The Implementation of Aggression Replacement Training (ART) to Reduce Student Aggressive Behavior at SMA Kartika 1-2 Medan

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Abstract: The existence of services in guidance and counseling at school is to help overcome the problems experienced by students, one of the student problems that often occur is aggressive behavior. The purpose of this study was to determine the effectiveness of the application of Aggression Replacement Training (ART) in reducing student aggression behavior. This research uses the mixed method, of the research method uses Explanatory Sequential Design. This research was conducted at SMA Kartika 1-2 Medan in 2023. The research subjects were second-grade students totaling 25 students. The instruments used in the data collection process used three types, namely (1) Questionnaires; (2) observation; and (3) interviews. Data analysis includes (1) Descriptive analysis; (2) Normality test; (3) paired sample t-test; (3) homogeneity test; (4) Independent Sample t-test; and (5) N-Gain Score test. The results showed that students' aggression behavior tended to be high before the service, then after being given the Aggression Replacement Training (ART) technique service, students' aggression behavior according to. The decrease in student aggression behavior can be seen from the results of the Pre-test score, the average value is 76.3. After being given the service the Post-test score has an average value of 53.6. This shows that the application of Aggression Replacement Training (ART) can reduce students' aggressive behavior.

Keywords: Aggression Replacement Training (ART); Aggressive Behavior; Students.

INTRODUCTION

The existence of services in guidance and counseling at school is to help overcome the problems experienced by students, one of the student problems that often occur is aggression. This behavior must of course be addressed to be resolved because the aggressive behavior is related to social deviations that can harm students (Wulandari et al., 2021). Aggression behavior is related to the function of emotions, namely, aggression is an uncontrolled or excessive emotional reaction by students to hurt the other party (Dewi & Savira, 2017). Aggression behavior is one of the problematic behaviors carried out by students today. This is shown by students deliberately harming others, both physically and verbally (Saputra & Handaka, 2018).

The cause of aggression behavior is a lack of student emotional management is one of the causes of aggression behavior (Dewi & Susilawati, 2016). Students with low emotional intelligence and a high level of aggression behavior will tend to be easily carried away by negative emotions, so they are easily provoked to commit aggression behavior, have a low level of patience, are easily offended, tend to impose their opinions on others and feel the need to fight as a way to solve problems because of their ability to know, understand, and feel other people's emotions, the ability to tolerate and make friends with others is low.

Aggression is divided into several forms, namely (1) physical aggression, which can be seen as in the form of fights with peers, physically attacking others, and being rude to parents, teachers, and adults; (2) verbal aggression, which is the tendency to attack others by providing stimuli that harm others or hurt others (Rahmawati & Asyanti, 2017). Students who have feelings of anger may be that the student feels upset and angry about something until anger occurs which causes a sense of hatred and can involve hostility between these individuals.

Students should have been able to control their emotions so as not to engage in negative behavior such as this aggressive behavior. Because in addition to hurting the feelings of others, it can also endanger and harm yourself and the people around you and even bitterly can lead to death. Merdekasari & Chaer (2017) revealed that aggressive behavior was carried out by students aged 12 to 18 years. These behaviors include persecution, use of sharp weapons, sexual abuse, rape, theft and embezzlement.

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Aggression behavior is part of the deviant behavior committed by a student. Aggression behavior is a problem that is usually carried out by most children to students related to emotions (Putra, 2015). Children or students who carry out this aggressive behavior deliberately to make other people lose both verbally and non-verbally (Mustikasari et al., 2021). Due to the lack of emotional management in these children and students, aggression behavior appears and if these children and students have a high level of aggression behavior, they tend to be more easily carried away by negative emotions.

Aggression behavior is a description of a person's actions aimed at deliberately hurting or harming (Alwi, 2019). Aggression behavior is verbal or physical behavior that can harm and cause difficulties, damage, pain, and damage to objects. Aggression behavior is carried out by someone who intends to threaten or hurt feelings and is carried out against objects or people (Subqi, 2019). Aggression behavior will cause various kinds of losses and negative impacts, such as low learning achievement and poor social interaction with peers, other impacts are anxiety, depression, legal problems, psychological and emotional traumatic reactions, panic, phobias, and depression (Illahi et al., 2018).

Aggression is a phenomenon that can take many forms, ranging from relatively small actions, such as calling names or pushing to more serious actions, such as hitting, kicking, or punching to severe actions such as stabbing, shooting, or killing (Kusuma, 2016). Because of the phenomenon in the field regarding the most aggressive behavior, the researcher takes and chooses the technique that will be given to students is the Aggression Replacement Training (ART) technique. This Aggression Replacement Training (ART) technique is an intervention program based on cognitive behavioral theory to develop adequate social skills and ethical reasoning, anger management skills, and control aggressive behavior (Murtadho et al., 2022; Brannstrom et al., 2016). The use of Aggression Replacement Training (ART) helps to overcome aggressive behavior that occurs in the field and can also help improve the social skills and moral reasoning of learners/students (Ensafdaran et al., 2019).

The purpose of this study is to determine the effectiveness of the application of Aggression Replacement Training (ART) in reducing student aggression behavior. The focus of this research discusses the role of using Aggression Replacement Training (ART) to reduce student aggression behavior at SMA Kartika 1-2 Medan.

METHOD

1. Research Design

This study uses the mixed method, a research method using The Explanatory Sequential Design, which prioritizes a quantitative approach first to calculate the data that has been studied and followed up with a qualitative approach to explain the results of the quantitative data in more detail (Creswell et al., 2011). Mixed Methods is research that combines and combines two types of research methods, namely qualitative and quantitative methods. This method is used because it is by the characteristics of the research questions to be answered by researchers, which include outcomes and processes that involve combining quantitative and qualitative data. The Explanatory Sequential Design model is described in the following figure:
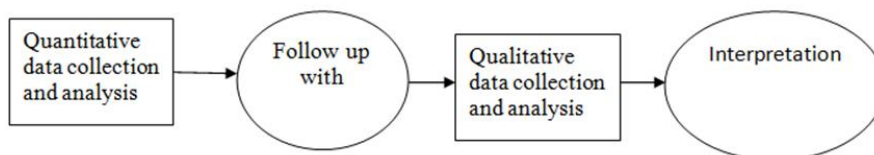

Figure 1. The Explanatory Sequential Design

2. Research Implementation

This research was conducted at SMA Kartika 1-2 Medan in 2023. The research subjects were second-grade students totaling 25 students. The sample was taken randomly based on the criteria or characteristics that have been determined by the researcher.

3. Instruments and Data Collection

The instruments used in the data collection process use three types, namely (1) Questionnaire in the form of a Likert scale. This questionnaire is in the form of two statements describing positive statements (Favorable) and negative statements (Unfavorable); (2) Observation. Observation is used by researchers to find out the process of implementing research, observation is carried out through the observation process. The observation process is carried out using observation guidelines; (3) Interview. Interviews are used by researchers to ask directly in the form of questions about the condition of students after being given training, the results of interviews will be interpreted qualitatively.

4. Data validity test
1) Validity by material experts. This feasibility test aims to test the feasibility of instruments that have been made by researchers in terms of editorial, construct, language, and content whether it is appropriate, and language seen from the suitability of standard language users in Indonesian.
2) Limitations test. This readability test aims to test understanding of this aggression behavior instrument. This readability test was carried out by several students as research samples.
3) Validity Test. This validity test aims to be an instrument measuring tool to obtain valid data. Valid means that the instrument can be used to measure what will be measured.
4) Reliability Test. The reliability test is carried out to measure the consistency of the instrument which is an indicator of the variable or construct whether it is reliable.

5. Data Analysis
1) Quantitative data analysis. In this study, researchers used Quasy-Experiment (quasi-experiment) with the type of Pre-Test and Post-Test with Non-Equivalent Control-Group Design because this method requires two sample classes, namely the experimental class and the control class. This analysis includes (1) Descriptive analysis; (2) Normality test; (3) paired sample t-test; (3) homogeneity test; (4) Independent Sample t-test; and (5) N-Gain Score test.
2) Qualitative Data Analysis. This analysis is done during the research process in the field with a qualitative data collection technique model from the results of observations and interviews. Observations were conducted directly at the research location/school environment and interviews were used to obtain qualitative data results conducted intensely between researchers and students to obtain the information needed.

RESULT AND DISCUSSION

Results

1) Pre-test and Post-test results

The pre-test results that have been carried out in the experimental class produce an average total value of 76.3, with the following details:

Table 1. Pre-Test Score Range

Low	Medium	High
X<65	72<=X<78	x>=78

Post-test results that have been carried out in the experimental class produce an average total value of 53.6, with the following details:

Table 2. Range of Post-Test Results

Low	Medium	High
X < 55	55 <=X<66	X>66

2) Normality testNormality test is used with statistical analysis, namely the Kolmogrov-Smirnov test

Table 3. Normality Test Results

		Kolmogorov-Smirnov[a]			Shapiro-Wilk		
	Class	Statistic	df	Sig.	Statistic	df	Sig.
Aggression Behavior	Pretest experimen	.183	8	.200*	.946	8	.638
	Postest experimen	.165	8	.200*	.955	8	.764
	Pretest kontrol	.158	8	.200*	.941	8	.619
	Postest kontrol	.311	8	.022	.736	8	.006

Tests of Normality

Based on the output above, it is known that the significance value (Sig.) for all data both Kolmogorov-Smirnov and Shapiro-wilk tests> 0.05, it can be concluded that the research data is normally distributed.

3) Paired sample t test;

This paired sample t-test test uses the SPSS statistic 26 for windows application with the following table results:

Table 4. Paired Simple t-test Test Results

		Paired Differences					t	df	Sig. (2-tailed)
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference				
					Lower	Upper			
Pair 1	Pretest Experimen - Postest Experimen	19.00000	5.18239	1.83225	14.66742	23.33258	10.370	7	.000
Pair 2	Pretest Kontrol - Postest Kontrol	.87500	7.37636	2.60794	-5.29179	7.04179	.336	7	.747

Paired Simples Test

Based on the output above, the Sig (2-tailed) value is 0.000 <0.05, it can be concluded that there is a difference in the average post-test results of the experimental and control classes.

4) Homogeneity test;

The homogeneity test was carried out using the Levene Statistic test which was carried out with the help of SPSS 26.0 for Windows. The following are the results of the processed data output.

Table 5. Homogeneity Test Results

		Levene Statistic	df1	df2	Sig.
Pretest_Posttest	Based on Mean	1.314	1	14	.271
	Based on Median	.827	1	14	.379
	Based on Median andwith adjusted df	.827	1	9.090	.387
	Based on trimmed mean	1.182	1	14	.295

Test of Homogeneity of Variances

Based on the results of the ouput above, the Levene Statistic test obtained sig = 0.271> 0.05. thus it is said that the data is said to be homogeneous.

5) Independent Sample T Test

Independent sample t-test is used to see if there is a statistically significant difference between the two groups (in terms of average).

Table 6 Independent Sample T-Test Test Results

		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
Aggression Behavior	Equal variances assumed	.174	.683	11.111	14	.000	19.00000	1.71000	15.33241	22.66759
	Equal variances not assumed			11.111	13.355	.000	19.00000	1.71000	15.31571	22.68429

Based on the output above, the Sig (2-tailed) value is 0.000 <0.05, it can be concluded that there is a difference in the average post-test results of the experimental and control classes.

6) N-Gain Score Test.

The N-gain score test is carried out by calculating the difference between the pre-test value (the test before the application of certain methods (treatment)) and the post-test value (the test after the application of certain methods (treatment)).

Table 7. N-Gain Score Test Calculation Results

No	Experiment Class	No	Control Class
	N-Gain Score (%)		*N-Gain Score* (%)
1.	69,89	1.	20.93
2.	72.38	2.	17.50
3.	54.32	3.	8.41
4.	55.15	4.	13.88
5.	98.25	5.	46.88
6.	69.48	6.	89.53
7.	67.33	7.	14.29
8.	86.36	8.	-38.59
Average	57.3160	Average	17.2830
Minimum	54.32	Minimum	-38.59
Maximum	98.25	Maximum	89.53

Based on the table above the results of the N-gain score test calculation, show that the average value of the N-gain score

for the experimental group is 57.31% while the average value of the N-gain score for the control group is 17.28% which explains that this study is included in the moderately effective category.

Discussion

The results showed that the application of Aggression Replacement Training (ART) can reduce students' aggressive behavior, this can be seen from the results of the post-test score, the results of students' aggressive behavior decreased after being given treatment. The purpose of this intervention is to find out about the aggressive behavior that occurs in students. In this case, there are several steps in the implementation of group guidance services using the Aggression Replacement Training (ART) technique which can determine the high and low levels of student aggression behavior according to existing indicators and with this intervention, namely with the aim that students can do more positive things and reduce negative things that can cause aggression behavior.

Theoretically, Aggression Replacement Training (ART) is a multimodal process that is very effective in breaking the chain of violent and aggressive behavior. Aggression Replacement Training (ART) encourages individuals to be able to increase control over the anger they experience (Currie et al., 2012). Aggression Replacement Training (ART) brings effective changes to develop behaviors that can reduce the meaning and quality of life, make students responsible, and bring changes in attitudes and better social behavior (Glick & Gibbs, 2010). Aggression Replacement Training (ART) can reduce violence, arbitrariness, and ignorance increase self-control, revitalize social role functions, and increase awareness and responsibility (Feindler, 2016). According to Merdekasari & Chaer (2017), students' emotional reactions tend to be unstable and uncontrollable such as statements of anger, sadness, and joy, and may still be able to change back and forth at a fast tempo. The lack of student emotion management is one of the causes of the emergence of aggressive behavior (Nissa, 2018).

Meanwhile, in terms of the forming factors, Halimah (2020) explained that there are factors that form aggression, namely (1) Social factors are all conditions that come from outside individual students that cause aggressive behavior. Provocation is one of the social factors that causes students to inevitably end up behaving aggressively; (2) Factors of the community environment where students have social interactions also influence the formation of students' aggression; (3) Emotional factors are emotional conditions or emotional vulnerabilities experienced by students.

The results reveal that ART brings effective changes to develop behaviors that can reduce the meaning and quality of life, make students responsible, and bring changes in attitudes and social behavior for the better. ART can reduce violence, arbitrariness, and ignorance increase self-control, revitalize social role functions, and increase awareness and responsibility..

CONCLUSION AND RECOMMENDATIONS

The results showed that students' aggression behavior tended to be high before being given services, then after being given Aggression Replacement Training (ART) technique services, students' aggression behavior according to. The decrease in student aggression behavior can be seen from the results of the Pre-test score, the average value is 76.3. After being given the service the Post-test score has an average value of 53.6. This shows that the application of Aggression Replacement Training (ART) can reduce student aggression behavior.

Research suggestions. Future researchers can pay attention to the constraints and limitations of research obtained by researchers during the research process, namely the enthusiasm of students in participating in this group guidance activity because the results of students who get treatment are different from the results of students who do not get treatment. Based on the results of this study, the obstacles experienced by researchers are when after giving the Pre-test the researcher is hindered by the school holiday so that the researcher waits for students to enter school for service delivery, the meeting time given is not much, and the condition of the place does not have a special room or the unavailability of a class so that the researcher during this research is placed in the school mosque. Then in this teacher/researcher obstacle, there were also almost all students who were initially afraid to take part in this activity so the researcher had to persuade the student until the student was willing to take part in this activity.

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