



Bullying Behavior And Its Relationship To Social Competence Among Middle School Students

Mezeghrani Halima University of Oran 2 Mohamed Ben Ahmed, Faculty of Social Sciences, Department of Psychology and Speech Therapy (Algeria). mezeghranih@live.fr

Hamri Sara University of Oran 2 Mohamed Ben Ahmed (Algeria). sarahamri@gmail.com

Received: 20/07/2024

Accepted: 10/01/2025

Published: 31/03/2025

Abstract:

The current research aimed to investigate the relationship between school bullying and social competence among middle school students, as well as the differences in the study variables based on gender and the differences in bullying behaviour according to academic level. The sample consisted of 220 randomly selected male and female students from the "Zighoud Youssef" secondary school in Koudiel, Oran. The study used a descriptive methodology appropriate to the research topic. The data collection tools included a questionnaire for personal information, a bullying scale developed by "Tarab Aissa Geraisy, 2012" and a social competence scale developed by "Hadr Fayez, 2016".

The results showed that:

- There is a significant negative relationship between school bullying behaviour and social competence among middle school students.
- There are statistically significant differences in social competence attributed to gender variable among middle school students.
- There are statistically significant differences in bullying behaviour attributed to the gender variable among middle school students.
- There are no statistically significant differences in bullying behaviours attributed to the academic level variable among middle school students.

Keywords: school bullying, social competence, students, middle school.

Introduction:

Bullying in schools is one of the most widespread behavioural problems among students and is associated with various problems that affect both individuals and society and prevent educational institutions from fulfilling their roles effectively. Bullying behaviour has received considerable attention from researchers in both foreign and Arab studies. Studies by Al-Waiz (1997) and Farid Jatoon (2009), as cited in Khokh (2012), indicate that bullying others is one of the main risk factors for antisocial behaviour, such as addiction and substance abuse. Individuals involved in bullying often experience high rates of psychological disorders, including anxiety, depression, developmental disorders, enuresis, nail biting, low self-esteem and feelings of loneliness.

According to Bayaan (1999), bullies, victims and bystanders all suffer psychological and physical problems that affect their lives and development. Early intervention and awareness are essential to stop bullying and there is an urgent need to teach pupils and all those involved appropriate ways of

interacting with others. They also experience feelings of loneliness amidst social and psychological adjustment, low self-esteem, social withdrawal, anxiety and decreased academic performance (Al- Dasouqi, 2010: 6).

Abdel Azim et al (2020) argue that social skills are essential elements that determine the nature of a child's daily interactions with their environment. These skills form the basis of psychological adjustment at both personal and social levels, as the child lives in a network of relationships that includes parents, peers and teachers. The development of social skills contributes to the establishment of successful and lasting personal relationships, enabling children to benefit from others and to learn positive social behaviours. It also shapes the child's sense of self. The correct use of social skills in all aspects of life is an indication of social competence (Al-Zayat, 1998). Social competence behaviour requires an accurate understanding of social interactions between the child and other members of society, using both verbal and non-verbal communication (Hafez, 2000).

1. Problem Statement

Numerous studies and scientific research have confirmed the existence of bullying problems in many schools, which negatively impact students' personalities and academic achievements, as well as their integration into society. Studies by Abu Ghazal (2009), Cody (2010), Taylor (2012), Nesharson, Kobar, Mahjoub et al. (2011), Geraisy (2013), Al-Sufi and Al-Maliki (2012), Qadah Aribat (2015), Zahia (2015), Abdel Dayem and Alwan (2016), Ahmed and Abdou (2016), Sakran and Alwan (2016), Zahra (2018), Abu Sahlool et al. (2018), Ghofran Abdel Karim et al. (2018), and Al-Abedine (2018) highlight this issue.

Other studies have focused on social skills and various psychological and social variables. Research by Wahba (2010), Hawaria (2015), Hamam (2017), and Khough (2012) also contributes to this discourse. Studies by Hensley, Dillon, Pratt, Ford, and Bjork (2005) have shown the negative impact of deficits in social skills, indicating that children with such deficits are more likely to face challenges both inside and outside of school. They may experience failure and encounter various issues, including aggression and antisocial behavior (Al-Dakheel Allah, 2014).

Numerous studies have examined social competence, including research by Al-Maghazi (2004), Tracy et al. (2007), Tran and Bakar (2010), Ghra and Khairy (2011), Sakran (2011), and Huli et al. (2014). These studies have also confirmed that a high percentage of learners exhibit numerous indicators of dysfunctional social behaviour, which reduces their overall social competence and exposes them to further social rejection and stigmatisation, necessitating attention to this variable social competence (Al-Dakheel, Abdullah, 2015).

The lack of successful social interaction skills often leads individuals to withdraw, feel lonely and struggle with acceptance, which weakens their resilience to psychological pressures. This has a negative impact on their performance and achievements, hindering future success. This underlines the importance of social skills in determining an individual's success or failure in dealing with situations and highlights their necessity in coping with psychological pressures and various problems. The emergence of bullying at school is closely linked to the inability to adapt socially and psychologically.

Studies on the development of social skills, such as those by Al-Khatib (2010), Al-Zafiri (2014), Al-Quraan (2014), Al-Sawafiya (2015) and Abu Hujair (2015), emphasise this point. School bullying is not a recent phenomenon, nor is it limited to a specific social or cultural setting; rather, it is a contemporary issue that has permeated all educational institutions and communities. It reflects patterns of negative interaction and weak communication skills in dealing with the problems faced by students. It also represents an act of coercion and an inappropriate use of power in directing the

educational process, thereby damaging the reputation of educational institutions and hindering personal development.

Studies by Nansel, O'Frick, Balla, Simon, Rowan, and Schiedt (2001) indicate that the risks posed by bullies may extend to the communities in which they live, as they are more likely to engage in behavioural problems such as smoking, alcohol consumption, and drug use, which may lead to criminality (Geraisy, 2016).

Based on the potential relationship between the variables of social competence and school bullying, this study aims to shed light on the nature of the relationship between bullying and social competence among middle school students. This problem statement raises several questions:

- Is there a statistically significant relationship between the dimensions of bullying behaviour and social competence among middle school students?
- Are there statistically significant differences in the dimensions of bullying behaviour based on gender (female, male)?
- Are there statistically significant differences in social competence based on gender (female, male)?
- Are there statistically significant differences in the dimensions of bullying behaviour based on academic level?

2. Study Hypotheses

- There is a statistically significant correlational relationship between bullying behavior dimensions and social competence among middle school students.
- There are statistically significant differences in bullying behavior dimensions attributed to the gender variable (female, male).
- There are statistically significant differences in social competence attributed to the gender variable (female, male).
- There are statistically significant differences in bullying behavior dimensions attributed to the academic level variable.

3. Study Objectives

This study aims to achieve the following objectives:

- To explore the relationship between bullying behavior and the level of social competence among middle school students.
- To identify differences in school bullying behavior among middle school students based on the gender variable.
- To identify differences in social competence among middle school students based on the gender variable.
- To identify differences in school bullying behavior based on academic level.

4. Significance of the study

The importance of this study lies in the fact that it examines a highly critical educational and social phenomenon in our schools, focusing specifically on bullying behaviour and its various forms and negative effects on the educational process.

- The study aims to contribute to the enrichment of an important area of psychological and social research, specifically school bullying and its relationship with social competence in middle school students.
- To encourage further research into the causes of the phenomenon of bullying and to explore appropriate solutions.

- Social competence is a fundamental component of mental health; when present in an individual, it indicates healthy behaviour.
- The study will help to determine the role of different types of social competence in social skills, academic skills and self-regulation in predicting bullying behaviour in students.
- The results of this study can be used to develop guidance and therapeutic programmes based on social competence to reduce bullying behaviour in schools.
- The importance of this study is also underscored by the nature of the sample studied, which consists of adolescents, a crucial segment of society that requires collaborative efforts between educators and parents to reduce bullying behaviour and increase social competence.

5. Definition of Key Concepts

School Bullying: School bullying is defined as the repeated engagement in a range of aggressive behaviors, including direct actions such as reprimands, mockery, and threats by an individual known as the bully toward another individual known as the victim, with the intent to control and dominate them (Khoug, 2012).

Operational Definition: In the current study, bullying behavior is defined as the total score obtained by individuals in the sample through their responses to the items and dimensions of the bullying behavior scale developed by Tarab Aissa Geraisy (2012).

Social Competence:

Social competence is the individual's effective response in social situations, represented by their ability to utilize personal resources and the available environment to achieve positive developmental outcomes. It encompasses a variety of positive traits and characteristics, such as assertiveness, social self-image, interaction skills, cognitive abilities, and social popularity among peers (Abu Ghali, 2014).

Operational Definition:

In the current study, social competence is defined as the total score obtained by the sample individuals through their responses to the social competence scale developed by Khadr Fayeze (2013).

Middle School Students:

These are students who are enrolled in the middle school education phase, which is the second stage of the educational system in Algeria. Students in this phase are typically aged between 11 and 15 years, and the duration of this stage is four years, concluding with the attainment of a middle school diploma.

6. Study limitations

A. Objective limitations:

The study focuses on exploring the relationship between bullying behaviour and social competence in middle school students.

B. Human limitations:

A random sample of 220 male and female students was selected from the first, second and fourth grades of middle school, ranging in age from 11 to 16 years.

C. Temporal limits:

The study was conducted during the second semester of the 2023-2024 academic year.

D. Spatial boundaries:

The study was conducted in the Zighoud Youssef middle school in Koudiel, Oran.

7. Studies on School Bullying

First: Studies on Bullying and Its Relationship with Social and Psychological Variables:

- **Study by Claire Fox and Michelle Bolton (2005):** Titled "The Relationship Between Social Skills and Bullying Among a Sample of Primary and Middle School Students," which included 330 students. The results indicated that most students who were victims of bullying in the school environment suffered from social skills issues, and there was a negative relationship between bullying and social skills problems among these victims.

- **Study by Delva et al. (2006):** This study aimed to explore the relationship between bullying and various psychological and social issues. It found heightened levels of social alienation among both victims and bullies. Additionally, students who experienced bullying behavior from teachers were more likely to withdraw from the educational process, and bullying victims exhibited lower levels of self-acceptance and acceptance of others.

- **Study by McKinney et al. (2006):** Investigated the relationship between bullying and psychosocial adjustment among a sample of approximately 506 high school students (male and female) and 308 college students. The results revealed that victims of persistent and repeated bullying by peers experienced increased feelings of powerlessness and a diminished ability to defend themselves, making it difficult for them to escape the bullying dynamics due to a lack of capability to change the necessary dynamics to end this aggressive behavior.

- **Study by Eric et al (2003):**

This study examined the relationship between bullying, social anxiety and loneliness among adolescents, with a sample of 383 individuals aged 13-16 from diverse backgrounds (American, African, Asian). The results indicated statistically significant differences between victims and non-victims in social anxiety and loneliness, favouring adolescent victims of bullying behaviour. Furthermore, it was found that males were more likely to be bullied than females (Sharbat et al., 2018).

- **Study by Ahmed Fikri Behnsawi and Ramadan Ali Hassan (2015):** Titled "School Bullying and Its Relationship with Achievement Motivation Among Middle School Students," this study aimed to investigate school bullying and its relationship with achievement motivation among a sample of 243 students from Beni Suef. The researchers utilized the Achievement Motivation Scale by Abdel Tawab Abu Al-Ala (2006) and developed their own bullying scale. The results indicated differences in forms of bullying among middle school students and found statistically significant differences between high and low achievement motivation in relation to school bullying, concluding that school bullying could be predicted through achievement motivation (Befensari & Hassan, 2015).

- **Study by Bouanani and Kourat (2019):** This study examined bullying behavior and its relationship with learning difficulties among a sample of students with learning disabilities in the middle school stage in Saida, Algeria. To achieve the study's objectives, the researchers employed a descriptive methodology and selected a purposive sample of 60 students across four academic

levels. The findings revealed a high prevalence of school bullying among middle school students with learning difficulties, along with statistically significant differences in bullying forms due to gender, favoring males (Bouanani & Kourat, 2019).

- **Study by Mohamed Hassan Bakri (2010):** Titled “Differences Between Emotional Intelligence and Bullying Behaviour Among Elementary Students in Akka”, this study aimed to explore the differences between emotional intelligence and bullying behaviour based on gender and grade level among a sample of 238 students (139 males and 99 females) from fifth and sixth grades in Akka. The researcher used Bar-On’s Emotional Intelligence Scale and developed his own bullying behaviour scale. The results revealed different manifestations of bullying behaviour among primary school students and no statistically significant differences were found in emotional intelligence and bullying behaviour based on gender and grade (Bakri, 2010).

- **Study by Tarab Aissa Geraisy (2012):** Entitled “Bullying Behavior and Its Relationship with Academic Self-Concept Among Students in the Nazareth Organization”, this study aimed to examine bullying behavior and its relationship with academic self-concept and academic achievement among a sample of 367 students in seventh, eighth, and ninth grades. The researcher developed a bullying behaviour scale and an academic self-concept scale. The results indicated a negative correlation between bullying and academic self-concept, with statistically significant differences in bullying favoring males, as well as significant differences in bullying levels favoring students with lower academic achievement (Geraisy, 2012).

- **Study by Khoug (2012):** This study aimed to investigate the differences in social skills between students with high and low levels of school bullying, and to identify social skills that could predict school bullying. The sample consisted of 243 sixth grade students in Jeddah, Saudi Arabia. The results revealed a significant negative relationship between school bullying and social skills, as well as statistically significant differences in social skills in favour of students with low school bullying (Khoug, 2012).

- **Study by Souzati (2014):** This study examined the relationship between bullying, self-esteem, academic achievement and empathy among primary school students in a sample of 170 fifth and eighth graders. The results showed a significant negative relationship between bullying and both empathy and self-esteem, with higher rates of bullying observed among males and higher grades (Al-Zaboun & Al-Zagoul, 2016).

- **Study by Solberg (2017):** This study aimed to assess the prevalence of bullying among male and female students, and to explore the relationship between bullies and victims according to grade level and age. The sample included 517 students, and the results showed that the proportion of male bullies was higher than that of female bullies, with no significant differences in bullying according to grade level (Brahemi, 2023).

- **Study by Mohamed Radi (2001):** This study aimed to explore the differences between students in terms of self-esteem and the effect of gender and grade level on an individual’s victimisation in bullying. The sample consisted of 240 males and 263 females with an average age of 11-12 years who were randomly selected. The study used self-esteem and psychological loneliness scales. The results showed differences in self-esteem among bullying victims and a statistically significant effect of gender and grade level on students’ scores on the bullying scale (Tatayi, 2020).

- **Study by Amitouch (2021):** This study aimed to assess the level of school bullying among middle school students and identify the most prevalent forms of bullying at this stage. Using a descriptive methodology, the sample consisted of 167 students. The researcher used a bullying scale developed by Mohammed Ali Al-Sabihin (2013). The results indicated a moderate level of bullying in middle

school, with no statistically significant differences in bullying based on gender, but significant differences based on age, favouring younger students (Rowan, 2021).

Second: Studies on social competence and its relationship with various variables

- **Study by Yu Kai Yüksel (2013):** The aim of this study was to assess the level of social competence in relation to aggressive social behaviour, taking into account grade level and the presence of learning difficulties in a sample of 166 students from Turkish schools in Istanbul. The results showed no statistically significant differences in social competence based on grade level; however, there were significant differences based on gender (Qojil, 2021).

- **Study by Ibrahim Mohamed Al-Maghazi (2004):** This study aimed to investigate social competence and its relationship with academic achievement among students. The sample consisted of 102 students, and the descriptive methodology was applied using a social competence test. The results showed statistically significant differences in social competence and academic achievement in favour of females (Al-Maghazi, 2004).

Third: Comment on previous studies

The research shows that studies dealing with the variables of school bullying and social competence or related social skills showed both similarities and differences in some methodological aspects. Most studies focused on middle school students, such as those by Mohamed Radi (2001), Amitouch (2021) and Geraisy (2012). Many relied on descriptive methods and examined bullying behaviour alongside various other variables, including gender, as in the studies by Maris (2010) and Amitouch (2021).

Other studies also examined social competence based on gender, such as those by Al-Maghazi (2004), Tokay (2013), and Kalbit (2015). The current researchers benefited from these previous studies in defining the problem of the current study, organising the theoretical framework, and comparing the results of previous studies with the current findings. In particular, our study is distinguished by the integration of the variables of bullying behaviour and social competence.

8. Methodology and procedures

1. Study Method:

The researchers used a descriptive methodology to answer the research questions and arrive at conclusions for discussion.

Sample Characteristics:

The study sample consisted of 220 male and female students from Zighoud Youssef Middle School who were randomly selected. The oldest student was 17 years old, while the youngest was 10 years old. The following table shows the distribution of the sample based on the study variables:

Gender distribution of the sample

Gender	Frequency	Percentage
Male	119	%54.09
Female	101	%45.91
Total	220	%100

Comment :

Table 1: This table represents the distribution of the sample members by gender, totaling 220 students. The number of males is 119, which constitutes 54.09%, while the number of females is 101, representing 45.91%. It is noticeable that the number of males exceeds that of females.

Academic Level

Academic level	Frequency	Percentage
First Year	84	%38.18
Second year	104	%47.27
Fourth year	32	%14.55
Total	220	%100

Table 2: This table illustrates the distribution of the sample according to their academic level for the first, second, and fourth years of middle school. The number of first-year students is 84, representing 38.18%, the number of second-year students is 104, accounting for 47.27%, and the number of fourth-year students is 32, representing 14.55%. Thus, it is evident that second-year students comprise the largest percentage compared to first and fourth-year students.

Educational Level of Parents

Educational level	Father's education level	Percentage	Mother's educational level	Percentage
Illiterate	34	15.45	32	14.54
Primary	16	7.27	13	5.09
Intermediate	58	26.36	55	25
Secondary	61	27.72	59	26.81
University	51	23.18	61	27.72

Comments:

Table 3: This table shows the distribution of the sample according to the educational level of both parents. It is observed that the highest percentage is for the secondary education level of fathers, with 61 representing 27.72%. Similarly, the highest percentage for mothers is at the university education level, also with 61, representing 27.72%. Conversely, the lowest percentage for fathers is at the primary education level, amounting to 16, which constitutes 7.27%, and the lowest for mothers is 13, representing 5.09%.

Parents' occupation**Table 4:**

Occupation	Father's occupation	Percentage	Mother's occupation	Percentage
Healthcare Sector	8	3.63	15	6.81
Military Sector	7	3.18	0	0

Education Sector	10	4.54	20	9.09
Police Sector	18	8.81	6	2.78
Agricultural Sector	13	5.90	0	0
Commercial Sector	20	9.90	0	0
Judicial Sector	2	0.9	8	3.63
Other Sectors	33	15	6	2.72
Retirees	36	16.36	6	2.72
Daily Workers	18	8.18	3	1.36
Unemployed	26	11.81	138	62.72
Freelancers	29	13.18	18	8.18
Total	220	%100	220	%100

This table shows the distribution of the sample according to the occupation of both parents. It can be seen that the most common occupation for fathers is retired, with a frequency of 36, representing 16.36%. The least common occupation for fathers is in the judiciary, with a frequency of 0.9%. The most common occupation for mothers is 'housewife' with a frequency of 138, representing 62.72%. The least common occupation for mothers is 'daily labourer', with a frequency of 1.36%.

Study Tools

First: Bullying Behaviour Scale

In our study, we relied on the Bullying Behavior Scale developed by Tarab Aissa Geraisy (2012) and adapted to the Algerian context by the researcher "Sannouien Boumediene" in 2019. The scale consists of 25 items covering the following dimensions

- Physical bullying behaviour: 8 items (1 to 8)
- Verbal bullying behaviour: 12 items (9 to 20)
- Material bullying behaviour: 5 items (21 to 25)

The response alternatives were structured on a five-point Likert scale: (1) completely true, (2) sometimes true, (3) not true, (4) not true at all. Scores were assigned accordingly to evaluate respondents' responses on the scale (see Appendix 2), with a range of scores from 5 to 1.

Second: Social Competence Scale

We used the social competence scale prepared by Khadr Fayeze Mohammed Bashir (2016). This scale consists of 27 items covering the following dimensions:

- Self-management skills: 8 items (1 to 8)
- Interpersonal skills: 10 items (9 to 18)
- Academic social skills: 9 items (19 to 27)

The positive items are: 1, 3, 5, 6, 7, 8, 12, 13, 14, 15, 17, 19, 20, 22, 23, 25, 26, 27.

The negative items are: 2, 4, 9, 10, 11, 16, 18, 21, 24.

The items were measured using a three-point Likert scale: (1) Yes, (2) Sometimes, (3) No. Scores were assigned to evaluate the responses on the scale (see Appendix 3), with scores ranging from 3 to 1 for positive items and from 1 to 3 for negative items.

Psychometric properties of the instruments

Bullying Behaviour Scale:

- Validity:

The discriminant or criterion validity was assessed using the two independent samples t-test to determine the significance of the differences between the means of the two extreme groups. The calculations were performed by assigning label X to the first group and label Y to the second group. The groups were then ordered and divided into upper and lower groups by taking 27% from both tails of the distribution. The t-test calculations were performed and the results are presented in the following table:

Table 5: Difference between lower and upper groups in bullying scale scores

Dimensions	Group	Count (n)	Mean	Standard deviation	T value	Significance level	Evaluation
Verbal Bullying	High	7	39,289	4,386	-	0,000	Significant
	Low	7	55,741	2,138	8,908		
Material bullying	High	7	24,142	4,670	-	0,000	Significant
	Low	7	38,142	1,772	7,415		
Verbal Bullying	High	7	14,000	2,000	-	0,000	Significant
	Low	7	20,000	0,000	7,937		
Material bullying	High	7	81,571	9,449	-	0,000	Significant
	Low	7	116,741	2,360	9,547		
Verbal Bullying	High	7	39,289	4,386	-	0,000	Significant
	Low	7	55,741	2,138	9,547		

Comments:

Reliability analysis

Internal consistency reliability:

The reliability of the scale was assessed using Cronbach's alpha coefficient, applied to the results of a pilot sample of 30 students from Zighoud Youssef Middle School in Oran. The results are shown in the following table:

Table 6: Cronbach's Alpha Reliability Coefficients for the Dimensions of the Bullying Scale

Dimensions	Number of Items	Reliability Coefficient
Verbal Bullying	12	0,87
Physical Bullying	08	0,87
Material bullying	05	0,76
Total scale	25	0,74

Comments:

Table 6 shows the Cronbach's alpha values for the total bullying scale and its sub-dimensions. The alpha value for verbal bullying was 0.87, for physical bullying 0.87 and for material bullying 0.76. The total scale reached an alpha of 0.74. These results indicate that the scale is reliable.

Split-half reliability:

The split-half reliability coefficient was calculated to be 0.71. Using the Spearman-Brown formula, the correlation coefficient reached 0.83, further demonstrating the reliability of the scale.

Validity analysis for the Social Competence Scale

Discriminant validity:

Discriminative validity was assessed using two independent samples t-test to determine the significance of the differences between the means of the two extreme groups. The first group was labelled X and the second group was labelled Y. The groups were ordered and divided into upper and lower segments by taking 27% from each end of the distribution. The calculations for the t-test were performed and the results are summarised in the following table:

Table 7: Discriminative Validity of the Social Competence Scale

Group	Count (N)	Mean (Average)	Standard Deviation (SD)	T Value	Significance Level (p-value)	Evaluation
High Group	7	77.625	8.399	7.956	0,000	Significant
Low Group	7	40.875	10.006			

Comments:

From Table 7, which details the discriminative validity, it is clear that the Social Competence Scale is valid. The t-value was 7.95, which is statistically significant at the 0.01 level.

Reliability analysis

Internal consistency reliability:

The reliability of the scale was confirmed using Cronbach's alpha coefficient. The results are summarised in the table below:

Table 8: Cronbach's Alpha Reliability Coefficients for the Social Competence Scale

Scale	Correlation Coefficient (r)
Social Competence	0.73

Comments

Table 8 shows that the Cronbach's alpha for the Social Competence Scale is 0.73, which indicates that the scale is reliable.

Split-Half Reliability:

The split-half method for assessing internal consistency showed a reliability coefficient of 0.53. After adjustment using the Spearman-Brown formula, the reliability coefficient increased to 0.69, indicating that the scale is stable.

Study procedure

After determining the study sample and verifying the psychometric properties of the study instruments, the instruments were administered to the participants at the Zighoud Youssef Middle School in Oran. Both scales were administered simultaneously, along with specific instructions and guidelines:

- Clarification of procedures: Appropriate explanations were provided to ensure that students understood how to handle the questionnaire and answer it correctly.
- Assurance of anonymity: Emphasised the importance of not writing names to allow students to complete the questionnaire comfortably.
- Completeness of responses: Encouraged students to answer all items in the questionnaire without leaving any blanks.

9. Statistical methods used in the study

According to Ibrahim (2005), statistics is the science concerned with the study of populations and measured statistical phenomena, focusing on collecting, recording, organising and summarising facts to facilitate analysis and understanding of their relationships. This is reflected in the laws and theories that govern these phenomena.

The main statistical methods used in this study include:

- Frequencies
- Means
- Percentages
- Standard Deviation
- Pearson's correlation coefficient
- Cronbach's Alpha
- Independent samples t-test
- One-way ANOVA

10. Presentation, discussion and analysis of results**Introduction**

The previous chapter outlined the procedures for the field study. This chapter presents, analyses and interprets the results obtained using statistical packages, discusses these results in the light of the theoretical framework presented earlier and compares them with the results of previous studies.

Presentation of hypothesis results**Results of the first hypothesis**

Hypothesis: There is a statistically significant relationship between bullying behaviour and social competence among middle school students.

To test this hypothesis, the correlation coefficient (r) was calculated between the scores on the bullying behaviour scale and the social competence scale for the study sample. The results are summarised in Table 9.

Table 9: Correlation Coefficients Between Dimensions of Bullying Behaviour and Social Competence in Middle School Students

Variables	Social Competence	Significance level
Verbal Bullying	-0.558	Significant at 0.01
Physical Bullying	-0.561	Significant at 0.01
Material bullying	-0.524	Significant at 0.01
Total scale	-0.599	Significant at 0.01

Comments

Upon reviewing the figures presented in the table, it is essential to clarify the reading and descriptive analysis. The study aims to address the hypothesis regarding the correlation between bullying behavior and social competence among middle school students. Using the Statistical Package for Social Sciences (SPSS) and Pearson correlation coefficients, the results revealed statistically significant negative correlations between the dimensions of school bullying and social competence. From Table 9, the correlation coefficients are as follows:

- Verbal Bullying and Social Competence: -0.558
- Physical Bullying and Social Competence: -0.561
- Material Bullying and Social Competence: -0.524
- Total Bullying and Social Competence: -0.599

All correlations were statistically significant at the 0.01 level. This indicates that as students' levels of bullying in its various dimensions increase, their levels of social competence decrease. The results confirm the first hypothesis of the study, which states that there is a statistically significant negative relationship between bullying behaviour and social competence among middle school students. Therefore, increased bullying at school is correlated with decreased social competence.

Explanation of the results for the first hypothesis

The results indicate a significant correlation between bullying behaviour and social competence, with a correlation coefficient of -0.599 at the 0.01 level of significance. This suggests that students who experience higher levels of bullying tend to have lower levels of social competence. This result can be interpreted as meaning that students who are not bullied have higher social competence. The findings are consistent with previous studies by Khoug (2012), Souzati (2014), Al-Bahass (2012), Behnsawi and Mohsen (2015), and others.

These findings highlight the importance of addressing bullying behaviours among these students through the development of programmes and activities that enhance social competence.

Presentation of findings for the second hypothesis

Hypothesis: There are statistically significant differences in bullying behaviour across its dimensions attributed to gender (male - female) among middle school students.

To test this hypothesis, an independent samples t-test was used to examine the significance of the differences between the genders. The results are shown in the table below:

Table 10: Significance of differences in dimensions of bullying behaviour according to gender (male - female)

Variable		Sample	M (Mean)	SD (Standard Deviation)	T Value	Significance Level (p-value)	Evaluation
Verbal Bullying	Male	119	52.310	5.83	2.516-	0.031	Significant at 0.05
	Female	101	54.250	5.49			
Physical Bullying	Male	119	37.210	3.16	2.499-	0.013	Significant at 0.05
	Female	101	38.217	2.74			
Material Bullying	Male	119	23.613	1.97	-2.922	0.004	Significant at 0.01
	Female	101	24.287	1.32			
Total Scale	Male	119	113.134	9.68	-2.902	0.004	Significant at 0.01
	Female	101	116.730	8.42			

Comments

From Table 10, it is evident that there are statistically significant differences between males and females in school bullying behavior. The t-values were as follows:

- Verbal Bullying: 2.516
- Physical Bullying: 2.499
- Material Bullying: 2.922
- Total Bullying: 2.902

All of these values are statistically significant, indicating differences in the level of school bullying between genders. Notably, the average scores for females were higher across all dimensions, suggesting that females exhibit more bullying behavior than males. Therefore, we conclude that the second hypothesis has been validated.

Explanation of Results for the Second Hypothesis

The second hypothesis posits that there are statistically significant differences in bullying behavior across its dimensions based on gender (male - female) among middle school students. The findings indicate significant differences, with a t-value of 2.90, which is statistically significant.

These findings are consistent with previous research, such as the study by Stri and others (2010), which found gender differences in school bullying in favour of females. This conclusion is also consistent with studies by Bouanani and Kourat (2019), Geraisy (2012), Eric, Maria, and Kari (2003), Maris and Petermaan (2010), Asis and Arslan (2010), and Radi (2001).

However, these findings contrast with those of Bakri (2010) and Amitouch (20-21), who reported no significant differences in bullying behaviour based on gender. This highlights the need for targeted strategies and prevention programmes that take into account gender differences in bullying behaviour among students.

Presentation of results for the third hypothesis

Hypothesis: There are statistically significant differences in social competence attributed to gender (male - female) among middle school students.

In order to test this hypothesis, an independent samples t-test was conducted to test the significance of the differences between the genders. The results are summarised in the table below:

Table 11: Significance of differences in social competence according to gender (male - female)

Variable		Sample	Mean	Standard Deviation	T Value	Significance Level (p-value)	Evaluation
Social Competence Assessment	Male	119	65.596	5.90	2.039-	0.043	Significant at 0.05
	Female	101	67.212	5.72			

Comments

From Table 11, it is clear that there are statistically significant differences in social competence between males and females. The t-value was 2.039, which is statistically significant at the 0.05 level. This indicates that there are significant differences in social competence, with females showing higher average scores than males. This suggests that females exhibit greater social competence compared to their male counterparts.

Explanation of Results for the Third Hypothesis:

The third hypothesis posits that there are statistically significant differences in social competence attributed to gender (male - female). The results indicate significant differences in the social competence scale, with a t-value of 2.039 being significant at the 0.05 level.

These findings align with previous studies by Al-Maghazi (2004), Klebit (2015), and Koukai (2013), which also found higher social competence levels among females. Therefore, we conclude that the third hypothesis has been confirmed.

Presentation of Results for the Fourth Hypothesis

Hypothesis: There are statistically significant differences in bullying behavior attributed to educational level (first, second, and fourth years) among middle school students.

To verify this hypothesis, a one-way ANOVA was conducted to examine the significance of differences between the first, second, and fourth-year students. The results are summarized in the following table:

Table 12: Significance of Differences in Bullying Behavior According to Educational Level (First, Second, Fourth Year)

Variable	Source of Variation	Sum of Squares (SS)	Degrees of Freedom (df)	Mean Squares (MS)	F Value	Significance Level (p-value)	Evaluation
Bullying Behavior	Between Groups	92.000	3	46000	0.531	0.589	Not significant
	Within Groups	18786.709	217	86.575			
	Total	18878.907	219				

Comments

From Table 12, it is evident that there are no statistically significant differences in bullying behavior across educational levels at the 0.01 significance level. The F-value was 0.531, with a significance level of 0.589, which is greater than 0.05. Therefore, we conclude that the fourth hypothesis has not been validated.

Explanation of Results for the Fourth Hypothesis:

The fourth hypothesis posits that there are statistically significant differences in bullying behavior attributed to educational level (first, second, and fourth years). The results indicate no statistically significant differences at the 0.01 level in the bullying scale based on educational level.

These findings align with studies by Bakri (2010), Radi (2001), and Lebirag (2017), which also found no relationship between students' educational level and bullying behavior. However, this contrasts with the study by Souzani (2017), which reported differences in bullying behavior favoring higher educational levels.

Interpretation of Findings:

The lack of significant differences can be explained by the psychological development characteristics of students at this stage, which is marked by impulsivity, recklessness, and a sensitivity to social criticism. This period also represents a beginning of rebellion against school norms and rules as students strive for independence and leadership.

Additionally, the cognitive load from their academic responsibilities may cause psychological stress, leading to anxiety and feelings of failure. Consequently, this can result in engaging in bullying as a form of self-defense or as a means of achieving certain goals, such as control and independence.

Ultimately, these results suggest that differences in educational level between first, second and fourth year students do not significantly affect their bullying behaviour, as they share the same educational environment, administrative interactions and curricula, all of which contribute to a lack of variance in bullying behaviour.

Conclusion:

This study addressed the issue of school bullying and its relationship with social competence among middle school students. Both school bullying and social competence are significant topics that warrant attention, as bullying is a widespread phenomenon in educational institutions, with negative effects on the overall school climate and on students' personalities. This study is valuable for informing decisions aimed at reducing school bullying while also enhancing social competence, including self-assertion and communication skills, which help students achieve personal balance. Since this research focuses on adolescents, who are the backbone of the future, its implications are particularly important.

The study allowed us to explore social competence and bullying behaviour in middle school students. Our aim was to investigate the correlational relationship between the dimensions of school bullying and social competence among these students, as well as to examine differences based on gender and educational level (first, second and fourth year). The hypotheses formulated for this study were as follows:

1. There is a statistically significant relationship between the dimensions of bullying behaviour and social competence among middle school students.
2. There will be statistically significant differences in the dimensions of bullying behaviour according to gender (male - female).

3. There are statistically significant differences in social competence attributed to gender (male - female).

4. There are statistically significant differences in bullying behaviour attributed to educational level (first, second, fourth year).

Based on the results obtained from the application of the scales and the use of different statistical methods to test the hypotheses, we have arrived at the following conclusions:

- There is a statistically significant correlation between the dimensions of bullying behaviour and social competence among middle school students.

- There are statistically significant differences in the dimensions of bullying behaviour according to gender (male - female).

- There are statistically significant differences in social competence attributed to gender (male - female).

- There are no statistically significant differences in bullying behaviour attributed to educational level (first, second, fourth year).

These findings highlight the need for targeted interventions to address bullying and promote social competence in educational settings.

Recommendations and suggestions

In light of the findings of this study, the researchers recommend the following:

1. Attention to educational stakeholders: Involve educational authorities (teachers, parents, counsellors, etc.) in the development of educational plans aimed at reducing risks for both bullies and their victims.

2. Family awareness: Educate families to reduce authoritarian and violent approaches to children, and encourage the adoption of positive parenting techniques to minimise bullying behaviour.

3. Educational programmes and seminars: Conduct educational programmes and seminars to raise awareness of the dangers of bullying in the educational context.

4. Social skills development programmes: Establish social skills development programmes for middle school students to help them manage social interactions more effectively.

5. Further research: Suggest additional studies that examine the relationship between bullying behaviour and social competence in larger populations, including a wider range of variables and contexts.

These recommendations aim to promote a safer and more supportive educational environment, and ultimately the well-being of all students.

References

1. Al-Dakhil Allah, Dakhil bin Abdullah (2015): Social Skills - Training, Exercises, and Assessment Methods, Al-Obeikan Publishing, Saudi Arabia.
2. Abu Al-Diyar, Mas'ad Najah (2012): Bullying Among Students with Learning Difficulties: Causes, Problems, and Solutions, 3rd ed., Kuwait: National Office of Kuwait.
3. Abu Ghali, A'taf Mahmoud (2015): The Effectiveness of a Training Program in Improving Competence Among Female Students in Late Childhood, Jordanian Journal of Educational Sciences, Vol. 10, No. 3.
4. Brahi, Nada (2023): The Relationship Between School Bullying and Academic Achievement Among First-Year Middle School Students, Master's Thesis, Special Education and Adapted Teaching, Faculty of Humanities and Social Sciences, Bouira University, Algeria.

5. Ben Rouan, Houria (2021): School Bullying and Its Relationship with Social Skills Among Primary School Students from Teachers' Perspectives, Master's Thesis, Guidance and Counseling Specialization, Faculty of Humanities and Social Sciences, Mohamed Boudiaf University, Msila, Algeria.
6. Bohansawy, Ahmed Fikri, and Hassan, Ramadan Ali (2015): School Bullying and Its Relationship with Achievement Motivation Among Intermediate School Students, Journal of the Faculty of Education - Port Said University, Vol. 1, No. 17, pp. 1-40.
7. Bouanani, Moustafa, and Kourat, Yamina (2019): Bullying Behavior and Its Relationship with Learning Difficulties Among a Sample of Middle School Students in Saida, Algeria, International Journal of Psychological and Educational Studies, No. 5, pp. 184-212.
8. Tattay, Fella (2020): Self-Esteem Levels Among Adolescents Who Are Victims of Bullying, Master's Thesis, Clinical Psychology Specialization, Faculty of Humanities and Social Sciences, Mohamed Khider University, Algeria.
9. Khough, Hanan Asad (2012): School Bullying and Its Relationship with Social Skills Among Elementary School Students in Jeddah, Saudi Arabia, Journal of Psychological and Educational Sciences, Vol. 13, No. 4, pp. 187-218.
10. Al-Dusouqi, Magdy Mohammed (2016): Scale of Bullying Behavior Among Children and Adolescents, Cairo: Dar Jwana for Publishing and Distribution.
11. Al-Zaboun, Mohamed Saleem, and Al-Raghol, Mohammed (2016): A Proposed Educational Program to Reduce Bullying Among Upper Basic Education Students in Jordan, Journal of Studies and Research, Arab Journal of Humanities and Social Sciences, No. 25.
12. Sharbat, Ashraf Mohammed, Abu Al-Fadl, Mahmoud Abdel-Sattar, and Mohamed Salmi Mohamed Said (2018): School Bullying Among High School Students, Journal of Educational Sciences, Faculty of Education, South Valley University, Vol. 1, No. 2, pp. 262-273.
13. Al-Sabihin, Ali Mousa, and Al-Qudat, Mohammed Farhat (2013): Bullying Behavior Among Children and Adolescents (Concept, Causes, Treatment), Riyadh: Naif Arab University for Security Sciences, Saudi Arabia, Vol. 7, No. 15, pp. 226-246.
14. Tarb Misi, Geraisy (2012): Bullying Behavior and Its Relationship with Academic Self-Concept and Academic Achievement Among Students, Master's Thesis in Psychology, Faculty of Educational and Psychological Sciences, University of Amman, Jordan.
15. Abd Al-Azim, Hala Samir, Ibrahim, Rania Al-Arabi Abdullah, Zahran, Samah Jad, and Youssef, Sidqi Ali Ahmed (2020): Learning Through the Quran as an Approach to Improve Some Social Skills Among Intellectually Disabled Children in Integrated Kindergartens, Journal of Scientific Research in Education, Ain Shams University, Faculty of Education for Girls, Vol. 3, No. 21.
16. Fayez Khadr Mohammed Bashir (2016): The Effectiveness of an Assertive Behavior Development Program and Its Impact on Self-Efficacy, Social Competence, and Academic Performance Among Secondary School Students in Gaza, PhD Thesis in Educational Studies, Educational Psychology Specialization, Al-Azhar University, Egypt.
17. Qoujil, Nasira (2021): Social Competence and Its Relationship with Academic Adjustment Among Academically Outstanding Students - Doctoral Thesis, Faculty of Social Sciences, Mouloud Mamari University, Tizi Ouzou, Algeria.
18. Al-Maghazi, Ibrahim Mohammed (2004): Social Competence and Its Relationship with Academic Achievement Among Education Students, A Psychological Study, Cairo, Vol. 14, No. 3, pp. 124-243.

Appendices

Appendix 1

Research Form Title:

Dear Students,

The researcher is conducting a study entitled: "Bullying Behaviour and Its Relationship with Social Competence Among Middle School Students". Please read the paragraphs relating to each scale and indicate your response by placing an (X) next to your chosen response. Please note that the information you provide will be used for research purposes only and will remain confidential.

Thank you for your cooperation.

I. Personal Information

- Name:
- Age:
- Class and section:.....
- Number of siblings:.....
- Father's level of education:.....
- Mother's level of education:
- Father's occupation:.....
- Annual average for the last year:
- Have you repeated a year?
Yes no

If yes, please specify which years you have repeated:

II. Bullying Behaviour Scale

	Verbal Bullying	Totally agree	Does not apply	Sometimes true	Does not apply	Does not apply
1	I direct threatening phrases and tones of anger towards my classmates.					
2	I insult my classmates with names and offensive terms.					
3	I make comments that annoy my classmates about their physical traits and overall appearance.					
4	I make my classmates the subject of jokes for others.					
5	I reveal personal secrets of my classmates.					
6	I deliberately refuse a classmate's desire to be friends with me.					
7	I ignore my classmates.					

8	I accuse my classmates of actions they didn't commit to make others dislike them.					
9	I instigate disputes among students by encouraging them to fight.					
10	I intentionally exclude some classmates from playing.					
11	I refuse to listen to some of my classmates.					
12	I direct sarcastic and mocking phrases towards my classmates.					
	Physical Bullying	Totally agree	Does not apply	Sometimes true	Does not apply	Does not apply
13	I pinch my classmates, especially those who are shy.					
14	I pull the hair of my female classmates to cause them pain and distress.					
15	I create reasons to fight with weaker classmates and take their place.					
16	I push my classmates.					
17	I attack my classmates and hit them with a stick, chair, or pencil when they do not obey me.					

Social Competence Scale

	Self-Management Skills	No	Sometimes	Yes
1	I remain calm during problems.			
2	I treat people the way they treat me.			
3	I adhere to the instructions and guidance of my teacher.			
4	I avoid engaging in tasks that require thinking and analysis.			
5	I try again multiple times when I fail at a task.			
6	I avoid confronting anything that is unclear.			
7	I adhere to school rules.			
8	I control my emotions when I am angry.			
	Interpersonal Skills	No	Sometimes	Yes

9	I feel anxious when I know someone is watching me.			
10	I make sure not to hurt others' feelings.			
11	I enjoy being in social gatherings			
12	I feel uncomfortable when looking directly at others.			
13	I engage with my classmates and peers in various activities			
14	I can praise the achievements or contributions of others.			
15	I cooperate with my classmates in various situations			
16	I start a conversation with someone I want to get to know			
17	I join discussions with classmates and friends			
18	I interact with different types of classmates			
	Academic Social Skills	No	Sometimes	Yes
19	I have the ability to discuss the lesson topic with the teacher			
20	I rely on myself to complete my homework			
21	I excel in a few areas compared to my classmates			
22	I feel a sense of belonging and love for my school			
23	I complete the required school activities on time			
24	I dislike reading and external reading assignments			
25	I feel anxious when assigned certain tasks by the teacher			
26	When I find it difficult to understand the lesson, I prefer to turn to a classmate for help			
27	I maintain my relationships and communication with teachers outside of school			