

The Role of Character Education, Creativity, Motivation, and Social Media Use as Predictors of Junior High School Academic Achievement

Moch. Hasan Sidqi^{1*}, & Didit Darmawan²

¹Department of Islamic Religious Education, Universitas Sunan Giri Surabaya, Indonesia

²Department of Management, Universitas Sunan Giri Surabaya, Indonesia

*Corresponding email: mochhasansidqi@gmail.com

Received: 16 April 2025

Accepted: 05 May 2025

Published: 27 May 2025

Abstract: The Role of Character Education, Creativity, Motivation, and Social Media Use as Predictors of Junior High School Academic Achievement. Objectives: The importance of

this study is to fill the gap of previous research that rarely analyzes the influence of character education, academic creativity, academic motivation and social media on academic achievement by taking all junior secondary students without distinguishing certain classes and subjects. Therefore, this study aims to determine and analyze the influence of all independent variables on academic achievement.

Methods: The study was a quantitative survey with a population of 115 students. The sample was taken from the population using the total sampling technique, so the sample amounted to 115 students. The data analysis technique used multiple linear regression (t-test, F-test, and coefficient determination) which was previously tested for data quality (Corrected Item- Total Correlation validity test and reliability test) and classical assumption test (Probability plot test, multicollinearity test, autocorrelation test, and scatter plot heteroscedasticity).

Findings: This research shows that all the independent variables of the study (Character education, academic creativity, academic motivation, and social media) positively influenced students' academic achievement, both partial and simultaneous analysis.

Conclusion: Based on the research results, all hypotheses were accepted, namely character education has an effect on academic achievement (H1), academic creativity has an effect on academic achievement (H2), academic motivation has an effect on academic achievement (H3), and social media has an effect on academic achievement (H4). MTs Bi'ul Ulum Gedangan Sidoarjo can implement the implications for paying attention to academic achievement by ensuring the implementation of policies for integrating character education values runs effectively, increasing adequate and stable resources and infrastructure, and creating stimulus by channeling social media content related to subject matter. Future research can carry out research that focuses on all the variables of the current study, but uses Alpha Generation subjects.

Keywords: character education, academic creativity, academic motivation, social media, academic achievement.

To cite this article:

Sidqi, M. H., & Darmawan, D. (2025). The Role of Character Education, Creativity, Motivation, and Social Media Use as Predictors of Junior High School Academic Achievement. *Jurnal Pendidikan Progresif*, 15(2), 978-994. doi: 10.23960/jpp.v15i2.978-994.

■ INTRODUCTION

Education is a means of fostering human resources for development (Hermiono & Arifin, 2020). The most critical step in fostering human resources is to improve the quality of education. A nation that is advanced in the field of education

reflects that the country has superior science (Azizah et al., 2019). Education is very much needed by society, because through education society can socialize and transform the values and social norms that apply from the previous generation to the next generation (Latri et al., 2020).

Therefore, education must receive attention from the government and society in general, as well as education managers in particular (Azizah et al., 2019).

The world of education is currently experiencing a strong increase in competition between institutions or schools (Krücken, 2021). Competition between educational institutions does not only involve competition from physical evidence or capital, but also competition between human resources (HR) or individuals (Winarti, 2018). Healthy competition between schools is expected to lead to improved school quality and better achievement for students (Jabbar et al., 2022). According to Efferi (2014), there are three factors that can dominantly influence educational institutions in their competition, namely strategic location, needs from the community and excellence or achievement.

Educators at Madrasah Tsanawiyah Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo, strive to improve students' academic performance in order to maintain quality in competition between educational institutions and in accordance with the school's vision, namely noble character, achievement, national insight and Ahlussunah Wal Jama'ah An Nahdliyah. This is because MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo is an educational institution that has competition with other formal educational institutions such as SMPN Satu Gedangan Sidoarjo, ITABA Junior High School, and SMP Pembangunan Jaya Gedangan Sidoarjo. According to Priarni (2017), in order for an educational institution to have competitiveness, educational institutions are required to take better, effective and efficient actions to produce outstanding students. In addition, leadership in educational institutions must create a strong teaching or learning ecosystem in order to get better achievements (Shukla, 2023).

Academic achievement is one of the important elements of learning in an educational system (Ejiobi-Okeke & Samuel, 2021). Academic achievement is one of the most

important indicators for assessing students' educational performance and achievement (Liu et al., 2020). Students' academic achievement in school is created by evaluation activities such as daily tests, mid-term exams, and final exams or final assessments. If the evaluation results are good, it means that the student's academic achievement is good, but if the evaluation results are low, it means that the academic achievement is poor (Yahya et al., 2020). High academic achievement can be achieved by students based on a high desire and attitude to learning (Hanifah et al., 2021). Students who have succeeded in obtaining academic achievement usually have a tendency to work hard, have a willingness to learn, and are more diligent in obtaining better results (Halizah et al., 2022). Academic achievement in educational institutions can be created by academic support, retention, and development of learners through tutoring, coaching, and mentoring (Tsymbaliuk, 2023). Academic achievement is positively and significantly influenced by character education (Efendi et al., 2020; Jamaluddin et al., 2021; Aspiani et al., 2023; Rahman et al., 2024). This is in accordance with the explanation of Singh et al. (2020) who explained that character education can improve students' academic achievement, so many schools have implemented character education in their learning strategies. Character education is an internal element that shows the worth of individual students (Izzati et al., 2019). Teachers at MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo are very concerned about the character education of their students, because the background of this school is a religious school with very thick pesantren norms. A student who is taught the values of character education will show more harmonious social interactions throughout his life (Birhan et al., 2021). In addition, a student who understands the concept of character education will also have more academic ability than a student who does not understand the concept of character education (Omiyefa, 2021). Character education

is an important element that students must have in order to grow their character, so that they can have a good personality (Intania & Sutarna, 2020).

In addition to character education, academic creativity also affects academic achievement (Tatlah et al., 2012; Akpur, 2020; Safarieh, 2020; Zokaee et al., 2020). Academic creativity also has a considerable positive relationship with academic ability, especially in reading, understanding, and doing written assignments (Tzachrista et al., 2023). Students at MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo are required to have good academic creativity, because this school is one of the schools that implement the Merdeka curriculum, which requires students to be more active than teachers in their academic activities. Academic creativity has an attachment to the skill of applying a new action to be able to solve problems into an innovation. Some examples of students' academic creativity are their willingness to think about challenges or problems, channel with other individuals, and receive input (Supena et al., 2021). Teachers need to pay attention to the academic creativity of students so that learning activities in educational institutions can produce graduates who have high creativity (Priyanto & Dharin, 2021). In addition to this, academic creativity also needs to be implemented in order to achieve effective and high-quality education (Choriyevea, 2022). Academic creativity is an important part of the educational process to fulfill the skills needed to face the 21st century (Sumarni & Kadarwati, 2020).

Academic achievement can also be positively and significantly affected by other factors, namely academic motivation (Gupta & Mili, 2017; Riswanto & Aryani, 2017; Sivrikaya, 2019; Abdelrahman, 2020). This is because the motivation contained in students can encourage them to be more eager to excel in the learning process (Agustina et al., 2021). Academic motivation is a factor that has an important role in determining the ability of student performance in

learning activities (Tentama & Arridha, 2020). Based on the results of the survey that has been carried out, every teacher at MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo is required by school regulations to start learning activities by praying and motivating students. Teachers can influence students' academic motivation by focusing on setting personal goals and developing curiosity in the subject area (Kalita, 2023). Academically motivated learners are more likely to engage in learning, persist and put in more effort than less motivated learners, with sociocontextually shaped beliefs playing an important role in academic success and achievement of learning goals (Filgona et al., 2020; Liem, 2021).

Research conducted by Tezer et al. (2017); Fak-on and Chobthamdee (2020); Amalia and Supriyadi (2023); Fudhla et al. (2023) mentioned that social media is one of the significant factors that can positively affect students' academic performance. The learning process of students can also be helped by social media if utilized properly (Uzochukwu & Anierobi, 2020). This is because in social media there are various benefits provided such as making it easier for students to communicate information and support learning (Adjin-Tettey et al., 2022). The students of MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo are generationally included in Gen-Z, so the students in this school as a whole use social media in their daily lives. Social media allows students to share learning resources more quickly (Caratiquit & Caratiquit, 2023). However, excessive, inappropriate use of social media and the use of social media for activities other than educational purposes can be detrimental to students' academic performance (Astatke et al., 2023).

Based on the explanation that has been done, the purpose of this study is to analyze and determine the effect of character education, academic creativity, academic motivation and social media on the academic achievement of MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo students with four hypotheses, namely 1)

Character education has a positive and significant effect on academic achievement; 2) Academic creativity has a positive and significant effect on academic achievement; 3) Academic motivation has a positive and significant effect on academic achievement; and 4) Social media has a positive and significant effect on academic achievement.

■ **METHOD**

Participants

The population used in this study were 115 students of MTs Bi'ru'ul Ulum Gemurung Gedangan Sidoarjo, consisting of 17 boys and 19 girls in class VII, 16 boys and 16 girls in class VIII and 35 boys and 13 girls in class IX. The sampling technique is total sampling, so the number of respondents used as samples is 115 students.

Research Design and Procedures

This research study is a quantitative survey because it is carried out with the aim of knowing the effect of the independent variable on the dependent variable. Quantitative survey studies according to Barth and Blasius (2021) are statistical methods for analyzing observable phenomena using questionnaires. The study utilized two data sets over the course of one month: questionnaires and observations to observe students as primary data, and documentation of documents relevant to the study as secondary data.

Instrument

The instrument of this study is a questionnaire that uses a Likert scale ranging from Strongly Agree to score 8, Strongly Agree to score 7, Agree to score 6, Somewhat Agree to score 5, Disagree to score 4, Disagree to score 3, Strongly Disagree to score 2, and Strongly Disagree to score 1. The instrument used is a questionnaire compiled from the following indicators.

Character education uses indicators according to Mubiar et al. (2020), namely 1)

Honesty; 2) Tolerance; 3) Discipline; 4) Curiosity; 5) Communicative; and 6) Hard work. Academic creativity uses indicators according to Rustaman et al. (2018), namely 1) Fluency; 2) Flexibility; 3) Originality; and 4) Elaboration. Academic motivation uses indicators according to Fajari (2020), namely 1) Doing assignments; 2) Strive; 3) Perseverance; and 4) Achievement. Social media uses indicators according to Chairil and Yasapura (2019), namely 1) Frequency; 2) Duration; and 3) Attention. Academic achievement uses indicators according to Bloom (1976), namely 1) Cognitive; 2) Affective; and 3) Psychomotor.

Each indicator has two items, so the total items of this study are 40, consisting of six items of character education variables, 12 items of academic creativity variables, eight items of academic motivation variables, eight items of social media variables, and six items of academic achievement variables.

Data analysis

The analysis technique used is multiple linear regression, before which several tests are carried out, both prerequisite tests and other tests, such as the closed statement test which is carried out to further describe the state of the variables in the research object. The prerequisite tests used are validity and reliability tests which aim to test data quality. In addition, classic assumption analysis is also used with four kinds of tests, namely the p-plot normality test, Durbin Watson autocorrelation, and scatter plot heteroscedasticity.

■ **RESULT AND DISCUSSION**

The results of multiple linear regression tests are presented in this study after variable exploration tests, classical assumptions, and data quality tests. Exploratory analysis of variables with closed statements that have been carried out with the aim of describing variables can be seen in the following tables 1, 2, 3, 4, and 6:

Table 1. Description of student character education variable (X1)

Answer	Total	Percentage
Ordinary, no problem	87	75.7%
I have role models in class	11	9.6%
I feel uncomfortable in class	3	2.6%
There are no role models of good character to emulate	14	12.2%

The table above shows the answers to the question about the character of students' classmates. The majority of students (75.7%) said that there were no character problems in class, according to the data, which indicates a positive social atmosphere. This is inseparable from the status of MTs Bi'ru'ul Ulum as a pesantren-based school that instills moral and religious principles through habituation, exemplification, and a strong religious culture. According to character education theory (Lickona, 1991), a good moral

environment will shape the overall character of students through moral knowledge, attitudes, and behavior. Although only a small proportion of students (9.6%) mentioned the presence of role models in the classroom, this supports Bandura (1962) social learning theory that good behavior is imitated from existing models. The existence of a socially safe environment also strengthens the internalization of values such as honesty, discipline, and tolerance in students' daily lives.

Table 2. Description of student academic creativity variable (X2)

Answer	Total	Percentage
Strongly disagree	1	4.4%
Disagree	14	12.2%
Somewhat agree	24	20.9%
Agree	25	21.7%
Strongly agree	47	40.8%

The table is the answer to the question of how creative the students are in learning activities. According to Table 2, most MTs Bi'ru'ul Ulum Gemurung pupils gave favorable answers to questions concerning academic creativity, indicating that the school's learning environment encourages the growth of concepts, critical thinking, and self-expression. These abilities can be developed because students are in an educational system that emphasizes the integration of science and spiritual values. The Islamic education environment that consistently nurtures

individual learners also encourages the growth of a high learning spirit. In addition, the interactive, participatory, and student-centered learning approach that characterizes the *Merdeka Belajar* curriculum allows for two-way communication between teachers and students. Through the habit of discussing, expressing opinions, and answering questions critically, students can learn to think reflectively and solutively. Thus, the academic creativity of students can not only be maintained, but can also be improved continuously.

Table 3. Description of student academic motivation variable (X3)

Answer	Total	Percentage
Fun teacher	52	45.2%
Favored subjects	37	32.2%
Fun friend	26	22.6%

The table answers the question of what factors motivate learners. Fun teachers, fun lessons and fun friends are factors that can motivate students. The students of MTs Bi'ul Ulum Gemurung Gedangan Sidoarjo are relatively balanced in choosing what factors motivate them in learning. The findings in Table 3 show that pleasant teachers (45.2%) are the most dominant factor in motivating students to learn in this school, where positive emotional relationships between teachers and students increase a sense of belonging and intrinsic motivation. Pleasant teachers tend to create a supportive,

communicative and fun learning atmosphere, so students feel comfortable, confident and encouraged to persevere in facing learning tasks. Although not as influential as teachers, favorite subjects (32.2%) remain important as they relate to interest and relevance of the material, while pleasant friends (22.6%) play a role in shaping social support and learning comfort. Contextual observations in schools show that teachers who are able to teach flexibly, insert humor and establish positive interactions tend to be more liked by students, which has a direct impact on their enthusiasm and perseverance in learning.

Table 4. Description of student social media variable (X4)

Answer	Total	Percentage
Instagram	10	8.7%
TikTok	53	46.1%
X (Twitter)	1	0.9%
WhatsApp	51	44.3%

The table is the answer to the question about social media that students often use to study. Based on the data, the majority of MTs Bi'ul Ulum Gemurung Sidoarjo students often use TikTok (46.1%) and WhatsApp (44.3%) as social media to support learning. TikTok offers short, visual and engaging learning content, in line with students' audiovisual learning style, while WhatsApp supports efficient communication and group discussion. Observations at school show that students utilize WhatsApp groups to exchange information about assignments or exam

materials, as well as search for educational content on TikTok such as concept explanations or study tips. These preferences are also influenced by the local context, where limited internet access and devices make lightweight and familiar platforms like WhatsApp more popular. A collaborative culture at school and technology-adaptive teacher support also encourage positive social media use. Thus, these findings reflect a shift in student learning patterns towards flexible, social and contextual utilization of digital media.

Table 5. Description of student academic achievement variable (Y)

Answer	Total	Percentage
Ordinary	55	47.8%
Classified as good	52	45.2%
Classified as bad	8	7.0%

The table is an answer to the question of how the academic achievement of MTs Bi'ul Ulum Gemurung Gedangan Sidoarjo students. Based on Table 5, most students rated their academic achievement as "average" (47.8%) and

"good" (45.2%), indicating that the majority felt they were in fair to positive attainment. This reflects that the cognitive, affective and psychomotor dimensions of academic achievement have developed in a relatively

balanced way, supported by a responsive and supportive school environment. Contextualized learning strategies, close teacher-student relationships and involvement in extracurricular activities provide space for students to develop as a whole. The low percentage of students who rated themselves as “poor” (7%) also indicates an inclusive and non-oppressive learning climate, so that students retain a positive perception of their abilities. The findings suggest that academic success depends not only on cognitive aspects but also on social support, motivation and the

relevance of learning, all of which have been well accommodated by the school.

The data quality test used in this study is the Corrected Item-Total Correlation (CITC) validity test and the Cronbach alpha reliability test. The CITC validity test that has been carried out reveals that all questionnaire question items are valid with a value > 0.30 . The reliability test that has been carried out also shows that the questionnaire of all variables is reliable because it is > 0.60 . This can be seen in the following table:

Table 6. Cronbach alpha reliability test

Variable	N of Item	Cronbach Alpha	Status
Character Education	12	0.873	Reliable
Academic Creativity	8	0.793	Reliable
Academic Motivation	8	0.863	Reliable
Social Media	6	0.873	Reliable
Academic Achievement	6	0.873	Reliable

After carrying out the data quality test, this study then carried out a classical assumption test as one of the requirements for the multiple linear regression test. The classic assumption test in this study uses four types of tests, namely the probability plot (P-Plot) normality test, the Durbin Watson multicollinearity test, multicollinearity, and heteroscedasticity scatter plot. The results of the four tests can be seen

in figures 1 and 2, as well as tables 7 and 8 below:

The results of the normality test image with the P-Plot technique from SPSS 26, which is known in Figure 1, show that the points are distributed around the diagonal line. This means that the data in this study is normally distributed, because the basis for making the P-Plot normality test decision has been met.

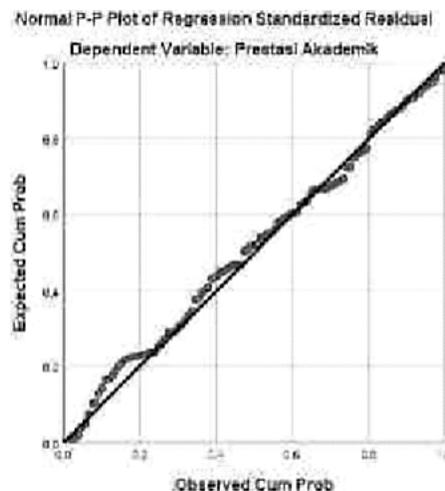


Figure 1. Normality probability plot test

Table 7. Durbin watson test

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.764 ^a	.584	.569	4.100	1.938

Table 7 of the autocorrelation test of this study results in a durbin watson value of 1.938 from the SPSS 26 output, so that the data in this study do not have autocorrelation symptoms because they are in accordance with the basis for making autocorrelation test decisions, namely the durbin watson value of this research data is not above 2.0 and not below -2.0.

The results of the multicollinearity test presented in table 8 state that the VIF and tolerance values of character education are.

2.135 and 0.468, academic creativity is 1.892 and 0.529, academic motivation is 1.608 and 0.622 and social media is 1.599 and 0.625. These results indicate that in all independent variables of this study there is no case of multicollinearity, because the VIF value is not more than 10.0 and the tolerance value is not less than 0.1.

Figure 2 of the scatter plot heteroscedasticity test with the help of SPSS 26 produces data points on the scatter plot spreading

Table 8. Multicollinearity test

Variables	Tolerance	VIF	Status
Character Education	0.468	2.135	Multicollinearity does not occur
Academic Creativity	0.529	1.892	Multicollinearity does not occur
Academic Motivation	0.622	1.608	Multicollinearity does not occur
Social Media	0.625	1.599	Multicollinearity does not occur

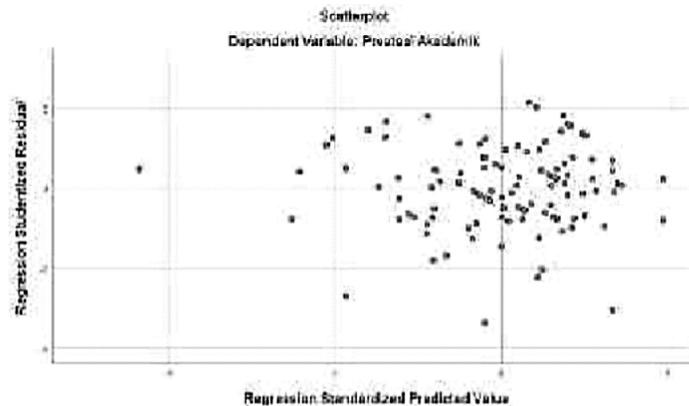


Figure 2. Heteroscedasticity test

randomly and showing no particular pattern. This proves that the data in this study does not indicate heteroscedasticity. Conversely, if there is a certain pattern in the distribution of data points, such as a megaphone or cone pattern, then heteroscedasticity occurs.

After the implementation of the data quality test and the classical assumption test, this research

study uses multiple linear regression to determine the status of the level of influence that exists between the independent and dependent variables. Multiple linear regression in this study uses several types of tests, namely the t test, F test and coefficient of determination, the results of which can be seen in the following explanation:

Table 9. t-Test

Model	Unstandartized		Standardized Coefficients		
	B Error	Std.	Beta	t	Sig.
(Constant) 1	3.715	2.827		1.314	1.938
Character Education	.099	.044	.202	2.252	.026
Academic Creativity	.190	.044	.246	2.905	.004
Academic Motivation	.205	.060	.268	3.442	.001
Social Media	.181	.061	.230	2.951	.004

Based on the t-test contained in table 9, the result of the first independent variable is 0.026, the second independent is 0.004, the third independent is 0.001 and the fourth independent is 0.004. The test results indicate that all independent variables in this study have a partially significant effect on the dependent variable, namely academic achievement. This can be known because the significance value of t-test of all independent variables is not greater than 0.05.

Based on the results of table 9, it can also be seen that if the character education, academic creativity, academic motivation and social media variables are constant, the academic achievement variable is worth 3.715. If the variables of academic creativity, academic motivation, social

media are constant and the character education variable increases, the academic achievement variable will increase by 0.099. If the variables of character education, academic motivation, social media are constant and the academic creativity variable increases, the academic achievement variable will increase by 0.190. If the variables of academic creativity, character education, social media are constant and the academic motivation variable increases, the academic achievement variable will increase by 0.205. If the academic creativity variable, academic motivation, character education is constant and the social media variable increases, the academic achievement variable will increase by 0.181.

Tabel 10. F-test

Model	Sum of Square	df	Mean Square	F	Sig.
1 Regression	2596.133	4	649.033	38.606	.000 ^b
2 Residual	1849.310	110	16.812		
Total	4445.443	114			

The F-test presented in table 10 produces a significance value of 0.000 for all independent variables. The F-test conducted indicates that all independent variables in this study have a

significant effect simultaneously on the dependent variable, namely academic achievement because the significance of the F-test of all independent variables is not greater than 0.05.

Tabel 11. Coefficient determination

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.764 ^a	.584	.569	4.100

The coefficient determination presented in table 11 produces an R value of 0.764, R square of 0.584 and adjusted R square of 0.584. Based

on these results, the coefficient of determination indicates that all independent variables, namely character education, academic creativity,

academic motivation and social media simultaneously affect the dependent variable, namely academic achievement by 56.9%. The results also indicate that variables other than character education, academic creativity, academic motivation and social media have an effect of 43.1%. After explaining the results of the research with several tests, this study then presents the findings with three discussions, namely:

The Effect of Character Education on Academic Achievement

Based on the results of the study which show that character education has a significant and positive effect on students' academic achievement, the first hypothesis of this study can be accepted. A study that is in line with these results is Efendi et al. (2020) which provides an explanation that character education is comprehensive and intact, not only forming students into good and intelligent individuals, but also forming students into agents of change, both in the lives of individual students themselves, and in social society. These results are also in accordance with studies from Jamaluddin et al. (2021); Aspiani et al. (2023); Rahman et al. (2024) who concluded that academic achievement is positively influenced by character education with high significance. Although the hypothesis of the study both accepts that character education affects academic achievement, this study uses MTs Bi'ru'ul Ulum Gedangan Sidoarjo students as research subjects, where students at the school are students from Islamic schools who strongly adhere to good Islamic character values, because the school is still under the auspices of the Islamic Boarding School.

Islamic boarding schools are one of the educational institutions that are very concerned about the values of good character education. Islamic boarding schools can overcome moral decline and moral dedication, where the cultural

climate, including agribusiness, society, and culture strongly support students to make developments (Pasi et al., 2020). The basis of character education values taught in Islamic boarding schools are basic values that are better (al-ashlah) and maintain goodness (al-shalih) (Muhajir, 2022). In addition, Islamic boarding schools also have learning methods that emphasize character education, which is usually conveyed and familiarized through knowledge of good morals that show good and bad things in life in the form of physical education and spiritual education (Karnaen, 2013). Islamic boarding schools not only teach and emphasize religious character education values, but also teach other character values, such as hard work punctuality, neatness, and discipline (Muhajir, 2022). MTs Bi'ru'ul Ulum Gedangan Sidoarjo as a school under the auspices of the boarding school is automatically exposed to the ideology and habits of character education taught by the boarding school, so that students in this school have character education values such as religious, hard work punctuality, neatness, and discipline, which are very visible in academic activities that occur in the school environment. With this character education, students in this school can obtain good academic achievement. The implication is that the school policy makers develop policies that emphasize the values of character education and conduct regular evaluations to ensure that the implementation of the policies is effective, resulting in improved academic performance of the students. In addition, the school policy makers can also involve the parents of the students and community leaders in the character building process of the students by providing understanding and training on the values adopted by the school.

The Effect of Academic Creativity on Academic Achievement

The results of the research that have been presented previously, show that the academic creativity variable has a significant and positive

effect on academic achievement. These results indicate that the second hypothesis in the study can be accepted. Previous research also explains things that are in line with the results of the research that has been presented. The previous research was conducted by Tatlah et al. (2012); Akpur (2020); Safarieh (2020); and Zokaee et al. (2020) which explained that the data obtained from the research group revealed a positive relationship and a significant relationship between academic creativity and academic achievement. However, education in Indonesia currently uses the *Merdeka Belajar* curriculum which has one of the programs, namely P5 (Projek Penguatan Profil Pelajar Pancasila) which intends to increase the academic creativity of students in schools through project-based learning, so this is a novelty value contained in the current study.

In academic creativity, there are several factors involved. These factors are finding and solving problems, selecting information relevant to the problem, evaluating ideas, associative thinking, flexibility, and divergent thinking (Sari et al., 2023). O'Sullivan (2021) explains that divergent thinking is a thought process used to generate creative ideas through finding a solution. The *Merdeka Belajar* curriculum currently implemented by Indonesia has a positive goal to support the elaboration of factors that support learning, one of which is creative learning (Rahayu et al., 2022). This curriculum provides an innovative atmosphere in student learning with project-based learning. Such learning will provide learning experiences so that students have academic and innovative creativity (Wulandari & Ilham, 2024). According to research by Sari et al. (2023), project-based learning can increase students' academic creativity by working in teams, organizing, and negotiating their ideas to create projects. In addition, *Merdeka Belajar* Curriculum can also increase students' academic creativity in its implementation, with the release of teachers to improve academic results, which emphasizes conceptual learning rather than rote

learning (Wulandari & Ilham, 2024). When learning that emphasizes conceptual understanding is implemented, a deeper understanding of the subject can be gained by students, resulting in improved academic performance. Through the activities contained in the *Merdeka Belajar* curriculum policy, students can have good academic creativity (Wulandari & Ilham, 2024). Therefore, academic achievement can also be improved. The implication that needs to be implemented by MTs Bi'ru'ul Ulum Gedangan Sidoarjo is to further improve adequate and stable resources and infrastructure, so that learning with *Merdeka Belajar* curriculum can run optimally and students get better academic achievement.

The Effect of Academic Motivation on Academic Achievement

Based on the results of the study, it can be seen that the academic motivation variable significantly has a positive effect on academic achievement. This finding makes the third hypothesis of this study accepted. In line with these findings, research by Gupta and Mili (2017); Riswanto and Aryani (2017); Sivrikaya (2019); Abdelrahman (2020) explained that student academic motivation has a significant and positive effect on academic achievement. The novelty that the current research has compared to previous research is that the subjects of this study are MTs Bi'ru'ul Ulum students whose learning activities are regulated by the *Merdeka Belajar* curriculum. One of the demands of the rules of the *Merdeka Belajar* curriculum is that learning does not have to be carried out in the classroom, but can also be carried out outside, so that this can make students have different academic motivations. Motivation is a significant determinant of students' actions, guiding their decisions regarding task prioritization and resource allocation (Rais & Xuezhi, 2024). When students have high levels of intrinsic motivation, they tend to show outstanding learning outcomes and strive for academic achievement (Austin et al., 2018; Peng & Fu, 2021).

Motivation can come from internal sources, such as personal goals, interests, and aspirations, as well as external factors, including learning environment support,

encouragement from peers and educators, and recognition of achievement (Rais & Xuezhi, 2024). In implementing the *Merdeka Belajar* curriculum, there are many activities that emphasize and intend to increase students' academic motivation, such as learning activities that do not have to be carried out in the classroom, but can also be carried out outside (Rahayu et al., 2022). In addition, the *Merdeka Belajar* curriculum system also authorizes teachers to be flexible in choosing learning tools, according to the needs of students' academic interests (Wulandari & Ilham, 2024). With this system, students' interest can increase so that they have motivation in academic activities. When students have motivation in their academic activities, academic achievement can be achieved. Policy makers at MTs Bi'ru'ul Ulum Gedangan Sidoarjo can carry out implications by increasing teacher competence to suit the needs of the curriculum. When the competence of teachers in schools is in accordance with curriculum standards, students will be able to have academic motivation, so that academic achievement will also increase.

The Effect of Social Media on Academic Achievement

Social media variables significantly have a positive effect on academic achievement. This finding makes the fourth hypothesis of this study accepted. In line with these findings, Tezer et al. (2017); Fak-on and Chobthamdee (2020); Al-Sawy and Al-Madani (2021); Fudhla et al. (2023); Amalia and Supriyadi (2023) explain that social media has an effect on academic achievement. However, the current research has differences with previous research, because MTs Bi'ru'ul Ulum Gedangan Sidoarjo students as a whole are generation Z (Gen Z) and social media

that is often used as a learning medium and improves academic achievement according to students is TikTok and WhatsApp.

TikTok attracts young users born after 1996, who are referred to as Generation Z. The app allows young people to produce creative educational videos that address complex topics found in the academic world (Khlaif & Sahla, 2021). The TikTok social media app with its short videos is popular because it allows people to capture memorable moments that range from a few seconds to a few minutes (Zhang et al, 2019). Short TikTok videos are changing the way skills are taught and learned among people with similar attributes by enabling new forms of communication through visually appealing material (Khlaif & Sahla, 2021). When a learner has an interest in learning on TikTok, then TikTok will automatically bring up similar content, so that learners will constantly experience learning activities with TikTok. Therefore, social media, especially TikTok, can improve academic achievement if used as a learning medium. In addition to TikTok, many studies have explained that WhatsApp is strongly related to academic achievement (Nitza & Roman, 2016). This is because WhatsApp has one of the features to interact in groups, namely the group feature. According to research (Reyes et al., 2020; Pinto et al., 2022), interactions developed through WhatsApp groups improve student performance. By learning in groups, the learning experienced by students is greatly assisted (Suárez- Lantarón et al., 2022). Based on this explanation, if used as a learning interest, social media can have a positive and significant effect on academic achievement. The implication that must be implemented by teachers at MTs Bi'ru'ul Ulum Gedangan Sidoarjo is that they must pay more attention to social media in terms of its use. Teachers can provide a stimulus that can create a good response to the use of social media. The role of the teacher as a stimulus provider can be implemented one of them by channeling social media content related to subject matter. The

implementation of good social media utilization activities by students on the basis of stimulus from teachers, creates an increase in student understanding, thus leading to an increase in student academic achievement in this school.

■ CONCLUSION

This finding underscores the importance of a holistic approach in improving academic achievement of junior high school students, which not only focuses on cognitive aspects but also on character development, creativity, academic motivation, and the wise use of social media. Based on the results of the research and discussion that has been presented, all hypotheses contained in this study can be accepted. The whole explanation can be concluded that 1) Character education has a significant and positive effect on the academic achievement, 2) Academic creativity has a significant and positive effect on the academic achievement, 3) Academic motivation has a significant and positive effect on the academic achievement, and 4) Social media has a significant and positive effect on the academic achievement. Overall, MTs Bi'ru'ul Ulum Gedangan Sidoarjo can implement the implications for paying attention to academic achievement by ensuring the implementation of policies for integrating character education values runs effectively, increasing adequate and stable resources and infrastructure, and creating stimulus by channeling social media content related to subject matter. Future research can carry out research that focuses on all the variables of the current study, but uses Alpha Generation subjects.

■ REFERENCES

- Abdelrahman, R. M. (2020). Metacognitive awareness and academic motivation and their impact on academic achievement of ajman university students. *Heliyon*, 6(9), 1-8.
- Adjin-Tetty, T. D., D. Selormey., & H. A. Nkansah. (2022). Ubiquitous technologies and learning: exploring perceived academic benefits of social media among undergraduate students. *International Journal of Information and Communication Technology Education (IJICTE)*, 18(1), 1-16.
- Agustina, E. T., A. Y. Wahyudin., & A. A. Pratiwi. (2021). The students' motivation and academic achievement at tertiary level: a correlational study. *Journal of Arts and Education*, 1(1), 29-38.
- Akpur, U. (2020). Critical, reflective, creative thinking and their reflections on academic achievement. *Thinking Skills and Creativity*, 37(10), 1-8.
- Al-Sawy, Y. M., & F. M. Al-Madani, (2021). Role of social media in academic achievement among northern border university students. *Amazonia Investiga*, 10(38), 20-32.
- Amalia, A. N., & S. Supriyad. (2023). The influence of social media and digital literacy on students' learning achievement in economics subjects. *International Journal of Business, Law, and Education*, 4(2), 1560-1566.
- Aspiani, A., M. I. T. Tahir, A. A. Sulolipu., & E. Elpisah. (2023). Pengaruh pendidikan karakter, kreativitas belajar dan motivasi belajar terhadap prestasi belajar siswa. *Jurnal Ecogen*, 6(2), 234-243.
- Astatke, M., C. Weng., & S. Chen. (2023). A literature review of the effects of social networking sites on secondary school students' academic achievement. *Interactive Learning Environments*, 31(4), 2153-2169.
- Austin, A. C., N. B. Hammond, N. Barrows, D. L. Gould., & I. R. Gould. (2018). Relating motivation and student outcomes in general organic chemistry. *Chemistry Education Research and Practice*, 19(1), 331-341.
- Azizah, S., M. B. N. Wajdi, U. Farida, D. Junus, I. Harianti, S. N. L. Chusna., & T. T. Zuono. (2019). Blog implications as

- learning media in improving learning achievement of students. *Journal of Physics*, 11(1), 1-6.
- Bandura, A. (1962). *Social learning through imitation*. Nebraska Press, California.
- Barth, A., & J. Blasius. (2021). *Quantitative methods*. Walter de Gruyter GmbH, Berlin.
- Birhan, W., G. Shiferaw, A. Amsalu, M. Tamiru., & H. Tiruye. (2021). Exploring the Context of Teaching Character Education to Children in Preprimary and Primary Schools. *Social Sciences & Humanities Open*, 4(1), 100171.
- Bloom, B. S. (1976). *Taxonomy of educational objectives: the cognitive domain*. David Mckay Company, New York.
- Caratiquit, K. D., & L. J. C. Caratiquit. (2023). Influence of social media addiction on academic achievement in distance learning: intervening role of academic procrastination. *Turkish Online Journal of Distance Education*, 24(1), 1-19.
- Choriyeva, D. (2022). Description, Didactic Requirements and Conditions of Subjects That Develop Students' creative Abilities Related of General Professional Subjects. *Science And Innovation*, 1(6), 296-298.
- Efendi, R., A. R. Ningsih., & P. S. Siregar. (2020). *Pengaruh pendidikan karakter terhadap prestasi belajar siswa kelas tinggi sd negeri 006 rambah samo. Primary: Jurnal Pendidikan Guru Sekolah Dasar*, 9(4), 555-563.
- Efferi, A. (2014). *Dinamika persaingan antar lembaga pendidikan*. *Quality*, 2(1), 96-116.
- Ejiobi-Okeke, B. I., & N. N. Samuel. (2021). Achievement motivation and locus of control as predictors of secondary school students' academic achievement in chemistry in enugu state, Nigeria. *IOSR Journal of Research & Method in Education*, 11(4), 27- 34.
- Fajari, L. E. W. (2020). Student critical thinking skills and learning motivation in elementary students. *Journal of Physics: Conference Series*, 1440(1), 1-8.
- Fak-on, S., & B. Chobthamdee. (2020). A study of learning achievement using social media and digital video of students in the faculty of education. *International STEM Education Conference*, 12(5), 63-65.
- Filgona, J., J. Sakiyo, D. M. Gwany., & A. U. Okoronka. (2020). Motivation in learning. *Asian Journal of Education and Social Studies*, 10(4), 16-37.
- Fudhla, A., C. Caska., & S. Suarman. (2023). The influence of using social media on students' motivation and learning achievement in economics subjects at daarun nahdhah thawalib bangkinang islamic boarding school. *Journal of Educational Sciences*, 7(4), 663-674.
- Gupta, P. K., & R. Mili. (2017). Impact of academic motivation on academic achievement: a study on high schools students. *European Journal of Education Studies*. 2(10), 43-51.
- Halizah, S. N., E. A. Sinambela, D. Darmawan., & R. Mardikaningsih. (2022). The influence of entrepreneurship education, self-efficacy, locus of control and achievement motivation on entrepreneurial intention. *Studi Ilmu Sosial Indonesia*, 2(2), 47-58.
- Hanifah, N., A. Salam., & D. Dewantara. (2021). The effect of adversity quotient and attitudes of students on the student's physical learning achievements. *Jurnal Pena Sains*, 8(1), 1-7.
- Hermino, A., & I. Arifin. (2020). Contextual character education for students in the senior high school. *European Journal of Educational Research*, 9(3), 1009-1023.
- Intania, E. V., & S. Utama. (2020). The role of character education in learning during the covid-19 pandemic. *Jurnal Penelitian Ilmu Pendidikan*, 13(2), 129-136.
- Izzati, U. A., B. S. Bachri, M. Sahid., & D. E. Indriani. (2019). Character education:

- gender differences in moral knowing, moral feeling, and moral action in elementary schools in Indonesia. *Journal for the Education of Gifted Young Scientists*, 7(3), 547-556.
- Jabbar, H., C. J. Fong, E. Germain, D. Li, J. Sanchez, W. L. Sun., & M. Devall. (2022). The competitive effects of school choice on student achievement: a systematic review. *Educational Policy*, 36(2), 247-281.
- Jamaluddin, A. B., S. Zubaidah, S. Mahanal., & A. Gofur. (2021). Character, creative thinking and learning achievement in higher education: how they are correlated. *AIP Conference Proceedings* 2330(1), 1-8.
- Kalita, R. (2023). Education and Motivation: How to Make Students Interested. *International Journal for Multidisciplinary Research*, 5(2), 1-4.
- Karnaen, A. (2013). The policy of moral education on kh imam zarkasyi's thought at gontor modern islamic boarding school. *Jurnal Pendidikan Islam*, 3(1), 163.
- Khairil, M., & M. I. Yusaputra. (2019). *Efek ketergantungan remaja k-popers terhadap media sosial di kota palu*. *Jurnal Aspikom*, 4(1), 14-25.
- Khlaif, Z. N., & S. Salha. (2021). Using tiktok in education: a form of micro-learning or nano-learning?. *Interdisciplinary journal of virtual learning in medical sciences*, 12(3), 213-218.
- Krücken, G. (2021). Multiple competitions in higher education: a conceptual approach. *Innovation*, 23(2), 163-181.
- Lastri, L., S. Kartikowati., & S. Sumarno. (2020). Analysis of factors that influence student learning achievement. *Journal of Educational Sciences*, 4(3), 679-693.
- Lickona, T. (2001). *Whatis Effective Character Education*. The Stony Brook School, New York.
- Liem, G. A. D. (2021). Achievement and motivation. *Educational Psychology*, 41(4), 379-382.
- Liu, J., P. Peng., & L. Luo. (2020). The relation between family socioeconomic status and academic achievement in china: a meta-analysis. *Educational Psychology Review*, 32(2), 49-76.
- Mubiar, M., N. B. Mamat., & E. Syaodih. (2020). Exploring kaulinan barudak to develop children's character values in islamic early childhood education. *Jurnal Pendidikan Islam*, 6(1), 13-26.
- Muhajir, A. A. (2022). Inclusion of pluralism character education in the islamic modern boarding schools during the pandemic era. *Journal of Social Studies Education Research*, 13(2), 196-220.
- Nitza, D., & Y. Roman. (2016). WhatsApp messaging: achievements and success in academia. *International Journal of Higher Education*, 5(4), 255-261.
- O'Sullivan, M. (2021). Innovation and creativity. *Cambridge Assessment International Education*, 8(3), 53-74.
- Omiyefa, M. O. (2021). Action learning strategy and students' knowledge of character education concepts in social studies. *Anatolian Journal of Education*, 6(1), 67- 68.
- Pasi, K. M., R. Rasyidin., & R. M. Harahap, (2020). Education system of modern islamic boarding school in the postmodern era. *Nazhruna: Jurnal Pendidikan Islam*, 3(3), 311-323.
- Peng, R., & R. Fu. (2021). The effect of chinese efl students' learning motivation on learning outcomes within a blended learning environment. *Australasian Journal of Educational Technology*, 37(6), 61-74.
- Pinto, A. C. P., R. de Sousa Gondim, de M. Lima Brito, E. M. de Barros Filho, F. H. L. Vasconcelos., & A. B. C. Gondim. (2022). O aplicativo whatsapp em contextos educativos de letramento digital: uma revisão sistemática da literatura.

- Research, Society and Development*, 11(5), 59211528752. Priarni, R. (2017). *Aplikasi total quality management dalam lembaga pendidikan islam. INSPIRASI: Jurnal Kajian dan Penelitian Pendidikan Islam*, 1(2), 185-202.
- Priyanto, D., & A. Dharin. (2021). Students' creativity development model and its implementation in Indonesian Islamic elementary schools. *Pegem Journal of Education and Instruction*, 11(3), 81-87.
- Rahayu, R., R. Rosita, Y. S. Rahayuningsih, A. H. Hernawan., & Prihantini. (2022). Implementation of independent curriculum in driving school. *Jurnal Basicedu*, 6(4), 6313–6319.
- Rahman, C. A., S. Winarsih., & I. Ikhwan. (2024). The influence of character education on learning achievement in economic subjects of grade X students in SMA Sandikta Bekasi City. *Soedirman Economics Education Journal*, 6(1), 50-59.
- Rais, D., & Z. Xuezhi. (2024). Elevating student engagement and academic performance: a quantitative analysis of Python programming integration in the "Merdeka Belajar" curriculum. *Journal on Mathematics Education*, 15(2), 495-516.
- Reyes, B. C., N. G. Ortega-Sánchez., & M. J. P. Hurtado. (2020). Trabajo colaborativo mediante la aplicación de WhatsApp para el aprendizaje. *Boletín Científico INVESTIGIUM de la Escuela Superior de Tizayuca*, 5(10), 15-21.
- Riswanto, A., & S. Aryani. (2017). Learning motivation and student achievement: description analysis and relationships both. *The International Journal of Counseling and Education*, 2(1), 42-47.
- Rustaman, N. Y., E. Afianti., & S. Maryati. (2018). STEM based learning to facilitate middle school students' conceptual change, creativity and collaboration in organization of living system topic. *Journal of Physics: Conference Series*, 1013(1), 1-8.
- Safarieh, M. (2020). Evaluation of relationship creativity with academic achievement in quantitative-descriptive evaluation. *Journal of Social Sciences and Humanities Research*, 8(3), 43-49.
- Sari, E. D. P., R. K. Trisnawati, M. F. Agustina, D. Adiarti, & N. Noorashid. (2023). Assessment of students' creative thinking skill on the implementation of project-based learning. *International Journal of Language Education*, 7(3), 414-428.
- Shukla, M. (2023). Quality enhancement in higher education institutions. *International Journal of Multidisciplinary Research and Analysis*, 6(2), 806-809.
- Singh, C. K. S., T. S. M. Singh, H. Ja'afar, O. E. Tek, H. Kaur, N. A. Moastafa., & M. Yunus. (2020). Teaching strategies to develop higher-order thinking skills in English literature. *International Journal of Innovation, Creativity and Change*, 11(80), 211-231.
- Sivrikaya, A. H. (2019). The Relationship between Academic Motivation and Academic Achievement of the Students. *Asian Journal of Education and Training*, 5(2), 309-315.
- Suárez-Lantarón, B., Y. Deocano-Ruiz, N. García-Perales., & I. S. Castillo-Reche. (2022). The Educational Use of WhatsApp. *Sustainability*, 14(17), 10510.
- Sumarni, W., & S. Kadarwati. (2020). Ethno-stem project-based learning: its impact to critical and creative thinking skills. *Jurnal Pendidikan IPA Indonesia*, 9(1), 11-21.
- Supena, I., A. Darmuki., & A. Hariyadi. (2021). The influence of 4C (constructive, critical, creativity, collaborative) learning model on students' learning outcomes. *International*

- Journal of Instruction*, 14(3), 873-892.
- Tatlah, I. A., T. M. Aslam, Z. Ali., & M. Z. Iqbal. (2012). Role of intelligence and creativity in the academic achievement of students. *International Journal of Physical and Social Sciences*, 2(1), 1-10.
- Tentama, F., & G. Arridha. (2020). Motivation to learn and employability of vocational high school students. *Journal of Education and Learning (Edulearn)*, 14(2), 301-306.
- Tezer, M., A. Ta'polat, K. Ö. Sami., & S. H. Fatih. (2017). The impact of using social media on academic achievement and attitudes of prospective. *International Journal of Cognitive Research in Science, Engineering and Education*, 5(2), 75- 81.
- Tymbaliuk, S. (2023). Features of the centers of academic success in us universities. *Educological Discourse*, 2(41) 307-324.
- Tzachrista, M., E. Gkintoni., & C. Halkiopoulos. (2023). Neurocognitive profile of creativity in improving academic performance scoping review. *Education Sciences*, 13(11), 1127.
- Uzochukwu, O. N., & E. I. Anierobi. (2020). The influence of social media on aggressive behaviours of in-school adolescents in anambra state. *Journal of the Nigerian Academy of Education*, 16(1), 179-292.
- Winarti, E. (2018). *Perencanaan manajemen sumber daya manusia lembaga pendidikan. Tarbiyatuna: Jurnal Pendidikan Ilmiah*, 3(1), 1-26.
- Wulandari, Y., S. Rustan, & D. Ilham. (2024). Unleashing student creativity: a dynamic look at merdeka belajar curriculum's impact. *International Journal of Asian Education*, 5(1), 21-33.
- Yahya, M., A. M. Radjab., & S. Satriyani. (2020). The effect of intellectual, emotional, and spiritual intelligence on the economic learning achievement of SMA Negeri 1 Soppeng. *Journal of Educational Sciences*, 4(3), 560-574.
- Zhang, X., Y. Wu, & S. Liu. (2019). Exploring short-form video application addiction: socio-technical and attachment perspectives. *Telematics and Informatics*, 42, 101243.
- Zokaee, M., A. Baghbanian., & M. A. Nejad. (2020). Creativity impact on language achievement: a correlational study of iranian efl learners. *CIRCULO de Linguistica Aplicada a la Comunicacion*, 84(1), 1-12.