



SELF-PERCEPTION PROFILE FOR CROATIAN ADOLESCENTS WITH VISUAL IMPAIRMENT

PROFIL VLASTITOG DOŽIVLJAJA SEBE KOD ADOLESCENATA S OŠTEĆENJEM VIDA U RH

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SUMMARY

The American psychologist Harter developed a few scales to evaluate the self-concept. Starting point in her method are multidimensionality and the increasing differentiation in the competence fields according to age.

A Croatian translation of Harter's questionnaire "The Self Perception Profile for Adolescents" (SPPA) was used in 30 visually impaired (B2 classification) adolescents. Reliability, in terms of internal consistency was evaluated and the results were compared to those of foreign studies with the sighted adolescent population.

Differences between the results of boys and girls were discussed, and differences between profiles of a visually impaired adolescents and their normally sighted peers. Also, the differences between cultures can be detected because the questionnaire was used in several international studies.

The aim of this study was to construct a Croatian version of the Self-Perception Profile for Adolescents (SPPA) with visual impairment. The research focuses on the reliability and validity of the Croatian version. The presented research investigated the reliability and validity of a Perceived Competence Scale based on the American (Harter's) original – SPPA. It was established to assess the adolescent's perception on school, social, athletic, physical, job, romantic, behavior, close friendship and global self-worth domains. The subjects (N=30) were tested twice in order to investigate the stability between test and retest. The results indicate high test-retest correlations and high internal reliabilities. The correlations among subscales were moderate good.

It is concluded that SPPA is a reliable and valid instrument for determining the perception of adolescents on all domains mentioned above.

SAŽETAK

Američka psihologinja Harter je osmislila nekoliko skala kako bi procijenila samopoimanje pojedinca. Polazna točka u njezinoj metodi je višedimenzionalnost i povećanje diferencijacije u područjima kompetentnosti u skladu s dobi ispitanika.

Upitnik Susan Harter, „The Self Perception Profile for Adolescents“ (SPPA), preveden je na hrvatski i korišten na uzorku od 30 slijepih i slabovidnih (B2 klasifikacija) adolescenata. Pouzdanost, u smislu unutarnje konzistencije je procijenjena, a rezultati su uspoređeni s rezultatima inozemnih studijama provedenih na uzorku adolescenata bez problema s vidom.

Raspravljalo se o uočenim razlikama između rezultata dječaka i djevojčica i razlike između profila slabovidnih adolescenata i njihovih vršnjaka bez problema s vidom. Također, uočene su i kulturološke razlike između, s obzirom da je upitnik bio korišten i u nekoliko međunarodnih studija.

Cilj ovog rada bio je izraditi hrvatsku verziju upitnika za izradu profila za adolescente s oštećenjem vida, na temelju samoprocjene (SPPA). Istraživanje se fokusira na utvrđivanje pouzdanosti i valjanosti hrvatske verzije upitnika. Ovo istraživanje je ispitalo pouzdanost i valjanost skale percepcije osobnih kompetencija (Perceived Competence Scale) temeljene na originalnom američkom upitniku (SPPA). Upitnikom je procijenjena percepcija adolescenata o sljedećim područjima: školska domena, socijalna domena, sport, fizička domena, posao, romantična domena, blisko prijateljstvo i opće samopoštovanje. Ispitanici (N = 30) su testirani dva puta kako bi se istražila stabilnost između testa i retest. Rezultati ukazuju na visoku test-retest povezanost i visoku pouzdanost. Povezanost između subskala je umjereno dobra.

Further research is needed to make the construct of competence more useful for visually impaired adolescents, because the feeling of competence will encourage the adolescent to learn new skills.

Key words: self-perception, visual impairment, adolescents, questionnaire

Zaključeno je da SPPA pouzdan i valjan instrument za utvrđivanje osobne percepcije adolescenata u svim gore navedenim područjima.

Daljnja istraživanja su neophodna kako bi se izradio što korisniji instrument za utvrđivanje percepcije slijepih i slabovidnih adolescenata, jer osjećaj veće kompetencije će biti poticaj adolescentima da nauče nove vještine.

Ključne riječi: vlastiti doživljaj sebe, oštećenje vida, adolescenti, upitnik

Background

The aim of this study is to make a contribution to the applicability of the concept of perceived competence for adolescents with visual impairment. Harter's manual for the «Self-Perception Profile for Adolescents» (SPPA) was used in this study. The same instrument was already used on American (11), Norwegian (41), Australian (31) and Flemish (26) sighted adolescents. Simons (26) did the comparison of the results of those studies and detected interesting differences, which he explained as a result of cultural differences.

All studies confirmed the reliability and validity of Harter's SPPA. It has to be mentioned that first aim of this research concerned the psychological quality of the scale itself for visually impaired adolescents. Second aim was to establish whether there are differences in results of visually impaired adolescents and their sighted peers.

Further investigations are needed to investigate those differences and other parts of Harter's SPPA, viz. the Importance Scale.

INTRODUCTION

The adolescence is marked as a transition between naive safety of the childhood, on one hand, and stabile model of a life of adults on the other. Adolescence, as the transition from childhood to adulthood, is characterized by unique, multiple physical and psychological changes and social demands (38). That transition is characterized by a sudden change of mood and instability. During that period deep effective changes occur, physical and psychological as well as social abilities development. Through adolescence, personality development continues more rapidly. Since, adolescence is commonly treated as a temporary faze (period) of insecurity in oneself, investigation of a self perception in that particular period seems very appealing and interesting (26).

The ongoing chronic strain of deficiencies, such as the potential limitations in the activities of daily living and functional independence and the psychological and social effects of being physically different from one's peers, may interact synergistically to produce a negative impact on psychological and social adjustment (36).

Adolescents with visual impairments may be at risk for psychological and social adjustment problems. Some studies have found that visual impairments may cause adolescents to feel inadequate and inferior-feelings that are thought to reflect their lack of social acceptance, academic underachievement, physical incapability, and social maladjustment (20). However, other studies (21) have suggested that visually impaired persons are not at higher risk of developing lower self-esteem than their sighted counterparts.

It has also been found that many adolescents with visual impairments have problems relating to peers. They may be socially isolated, with fewer friends and smaller social networks than fully sighted adolescents (5, 14, 15, 34), and spend more time alone in passive activities (42).

Literature shows quite confusion regarding the terms of self perception, self worth and self concept (26). So, the need for definition and distinction of these terms emerge. The self concept has a role of the central term in organization of knowledge, behavior, emotions and motives of a person (37). More or less that is the complete picture the individual has of her/himself, which points to the cognitive representation. The self worth is the affective aspect of the self concept. It is about comparison of oneself with the standard criteria, e.g. with the others, with the ideal picture of oneself or to the other expectations of us. Self worth is either positive or negative, and could be broken down to the different components (7, 22, 26, 28).

Harter (9) differs global self worth and value of functioning of a person in the different domains. She designed the term of «perceived competence» for evaluation of adolescents. It is based on a fact that an individual is more

competent (effective) in some domains than in others. Harter (11) developed and operationally defined a self concept for adolescents as a multidimensional construct consisting of (a) measures of perceived competence or adequacy in eight specific domains and (b) an independent measure of global self-esteem designed to reflect over-all happiness with self and life, and for different life phases (11, 40). As the person grows older, more differences and more different domains could be detected.

Harter's (11) operationally defined self concept (perception) was accepted by Fox (7), Shavelson et al. (22), Sonstroem (28).

The purpose of this study was to examine the self-concept of visually impaired (B2 classification), and to compare the results with their normally sighted peers. No research presently exists on adolescents with this disability. Some studies of adult visually impaired athletes, however, provide growing evidence that mean self-concept is similar to that of sighted persons (1, 23, 24). Because adult disabled athletes are similar to their sighted peers, it was hypothesized that visually impaired adolescents, not necessarily athletes would follow the general pattern of their sighted peers. Mean self-concept scores were expected to fall within the ranges designated as normal in the test manual.

METHODS

Subjects

The population of interest for this study was visually impaired adolescents. Inclusion criteria was visual impairment (B2 classification), an age between 13-18 years and IQ within the normal range of intelligence. The sample included 30 adolescents (13-18 years), 13 girls (mean age 16,8 years) and 17 boys (16,4 years). The subjects were not visually impaired by birth. They were recruited from elementary school for visually impaired "Vinko Bek" and from the center for visually impaired "Vinko Bek -Zagreb". The mean age of a sample was 16,6 years.

Instrument

Self-Perception was measured by an inventory entitled "What Am I Like". This instrument included 45 items designed to measure global self-worth and eight specific self-perception domains: scholastic competence, social acceptance, athletic competence, physical appearance, job competence, romantic appeal, behavioral conduct and close friendship. Explanations of each of these domains appear below. The instrument yielded nine separate scores. Items were written in a structured alternative format in which the subject first indicated which of two types of individuals he was most like and then whether this likeness was sort of or really true. An example of this type of item follows:

This structured alternative format has been recommended as a way of minimizing socially desirable responses (11). Also, this four-choice format provides

more information than the traditional two-choice formats (e.g., Like Me-Unlike Me; Yes-No). Explanation of scales comprising "What Am I Like" are:

1. **Scholastic Competence.** This subscale taps the adolescent's perception of her/his competence or ability within the realm of scholastic performance, e. g. how well she/he is doing at class work, and how smart or intelligent one feels one is.
2. **Social Acceptance.** This subscale taps the degree to which the adolescent is accepted by peers, feels popular, has a lot of friends, and feels that she/he is easy to like.
3. **Athletic Competence.** This subscale taps the adolescent's perception of her/his athletic ability and competence at sports, e. g. feelings that one is good at sports and athletic activities.
4. **Physical Appearance.** This subscale taps the degree to which the adolescent is happy with the way she/he looks, likes one's body, and feels that she/he is good-looking.
5. **Job Competence.** This subscale taps the extent to which the adolescent feels that she/he has job skills, is ready to do well at part-time jobs, and feels that one is doing well at the job she/he has.
6. **Romantic Appeal.** This subscale taps adolescent's perception that they are romantically attractive to those in whom they are interested, are dating the people they would like to be dating, and feel that they are fun and interesting on a date.
7. **Behavioral Conduct.** This subscale taps the degree to which one likes the way one behaves, does the right thing, acts the way one is supposed to, and avoids getting into trouble.
8. **Close Friendship.** This subscale taps one's ability to make close friends she/he can share personal thoughts and secrets with.
9. **Global Self-Worth.** These items tap the extent to which the adolescent likes oneself as a person, is happy the way one is leading one's life, and is generally happy with the way one is. Thus, it constitutes a global judgment of one's worth as a person, rather than domain-specific competence or adequacy.

The each subscale consists of five items, scored on a 4-point scale in which a score of 1 indicated low perceived competence or adequacy and a score of 4 indicated high perceived competence or adequacy. Test manual instructions required that the item scores within each domain be averaged to obtain the subscale scores. Thus each subscale was examined independently from the others.

This instrument was selected because it give them standard validity and reliability requirements and was consistent with self-perception theory that supports analysis of separate measures for each self-dimension and the use of a global score that is not the sum of other measures. Harter's (12) theoretical constructs have gained widespread acceptance in physical education (6, 7, 40). During the past years Harter's inventory has been used in sport psychology research with youth athletes more than any other instrument.

Procedure

The original Harter's questionnaire was translated from English to Croatian, than back to the English original; to avoid possible differences in translation process. The questionnaire was administered to each subject individually, by reading (because of their disability), in a private and quiet area two times (test-retest); within period of two weeks. The procedure lasted from 25-35 minutes. Each item from questionnaire was read and explained to the subjects according to the Harter's "Manual for the SPPA". Since their IQ was within the normal range of intelligence it was assumed that they understand the procedure and questions.

Since the results from this study are going to be compared with the results of other international studies (on normally sighted adolescent population), in which each age group has been considered as one whole, we also wont separate participants on age group.

Statistical procedure

First we will analyze our data, obtained on the SPPA questionnaire, and arrange them on a key-score basis. General procedure is to score each item on a scale from 1 to 4, where the score of 1 indicates low perceived competence or adequacy and a score of 4 reflect high-perceived competence. The adolescent who indicates that statement (item) is only sort of true for her/him would receive a score of 2 or 3 (depends in which group or part of the item subjects view themselves).

To establish the reliability of the "Self-Perception Profile for Adolescents" with visual impairment the internal consistency was expressed by Chronbach's Alpha. That was conducted for all 45 items together, and for each competence domain (subscale) and for global self-worth subscale.

Computing the Pearson's product moment coefficient among the nine subscales for both the test and retest assessed validity.

Student t-test was used to establish the gender differences and to establish the differences between visually impaired Croatian adolescents and their American, Flemish and Norwegian fully sighted peers.

RESULTS

A. Reliability in terms of internal consistency (alpha coefficient)

The global internal consistency in Croatian study is $\alpha = 0.94$; which is very high. Alpha coefficients of the different domains of self-perception and Global Self-Worth are also high. From these values we can infer that our α coefficients are analogous to coefficients from American, Australian and Norwegian studies, but higher than Flemish study (Table 1).

B. Means and standard deviations from Croatian study (Table 2).

From Table 2. we can see that mean values are around 3,1; and median values are always close to the mean values. Adolescents scored especially high on Close Friendship (3,49), Social Acceptance (3,21), Job Competence (3,17) specific domains, and on Global Self-Worth (3,51). The lowest values were obtained on Athletic Competence (2,78) and Romantic Appeal (2,83). Standard deviations vary between 0,57 and 0,69.

The results of boys and girls are showed in Table 3., and no significant differences were found on p-level of 0,01.

Scores of boys (N=17) and girls (N=13) are not significantly different on all 8 specific domains and Global Self-Worth. So, we can conclude that there are no gender differences.

C. Comparison with other studies (Table 4)

Table 1. Alpha coefficient from Croatian, Flemish, American, Australian & Norwegian studies

Tablica 1. Alfa koeficijent iz hrvatskog, flamanskog, američkog, australskog i norveškog istraživanja

	Croatian	Flemish	American	Australian	Norwegian
Scholastic Competence	.79	.45	.77-.91	.91	.60
Social Acceptance	.76	.47	.77-.90	.85	.56
Athletic Competence	.75	.59	.86-.92	.89	.66
Physical Appearance	.77	.67	.84-.89	.85	.76
Job Competence	.70	.32	.55-.93		
Romantic Appeal	.66	.36	.75-.85	.70	.75
Behavioral Conduct	.65	.53	.58-.78	.59	
Close Friendship	.82	.50	.79-.85	.85	.68
Global Self-Worth	.83	.56	.80-.89	.85	

Table 2. Means, standard deviations and median for Croatian adolescents (N=30)

Tablica 2. Aritmetičke sredine, standardne devijacije i medijan za hrvatske adolescente (N=30)

	Valid N	Mean	Median	Std.dev.
Scholastic Competence	30	2,87	2,80	0,65
Social Acceptance	30	3,21	3,30	0,65
Athletic Competence	30	2,78	3,00	0,66
Physical Appearance	30	3,17	3,10	0,65
Job Competence	30	2,97	3,10	0,69
Romantic Appeal	30	2,83	2,90	0,60
Behavioral Conduct	30	2,88	3,00	0,62
Close Friendship	30	3,49	3,60	0,62
Global Self-Worth	30	3,51	3,80	0,57

Table 3. Comparison between results of boys and girls in Croatian study

Tablica 3. Usporedba rezultata dječaka i djevojčica u Hrvatskom istraživanju

	BOYS (N=17)		GIRLS (N=17)		t-test	p-value
	M	SD	M	SD		
Scholastic Competence	2,93	0,61	2,80	0,72	0,531	ns
Social Acceptance	3,15	0,62	3,29	0,70	-0,567	ns
Athletic Competence	2,87	0,66	2,66	0,66	0,846	ns
Physical Appearance	3,24	0,73	3,08	0,54	0,640	ns
Job Competence	2,93	0,69	3,02	0,72	-0,325	ns
Romantic Appeal	2,75	0,67	2,92	0,49	-0,773	ns
Behavioral Conduct	2,85	0,54	2,92	0,73	-0,323	ns
Close Friendship	3,48	0,41	3,51	0,84	-0,108	ns
Global Self-Worth	3,45	0,62	3,58	0,52	-0,631	ns

Table 4. Comparison of Croatian and American adolescent population (11)

Tablica 4. Usporedba rezultata hrvatskih i američkih adolescentske populacije

	Croatian sample (N=30)		American sample (N=13)		t-test	p-level (0,01)
	M	SD	M	SD		
Scholastic Competence	2,87	0,65	2,90	0,69	0,231	ns
Social Acceptance	3,21	0,65	3,10	0,66	0,846	ns
Athletic Competence	2,78	0,66	2,60	0,78	-1,200	ns
Physical Appearance	3,17	0,65	2,60	0,72	-4,071	0,0001
Job Competence	2,97	0,69	3,20	0,62	1,917	ns
Romantic Appeal	2,83	0,60	2,70	0,68	-1,000	ns
Behavioral Conduct	2,88	0,62	2,60	0,54	-2,545	ns
Close Friendship	3,49	0,62	3,10	0,64	-3,000	0,0030
Global Self-Worth	3,51	0,57	3,00	0,72	-3,643	0,0003

Here we can see that differences between results in Croatian and American study are not statistically significant. Croatian adolescents scored average higher than their American peers on almost all specific domains and on Global Self-Worth (Table 5).

Differences between results in Croatian and Flemish study are statistically significant. Croatian adolescents scored significantly higher than their Flemish peers on all specific domains and on Global Self-Worth (Table 6).

Differences between results in Croatian and Norwegian study are statistically significant. Croatian adolescents scored significantly higher than their Norwegian peers on all specific domains and on Global Self-Worth.

D. Correlations between subscales (Table 7)

To investigate possible significant correlations among all subscales we used Pearson's coefficient product moment. Correlation between 8 specific self-concept domains and Global Self-Worth in Croatian study is $r = 0,99$; which is extremely high. In American study it was $r = 0,66$ (11), Flemish $r = 0,71$ (Simons, 1999), Australian $r = 0,68$ (Trent et al 1994).

Table 5. Comparison of Croatian and Flemish adolescent population
Tablica 5. Usporedba rezultata hrvatske i flamanske adolescentske populacije

	Croatian sample (N=30)		Flemish sample (N=13)		t-test	p-level (0,01)
	M	SD	M	SD		
Scholastic Competence	2,87	0,65	2,67	0,59	1,429	ns
Social Acceptance	3,21	0,65	2,82	0,59	3,250	0,0012
Athletic Competence	2,78	0,66	2,33	0,69	3,488	0,0005
Physical Appearance	3,17	0,65	2,48	0,77	4,929	0,0000
Job Competence	2,97	0,69	2,61	0,58	2,571	ns
Romantic Appeal	2,83	0,60	2,39	0,54	4,400	0,0000
Behavioral Conduct	2,88	0,62	2,66	0,61	1,930	ns
Close Friendship	3,49	0,62	3,12	0,68	2,846	0,0045
Global Self-Worth	3,51	0,57	2,82	0,68	5,308	0,0000

Table 6. Comparison of Croatian and Norwegian adolescent population
Tablica 6. Usporedba rezultata hrvatske i norveške adolescentske populacije

	Croatian sample (N=30)		Flemish sample (N=13)		t-test	p-level (0,01)
	M	SD	M	SD		
Scholastic Competence	2,87	0,65	2,71	0,53	3,200	0,0014
Social Acceptance	3,21	0,65	2,87	0,51	3,505	0,0005
Athletic Competence	2,78	0,66	2,45	0,57	3,000	0,0028
Physical Appearance	3,17	0,65	2,54	0,62	5,250	0,0000
Job Competence	2,97	0,69				
Romantic Appeal	2,83	0,60	2,64	0,57	1,727	Ns
Behavioral Conduct	2,88	0,62				
Close Friendship	3,49	0,62	2,98	0,67	4,250	0,0000
Global Self-Worth	3,51	0,57	2,75	0,57	6,909	0,0000

Table 7. Correlations between competence domains and Global Self-Worth (N=30)

Tablica 7. Korelacija između kompetencijske domene i globalnog samopoštovanja (N=30)

	Schol. Comp.	Soc. Accep.	Athl. Comp.	Phys. Appear.	Job Comp.	Rom. Appeal	Behav. Cond.	Close Friend.	Global S.-W.
Schol. Comp.	1,00								
Soc. Accep.	0,13	1,00							
Athl. Comp.	0,04	0,29	1,00						
Phys. Appear.	0,13	0,05	0,43	1,00					
Job Comp.	0,36	0,36	0,36	0,17	1,00				
Rom. Appeal	0,37	0,60	0,41	0,15	0,67	1,00			
Behav. Cond.	0,53	0,41	0,36	0,44	0,45	0,62	1,00		
Close Friend.	-0,08	0,52	-0,12	-0,16	-0,22	0,27	0,03	1,00	
Global S.-W.	0,41	0,30	0,24	0,65	0,34	0,46	0,49	-0,01	1,00

DISCUSSION AND CONCLUSION

The study presented here investigated the reliability and validity of “Self-Perception Profile for Adolescent” – SPPA (11) for Croatian visually impaired adolescents, and whether adolescents with and without visual impairment differed in specific competence domains and self-esteem.

The SPPA turned out to be a questionnaire with a high reliability for all domains, in a term of internal consistency. Harter (11) found values between 0.75 to 0.92 for American sighted adolescents, and in this study total reliability for Croatian adolescents (visually impaired) was 0.94, which is very high (higher than all other studies). In all subscales reliability values are high, and they are analogous with American study (11).

No gender differences were found in this study, which is in contradiction with the results of other studies. In Harter’s study (11) girls scored lower on Athletic Competence, Physical Appearance and Global Self-Worth. Also, in Australian study (31) they found these gender differences and they were significant. American girls felt themselves more competent in Close Friendship than their male peers.

The validity was assessed by Pearson’s product moment correlation coefficient ($r = 0.99$) between each specific domain and global self-worth (Table7). It led to conclusion that SPPA is very reliable and valid instrument to assess self-perception of Croatian visually impaired adolescents.

Among the domain-specific subscales, Scholastic Competence is moderately related to Behavioral Conduct, indicating that adolescents who feel they are good at schoolwork report that they are well behaved. Conversely, those who feel that they are not doing well at school also report more behavior problems. Behavioral Conduct domain is moderately related to all specific domains except to Close Friendship. This could be explained through the previous findings in this area, that many adolescents with visual impairments have problems relating to peers. So, they may

be socially isolated, with fewer friends and smaller social networks than fully sighted adolescents (5, 14,15,35).

In a sighted population appears to be a cluster involving Social Acceptance, Romantic Appeal, and Physical Appearance, that three subscales are thought to be moderately related because it seems likely that physical attractiveness may lead to greater acceptance or popularity among one’s peers, as well as greater perceived romantic appeal (11). On the other hand, in visually impaired population could be noted moderate relationship between Social Acceptance and Romantic Appeal domain, but not with the Physical Appearance.

As mentioned before, visually impaired lack the intense concern about physical appearance in contrast to their sighted peers, and this study supports that view. Visually impaired had higher values on Physical Appearance (3,17); also higher correlation values were obtained between Physical Appearance specific domain and Global Self-Worth ($r = 0,65$).

Physical Appearance is subscale, which is highly related to one’s self-worth in this study as well as in all previous studies. One may infer that attractiveness is particularly important to one’s sense of self-worth, although the directionality of this relationship warrants further study, particularly since this relationship is very robust across the lifespan (11). Almost all of the subjects had appearances that were markedly different from their sighted peers. Further research is needed to investigate whether the professed good feeling about appearance was the result of a deep-seated denial mechanism (i.e. the subjects did not perceived their appearance as different or undesirable) or scores may simply have reflected acceptance of their physical appearance.

In studies conducted on sighted population (11,26,31,42) higher correlations were obtained between the Global Self-Worth and Scholastic Competence, Social Acceptance, Close Friendship, Romantic Appeal and Behavioral Conduct. This seems to suggest that the social competence is very

important domain for the global self-esteem of adolescent. Namely, how they feel and behave in relations to their peers. This could be important support for the multidimensional vision, which could help to explain the self-perception of adolescents.

In this study specific domains of Scholastic Competence, Romantic Appeal and Behavioral Conduct bear moderate relationships to Self-Worth, whereas Athletic Competence, Social Acceptance, Job Competence are less highly related, and Close Friendship domain has very low correlation (0,01) to Self-Worth.

This points out the importance of relationship with friends among adolescents in general, which describes the degree of social integration with friends and significantly contributes to higher and more positive feeling of global self-worth among visually impaired adolescents.

From results of this study we can infer that Croatian, visually impaired, population has very high and positive self-concept. Also, that they are very self-confident. Since the sample size is rather small ($N = 30$), further investigation are recommended and needed. The development of self-esteem is recognized as fundamentals for the psychosocial development of visually impaired children (2).

Despite the concern over self-esteem in blind and visually impaired children there is little evidence that they have consistently lower self-esteem than their sighted peers (20).

Self-esteem has been identified as a concept of central relevance to the understanding of individuals functioning, to their beliefs in achieving success at new tasks (30). Common sense terms such as confidence and motivation can therefore be seen to be subsumed under the concept of self-esteem. Self-esteem appears to have two main origins. The first is a sense of self-worth acquired during the childhood; the second is based on perception of one's own competence in every day life.

The positive self-esteem of adolescents with wide range of degrees of blindness suggests that they lack the intense concern about bodily appearance, which is found in sighted children (32,39). The results of Croatian study are very similar to Harter's (11) on sighted population. The biggest difference between Croatian, Flemish, Norwegian and American results was in job competence domain. This could be explained through cultural differences and habits of different nations. Croatian adolescents have a similar mentality and opportunity as their American peers towards

a part time job. They experience the job competence in order to gain higher feelings of self-esteem and self-worth. It has especially significant value for special population.

Norwegian adolescents differ significantly in all competence domains, except in romantic appeal, from their Croatian peers. They scored lower on all subscales. Norwegian adolescents gave themselves relatively low scores on the field of athletic competence, perhaps because they compared themselves to their national heroes; who are very successful on the international level. That could explain their critical attitude towards athletic competence (41).

The comparison of visually impaired Croatian population to their sighted Flemish peers showed significant differences in all domains, except in scholastic and behavioral domain, this could point out cultural differences in the life style of Croatian and Flemish adolescents. Also, in comparison to American, Norwegian and Australian adolescents significant differences were found (low reliability figures on SPPA subscales) for Flemish adolescents. This fact tells us that self-perception seems not to be something stable, constant, and maybe new, modified form of SPPA should be done for Flemish population. Like Harter, they should start with questioning adolescents in the areas they feel are important and then make a new questionnaire form. Because, it could be possible that Flemish adolescents answer less honest on this kind of questions (26).

The differences between mean values of subscales for different studies can be explained through cultural differences, norms and habits. The SPPA questionnaire of Harter is recognized as one of the most recent and most reliable in the area of multidimensional view of self-perception. Attractiveness of this scale is explicit theory building, which lies on the foundation of it.

This study proves the value of SPPA, which had been already proved on international level. Also gives us an overview of previous studies, which were conducted in different countries and cultural environment that significantly affected final results of the study. So, that lead us to conclusion that SPPA has to be adapted to specific characteristics of population.

We should not underestimate the enormous influence of mentality on competence experience and self-worth. Also, habits, values, norms and beliefs of a nation and its people can be very determinative for self-perception of their adolescents.

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