

The impact of social media use on suicide-related behavior

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ABSTRACT

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Cyberbullying and addictive behavior are examples of the negative impacts that social media use that lead to suicidal thoughts. This study uses a systematic literature review to show the consequences of using social media that lead to suicidal behavior in various parts of the world. 37 articles were used to support this study that consists of 19 articles about cyberbullying and 18 articles about social media addiction. According to the findings of this report, there is a connection between cyberbullying and internet addiction and an increased risk of suicide or suicidal behavior among teenagers due to social media access. Addictive behavior of social media use has a direct effect on mental health and causes depression. Meanwhile, cyberbullying causes a lack of self-confidence, depression, frustration, self-awareness, and suicidal thoughts. Suicide is a way out for teenagers who experience various problems. Suicide prevention is also discussed.

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1. Introduction

COVID-19 pandemic exploded in China at the end of 2019 and soon spread worldwide, infecting and killing millions of people [1]. Fake news rumors and conspiracy theories over the virus's sources circulated across the globe, followed by misinformation, bigotry, and widespread sales of face masks [2]. In January 2020, there were 3.80 billion social media users, and internet users spent an average of 6 hours and 43 minutes a day online [3]. That's unsurprising that the enormous volume of information obtained across these sources has an impact on how we view and respond to the present COVID-19 outbreak.

The COVID-19 outbreak is causing an increase in social media users in the world. The lockdown system implemented in many countries can trigger feelings of loneliness in a person so, in order to get attention and not feel lonely, many of them began to use social media to communicate with other people frequently. It is feared that the use of social media, which was initially only used to reduce loneliness, could lead to negative impacts such as addictive behavior and cyberbullying, which could affect users' mental health.

In our daily lives, social media plays a significant part. Governments, individuals, state bodies, and corporations increasingly use social media to communicate [4]. In education, students can use social media to discuss through various platforms [5]. Social media changes marketing methods to reach customers who are far away [6]. Social media makes getting information very fast and easy. However, if not utilized properly, social media can interfere with a person's life, such as the emergence of addictive behavior, cyberbullying, and social comparisons. So that this behavior can trigger a person to experience depression and mental health problems, and even the risk of suicide.

Social media are Internet-based platforms that enable users to introduce themselves to both wide and narrow audiences that value user-generated content and the pleasure of engaging with others in real-time or asynchronously [7]. Social media addiction has a major negative impact on mental health and leads to depression. A study of 631 adolescents aged 12 to 18 was conducted in Israel to determine a link between social media addiction and suicidal ideation [8]. The results found that 22.9 percent of the participants had suicidal ideation in the month before the survey, 42 percent had sleep problems, 30.2 percent used the Internet addictively, and 26.5 percent had extreme depressive symptoms. Addiction will cause a lack of effective use of social media, resulting in feelings of loneliness and psychological pressure for the person and ultimately disrupting a person's life with bullying.

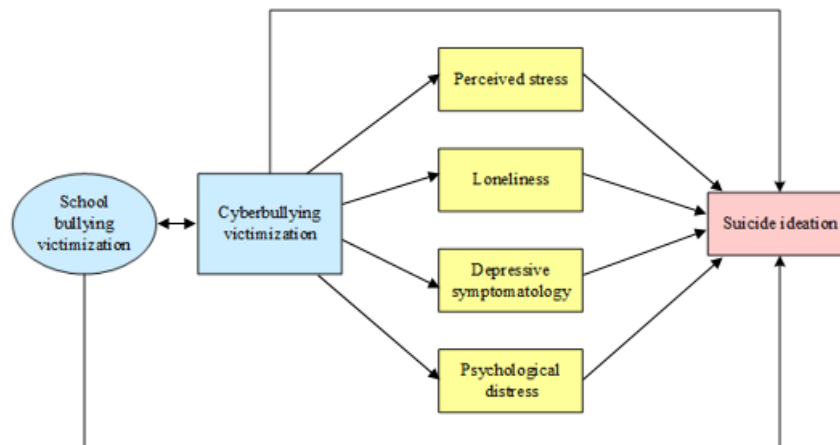


Fig. 1. The Effects of School Bullying Victims and Cyberbullying Victimization on Suicide Ideas: A Theoretical Model

Fig.1 presents the theoretical model of this study. Based on this theoretical model, it can be seen that indirectly, victims of cyberbullying will have suicidal ideas, which are the effects of perceived stress, loneliness, depression, and psychological pressure [9]. Cyberbullying causes low self-esteem, depression, frustration, self-consciousness, and suicidal ideation. More than half of the victims started skipping school and completely changed their attitudes, meaning they stopped paying attention in class and formed gangs to avoid being bullied. Because of the victimization, cyberbullying victims disliked going to school and considered dropping out [10]. Those who had been targeted to either school bullying or cyberbullying had no increased risk of suicidal ideation, but those who had been subjected to all kinds of bullying were more than 11 times more likely to contemplate suicide than those who had not been bullied [11].

This study uses a systematic literature review to determine the relationship between social media with cyberbullying, unfavorable social comparisons, and addictive behaviors that lead to suicide attempts. A review of research articles and journals was carried out on the specified subjects to find this relationship. The literature and journals reviewed are between 2012 and 2021.

2. Method

In order to analyze this report, the researchers used a systematic literature review. This literature study is an activity that involves summarizing the research findings from numerous scholarly articles of interest in order to create a new report. Data collection for this study were from journals in the Google Scholar database according to the research theme. The following are keyword terms used for literature: "cyberbullying", "cyberbullying and suicide rate", "addiction to social media and suicide rates", and "social comparisons in social media". A literature search was performed for all publications written in the previous ten years between 2012 and 2021.

Many factors contribute to varying prevalence rates of suicidal behavior around the world [12]. In this review, we will discuss the negative impact of social media use, which results in the emergence of ideas, attempts, and suicides in adolescents in various countries within America, Europe, Africa, and Asia.

The topics included in this study have a relationship between the impact of social media use and suicidal behavior. This behavior can be in the form of suicidal ideation, suicide attempts, or suicide, especially among adolescents around the world. This analysis has many facets of data collection by reviewing the title and summary, looking at the number of populations and samples, analyzing the test findings collected, and the research conclusions. The research data were then classified based on the factors contributing to the risk of suicidal behavior due to social media use, such as cyberbullying and social media addiction.

3. Results

A total of 37 articles qualified for inclusion in the study, including 19 articles on cyberbullying presents on Table 1 and 18 articles on addiction presents on Table2. A total of 5 articles from Africa (4 articles from South Africa and 1 article from Kenya), 11 articles from Europe (4 articles from Spain, 3 articles from Turkey, 1 article from England, 1 article from the United Kingdom, 1 article from Portugal, and 1 article from Italy), 8 articles from America (6 articles from the USA, 1 article from Mexico and 1 article from Canada), and 13 articles from Asia (3 articles from Indonesia, 2 articles from Singapore, 2 articles from China, 2 articles from Korea, 1 article from Thailand, 1 article from Israel, 1 article from Taiwan, 1 article from Kuwait)

Table.1 Suicide behavior as a result of cyberbullying

Study	Year	Continent	Country	Population	Sample	Result
J.R.A Ndiege et al.,	2020	Africa	Kenya	6500 students of the private universities in Kenya	395 students	University students who spent 3-4 hours and more than 5 hours a day online were more likely to partake in deceptive online bullying than those who spent 1-2 hours online.
P. Farhangpour et al.,	2019	Africa	South Africa	A rural high school for students in grades 8 through 10.	80 students from grades 8 to 10 (50 females and 30 males)	Cyberbullying causes low self-esteem, depression, frustration, self-consciousness, and suicidal ideation. More than half of the respondents started skipping school and totally changed their attitudes, meaning they stopped paying attention in class and formed gangs to avoid being bullied. Because of the victimization, cyberbullying victims disliked going to school and considered dropping out.
B. Iranzo et al.,	2019	Europe	Spain	Adolescents in the Valencia Region pursuing Secondary Education	There were 1,062 teenagers between 12 and 18, including 547 boys (51.5%) and 515 females (48.5 percent).	Suicidal ideation is directly influenced by cyberbullying. According to the research, cyberbullying appears to indirectly affect suicidal ideation through perceived stress, isolation, depressive symptoms, and psychological problems.
Hinduja S. & Patchin J.W.	2018	America	USA	English-speaking middle and students in primary school-aged 12 to 17 who live in the United States	There were a total of 2,670 students, with a gender split of 49.9% female and 49.6% male.)	According to the findings, cyberbullying appears to have an indirect impact on suicidal ideation through perceived stress, loneliness, depression symptoms, and psychological distress.

Study	Year	Continent	Country	Population	Sample	Result
M.C.M. Monteagudo et al.,	2019	Europe	Spain	1102 Spanish high school and baccalaureate students.	499 boys and 603 girls between the ages of 12 and 18	Additionally, possessing a higher level of empathy and cognitive control lowers the likelihood of intervening in any of the cyberbullying roles.
Anke Görzig	2016	Europe	England	25,000 European children aged 9 to 16 who use the Internet	A total of 19,406 11-16-year-olds were included in the study (50 percent girls)	Cyberbully victims tend to be the most helpless and most need assistance with several psychological problems. Meanwhile, more focused approaches could concentrate on solving cyberbullies' emotional and peer problems and helping cyber victims' emotional and peer problems.
E. Whittaker et al.	2015	America	USA	25,000 European children aged 9 to 16 who use the Internet	84% of the sample was White, with another 8.6% being African American.	In the previous year, 18.2 percent of those interviewed said they had been the victim of cyberbullying at least once. Nearly 12% of respondents said they had been the target of cyberbullying at least once in the previous year.
M. Rachoene & T. Oyedemi	2015	Africa	South Africa	South African youth	30 pages of subscribers' postings and comments on six different Facebook pages	Attacks on intellect, attacks on body shape, sexting and outing, slurs, and intimidation are the five most popular forms of cyberbullying among South African youth on these Facebook accounts.
S. Buelga, et al.,	2015	Europe	Spain	Adolescents in Spain aged 12 to 17 years old	1,415 Spanish adolescent boys and girls (760 boys and 655 girls)	Boys and adolescents in their fourth year of high school (15-17 years old) were more likely than females and students with lower grades to engage in violence against their classmates.
C. Abidin	2019	Asia	Singapore	Influencers in Singapore	Young influencer in Singapore	Hate comments make influencers angry and frustrated.
Z. Zhou et al.,	2013	Asia	China	High school students in China	1,438 central Chinese high school students	Males are more likely than females to be the perpetrators and victims of online bullying. Students with lower academic achievement were more likely to be online perpetrators than students with higher academic achievement. Students who spend more time online are more likely to be attacked by online bullies.
R. Sittichai, & P.K. Smith	2018	Asia	Thailand	Students in Thailand, 12 schools from three southern Thai provinces	1,049 students aged 12 to 18 (42 percent boys, 58 percent girls)	According to the girls, cyberbullying should be recorded. The girls even suggested that you dismiss him further or block his messages. Boys, on the other hand, support revenge.

Study	Year	Continent	Country	Population	Sample	Result
J.H. Kim et al.,	2020	Amerika	USA	10th Graders	With a mean age of around 15 years, there were 61 males and 32 females.	School connectedness serves as a significant barrier, reducing the effect of cyber victimization on suicidal behavior.
R.A. Bonanno, & S. Hymel	2013	America	USA	8th to 10th grades Students at a single urban high school in southern British Columbia	171 males and 228 females	Both forms of victimization and abuse were positively linked to both depressive symptomatology and suicidal ideation, despite the small extent of these associations.
D.H. Tustin et al.,	2014	Africa	South Africa	14 schools in South Africa	3353 Learners from Gauteng and 892 Learners from Western Cape	Bullying suspects and participants are also at a greater risk of depression, suicidal thoughts, and suicide attempts than teenagers who are not bullied.
H. Sampasa-Kanyinga et al.,	2014	America	Canada	Eastern Ontario Youth	2,999 participants (1658 females and 1341 males)	Victims of cyberbullying and school bullying are most likely to have suicidal thoughts. One of the most common triggers of thoughts, plans, and suicide attempts in cyberbullying victims in distress.
M.C. Martínez-Monteaigudo et al.,	2020	Europe	Spain	Students at Spanish universities aged 18 to 46	1282 students enrolled in college (46.33 percent men and 53.67 percent women)	Cyberbullying victims are more likely to experience social anxiety as well as the likelihood of suicidal ideation.
E.L. Mirsky & H.A. Omar	2015	America	USA	Adolescents	Adolescent ranging 12-18 years old	Cyberbullying has very adverse psychological effects, often leading to suicidal thoughts and behavior.

4. Discussion

Based on studies that have been conducted, 19 journals were found that showed a relationship between cyberbullying and suicide behavior, and 18 journals showed a relationship between social media addiction and suicide behavior. According to a meta-analysis, the correlation between suicide attempts and online bullying is more potent than the relationship between conventional bullying and suicidal ideation. According to related research, 20% of adolescents victims of cyberbullying on social media commit suicide to alleviate their problems and suffering [9]. Aside from cyberbullying, social media addiction has been linked to depression and suicidal ideation [13].

According to research conducted, the activities that are often done on the Internet are 69,61% playing online games, 66,21% accessing email, 49,47% using the Internet to access information, 35,95% watching movies online, 32,22% for chatting, and 23,30% for learning online [14]. Using the Internet for these activities is positive, but if done excessively, it can contribute to increased stress and depression, leading to suicidal thoughts [8]. Internet addiction can also lead to unhealthy eating habits, anxiety, depression [15], and more likely to experience cyberbullying [16]. According to the report, 72,2 percent of cyberbullying victims had high levels of distress, 68,1 percent had high levels of depression, and 75,2 percent had elevated levels of anxiety [17]. Cyberbullying is more common among boys than girls, who are more likely to partake in and perpetuate it; the target of cyberbullying tends to be someone with poor academic performance [18].

Cyberbullying and social media addiction are related because they cause depression, which has been identified as the leading cause of suicidal thoughts, intentions, and attempts in research [19]. The following is a case study of the effects of social media on suicide behavior in various nations, based on the 37 journals are organized by country presents on Fig.2.

The Impact of Social Media Use on Suicide-Related Behavior in Countries

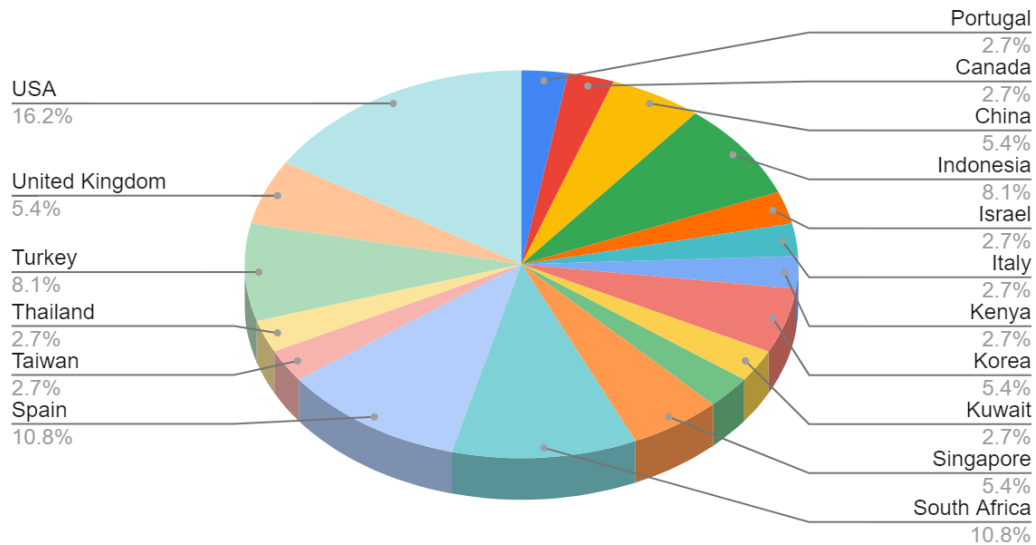


Fig. 2.The Impact of Social Media Use on Suicide-Related Behaviour in Countries

Prevention is needed to overcome suicidal thoughts. Assistance for victims is significant. Communicating with people at high risk of committing suicide can reduce suicide attempts by up to 30% [20]. Therefore, communication is also an important thing, which makes the technology very important for the mental recovery of victims. Social media can also be used to overcome this. Online mental health services and counseling psychologist services in China were carried out during the COVID-19 pandemic [21]. The service is quite effective as a means of communication for victims to get assistance.

5. Conclusion

According to the findings of this report, there is a connection between cyberbullying and internet addiction and an increased risk of suicide or suicidal behavior among teenagers due to social media access. Most of the social media users in the world are teenagers or adolescents, so they are more likely to suffer the adverse effects of social media use. Teenagers who are victims of cyberbullying on social media will commit suicide to alleviate their hardships and misery. Additionally, addictive social media behavior has been linked to depression and suicidal thoughts. The impact felt by victims of cyberbullying and victims of internet addiction in using social media is the emergence of jealousy, psychological pressure, depression, stress, and feelings of deep loneliness, so they finally choose to commit suicide to get out of various problems.

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