



RESEARCH ARTICLE

An Investigation of Adolescents' Social Media Use and Self-Perceptions in the Framework of Peer Bullying

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Abstract

The study aims to examine the effect of peer bullying that adolescents are exposed to on their self-perceptions and social media use. The present study that included 198 participants was planned descriptive, relational and cross-sectional. In addition to the personal information form, Adolescent Social Media Use Scale, Child-Adolescent Bullying Scale-9 Short Form and Social Comparison Scale were used to collect the data. SPSS 22.0 package program was used in the analysis of the data. Descriptive data of the research are given with mean and frequency. To analyse the data One-Way ANOVA, t-test, and Bivariate Correlation were used. The mean age of the adolescents included in the study was determined as 15.32 ± 1.03 . It was determined that 50% of the participants were men, 79.8% were living in nuclear families and 17.2% were individuals who felt psychologically bad. Besides, it was revealed that the mean score of the adolescents' self-perception scale was 81.96 ± 14.3 , the mean score of peer bullying was 19.46 ± 8.39 , and the mean score of the adolescent social media scale use was 18.15 ± 6.68 . As a result of the analyzes, it was determined that there is a strong and significant relationship between the adolescents' exposure to peer bullying, their self-perceptions, and their use of social media. It has been determined that exposure to peer bullying negatively affects adolescents' self-perceptions and may cause addiction to social media use.

Keywords: Adolescent, Peer Bullying, Self Perception, Social Media Addiction

INTRODUCTION

Adolescence is a critical developmental stage in which psychological needs such as autonomy, competence, and relatedness are at the forefront, as well as emotional fluctuations (Patton et al., 2018). In this stage, while positive peer relations ensure that the support, security, belonging, and psychological needs of the adolescent are met; Negative experiences such as exclusion, not being accepted, mocking by not giving the expected value, and peer bullying negatively affect the current and future health of the adolescent (Múzquiz et al., 2022; Patton et al., 2018).

Peer bullying is defined as the deliberate, systematic, and repetitive physical, verbal, or psychological attack or violence involving intimidation by the stronger individual or individuals who have physical or psychological power inequality among them (Güven, Yasin and Köker, 2021). This

condition has been recognized as a worldwide public health problem due to its severe adverse effects on adolescents' physical and mental health and its high prevalence rates (Adeyele, 2021). In relation to the subject, in a study conducted on 317.869 adolescents aged 12-17 from more than 80 countries, it was reported that the prevalence of bullying is 30%, thus millions of adolescents are exposed to bullying worldwide (Biswas et al., 2020). The person who bullies is called a bully. People who are bullied are called victims. Bullying behaviors include physical (kicking, slapping, beating, pushing, etc.) and verbal bullying (giving a nickname, teasing, mocking, etc.), excluding from the group, spreading gossip, threatening with anything, or taking other people's things without permission (Güven, Yasin and Köker, 2021). Bullying can affect the psychosocial health of school-aged children, and this effect may continue throughout the child's life (Çalışkan et al., 2019). The literature has revealed that the interpersonal relationships, self-esteem, and self-perceptions of adolescents who are exposed to peer bullying are adversely affected, they cannot achieve the expected academic success, they do not want to go to school, they feel negative emotions such as discrimination, exclusion, rejection, helplessness, and loneliness, and they stay away from society (Álvarez Marín et al., 2022; Rodríguez-Hidalgo et al., 2019).

Today, it has been found that adolescents tend to use social media platforms as the primary interaction tool in communication with their peers, and peer relationships are

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associated with social media use levels (Nesi et al., 2018). In recent years, newspaper headlines have painted an alarming picture of adolescent mental health issues linked to social media (SM). However, empirical evidence is mixed. A 2014 systematic narrative review of online communication, SM, and adolescent well-being (Course-Choi and Hammond, 2021). It revealed that positive peer relationships serve as a protective factor against psychological problems and addiction. On the other hand, it has been reported that negative peer relationships cause adolescents to avoid "real life" stress and try to meet their social desires and psychological needs that are not met in real life more easily and comfortably through social media platforms. However, it has been reported that this may lead to excessive and uncontrolled use of social media platforms and, consequently, to social media addiction (Huang et al., 2021; Okur and Ozekes, 2021; Ozteke Kozan et al., 2019).

Self-perception, which points out how an individual considers herself in general, is one of the factors impacting mental health (Cüceloğlu, 2018). The experiences of the individual can influence self-perception in interpersonal interactions and the assessments or expectations of other individuals (Kaplan, 2023; Tıraşoğlu & İpek, 2019). Self-perception is one of the most critical issues of adolescence. The adolescent's self-perception determines his self-esteem, whether he can trust himself or not, and whether he is introverted or extroverted (Ozcan et al., 2018). In addition, it plays an important role in an individual's relationships with family and friends, decisions about the future, academic success, adaptation to the environment and mental health. In the literature, it has been reported that the academic success, coping skills, and social and interpersonal relationships of adolescents with a positive self-perception are better than those with a negative self-perception. On the other hand, it has been reported that adolescents who are exposed to peer bullying have a negative view of themselves and their experiences, which increases their negative self-perception (Sahin & Ersanli, 2021; Shemesh & Heiman, 2021). It has been determined that adolescents with negative self-perceptions are cyclically exposed to more peer bullying, feel weak and powerless, and experience mental problems such as self-alienation, loneliness, social anxiety, depression and suicide (Sahin & Ersanli, 2021).

When the literature was reviewed, it was observed that relatively few studies examined the relationships between peer bullying, social media usage level and self-perception. When studies related to the subject are examined, it has been determined that they mostly focus on cyberbullying among adolescents, psychosocial problems caused by the victim-bully relationship in peer bullying, individual and familial factors affecting the social media use levels of adolescents, and self-esteem (Chu et al., 2020; Lucas-Molina et al., 2022). However, no study has been found that directly and clearly reveals the relationship between being exposed to peer bullying and the level of social media use and self-perception. Therefore, this study aims to examine adolescents' social media use and self-perceptions within the framework of peer bullying. Adolescents are at a disadvantage in terms of the negative consequences that can be caused by peer bullying, social media addiction and negative self-perception.

For this reason, it is essential for adolescents' mental health to prevent peer bullying, encourage healthy peer relationships, develop a positive self-perception, and ensure the controlled use of social media in adolescence. This work can assist in planning, developing, implementing and evaluating relevant interventions. In addition, the study's results can expand the scope of existing knowledge by

bringing results from a different international geography and culture to the literature.

MATERIALS AND METHODS

Purpose and Design of the Study

The research was conducted to determine the effect of peer bullying that adolescents are exposed to on their social media usage levels and their perceived self.

Research Population and Sample

The research was carried out between 15/09/2022 – 15/11/2022 with students continuing their education activities at a high school in Turkey. The research universe consists of all students who continue their education at the high school without any choice. The sample consists of 198 students who agreed to participate in the study.

Inclusion/Exclusion Criteria for the Research

Inclusion Criteria

- Continuing educational activities at the relevant high school on the dates of research,
- Having no problems in terms of hearing, speaking, and understanding that would prevent communication in filling out the data collection tools and in the sessions to be held,
- Students who volunteered to participate in the research.

Exclusion Criteria

- Students who were not at the high school due to various reasons at the time of research,
- Having problems in terms of hearing, speaking, and understanding that will prevent communication in filling out the data collection tools and in the sessions to be held,
- Students who did not volunteer to participate in the research.

Data Collection Tools

Individual Introduction Form

In the form created by the researchers by scanning the literature. There are questions to determine the characteristics of the individual, such as age, sex, family type, family financial situation, relationship with family and friends, and psychological state.

Adolescent Social Media Use Scale

The scale developed by Özgenel, Canpolat, and Ekşi (2019) consists of 9 items. The highest score that can be obtained from the scale with a five-point Likert structure is 45, and the lowest score is 9. As the scores obtained from the scale increase, adolescents' social media addiction is high, and as the score decreases, the said addiction is low. The Cronbach Alpha reliability coefficient of the scale was 0.904

Social Comparison Scale

The Social Comparison Scale is used to find how a person perceives themselves as a result of comparing

himself to another person. The scale was developed as five items by Gilbert and Allan (1995), and şahin and şahin (1992) added some things and adapted them to Turkish. There are 18 reversible items on the scale evaluated on a 6-grade line. A high score on the scale indicates a positive self-perception and a low score indicates a negative self-perception. The Cronbach Alpha reliability coefficient of the scale was 0.75.

Child-Adolescent Bullying Scale-9 Short Form (CABS-9).

The Turkish version of the Child-Adolescent Bullying Scale-9 Short Form developed by Vessey et al. (2019) was made by Kırıcı and Eksi (2022). The four-point Likert-type scale consists of 9 items and aims to identify children who are victims of bullying. A high score indicates a high level of bullying. The original version of the scale was obtained from studies on adolescents aged 10-18 years. It is known that the factor loads of the scale items vary between .54 and .76. The Cronbach alpha internal consistency coefficient of the Child-Adolescent Bullying Scale-9 was found to be 0.88.

Analyse of the Data

SPPS 22.0 package program was used in the analysis of the data. Descriptive data of the research are given with mean and frequency. When the normality distribution of the data of the study was examined, one-way ANOVA, Student's t-test, and Bivariate Correlation were used for data showing normal distribution. In the regression analysis of the research, the linear regression (Enter) method was used.

RESULTS AND DISCUSSION

It was determined that the mean age of the adolescents was 15.32 ± 1.03 , and the number of siblings was 3.54 ± 2.65 . It was revealed that the mean score of the adolescents' self-perception scale was 81.96 ± 14.3 , the mean score of peer bullying was 19.46 ± 8.39 , and the mean score of the adolescent social media scale use was 18.15 ± 6.68 (Table 1).

Table 1. Mean of Scale and Some Demographic Characteristics of Adolescents

	Mean±Sd	Median (Min-Max)
Mean Score of Self Perception	81,96 ± 14,3	84,5 (18 - 108)
Mean Score of Peer Bullying	19,46 ± 8,39	17 (9 - 52)
Mean Score of Adolescent Social Media Use	18,15 ± 6,68	16 (9 - 43)
Age	15,32 ± 1,03	15 (13 - 17)
Number of Siblings	3,54 ± 2,65	3 (0 - 10)

Table 2. Distribution of Demographic Characteristics of Adolescents (Frequency)

		n	%
Sex	Male	99	50,0
	Female	99	50,0
Family Type	Nuclear	158	79,8
	Extended	35	17,7
	Crowded	5	2,5
Parent Life Status	Living in Both	183	92,4
	Mother Dead	8	4,0
	Dead	7	3,6
Family Financial Status	Good	92	46,5
	Middle	99	50,0
	Bad	7	3,5
Smoking and Alcohol Use	No	193	97
	Yes	5	3
Academic Success Status	Good	106	53,5
	Middle	85	42,9
	Bad	7	3,6
Relationship with Family	Good	127	64,1
	Middle	60	30,3
	Bad	11	5,6
Relationship with Friends	Good	126	63,6
	Middle	64	32,3
	Bad	8	4,0
Psychological State	Good	98	49,5
	Middle	66	33,3
	Bad	34	17,2

It was observed that 50% of the adolescents were male, 79.8% lived in a nuclear family type and 50% of the adolescents of a family financial status was moderate. It was observed that 97% of the adolescents did not use cigarettes or alcohol, and 53.5% had good academic success. It was determined that 64.1% of the adolescents had good relations

with their families, 63.6% had good relations with their friends, and 49.5% perceived their psychological state as good (Table 2).

When the mean scores of the scales were examined according to the relationship status of the adolescents with their families (Table 3); according to the family relationship

status of adolescents, there was a significant relationship between peer bullying and adolescent social media use mean scale scores ($p < 0.001$; $p < 0.001$). It was determined that there was a significant relationship between the mean scores of all scales according to the relationship status of the adolescents with their friends ($p < 0.001$; $p = 0.012$; $p = 0.004$). A statistically significant difference was found between the mean scores of the peer bullying scale and the adolescent social media use scale according to the psychological self-perception of adolescents ($p = 0.005$; $p = 0.016$). It was

determined that there was a statistically significant difference only between the mean scores of the self-perception scale according to the academic success of the adolescents ($p = 0.039$). A statistically significant difference was found between the mean scores of the peer bullying scale according to the economic status of the families of the adolescents ($p < 0.001$). It was determined that there was no statistically significant difference between the mean scores of the scales according to the gender of the adolescents.

Table 3. Scale Scores According to Family Relationship, Friend Relationships and Psychological Status of Adolescents

Demographic Characteristics		Mean Score of Self Perception	Mean Score of Peer Bullying	Mean Score of Adolescent Social Media Use
Relationship with Family	Good	83,38 ± 13,69	17,32 ± 6,5 ^a	16,77 ± 5,99 ^a
	Modarate	79,18 ± 14,77	22,34 ± 9,16 ^b	19,3 ± 5,94 ^b
	Bad	80,8 ± 17,9	28,64 ± 12,74 ^b	27,82 ± 9,13 ^c
	Test Statistic	1.800	24.646	17.675
	p*	0.168	p<0.001	p<0.001
Relationship with Friends	Good	84,21 ± 12,46 ^a	17,89 ± 7,41 ^b	16,97 ± 6,13 ^b
	Modarate	80,13 ± 14,52 ^a	21,57 ± 8,67 ^{ab}	20,31 ± 7,18 ^a
	Bad	61,38 ± 21,8 ^b	27,5 ± 12,92 ^a	19,5 ± 7,09 ^a
	Test Statistic	11.455	18.024	5.754
	p*	p<0.001	0.012	0.004
Psychological State	Good	84,14 ± 12,15	17,72 ± 6,29 ^a	17,14 ± 5,77 ^b
	Modarate	81,58 ± 14,26	19,26 ± 7,82 ^a	17,65 ± 5,91 ^b
	Bad	76,24 ± 18,54	24,82 ± 12,03 ^b	22,03 ± 8,98 ^a
	Test Statistic	75.740	74.214	78.577
	p*	0.063	0.005	0.016
Academic Success Status	Good	83,55 ± 11,96 ^a	19,35 ± 8,2	17,67 ± 6,28 ^a
	Modarate	80,73 ± 16 ^a	19,55 ± 8,62	18,08 ± 6,48 ^a
	Bad	69,5 ± 21,35 ^b	20,67 ± 10,5	29 ± 8,05 ^b
	Test Statistic	3.310	0.075	8.870
	p*	0.039	0.928	p<0.001
Family Financial Status	Good	80,77 ± 15,19	21,21 ± 8,85 ^a	19,09 ± 6,97
	Modarate	83,38 ± 13,05	17,48 ± 7,38 ^a	17,39 ± 6,35
	Bad	77,71 ± 18,97	24,57 ± 9,73 ^b	16,57 ± 6,53
	Test Statistic	1.106	6.348	1.748
	p*	0.333	p<0.001	0.177
Sex	Male	83,4 ± 12,01	20,04 ± 6,77	18,13 ± 5,31
	Female	80,49 ± 16,25	18,87 ± 9,76	18,17 ± 7,84
	Test Statistic	1.427	0.981	0.042
	p*	0.155	0.328	0.966

** Independent Student T test; * One Way Anova; a-c: No difference exists between the mean scores with the same letter.

Table 4. Correlation between Scale Scores of Adolescents

		Mean Score of Self Perception	Mean Score of Adolescent Social Media Use
Mean Score of Peer Bullying	r	-,214**	,467**
	p*	0,003	0,000

*Pearson Correlation

It was determined that a strong negative correlation exists between adolescents' self-perceptions and peer bullying ($r = -0.214$ $p = 0.003$). It was observed that there was a strong positive correlation between peer bullying of adolescents and adolescent social media use ($r = 0.467$ $p = 0.003$) (Table 4).

The regression model created for adolescents' peer bullying was found to be statistically significant ($F = 27.327$; $p < 0.001$). It has been revealed that adolescents' self-

perceptions and social media use explain 21.3% of their peer bullying levels. A one-unit decrease in adolescents' exposure to peer bullying causes a 0.121-fold increase in their self-perceptions ($B = -0.121$; $P = 0.050$). A 0.430-fold increase in adolescents' exposure to peer bullying leads to a one-unit increase in their use of social media ($B = 0.430$; $P < 0.001$). The increase in adolescents' use of social media and the decrease in their self-perceptions significantly increase their exposure to peer bullying (Table 5).

Table 5. Regression Model Built on Peer Bullying (Enter)

Demographic Characteristics	B (95 CL)	Beta	t	p	Zero-Order	Partial
(Constant)	15.383 (7.962 – 22.804)		4.089	0,000		
Mean Score of Self-Perception	-0,070 (-0,145 – 0.005)	-0,121	-1,849	0,050	-0,214	-0,132
Mean Score of Adolescent Social Media Use	0,541 (0,379 – 0,703)	-0,151	6.585	0,000	0,456	0,419

B: Non-standardized Coefficient; Beta: Standardized Coefficient; **Adj.R²:0.213**; F:27.327; p<0.001; S.E: 7.398

DISCUSSIONS OF FINDINGS

The result of the study showed moderate perception pertaining to social comparison among respondents. One possible reason why adolescents compare themselves with others might be because the pressure coming from the peers may play a significant factor in creating the identity of adolescents to fit-in in the society. Adolescents are more aware of societal standards by comparing themselves to others which may have influenced how they perceive themselves. Socially comparing oneself is described as a process by which an individual compares himself with others based on their position and status, and adolescents usually use this process to develop a sense of identity (Sun et al., 2016; Krayer et al., 2008). In addition, they can get life satisfaction by setting a negative comparison to their peers (Kong & You, 2013; Arnarsson & Bjarnason et al., 2018). Adolescents have reasons to believe that it increases their sense of pride whenever they notice that they are superior or at least at the same level as others. This is the reason why respondents reported a moderate perception regarding social comparison since it helped them to figure out where they stand in society aside from getting satisfaction from it.

Another important finding is that respondents showed a low mean score of peer bullying. This finding contrasts with the previous studies since most researchers found moderate to high bullying perpetration. For instance, the study of Elmahdy et al. (2022) has shown that bullying is higher among adolescents in the Jazan region while Farrell & Vaillancourt (2020) revealed that a small number of adolescents have moderate level of bullying perpetration. In fact, AlBuhairan et al. (2016) also reported that 26% of 9073 adolescents in their study have experienced bullying in a span of 30 days. A low mean score could indicate that bullying among peers is not rampant among the respondents in the current study. One probable reason for this might be because adolescent have different personalities, which could have been a big factor in why they perpetrate peer bullying. Narcissistic personality traits can be one reason one easily feels frustrated and less sensitive to others. Frustration and irritation triggered by others could develop superiority among those peers (Farrell & Vaillancourt, 2020). When adolescents' personalities are not sensitive to others, their actions might be associated with bullying. However, this is not the case with the respondents of the study since findings have shown a low mean score of bullying behavior. Another probable reason of the observed low mean score on bullying might be explained by the awareness of adolescents on the concept of peer bullying in addition to various institutions joining the fight against it. Many researchers proposed an anti-bullying organizations and programs to prevent it and some studies revealed that school level anti-bullying programs (e.g., training for emotional control, school policies for bullying and peer counselling) can effectively reduce bullying and victimization (Gaffney et al., 2018; Hall, 2017; Lee et al., 2013). Focusing on spreading awareness to combat bullying incidents through undertaking various activities specifically

prepared for the adolescents could be helpful as these groups are the most susceptible for victimization.

Meanwhile, a moderate perception of social media use was reported among adolescents. This could possibly mean that adolescents in this study are more responsible in the usage of social media compared to others since in US alone, a study revealed that adolescents were reportedly increased their time on social media from 11% in the year 2013 to 20% in 2017 (Boak et al., 2018). Contrary to other findings in which researchers found high percentage of adolescents using social media and the usage increases as they age (Plaisime et al., 2020; Vernon et al., 2018). Technology and the use of social media platforms is already considered a necessity nowadays as it became one of the primary tools in communicating, even in completing tasks for school or for work. Because of its accessibility, it has been more commonly used not only among adults but also by other age groups such as adolescents and young adults. Nevertheless, one reason that might explain their moderate perception of the usage of social media could be because respondents of the study have life outside the online world. It could be possible that the time they spent in social media might be just sufficient to finish their task or browse for entertainment as opposed to intense users who have mostly dedicated much of their time in browsing. It is then recommended to the parents to monitor and limit the time adolescents spent in social media in order to avoid internet addiction.

Then some associations were reported between scale scores according to family relationship, friend relationships and the psychological status of adolescents towards its demographic characteristics.

Specifically, perceived peer bullying and social media use is connected to their family relationship. The connection of peer bullying to the family is supported by the studies showing that bullying behavior was associated with their perceived family support and low level of family connection was linked to greater annoyance with others using social media (Zhang et al., 2021; Dobbs, 2020). Family and the climate around it are the first model of children and adolescents in developing their personality. Environmental factors such as the type of family a child was raised can be one of the determining factors or indicators of an individual to have a tendency of bullying behavior. For instance, an adolescent who was raised where a good family relationship exists could possibly develop good behaviors since it can be a source to provide healthier behaviors and self-esteem (Thomas et al., 2017). Whereas those who are raised in a negative family climate was found to be associated to bullying involvement (de la Villa Moral & Ovejero, 2021). This indicates that external factors such as the type of family and adolescent belongs to are critical as they can form either good or disruptive behaviors. In terms of the association of social media use and family, this finding is in line with the study of Dobbs (2020), where it was found that a low level of family connection was related to a high level of perceived duration of using social media. The connection of social media use to family might be explained by the reason that

family plays a vital role in the amount of time they spend in using social media. A study has shown that lesser quality time being given to family members was found to be linked with children being addicted with the internet and that intense users of internet in countries with low prevalence of intense social media using was reported to have less family support (Shek et al., 2019; Boer et al., 2020). In fact, according to Saquib (2020), when it comes to family-related factors regarding internet addiction, Saudi Arabia is a great setting since Saudis tend to have a large family and many of those see their children on a rotational basis. Lesser attention might weaken familial connection and guidance among adolescents which could become possible reasons why they divert their attention more on social media. Due to the findings, it is indeed important to ensure that time spent with family is maintained so that children and adolescents will not have to resort seeking attention from strangers in social media.

Next, the perception of self perception, peer bullying, and social media use is significantly related to relationship with friends. This corroborates with the result in a previous study that peer friendship was found to be a protective factor against bullying and that bullies are characterized by low levels of friendship (Bianchi et al., 2021). In fact, 25-30% of bullying incidents occur within their context of perceived friendship since aggressors usually victimized their considered friends (Wei and Jonson-Reid, 2011). Adolescents usually have that fear of missing out in the group and because they do not want to feel ostracized, they tend to appraise themselves to establish relationship with friends that could help in creating their good image. This could be the reason why social comparison to select friends occurs since most adolescents do not want to be grouped with what they perceived as the weaker ones. In fact, the study of Whitley (2016) has shown that peer bullying can also affect friendship selection among children which supports the current finding of the study.

Then result showed that peer bullying, and social media use is significantly related to psychological state. This finding is supported by a previously conducted study which have shown a positive relationship between envy and intense usage of social media (Charoensukmongkol, 2018). Particularly the use of social media platform such as Instagram was found by previous study to be positively correlated with generalized anxiety disorder (Kaloeti et al., 2021). Feeling envious and intense usage of social media was revealed to be higher among adolescents (Charoensukmongkol, 2018). The seemingly unrealistic image that adolescents may find in social media can be their point of reference during comparison, which could bring sense of insecurity and frustration. It may trigger jealousy or feeling inadequate which could affect the adolescents' psychological state. In addition, social media can also expose adolescents to a few mentally disturbing contents such as bullying, social media violence or suicide. This might be one of the factors that could influence their perceptions and behaviors in real life (Moreno & Uhls, 2019). Other types of social media peer experience are cyber-victimization which is the result of bullying, and a study has shown that victims of bullying were associated with self-harm and suicidal behaviors (John et al., 2018). Furthermore, some negative outcomes that were mostly associated with cyberbullying were peer problems, self-harm, stress/distress, hostility/aggression, suicidality, substance misuse/use, anxiety, loneliness, depression, ADHD/ hyperactivity, and low self-esteem and that those who are intensely using the internet reported more frequent psychological complaints than those non-intense users (Kwan et al., 2020; Boer et al., 2020). This only strengthens the current results

that peer bullying which could occur in social media can be harmful to adolescents. Since peer bullying is difficult to control in social media, it is advisable for adolescents to limit their social media use.

Another important finding was that self-perception of social comparison and adolescent social media use significantly connected their academic success status. This result is supported by the findings of Kolhar et al. (2021) which has shown that social media affected their learning activities since they are more drawn towards it and the majority also reported that their delayed bedtime was due to the use of social media. The prolonged use of social media for nonacademic purposes could become a huge distraction among adolescents especially when they are completing a learning task and this divided attention could adversely affect the academic performance of the adolescents. In addition, the current result is also supported by the findings of Bianchi et al. (2021) showing that students who have low academic achievement are more at risk of bullying. Adolescents have competitive attitudes and in fact it positively predicted academic outcomes (Lee & Seo, 2022). When they see that they are ahead of everyone in the classroom by comparison, others who are doing poorly academically are inferior to them. This type of mindset could be a potential reason for bullying. Although the study of Eryananda and Arbiyah (2020) found that social comparison had no significant effect on the student's academic performance, still bullying due to low academic rank is a situation that occurs in real life. Thus, the variation of results of the previous studies and the current one may be attributed to the difference of research setting although both studies recruited adolescents in the study.

Then, report showed that peer bullying is significantly related to family financial Status. This corroborates the previous studies' findings that chronic poverty increases the risk of bullying and that children from the lowest-income household were more at risk of being bullied (Johnson, 2019; Campbell et al., 2019; Tippett & Wolke, 2014). This could mean that the adolescent's socioeconomic status can also be a source of peer bullying. As previously mentioned, adolescents had a competitive personality and has the desire to determine where they stand in society. The pyramidal thinking that those who have high financial status stands at the top could be the reason why adolescents act superior over the others. Several cases have been reported in school level about adolescents from a wealthy family victimizing those who came from low-income families probably because most of the time, they consider these individuals to be the most vulnerable and easy to pick on. Although this might not always be the case in another setting, but the current study found a relation between it.

Finally, peer bullying is significantly related and predictor of self-perception comparison and adolescent social media use. This is in agreement with the results of Wen et al. (2022) showing that cyber upward social comparison was significantly associated with cyberbullying. The literature review of Alim (2016) has shown that adolescents' use of social media resulted in increased cyber bullying, which also agrees with the current results. This could mean that when adolescents use social media and compare themselves to others, it might result in peer bullying, especially when they follow the wrong content. There is a danger when adolescents idolize certain users on the internet most especially when they promote disturbing or inappropriate contents since they may be more likely to engage in these behaviors (Moreno et al., 2016). It indicates that when their behaviors are influenced, then most probably they became violent and would engage in bullying. It is thus essential that adolescents must be vigilant and

become more responsible in the use of social media to avoid negative outcomes like this. Although social media have its own benefits, still too much exposure could lead to adverse effects.

Limitation

This study is have several limitations. Firstly, the results obtained from the participants were limited to the values measured by the scales. Besides, since the results of the study were obtained depending on some characteristics of the participants, inadequacies in generalization should be considered.

CONCLUSIONS AND RECOMMENDATIONS

As a result of the analyzes carried out for the research, it was determined that there is a strong negative correlation between adolescents' self-perceptions and peer bullying. Besides it was observed that there was a strong positive correlation between peer bullying of adolescents and adolescent social media use. In this context; organizing psychoeducational programs for adolescents, especially in high schools, on establishing healthy relationships, empathy and saying no. Moreover, organizing psychoeducational programs on the harms of social media, the consequences of excessive use, beneficial use and social media addiction. In addition, it is recommended to organize psychoeducations in the context of spiritual development, becoming an adult, and future expectations during adolescence.

DECLARATION

Ethics approval and consent to participate: The study was carried out with the permission of Harran University Social and Humanity Sciences Ethical Committee (Date: 19.08.2022 Decision No: 2022-135).

Consent for publication: Informed consent was obtained from all individual participants included in the study. We confirm that this manuscript is original and has not been published elsewhere nor is it currently under consideration for publication elsewhere. The research conforms to the provisions of the Declaration of Helsinki in 1995 (as revised in Brazil 2013).

Availability of Data and Material (ADM): The data analyzed during the current study are available from the corresponding author on reasonable request.

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