SOCIAL POSITIONS OF STUDENTS AND CYBERBULLYING

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Abstract: The present study studies the evaluation of the social position of students towards cyberbullying. The dedicated survey was targeted on the self-evaluation of students among their classmates and the students' social positions were consequently put into the relation with cyberbullying. The research was aiming at identifying the research was atomized to a students' social position of students are sumption that there is a relation between the perceived social position of student and cyberbullying. The research was carried out as the part of VEGA project no. 1/0244/15 Detection and resolving cyberbullying.

Keywords: social position, sociometric status, cyber-aggressor, cyber-victim

1 Introduction

The phenomenon of cyberbullying has been recently given more and more attention. The seriousness of this phenomenon is confirmed by theoretical studies and researches worldwide. In Slovak Republic, several experts including Valihorová (2015), Žiaková (2014), Hudecová (2014), Emmerová (2013), Dulovics (2013), Gregussová & Kováčiková (2009), Hollá (2010, 2013) et al. are studying the phenomenon of bullying in cyberspace. Empirical studies of cyberbullying are carried out on various levels and scopes (the social phenomenon, the form of aggression, psychical violence, the cyberbullying at schools, the consequences of cyberbullying, etc.).

The study is focused on identifying the relations and links between student's social position and cyberbullying. The fact how students evaluate themselves and their behavior represents the factor contributing to the start of cyberbullying.

Students' self-knowledge, self-understanding, and selfawareness, awareness of their role, the role in the classroom, their sociometric status require mastering of self-perception (self-image). Students can create their self-image via two forms: through introspection (self-examination) and through the evaluation of the results and consequences of the own behavior. As Oravcová (2004) points out, the creation of self-image comprises the important parts including *social comparison* (comparison of an individual to famous people), *self-reflection* of the own experiences over a period of time, basically the selfevaluation, focusing on the own positive and negative aspects, potential for changes, *feedback*, the information about an individual receiving from other people.

Self-awareness is closely related to the social position and sociometric status in the class environment. Students acquire their position and status on the basis of several factors: from their parents, through the ontogenesis, by the statements of the people in their surroundings, however, the latter may not necessarily be true. The position that student acquires in the class environment proceeds naturally from the outside world and from personal attributes. This includes particularly personal attractiveness, popularity – the bigger it is, the stronger student's position becomes. The position of the student is affected by the character of social relations in the class.

If a student acquires high number of social relations and selections from the classmates, it proves their acceptation or rejection in formal or informal group. The important factor that also contributes to the forming student's position includes meeting the expectations of being useful within a group, pushing through the own opinions, accomplishing the own ambitions, the ambition to be respected, admired, satisfying the need of selfrealization, etc. The student with high position and status in the classroom has significantly higher influence on the other students and is thus recognized as the natural leader of the group or team.

Student's activity within the classroom goes beyond the role of the student receiving the information. The current education practice requires the student to meet cognitive, social, emotional, moral and ethical skills, to master critical thinking and constructive evaluation of positive or negative situations in the class.

The current educational professional discourses underline the need of secure classroom environment particularly from the emotional, social aspect on various levels.

Proceeding from the latter, we would consider very important to think about the students' positions in relation to the occurrence of cyberbullying.

2 Relation between students' social positions in the class and cyber-victim and cyber-aggressor

2.1 Research goal and methodological base

Many scientific theoretical studies and empirical surveys register the presence of aggression and bullying in cyberspace in the global scope. The empirical aspect of the study aimed at identifying the existence of the relation between students' social positions in the classroom and the level of cyberaggressor/cyber-victim. We studied the existence of statistical significance between student's social position and students' level of cyber-aggressor/cyber-victim. The focus was laid on the evaluation of student's position (self-perception) in the scope of cyberbullying.

Cyberbullying and Online Aggression questionnaire (Hinduja, S., Patchin, J. W. 2009) was used to collect the data. The modification of the questionnaire for the conditions of Slovak school environment proved highly effective values.

The reliability of the translated and modified research tool was established using Cronbach's alpha in SPSS program. The coefficient in the scale of cyber-victim was 0.864 and in the scale of cyber-aggressor 0.905 (Hollá, Fenyvesiová, Hanuliaková, 2016). The values of both scales point out highly effective internal reliability of the research tool. In addition to the above-mentioned questionnaire, we also used the nonstandardized questionnaire focused on students' social positions within the class.

2.2 Research participants

The research sample included 1,118 primary school (PS) and secondary school (SS) students (boys -45.5%, girls -55.5%) from all regions of Slovakia.

The greatest number of students came from Nitra region -45.2% and Žilina region -20.8%; on the other hand, the least came from Bratislava region -2.8% and Košice region -3.5%. Most students (57.1%) attended primary school. The research included students aged 11 - 18 (the average age was 15.25). The structure of the research sample is demonstrated in Table 1.

Region	Ν	Sex		Ту	pe of school	Age		
		Boys	Girls	PS	SS	Average (SD)		
Bratislava	31	15	16	23	8	14.90 (SD = 2.23)		
Trnava	90	45	45	20	70	16.34 (SD = 2.28)		
Trenčín	90	42	48	71	19	13.11 (SD = 2.18)		
Nitra	505	221	284	227	278	14.95 (SD = 2.39)		
Žilina	232	100	132	20	212	17.34 (SD = 1.69)		
Banská Bystrica	71	34	37	46	25	13.59 (SD = 1.97)		
Prešov	60	34	26	44	16	14.15 (SD = 2.31)		
Košice	39	18	21	29	10	14.00 (SD = 2.38)		
Total	111 8	509	609	480	638	15.25 (SD = 2.55)		

Table 1: The structure of the research sample

(N - number of students, SD - standard deviation)

2.3 Research results

In recent years, cyberbullying has been studied by a vast number of experts. Following the research goal, we collected the data via questionnaire method, i.e. we performed the quantitative research. Using this questionnaire, the participants evaluated their social position in the class. We were highly interested in the participants' evaluation of their own behavior towards the other classmates and also the opinion, attitude and judgment of the latter group.

The collected data were evaluated by IRT statistic method, MANOVA method, Pearson's test and Tukey's test. We also used descriptive and inductive statistics to evaluate these data. IRT method helped us to identify the students' levels of cyberaggressor and cyber-victim. Students' social positions in the class were identified by their answers to the questionnaire items:

In the classroom, I...

My classmates think, I...

Since the highly positive correlation measured by Pearson's correlation coefficient *r* (boys: r = 0.61 (p < 0.001), girls: r = 0.59 (p < 0.001)) was proved between the level of cyber-aggressor and that of cyber-victim, we used multivariate analysis of variance (MANOVA) for each question individually, in order to study the significance of the cyber-aggressors' and cyber-victims' levels regarding students' social positions in the class.

In the classroom, I... vs. Cyber-Aggressor (C-A) and Cyber-Victim (C-V)

In the questionnaire item 'In the classroom, I...', the respondents were offered to select one of the possible social positions: I behave friendly, I act like a leader, I often spread gossips, I make fun of the others, I hurt the others, I am ambitious, I act rudely and disturb, I act indifferently, I am emphatic and devoted.

The values in the Table 2 demonstrate both boys and girls mostly claim that they behave friendly in the classroom.

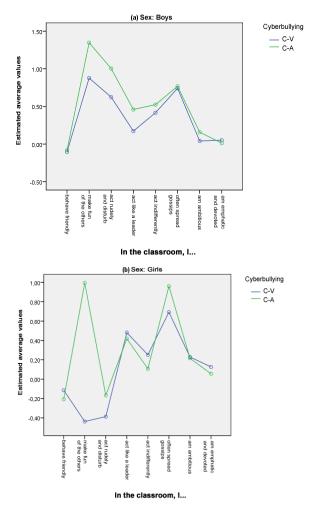
Table 2: Score of cyber-aggressor and cyber-victim according to the behavior and sex

	CYBER-AGGRESSOR						CYBER-VICTIM						
In the	boys			girls			boys			girls			
classroom,	Ν	Avg.	SD	Ν	Avg.	SD	Ν	Avg.	SD	Ν	Avg.	SD	
I													
behave friendly	344	-0.08	0.71	461	-0.21	0.62	344	-0.11	0.82	461	-0.11	0.77	
make fun of the others	11	1.35	1.06	2	1.00	0.41	11	0.88	1.00	2	-0.44	0.52	
act rudely and disturb	24	1.00	0.95	6	-0.17	0.61	24	0.62	0.78	6	-0.39	0.46	
act like a leader	46	0.46	0.75	14	0.42	1.27	46	0.17	0.74	14	0.48	1.36	
act indifferently	34	0.52	0.91	24	0.11	0.86	34	0.42	0.95	24	0.25	0.92	
often spread gossips	4	0.77	0.68	17	0.96	0.48	4	0.74	0.44	17	0.69	0.71	
am ambitious	25	0.16	0.78	31	0.22	0.72	25	0.04	0.87	31	0.23	0.80	
am emphatic and devoted	18	0.01	0.84	49	0.06	0.68	18	0.05	0.97	49	0.13	0.81	

(N - number of students, Avg. - Average, SD - standard deviation)

The least frequent answer is 'I often spread gossips' (boys) and 'I make fun of the others' and 'I act rudely and disturb' (girls). The students who claimed they behave friendly have the lowest average level of cyber-aggressor and cyber-victim.

To demonstrate this phenomenon in more convenient view, we introduce the profile graphs of the average level of cyber-aggressor and cyber-victim for both boys (Picture 1a) and girls (Picture 1b) according to their behavior in the class.



Picture 1: Profile graphs of cyber-aggressor and cyber-victim according to the behavior in the class

The graphs clearly demonstrate that both groups of respondents (boys and girls) have the same statistically significant category: 'I make fun of the others'. For boys, making fun and rude, disturbing behavior prove they might probably become cyber-aggressors or cyber-victims. Girls, as per their self-evaluation, show high probability to become cyber-aggressors and cyber-victims due to spreading rumors and gossips of their classmates.

Using MANOVA method, we studied (separately for boys and girls) if the way how the students behave in the class statistically significantly affects the level of cyberbullying participants (C-A and C-V). We excluded all the categories with the frequency lower than 10 ('I often spread gossips' for boys and 'I make fun of the others' plus 'I act rudely and disturb' for girls) from the analyses.

MANOVA method results for *boys* demonstrate the fact that the boys' behavior in the class significantly affects the level of cyberbullying (or vice versa) ($\lambda = 0,811$, F (10; 894) = 9,86, p < 0,001). This relation was proved both in the case of C-V (F(5,448) = 7,63, p < 0,001) and in the case of C-A (F (5,448) = 20,43, p < 0,001). Tukey's test demonstrated that for C-V, the following category pairs show statistically significant differences:

- I behave friendly I make fun of the others (p = 0,001)
- I behave friendly I act rudely and disturb (p < 0,001)

The evaluation of students' social positions statistically demonstrated the probability that students making fun of the others in the class and showing rude and disturbing behavior may become the victims of cyberbullying. For C-A, the following category pairs show statistically significant differences:

- I behave friendly I make fun of the others (p < 0,001)
- I behave friendly I act rudely and disturb (p < 0,001)
- I behave friendly I act like a leader (p < 0.001)
- I make fun of the others I am ambitious (p < 0,001)
- I act rudely and disturb I am ambitious (p < 0,001)
- I act like a leader I act rudely and disturb (p = 0,042)

Conclusions made from the identified results within the correlation of the selected items point out the high assumption that student who makes fun of the others can become cyberaggressor. Taking age structure of the respondents into account, cyberbullying may arise because of making fun of the physical appearance, success or failure at school, failure to integrate to a group, nerds, preferred students, etc. Statistically significant relation was proved among students considering themselves rude and disturbing and cyber-aggressor. Students' disturbing is the result of passivity during the lesson, tedious lecture or disinteresting learning material. Boredom during the lecture creates the space for students to play on their mobile phones, record their classmates, teachers, whole atmosphere at the classroom and share such content on social networks, or send emails or text messages of various content. Mutual correlation of the student in the position of leader and the cyber-aggressor was statistically proved. A student - leader lusts for power, demonstrates their strengths to evoke fear among the others. If there is no reaction of the surrounding, the aggression intensifies. Rottová (2009) describes this type of cyber-aggressor as "lusting for power". The author generally considers the mentioned type of cyber-aggressor as the most dangerous. Student's self-evaluation as making fun of the others forms real assumption for the position of aggressor. Diminishing the classmates, mockery, humiliation, ridiculing of students represent one of the ways how to be successful, popular and respected within a group. Technologies, especially mobile phones and computers with internet connection recently represent significant means of diminishing other people.

The results of MANOVA method for *girls* demonstrate the way how girls behave within the class significantly affects the level of cyberbullying (or vice versa) ($\lambda = 0,876$, F (8; 1082) = 9,26, p <0,001). This relation was proved both in the case of C-V (F(4,542) = 8,09, p < 0,001) and C-A (F(4,542) = 4,93, p < 0,001). Since the equality-of-variance assumption was violated, Games-Howell test was used to evaluate the statistical significance of differences of average values between the category pairs for C-V and C-A. For C-V, statistically significant difference was identified only in the case of category pair *behave friendly – often spread gossips* (p = 0,002). In the case of C-A, statistically significant difference was identified in the following category pairs:

- I behave friendly I often spread gossips (p < 0,001)
- I act indifferently I often spread gossips (p = 0,002)
- I often spread gossips I am ambitious (p = 0,001)

The mentioned results document that frequently gossiping girls become cyber-victims. Claims that girls show disinterest to everything are considered most serious. Respondents' indifference, thoughtlessness, disinterest, demonstrated lack of interest can be shown in the lack of interest in learning, social relationships, emotions within the class and in whole atmosphere in the group. Disinterest and indifference might be reflected intensively in gossiping the classmates. Defamation and gossiping of the classmates as a part of cyberbullying are closely related to respondents' ambitiousness. The compelling fact is that the female students use their self-assertion in the collective exactly for gossiping. Since the aim of spreading gossips is to hurt and harm the other people, female students, who considered themselves ambitious and at the same time spreading gossips, had high tendency to become cyber-aggressors.

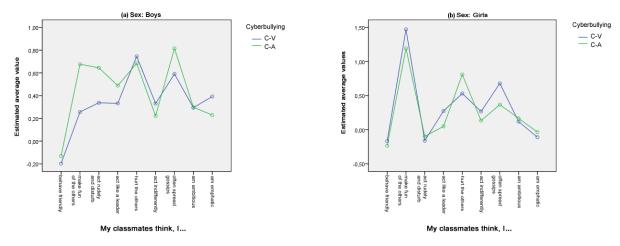
My classmates think, I... vs. C-A and C-V

In the questionnaire item: 'My classmates think, I...', students were supposed to choose one of these answers: I behave friendly, I act like a leader, I often spread gossips, I make fun of the others, I hurt the others, I am ambitious, I act rudely and disturb, I act indifferently, I am emphatic. Table 2 shows that both girls and boys mostly think their classmates find them friendly.

We may claim that students' opinion of themselves and presumed opinion of their classmates match. Interesting thing is that second most frequent answer is 'I act indifferently'. Least frequent answer is 'I marke fun of the others' and 'I often spread gossips' (boys) and 'I make fun of the others' and 'I hurt the others' (girls). Students who claimed their classmates found them friendly have the lowest levels of cyber-aggressor and cyber-victim.

	CYBER-AGGRESSOR							CYBER-VICTIM						
My	boys			girls			boys			girls				
classmates think, I:	Ν	Avg.	Ν	Avg.	Ν	Avg.	Ν	Avg.	Ν	Avg.	Ν	Avg.		
behave friendly	295	-0.13	295	-0.13	295	-0.13	295	-0.13	295	-0.13	295	-0.13		
make fun of the others	26	0.68	26	0.68	26	0.68	26	0.68	26	0.68	26	0.68		
act rudely and disturb	37	0.64	37	0.64	37	0.64	37	0.64	37	0.64	37	0.64		
act like a leader	38	0.49	38	0.49	38	0.49	38	0.49	38	0.49	38	0.49		
hurt the others	8	0.68	8	0.68	8	0.68	8	0.68	8	0.68	8	0.68		
act indifferently	43	0.22	43	0.22	43	0.22	43	0.22	43	0.22	43	0.22		
often spread gossips	9	0.81	9	0.81	9	0.81	9	0.81	9	0.81	9	0.81		
am ambitious	32	0.30	32	0.30	32	0.30	32	0.30	32	0.30	32	0.30		
am emphatic	18	0.23	18	0.23	18	0.23	18	0.23	18	0.23	18	0.23		

To demonstrate this phenomenon in more convenient view, we introduce the profile graphs (Picture 2) of the average level of C-A and C-V for both boys (Picture 2a) and girls (Picture 2b) according to what, in their opinion, the others think about them.



Picture 2: The profile graphs of the average level of C-A and C-V according to what, in their opinion, the others think about them

Above-mentioned graphs illustrate that students are well-aware of the fact their classmates consider them the ones who make fun of the others. Proceeding from this, they may become C-A in the future. Students who show high statistical probability to become cyber-victims think their classmates consider them the ones who make fun of the others or hurt the others.

MANOVA method was used separately for boys and girls to find out if students' opinions of their classmates affected the level of cyberbullying (C-A and C-V) in a statistically significant way. All the categories with less than 10 answers – i.e. 'I often spread gossips' and 'I hurt the others' (for both boys and girls) – were excluded from the analyses. As per MANOVA method results for boys, students' opinions about them significantly affect the level of cyberbullying (or vice versa) ($\lambda = 0,845$, F (16; 886) = 4,86, p <0,001). This relationship was proved for both the cases of C-V (F (8;444) = 5,38, p < 0,001) and C-A (F (8; 444) = 8,11, p < 0,001). Since the equality-of-variance assumption was violated for both C-V and C-A, the statistical significance of the differences of average values between the category pairs for C-V and C-A was evaluated using Games-Howell test. In the case of C-V, the statistically significant difference was proved for the following category pairs:

- I behave friendly I make fun of the others (p = 0,015)
- I behave friendly I act rudely (p = 0.030)
- I behave friendly I act like a leader (p = 0,016)

For C-A, these category pairs showed statistically significant difference:

- I behave friendly I act rudely (p = 0,015)
- I behave friendly I act indifferently (p = 0,010)
- I behave friendly I am ambitious (p = 0,030)

The statistical data processing showed that students who thought their classmates considered them making fun of the others, being rude and acting like leaders were highly supposed to become cyber-victims in the future. The fact that students consider the respondents rude, indifferent when it comes to the class matters, leaders in the team work and dominant makes them supposed to become cyber-aggressors in the future.

As per MANOVA method results for girls, students' opinions about them significantly affect the level of cyberbullying (or vice versa) ($\lambda = 0.820$, F (16; 1072) = 6.97, p < 0.001). This relationship was proved for both the cases of C-V (F (8; 537) = 10.63, p < 0.001) and C-A (F (8; 537) = 11.50, p < 0.001). Since the equality-of-variance assumption was violated, the statistical significance of the differences of average values between the category pairs for C-V and C-A was evaluated using Games-Howell test. In the case of C-V, the statistically significant difference was proved for the following category pairs:

- I behave friendly I make fun of the others (p = 0.031)
- I behave friendly I act indifferently (p = 0.033)
- I behave friendly I often spread gossips (p = 0,015)
- I make fun of the others I am emphatic (p = 0.045)
- I act rudely I make fun of the others (p = 0.036)

For C-A, these category pairs showed statistically significant difference:

- I behave friendly I make fun of the others (p = 0,024)
- I behave friendly I act indifferently (p = 0,049)
- I behave friendly I am ambitious (p = 0,045)
- I make fun of the others I act rudely (p = 0,019).

Girls who are empathic are highly supposed to become cybervictims. The ability of these girls to understand their classmates and empathize with them may be counterproductive, i.e. they can become cyber-victims themselves. High probability of becoming cyber-victims also affects those girls who spread rumors and gossips. It can be the revenge of those they once gossiped. Girls' lack of interest in their classmates and class matters might proceed from the absence of interpersonal skills. The situation of these girls or their status in the class may deteriorate as soon as the aggressors draw their attention to them. The lack of interest can be also caused by the ignorance of class matters and classmates, the dominance over the others, the absence of interactions within the class, etc. It is important to work on girls' indifference at least within the class, as well as to identify what reasons they have for such a behavior.

In the context of cyberbullying, the student who is not interested in the class matters can hold the position of 'bystander'. This term is used in specialized literature to refer to an inactive participant, i.e. someone who neither stops nor supports the aggressor. Such students represent the third group of cyberactors. They support bullying and cyberbullying by their apparent lack of interest. From a psychological point of view, we talk about the effect of diffusion of responsibility, i.e. the higher is the number of bystanders, the lower is responsibility to intervene or to do something that would change the whole situation. The supportive behavior of bystanders and the determiners of such behavior were studied by Macháčková et. al (2013).

Girls who make fun of the others are supposed to become cyberaggressors. Their mockery may arise from different characteristics of their classmates; the effort to have the wanted status in the class; the desire to take revenge, to hurt, to humiliate someone, to attract the attention, to force acquiring the leader status, etc. The statistical significance is also proved in the case of girls who make fun of the others and are rude, as well. The above-mentioned types of behavior represent serious and proved tendency to become cyber-aggressors.

3 Discussion and conclusions

The study examines mutual relations between students' social positions within the class where cyberbullying occurs. Proved by the statistical evaluation, it is highly probable that the student once being in the position of cyber-victim could become the cyber-aggressor. Cyber-victim may become cyber-aggressor who is often referred to the 'vengeful angel' – former victim of cyberbullying who wants to get the revenge in the same way (see Rottová et al. 2009).

The mutual relations are significantly influenced by the way students evaluate their intrapersonal and interpersonal skills. The results from this study present students' most effective responses that can lead to the aggression in cyberspace. This phenomenon as such is essential to be treated both within classroom and at school. Cyberbullying has serious consequences for students. According to the results from this study, we consider very important to pay concentrate on students and their intrapersonal skills. Self-evaluation, self-perception and self-awareness are important elements of personal skills. The analysis of students' responses to the first and second item provides us with the responses where students see themselves as leaders. Following Herenyiová (2013), we can identify two kinds of leaders: emotional and work leader. We believe that it is necessary to focus on and work with the leader from the emotional aspect. Emotional leaders significantly contribute to the friendly atmosphere in the classroom. They handle and settle all the conflicts and other students are more likely to share their secrets with them. If the leader is a mature student with no signs of individualistic and egocentric behavior in front of the class, the class environment is usually positive without any unnecessary conflicts. The leader of the class is also adequately selfconfident. Brack & Caltabiano (2014) carried out the research aimed at studying the relation between cyberbullying and selfconfidence of the adults in Australia. Cyberbullying can lead to the conflict between the leader and the class. Conflicts between the leader and the core of the class may cause splitting the whole class into isolated or hostile groups. In most cases, the leadership may be held by both socially and emotionally negativelyoriented group. The latter is represented by a problematic student with leadership presumptions whose acts towards the others are autocratic or even despotic. This kind of student tends to use severe methods to persuade other, particularly weaker members of the group.

Social status of a friend is closely linked to student's sociometric status - popularity within the class. Student's popularity within the class can be of two kinds: sociometric and perceived. Sociometric popularity refers to the acceptance among the peers, i.e. to what extent the group accepts or rejects the particular student (Rubin edc., 2006). Sociometric popularity can be also identified simply as popularity. Perceived popularity refers to the way students perceive the individual's position in the group (Rubin et al., 2006), i.e. who they consider popular. The phenomenon of cyberbullying requires us to concentrate on another important element: the creation of subgroups. The creation of subgroups is closely related to the structure of the class and students' positions within the class. These subgroups often consist of students with common characteristics: common school performance (high/poor), the same status within the class, similar interests, the same opinion or 'the same enemy'. The important phenomenon in the creation of isolated subgroups represents the danger of forming elitist or 'outcast' subgroups which may easily become the target of cyberbullying. Rejection and failure are typical for the position of 'outcast' who often makes the atmosphere in the class morally negative. This can affect school, educational and social attitudes of the other members of the subgroup or the class. Jiang & Cillessen (2005) claim that expressing sympathy to peers is recently less stable; having the aversion to the peers, however, has become more stable. In recent years students have become more anxious,

overprotective and they rather focus on aversion than on sympathy. Since students' sociometric status changes in the long-term period, it is necessary to proactively influence students' personalities and their social and emotional skills. We believe that cyberbullying can be effectively prevented by supporting the development of interpersonal skills (students' social skills and competences to be able to handle the conflicts in an appropriate and assertive way; to be tolerant; to accept different opinions, attitudes, religious beliefs, races and social groups; to understand other people's feelings and situations; to be concerned about their classmates' behavior), as well as intrapersonal skills (such as self-knowledge, self-evaluation, self-motivation, auto-regulation of the own behavior, the application of ethical principles in the own life).

Literature:

1. Brack, K. & Caltabiano, N.: Cyberbullying and self-esteem in Australian adults. Cyberpsychology: *Journal of Psychosocial Research on Cyberspace*, 8 (2), 2014, article 1. doi 10.5817/CP2014-2-7

2. Dulovics, M.: *Kyberšikanovanie ako prejav agresie v systéme virtuálnej komunikácie s možnosti jeho prevencie.* 2013, Retrieved from http://protidrogovaprevencia.webno de.sk/news/kybersikanovanie-ako-prejav-agresie-v-systeme-virtualnej-komunikacie-a-moznosti-jeho-prevencie/

3. Emmerová, I.: Rizikové správanie detí a mládeže vyplývajúce z používania moderných technológií. In: *Mládež a spoločnosť.* - Roč. 1/2013, s. 16-24. - ISSN 1335-1109.

4. Herenyiová, G.: *Čo robiť keď*,... Bratislava: Raabe, 2013, 588 s.

5. Hinduja, S., Patchin, W. J.: *Bullying beyond the schoolyard: Preventing and responding to cyber bullying.* Thousand Oaks, CA : Corwin Sage Publications. 2009

6. Hollá, K.: *Elektronické šikanovanie. Nová forma agresie.* Bratislava: IRIS, 2009, 94 s.

7. Hollá, K.: Kyberšikana. Bratislava: IRIS, 126 s., 2013

8. Hollá, K., Fenyvesiová, L., Hanuliaková, J.: *Kyberšikana medzi dospievajúcimi: copingové stratégie a triedna klíma.* Dabrowa Gornicza: Wysza Szkola Biznisu. V tlači. 2016

9. Hudecová, A. & Šavrnochová, M.: Riziká sociálnych sietí v živote mladých ľudí. / - *In: Mládež a spoločnosť*. - Roč. 3-4/2014, s. 14-22. - ISSN 1335-1109.

10. Jiang, X., & Cillessen, A.: Stability of continuous measures of sociometric status: a meta-analysis. In *Developmental Review*, 25, 2005, pp 1-25.

Macháčková, H. & Dědková, L. & Ševčíková, A. & Černá,
A.: Bystanders' Support of Cyberbullied Schoolmates. *Journal of Community & Applied Social Psychology* J. Community Appl.
Soc. Psychol., 23: 2 5 – 36 (2013) Published online in Wiley Online Library(wileyonlinelibrary.com) DOI: 10.1002/casp.2135

12. Oravcová, J.: *Sociálna psychológia*. Banská Bystrica: Univerzita Mateja Bela, 2004.

13. Rottová, N. eds.: *Kyberšikana a její prevence: Příručka pro učitele.* Plzeň: Člověk v tísni, o.p.s. Statutární město Plzeň, 2009, ISBN 978-80-86961-78-1.

14. Rubin, K. H., & Bukowski, W. M., & Parker, J. G.: Peer Interactions, Relationships, and Groups. In Eisenberg, N. – Damon, W. – Lerner, R. M. (Eds.). *Handbook of Child Psychology, Social, Emotional, and Personality Development*, New Jersey : John Wiley & Sons, 571-645, 2006.

15. Valihorová, M., & Holáková, B.: Kyberšikana ako forma agresívneho správania na školách a jej prevencia. / Školský psychológ / Školní psycholog 16 (1), 2015, 12-19

16. Žiaková, E. & Panáček: Kyberšikana - závažný sociálně patologický jev v současné populaci dospívajících v České republice a na Slovensku. Sociální práce / Sociálna práca. -1/2014, 79-99.

Primary Paper Section: A

Secondary Paper Section: AM