children with Special Needs Act (2000), according to which

the term »special needs« includes (i) blind and visually impaired children, (ii) deaf and hearing impaired children, (iii) physically disabled children, (iv) children with verbal or communication deficits, (v) children with intellectual disabilities, (vi) children with learning deficits, (vii) children with protracted illnesses, and (viii) children with emotional and/or behaviour disorders. There are also some other groups of children who need special adjustments but do not have a »child with special needs« status, e. g. students with specific learning difficulties (Opara, 2005). This widely defined population of children who need special help includes 20 to 25 per cent of the whole elementary school population, but only 3 to 5 per cent of these children are incorporated into the special guidance process. Children with special needs in Slovenia receive their education in mainstream or special schools. The decision on the type of school is made for each child individually by a Special Education Needs Guidance Commission, which follows a principle of placement in the most enabling environment (Eurydice, 2010). Students with special needs attending mainstream schools receive special educational support (e.g. remedial teachers, additional teaching hours). They are included into (i) adapted programmes with equal educational standards as prescribed in the curriculum, where adaptations are provided so the student with special needs can participate in the programme, or (ii) programmes with educational standards at a lower level, where certain subjects are omitted from the general curriculum (resulting in a less extensive curriculum) and educational standards are set at a lower level. These programmes are also offered in special institutions, with the addition of special education programmes for students with moderate and severe intellectual disabilities, for example the so called tutoring programme, which includes social skills, interest and motivation, preventive disciplinary strategies, compensatory measures and positive behaviour management.

Although Slovene educational system is supposed to follow the inclusion principles, nearly half of students with special needs are still segregated.

Self-concept, self-esteem and inclusion

Researches about *self-concept* and *self-esteem* of students with special needs are condensed around

two poles. On the one hand, researches show that students with special needs included in the mainstream schools have lower self-concept and self-esteem than students from segregated schools. LaBarbera (2008) claims that teachers in special schools are more qualified to work with children with special needs, due to their acquaintance with students' learning and emotional needs, which enables teachers to give their students greater amounts of positive feedback. Beaty (1992) believes that, for example, blind and visually impaired students attending mainstream schools experience feelings of inadequacy and inferiority resulting in deficit of their self-concept. Blind and visually impaired students attending special schools are not supposed to experience such differences which results in higher self-concept of these students.

On the other hand, there is an increasing number of researches which show that students attending mainstream schools show higher degree of self-concept and self-esteem. Heward (2003) and Kaminski (2003) claim that inclusion helps to improve communicative and social skills and helps to raise self-concept and self-esteem of children with special needs. Fitch (2003) also states that students with special needs included in mainstream schools have different and more positive feeling of themselves than students in segregated schools. Regarding these findings, it seems that inclusion has a positive influence on students' intra- and interpersonal characteristics.

Social support and inclusion

Authors researching *social inclusion* and *support* of the students with special needs concentrate mainly on the differences between students with and without disabilities. The researches show that many blind and visually impaired adolescents are socially isolated and have less friends and smaller social networks than their typical peers because they lack interpersonal skills (Huurre and Komulainen, 1999; Kef et al., 2000). The quality of peer relations is also lower, the differences visible mainly in the joint leisure time (Lifshitz et al., 2007; Sacks and Wolffe, 1998). Sacks and Wolffe (1998) state that lack of social skills is the main reason for low-quality friendships and social interactions of the blind and visually impaired, and

that it appears as a consequence of the disability to recognize and use non-verbal communication. Skär (2003) warns that adolescents with special needs are significantly less socially integrated and less involved in peer activities and social environment than their typical peers, and that peer relations are much more complex with adolescents with special needs. These adolescents have fewer friends their own age and are often excluded from peer groups (Barron, 2001). Due to their disabilities they are rarely included in peer activities, especially in the sports area, unless these activities are designed especially for them.

Stevens et al. (1996) compared physically disabled and typical adolescents and found that physically disabled students have good self-esteem and strong and positive family relations, but are less involved in social activities than their typical peers. Their friendships are less intimate and linked mostly to school environment, and they also have more positive opinions about school and teachers. Results of the researches also show that adolescents with special needs often experience problems with establishing contacts with the opposite gender despite their desire to have an intimate relationship (Skär, 2003). But Kef et al. (2000) found that blind and visually impaired adolescents receive plenty of social support, mostly from parents and peers.

Davis (1986) determined that deaf and hearing impaired adolescents attending mainstream schools often experience problems in relations with other people: they often talk about loneliness, rejection and social isolation. Antia et al. (1993) believe that deaf and hearing impaired adolescents experience problems with establishing contacts with typical peers because they spend most of their time socializing with teachers and other deaf and hearing impaired children, with whom they feel emotionally safer.

Objective

The aim of the research was to investigate self-concept, self-esteem and social support among adolescents with special needs, concentrating on the differences between adolescents who are attending regular schools and those who receive their education in special institutions.

METHOD

Participants

105 secondary-school students were included in the research: 15 of them were blind or visually impaired, 55 deaf or hearing impaired and 35 physically disabled. 12 participants also have either one or both parents with disabilities. Of all the students, 70 receive their education in special institutions, and 35 in various (mainstream) secondary-schools. The average academic achievement of students attending mainstream schools was slightly higher ($M = 3.86$) as opposed to the students attending special schools ($M = 3.3$).

Instruments

Child and Adolescent Social Support Scale (CASSS; Malecki et al., 2000)

The CASSS measures the perceived social support of children and adolescents (Malecki et al., 2000). It is a 60-item measure consisting of five 12-item subscales (parent, teacher, classmate, close friend and school). Students are asked to read each statement and rate (i) how often they perceive that support and (ii) how important it is to them that they perceive that support. The frequency ratings are on a 6-point scale ranging from 1 (never) to 6 (always). The importance ratings are on a 3-point scale from 1 (not important) to 3 (very important). Frequency ratings for each subscale are added up, creating a frequency total score for each of the five subscales. These five subscale scores can then be added to result in an overall total social support score. Likewise, importance ratings are summed up for each subscale and then the five importance subscale scores are added together for a total importance scale. The scale's reliability is from 0.96 to 0.98 for total social support score and from 0.88 to 0.96 for subscale scores.

Self-Liking/Competence Scale – Revised Version (SLCS-R; Tafarodi and Swann, 2001)

The SLCS-R measures two dimensions of the general self-esteem: self-liking and self-competence. The self-competence subscale measures the part of self-esteem originating in individual's feelings of ability and efficacy, while the self-liking subscale measures the part of self-esteem depending on soci-

ety. Each subscale consists of eight items. Students are asked to read each statement and rate on a 5-point scale how characteristic these statements are of them (1 – not at all, 5 – completely). Ratings for each subscale are added up creating a total score for self-liking and self-competence. The scale's reliability is 0.90 for the self-liking subscale and 0.82 for the self-competence scale (Tafarodi and Swann, 2001).

Self-description Questionnaire (SDQIII; Marsh, 1992)

The SDQIII measures the self-concept in late adolescence and early adulthood (Kobal Grum, 1994). It consists of 136 items and measures 13 aspects of self-concept: general self-concept, academic self-concept, mathematical aptitude, verbal aptitude, physical aptitude, emotional stability, creativity / problem solving, physical appearance, peer relations with the same gender, peer relations with the opposite gender, parent relations, religion / spirituality and sincerity / reliability. Students are asked to read each statement and rate on a 6-point scale how characteristic these statements are of them (1 – not at all, 6 – completely). Ratings for each subscale are added up creating a total score for each of the 13 areas of self-concept. The subscales' reliability is from 0.80 to 0.90, with the exception of the sincerity scale where the reliability is somewhat lower (Marsh, 1992).

Students were asked to fill out a battery of abovementioned scales/questionnaires along with several additional questions about their education, academic achievement, eventual parents' disability and who they turn to when in distress.

Procedure

To collect data from students in special institutions, we first acquired permissions from the institutes' directors or headmasters and concordances from parents of the students who were not yet of full age. We presented the students with basic information about the research goals and proceeded with instructions for each part of the questionnaire. Students then filled in the questionnaires. The majority of students were able to complete the questionnaires on their own, due to certain adjustments that were previously made in the form of the questionnaires (enlarged text for visually impaired students)

and in the procedure (sign language interpreter for deaf and hearing impaired students). However, the blind and severely physically disabled students needed additional help with completing the questionnaires, so their answers were written down for them by their teachers or the authors of the research.

To collect data from students attending mainstream secondary-schools we contacted various associations, mobile specialist teams (which include some or all of the following specialists: psychologists, social workers, defectologists, teachers, speech therapists, occupational therapists, physiotherapists, nurses and doctors) and advisers in secondary schools throughout Slovenia. Then we sent out questionnaires with concordance forms and return envelopes. Students who decided to participate filled in the questionnaires and sent them back (the return rate was approximately 50%).

The data were analysed with proper statistical methods, mostly correlation and univariate procedures (means comparisons with parametric and nonparametric tests, analyses of variance). Analyses were performed with SPSS for Windows programme.

RESULTS AND DISCUSSION

Due to easier interpretation, detailed results with regard to some important explaining variables are showed in sections. The first section therefore describes general findings regarding social support. The second section concentrates on the differences between students, attending mainstream schools and

those who receive their education in special institutions. The third section explains differences between students with different types of disabilities. The fourth section investigates differences between students with special needs, whose parents also have disabilities, and those who have typical parents. The last section in this chapter discusses correlations between self-concept and social support and the discrepancy between perceived and desired social support.

Social support

The results show that the students on average perceive the most social support from close friends ($M = 52.87$), followed by parents ($M = 50.40$), teachers ($M = 47.47$), classmates ($M = 44.32$) and people in their school ($M = 42.99$). Close friends' support is also the most important to them ($M = 27.86$). Parents' ($M = 26.43$), teachers' ($M = 26.01$) and classmates' support ($M = 25.57$) is also quite important to these students, whereas support from people in their schools is not so important ($M = 23.59$).

These results are congruent with findings of the former researches, where parents' and peers' support proved to be the most important sources of social support in adolescence (Helsen et al., 2000; Wenz-Gross et al., 1997).

Educational institution

The results show that students attending mainstream schools have significantly higher general

Table 1. Average results of students attending special and inclusive schools with results of the t-test (only significant differences are showed).

	Educational institution	N	M	SD	t	df	p
SDQ-III							
Academic self-concept	Special school	70	36,81	8,24	-4,203	102	0,000**
	Inclusive school	34	44,29	9,06			
Creativity / Problem solving	Special school	70	36,63	6,11	-5,420	103	0,000**
	Inclusive school	35	44,17	7,83			
Peer relations (same gender)	Special school	68	38,03	7,32	-2,199	52,626	0,032*
	Inclusive school	35	42,29	10,17			
Sincerity / Reliability	Special school	69	48,45	7,78	-3,694	101	0,000**
	Inclusive school	34	54,76	8,89			
Emotional stability	Special school	68	36,43	7,96	-3,398	101	0,001**
	Inclusive school	35	42,17	8,44			
General self-concept	Special school	68	45,34	9,61	-2,596	101	0,011*
	Inclusive school	35	50,54	9,70			

* $p < 0,05$ ** $p < 0,01$

self-concept, academic self-concept, and self-concept in the areas of problem solving, peer relations (same gender), sincerity and emotional stability. Students attending mainstream schools also have better self-concept in the area of verbal aptitude ($M(\text{special school}) = 39.00$, $M(\text{mainstream school}) = 44.83$, $U = 818$, $z = -2.784$, $p = 0.005$). There were no significant differences in other areas of self-concept, in self-esteem and social support, which shows that the students in mainstream schools do not perceive any less social support than the students in special schools.

Results referring to self-concept are congruent with Heward's (2003), Kaminski's (2003) and Fitch's (2003) findings: the authors determined that inclusion contributes to a more positive view of the self and the world, therefore to the better self-concepts of the children with special needs. Heward (2003) and Kaminski (2003) found that the positive effect of inclusion shows primarily in better communication and social skills. In the present research, this effect is visible in the differences in the areas of verbal aptitude and peer relations (same gender), where students in mainstream schools achieved higher self-concept scores.

We believe that the differences in the academic self-concept and problem solving are the consequence of the differences in academic achievement. Most researchers support the model where academic achievements form certain spheres of academic self-concept, and these spheres influence further academic achievements (De Fraine et al., 2007). In the present research the academic achievement was higher with the students attending mainstream schools, and this is probably why the academic self-concept scores were higher with this group of students. Peetsma et al. (2001) also found out that the academic achievements of the students with disabilities in mainstream schools are higher than the achievements of their peers attending special schools. Academic achievement is probably also linked to better self-concept in the area of problem solving.

With regard to emotional stability, we believe that differences are connected to better social skills and relations of the students in mainstream schools. These students have more chances to interact with different people, which enables inclusion in het-

erogeneous social situations, and learning how to react and deal with obstacles properly (Huurre and Komulainen, 1999).

It seems that self-esteem is less connected to academic achievement than self-concept because there were no significant differences between students in mainstream and special schools, even though their achievements varied. Self-esteem of the students with special needs seems to form on the basis of different experiences than self-concept and is probably more connected to the disability itself than to the academic achievement.

Type of disability

Table 2 shows that physically disabled students perceive the most support from parents. The blind and visually impaired perceive the most support from close friends, whereas the deaf and hearing impaired the least of all students who were included in our research. Blind and visually impaired students also experience social support as more important than deaf and hearing impaired students.

There were also some significant differences in self-esteem: physically disabled students had the highest scores, while the blind and visually impaired had the lowest. The blind and the visually impaired have a significantly better general self-concept and self-concept in the area of problem solving, peer relations (opposite gender), parent relations and sincerity. The deaf and the hearing impaired have a significantly higher self-concept in the area of sports, while the lowest results in this area were from physically disabled students.

We believe that the reasons for the physically disabled perceiving the most parent support lie in their functional disability: these students mainly need adjustments at going to school and shaping the environment, which is mostly provided by parents. Hindered mobility could also be the reason for perceiving less close friends' support than blind, visually impaired, deaf and hearing impaired students, because it thwarts access to certain places where their peers spend time together (Kef et al., 2000; Lifshitz et al., 2007). In regard to close friends' support the results of the present research are not congruent with findings of other authors.

The results show that blind and visually impaired students perceive the most social support in this area, while other researchers pointed out that the blind and the visually impaired have less friends due to their lack of social skills which is supposed to occur as a consequence of the disability to use the non-verbal communication (Huurre and Komulainen, 1999; Sacks and Wolffe, 1998). But it seems that the disability to use the non-verbal communication is not an obstacle to the blind and visu-

ally impaired students, or it is successfully compensated with other aptitudes. The reason for blind and visually impaired students perceiving the most support, and deaf and hearing impaired students the less of it could also lie in the mere communication. It is possible to communicate to the blind and visually impaired about everything, which is why they can be very active in social activities, while communication with the deaf is much harder and consequently more exclusive.

Table 2. Average results of deaf and/or hearing impaired, blind and/or visually impaired and physically disabled students with results of a one-way ANOVA (only significant differences are showed).

	Disability type	N	M	SD	df	F	p
CASSS (frequency)							
Parents' support	Deaf/hearing impaired	55	48,11	10,31	2	3,772	0,026*
	Blind/visually impaired	15	50,20	8,45			
	Physically disabled	35	54,09	10,29			
Close friends' support	Deaf/hearing impaired	55	48,93	10,68	2	8,120	0,001**
	Blind/visually impaired	15	59,93	10,03			
	Physically disabled	35	56,03	11,76			
CASSS (importance)							
Close friends' support	Deaf/hearing impaired	55	25,96	4,54	2	11,070	0,000**
	Blind/visually impaired	15	30,60	3,74			
	Physically disabled	34	29,71	4,39			
General support	Deaf/hearing impaired	55	124,89	19,39	2	4,397	0,015*
	Blind/visually impaired	15	138,47	13,60			
	Physically disabled	34	133,44	17,77			
SLCS-R							
Self-liking	Deaf/hearing impaired	53	26,89	5,15	2	4,797	0,010**
	Blind/visually impaired	15	21,80	6,27			
	Physically disabled	35	27,60	7,74			
SDQ-III							
Creativity / Problem solving	Deaf/hearing impaired	55	37,84	6,46	2	5,095	0,008**
	Blind/visually impaired	15	44,60	7,35			
	Physically disabled	35	38,86	8,45			
Physical ability / Sport	Deaf/hearing impaired	53	44,11	10,16	2	4,886	0,009**
	Blind/visually impaired	15	40,80	14,24			
	Physically disabled	35	36,57	11,02			
Peer relations (opposite gender)	Deaf/hearing impaired	55	38,98	8,33	2	4,686	0,011*
	Blind/visually impaired	15	44,20	10,20			
	Physically disabled	35	35,31	10,98			
Parent relations	Deaf/hearing impaired	53	42,68	7,74	2	3,265	0,042*
	Blind/visually impaired	15	48,53	6,40			
	Physically disabled	34	43,56	8,61			
Sincerity / Reliability	Deaf/hearing impaired	54	48,91	8,58	2	3,227	0,044*
	Blind/visually impaired	15	55,07	10,22			
	Physically disabled	34	51,12	7,40			
General self-concept	Deaf/hearing impaired	54	46,17	8,69	2	3,720	0,028*
	Blind/visually impaired	14	53,64	9,64			
	Physically disabled	35	45,94	10,99			

* $p < 0,05$ ** $p < 0,01$

Differences in the importance of social support can be explained by the fact that the most important channel to receive information is obstructed with the blind and the visually impaired. We believe this is why they have the most problems dealing with their disability and therefore need more social support. This could also be the reason for the self-liking dimension being the lowest with blind and visually impaired students. Higher self-liking with the physically disabled is on the other hand probably connected to the amount of parents' social support. Teplin et al. (1981) determined that parents of children with cerebral palsy consciously strive to enhance the positive self-concept and self-esteem with their children. Another explanation is the more explicit self-protective behaviour of physically disabled students that reduces the value of tasks they cannot perform and emphasizes dimensions where they stand out, thus increasing their self-esteem (Crocker and Major, 1989).

In regard to self-concept, the results show that the physical appearance self-concept is the lowest with physically disabled students. These results were expected because the physical appearance presents an important part of understanding oneself in adolescence (Wright, 1983). Of all three groups of students, physical appearance of the physically disabled usually deviates from general ideals more than appearance of the blind or the deaf, which is why physically disabled students have the hardest time confronting the ideals tied to a certain gender, and this negatively affects their self-concept (Wright, 1983).

Regarding the differences in other areas of self-concept we believe that they are linked to social support. The blind and visually disabled perceive the most support from close friends and it is not surprising that they have higher scores at peer-relations (opposite sex) self-concept than other two groups of the students. Their parent-relations self-concept is probably higher due to the different nature of these relations: physically disabled perceive more parent support, but it is possible that parent relations of the physically disabled are based more on the physical help, while parent relations of the blind and the visually impaired are founded on other qualities, such as intimacy. Higher scores in general self-concept and problem solving self-

concept with the blind and the visually impaired is probably the consequence of a better communication and thus more successful learning of these students. With the deaf and the hearing impaired, communication can be quite hindered, which affect learning as well.

Parents' disability

The results show one significant difference in regard to parents' disability: self-competence was higher with students who do not have parents with disabilities ($M(\text{disabled parents}) = 22.17$, $M(\text{typical parents}) = 24.87$, $t = -2.205$, $df = 93$, $p = 0.030$). Higher self-competence of students who have typical parents probably originates from the ability to perform different activities with their parents, while students with disabled parents have more limited set of activities they can do together. Students with typical parents may feel that their family is more able to control the environment and life challenges in general, which according to Mruk (2006) is one of the sources of self-esteem, especially of self-competence.

Correlations between self-concept and social support

We found significant correlations between different sources of social support and almost all areas of self-concept. The correlation between self-concept and the support of close friends, classmates and people in the school is quite high, while correlation with parents' support is somewhat lower.

These results are partly congruent with the findings of other authors who state that social support from parents, teachers, classmates and close friends is significantly connected to students' self-concept (Demaray et al., 2009), and that self-concept is higher with students who perceive more support from parents and close friends (Antle, 2004). In the present research, the support of classmates and close friends was significantly connected to self-concept as well, while correlations between self-concept and parents' support were lower. These results show that self-concept of students with special needs forms more on the basis of experiences with friends and classmates than on the basis of parent relations. We believe the reason for this

is that students who participated in the research spend more time with friends and/or classmates than with parents, especially students who attend special schools because most of them only go home for weekends and are separated from their families for most of the week.

We also found some medium correlations between the frequency and the importance of social support from particular sources. The correlations of the support of parents, close friends and other school workers are very similar, but are somewhat lower with classmates' support and the lowest with teacher's support.

These results show that students long for more support from all of the sources, especially from teachers. The desire or need for more support is probably connected to obstacles mentioned by different authors in the framework of inclusion obstructing factors, e.g. excessive emphasis on academic achievement, teachers' lack of special knowledge, inability to recognize students' special needs. We presume that students wish for their special needs to be considered in a greater extent and for their teachers to provide more support and express more tolerance. This would also give them some additional motivation for academic achievements.

CONCLUSIONS

It seems that with blind and visually impaired, deaf and hearing impaired, and physically disabled students, educational institution and the type

of disability present the factors with the greatest influence on self-concept, self-esteem and social support. The influence of parents' disability is also insignificant. Students perceive the most support from parents and close friends, and these two sources of support are also the most important to them.

The results therefore show inclusion's positive effect on students' personal and social functioning: students attending mainstream schools have better self-concepts and receive more social support than students attending special schools. Findings of the present research thus represent another argument for the children with special needs to be included in mainstream schools – of course, with all the other adjustments assured (adequate materials and help, adjusted teaching methods, an attainable curriculum and qualified teachers).

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