

Prevalence of Self-Regulated Learning in MBKM Program Students

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ABSTRAK

Perubahan konteks dalam proses belajar menjadi salah satu permasalahan yang dihadapi oleh mahasiswa yang mulai mengikuti program MBKM. Self-regulated learning memberikan kontribusi bagi siswa untuk mampu mengatur sendiri pembelajarannya sehingga siswa dapat meraih hasil yang optimal dalam melaksanakan program MBKM. Tujuan penelitian ini adalah untuk menganalisis prevalensi self-regulated learning pada siswa generasi Z dalam konteks pelaksanaan program MBKM. Metode penelitian yang digunakan adalah penelitian kuantitatif dengan desain survei. Teknik pengambilan sampel menggunakan stratified random sampling pada siswa MBKM di jurusan bimbingan dan konseling dengan total sample yang digunakan 57 mahasiswa program MBKM. Instrumen pengumpulan data berupa skala belajar mandiri. Analisis data penelitian menggunakan analisis deskriptif. Hasil penelitian menunjukkan bahwa sebagian besar mahasiswa yang merupakan generasi Z memiliki tingkat self-regulated learning dengan kriteria sedang atau bahkan masuk dalam kategori kriteria rendah. Perbedaan ketiga indikator atau dimensi self-regulated learning tersebut menunjukkan tidak terdapat perbedaan yang signifikan. Berdasarkan hasil studi ini memberikan rekomendasi terhadap pendampingan sebelum pelaksanaan program MBKM dilaksanakan.

ABSTRACT

Contextual changes in the learning process are one of the problems faced by students who start participating in the MBKM program. Self-regulated learning contributes to students being able to regulate their own learning so that students can achieve optimal results in implementing the MBKM program. The purpose of this study was to analyze the prevalence of self-regulated learning in generation Z students in the context of implementing the MBKM program. The research method used was quantitative research with a survey design. The sampling technique used stratified random sampling on MBKM students in the guidance and counselling department with a total sample of 57 MBKM program students. The data collection instrument was an independent learning scale. The analysis of the research data used descriptive analysis. The results of the study showed that most students who were generation Z had a level of self-regulated learning with moderate criteria or even fell into the low criteria category. The differences in the three indicators or dimensions of self-regulated learning showed no significant differences. Based on the results of this study, recommendations were provided for mentoring before the implementation of the MBKM program.

1. INTRODUCTION

Current developments require special skills in the output of graduates from tertiary institutions so as to improve the quality of tertiary institutions and the quality of graduating students (Allahviridiyani, 2011; Bunyamin & Alamsyah, 2016; Hersusetiyati & Chandra, 2022). Students in the era of industrial revolution 4.0 which is a development of the times with indications of changes in the use of technology so that at this time people can easily exchange information or communicate (Adha et al., 2020; Zain & Sailin, 2023). These changes in development have made it easier for people around the world to interact with each other, thereby expanding competition and collaboration in various fields. Individuals who are unable to accept the changes that occur will be eroded by the changes that occur (Bocoş et al., 2024; Kasali,

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2017). On the other hand, individuals who are able to adapt and accept all changes and developments that occur will find it easy to face and survive all the changes that occur. This is related to changes in the current context, which is the era of implementing the MBKM program, where students must be able to adapt to the pattern of implementing the MBKM program they are participating in (Christanti & Sukoco, 2022; Eriyanti et al., 2022). Furthermore, students are given the freedom to determine which MBKM program they will take so that in implementing it, self-regulation in students' learning becomes one of the keys to determining their success (Febrianti et al., 2022). One way to survive and adapt to the changes and developments that occur is to have individual skills, both soft skills and hard skills (Manara, 2014; Muslihati et al., 2023; Sabri, 2014). These skills are useful as values for individuals to be able to compete in the current era, especially in the competitive world of work and industry (DUDI) (Cahyanto & Afifulloh, 2021; Yulianto et al., 2022). The challenges of current developments provide new changes regarding the achievements of each individual in the learning process. In essence, teaching in higher education is oriented or aims at the aspect of strengthening students' independence in facing the post-college period or the world of work later. Students who are currently at the higher education level are those who belong to generation Z. The characteristics of generation Z are individuals who are accustomed to living side by side with technology so that they have the potential to use technology in the learning process (Salleh et al., 2017; Saputra & Ramli, 2024; Sobri et al., 2023).

The tendency of Generation Z characteristics to be proficient in using technology is a supporting factor in making the learning process easier (Jaciow & Wolny, 2021; Mark McCrindle, 2018; Ramli et al., 2023). However, this condition will boomerang for generation Z students if they do not have good self-regulation in the learning process. In implementing learning, learning and achieving the expected skills so that students can contribute and have competitiveness in the era of industrial revolution 4.0, good self-regulation in learning or self-regulated learning is needed (Filianti et al., 2020; Parahita et al., 2023; Zimmerman, 2000). Self-regulation in learning is the ability between thoughts, feelings and actions to make plans and adapt continuously in achieving the expected goals, especially in learning. Individual manages their emotions, then their thoughts and behavior will be carried out using strategies and skills called self-regulation. The self-regulation that each individual has in managing himself is the basic foundation for achievement and facilitates the skills needed for academic results (Blair & Raver, 2015; Murniati et al., 2023; Waharjani et al., 2023). The individual's ability to manage his cognition, emotions and behavior aims to carry out consistent behavior in maintaining the achievements that have been obtained as well as maintaining the standard values obtained as well as downstream consequences such as achievement of the learning or educational process (Moffitt et al., 2011; Ren et al., 2024; Robson et al., 2020). Self-regulated learning is a part that consists of several stages in the application of metacognitive, motivational, emotional and behavioral processes used to obtain the expected goals (Bostwick et al., 2020; Dudu & Vhurumuku, 2012). Metacognition is an important process because in understanding metacognition individuals can do it themselves, such as organizing events that will later be faced and choosing strategies to suit the desired performance (Kusaeri & Mulhamah, 2016; Teng, 2022). Motivation contributes in the form of encouragement to individuals to carry out their wishes in completing tasks. Meanwhile, behavior is a manifestation of cognitive and motivation in the form of actions to achieve expected goals. Individuals who have self-regulation make it possible to plan to achieve goals, maintain attention when solving problems, maintain motivation when facing setbacks and resist external temptations or distractions (Kristiyani, 2016; Panadero, 2017).

The development of self-regulated learning in students is very important for achieving academic results and achieving skills to have competitiveness during the study period for students (Kryshko et al., 2020; Sutarni et al., 2021). When self-regulation increases along with autonomy, the difficulty of the learning process and the structure of the educational curriculum in higher education change substantially. These three aspects are an inseparable part of self-regulated learning which will later be influenced by factors including (1) Individual, including the influence on students' understanding, goals, knowledge, and cognitive processes; (2) Behavior; including self-assessment, self-reaction, self-observation and (3) Environment, relating to parenting patterns, conditions, facilities, support, responses given (Dami & Parikaes, 2018; Eccles & Roeser, 2011). A more in-depth study is needed to find out the picture of self-regulated learning that individuals have so that in the future it can become a basis for developing special intervention or mentoring processes. This study answers the problem of what is the basis for students' inadequacies in implementing the MBKM program so that it can be the basis for making decisions or implementing services that are in accordance with conditions and needs.

2. METHOD

This research is quantitative research with a survey research design which contributes to describing the conditions and characteristics of a study (Sugiyono, 2019). The main focus of this research

is self-regulated learning, the aim of the research is to describe the prevalence of self-regulated learning in generation Z students in the implementation of the MBKM program. The population of this research is Guidance and Counseling students who take part in the MBKM program. The sample in this study amounted to 57 people with a sampling technique using stratified random sampling.

Data collection was carried out online with the help of a Google form and using a data collection instrument in the form of a self-regulated learning scale which was developed by adapting it based on previously existing theory and research. Validity and reliability tests of the instrument were carried out on 36 respondents. The results of the validity test with Product Moment show that the total r count for items 1 to 27 $>$ r table 0.329 so that all items are declared valid, while the reliability results of the self-regulated learning instrument with the Cronbach Alpha value show $0.946 > 0.60$, which means the items in the instrument self-regulated learning is said to be reliable or consistent.

Analysis of research data uses descriptive analysis which focuses on describing a picture of an event or phenomenon. The presentation of data analysis uses the help of the IBM SPSS version 25 application and is carried out in percentage terms to present data on very low, low, medium and high criteria. Self-regulated learning scoring criteria is show in [Table 1](#).

Table 1. Self-Regulated Learning Scoring Criteria

Criteria	Score
High	89 - 108
Currently	68 - 88
Low	48 - 67
Very low	27 - 47

3. RESULTS AND DISCUSSION

Result

The results of survey research with a sample of 57 students belonging to generation Z and students taking part in the MBKM program were to determine the level of self-regulated learning. The measurement of self-regulated learning is presented in the form of descriptive analysis in the form of percentages and processed results from the IBM SPSS version 25 application in [Table 2](#).

Table 2. Statistical Results of Self-Regulated Learning

Variable	N Statistic	Minimum Statistic	Maximum Statistic	Mean		Std. Deviation Statistic
				Statistic	Std. Error	
Self-Regulated Learning	57	66.00	107.00	82.4211	1.19049	8.98798
Valid N	57					

Based on [Table 2](#) show the results of statistical data analysis with a minimum statistical value of 66.00 and a maximum value of 107.00 with a statistical std deviation of 8.98798. [Figure 1](#) presents a comprehensive picture of the self-regulated learning of Generation Z students.

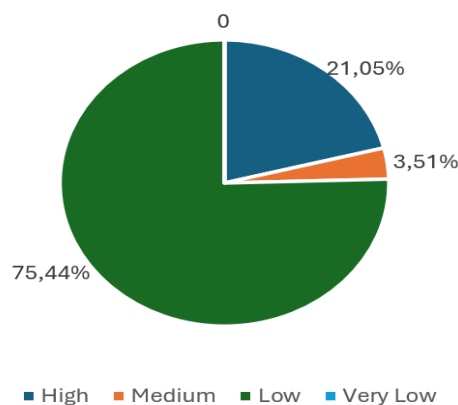


Figure 1. Overview of Student Self-Regulated Learning

Based on [Figure 1](#), the survey results, it shows that 21.05% of students who participate in the MBKM program are in the high category for self-regulated learning skills; for the medium category it was 75.44%; the low category is 3.51% and the very low category is 0%. This condition is based on the conditions that have been obtained, MBKM program students need related services to improve their self-regulated learning skills so that they can contribute to themselves who are generation Z, this aims to achieve results in the implementation of learning which aims to ensure that students can achieve the skill standards required in the current era of development. The results of the percentage analysis of self-regulated learning are presented in [Table 3](#).

Table 3. Percentage of Self-Regulated Learning Data

Variable	High	Medium	Low	Very Low
Self-Regulated Learning	22%	62%	15%	1%
Cognitive	24%	59%	16%	0%
Motivation	20%	63%	16%	1%
Behavior	22%	64%	13%	1%

[Table 3](#) showing the overall trend percentage for the self-regulated learning variable as well as the percentage for each indicator which includes cognitive; motivation and behavior. The first indicator, namely cognitive, shows that the majority are in the medium category at 59%, in the high category 24%, in the low category 16% and very low 0% or none. The second indicator is the motivation dimension with the largest prevalence in the medium category at 63%, high at 20%, low at 16% and very low at 1%. Meanwhile, the third indicator, namely the behavioral dimension, has the largest prevalence in the medium category at 64%, the high category at 22%, the low at 13% and the very low at 1%.

Discussion

Self-regulated learning makes an important contribution to the implementation of the learning process and learning outcomes for students ([Feraco et al., 2022](#); [Liebendörfer et al., 2023](#); [Shen et al., 2023](#)). Pintrich defines learning self-regulation as a constructive process that occurs in individuals in setting goals in the learning and learning process as well as how individuals carry out the process of monitoring, regulating and controlling cognitively, motivationally, levels of motivation and how behavior carried out in the learning process is limited by context and objectives that have been designed with existing environmental constraints. Self-regulation is a process and stage in which individuals carry out the process of activating and maintaining thinking (cognitive), individual behavior, and how they can influence the achievement of goals in a detailed and measurable way ([Lee et al., 2019](#); [Zimmerman, 2000](#)).

In essence, self-regulated learning is a process of self-regulation which involves the process of how individuals exercise control over thoughts, feelings in the form of motivation and the actions they carry out in learning activities ([Greene et al., 2020](#); [Toering et al., 2012](#)). Research result of previous study suggests that in research related to self-regulated learning (SLR) by measuring cognitive, motivational and emotional aspects of individuals in different phases of the cycle ([Koivuniemi et al., 2021](#)). The results of other research explain that self-regulation of learning is a process that includes cognitive, metacognitive, motivation and emotion in the learning process ([Liu et al., 2024](#); [Panadero, 2017](#)).

The first indicator relates to the cognitive dimension which includes self-awareness of learning, evaluation in learning and planning of learning. The cognitive aspect focuses on how a student organizes planning to improve good learning outcomes ([Faruq et al., 2021](#); [Koivuniemi et al., 2021](#)). The role of cognitive indicators provides encouragement related to individual understanding, reflection and planning regarding the learning process. Furthermore, the second indicator is the motivation dimension which consists of setting learning goals, confidence in one's abilities and persistence in learning. This component focuses on expressing positive or negative feelings about the task, the situation and oneself ([Graaf et al., 2021](#); [Putri et al., 2024](#)). Cognitive coverage provides space for students to be able to manage learning awareness, learning planning and how to carry out evaluations in implementing the MBKM program.

Then the final indicator is behavior which consists of implementing learning strategies, optimizing learning resources and conditioning the learning environment. Students control the behavior that arises during the learning process so that it can support the achievement of learning goals. This behavioral dimension will influence the effectiveness of the learning process ([Abdul Rahim et al., 2024](#); [Ceron et al., 2021](#)). Based on the dimensions of the research results, the indicators of self-regulated learning include cognitive, motivational and behavioral indicators, each of which has a role to play in achieving goals in the learning process. These conditions are required by students who take part in the MBKM program in planning and implementing the MBKM program chosen by the student. Each indicator

contained in the self-regulation competency in learning provides encouragement to students who take part in the MBKM program to become strong and clear individuals literally in the learning process carried out (Masithoh et al., 2022; Nan Cenka et al., 2024).

The condition or level of self-regulated learning possessed by students makes a significant contribution to student self-regulation in the learning process (Kizilcec et al., 2017; Lee et al., 2020; van Harsel et al., 2022). Furthermore, these conditions are needed for every student to be able to regulate themselves in the learning process. Self-study is a process of managing a person's self to be able to receive information and develop what he gets (Arista & Abbas, 2022; Dagdag et al., 2024). Just as every indicator contained in self-regulated learning shows how the learning process takes place, it does not necessarily mean that the learning process can produce something but requires a cognitive process, motivation which then becomes a behavior or activity carried out by the individual (Muwonge et al., 2020; Rahmah & Permatasari, 2022). Learning is not only a process of how individuals gain knowledge but how individuals can organize themselves in such a way that they can achieve a learning process that is in accordance with the expected goals. Self-regulation skills in learning are one of the competencies possessed by individuals, especially in this MBKM program, which will facilitate individual learning conditions (Tur et al., 2024; Vhalery et al., 2022).

The characteristics of the MBKM program are diverse by giving students the freedom to take part in a program that suits them and aims to support their future careers (Budiarti et al., 2022; Ginaya et al., 2021). Meanwhile, in the context of the development of the industrial revolution 4.0, changes and developments in various fields require special skills to be able to compete globally. Apart from that, the characteristics of generation Z with expertise in using technology and easy to adapt quickly support them to compete in the era of industrial revolution 4.0 (Gharzai et al., 2020; Putriani & Hudaidah, 2021). Furthermore, in line with the implementation of the MBKM program, it requires independence for students to be able to optimize their potential in accordance with their expectations (Mogas et al., 2022; Tuasikal et al., 2021). In this context, students as generation Z need good or high self-regulation in learning so that they can be optimal in implementing the MBKM program (Febrianti et al., 2022; Purwadi & Saputra, 2023). This is in harmony and will be maximized if accompanied by an increase in the prevalence of self-regulated learning in students who still show the medium, low and very low categories.

The level of self-regulated learning in students will contribute to how students plan and implement the MBKM program. Based on the research results above, it shows that the profile or condition of self-regulation in learning possessed by MBKM program students tends to be low, so special assistance and services are needed to help MBKM students have high learning regulation. If it is related to the preparation and implementation of the MBKM program in tertiary institutions by providing services in the form of guidance or counseling through the guidance and counseling service unit at tertiary institutions. Guidance services are provided to prepare and prevent students from experiencing problems related to self-regulation in learning when implementing the MBKM program. Furthermore, if there are problems experienced by students taking part in the MBKM program related to self-regulation in learning, counseling services can be provided. Further research is needed to analyze, design and devise efforts to increase self-regulation in the learning of MBKM program students.

4. CONCLUSION

Self-regulated learning is a student's ability to self-regulate in achieving learning goals. The scope of self-regulated learning is described in three indicators, cognitive, motivational and behavioral. Cognitive indicators are shown by their role in awareness of learning new things, solving problems and evaluating the learning process. The dominant form of motivation is prioritizing specific goals for the future, confidence in abilities by learning according to interests and looking for something new to learn. Meanwhile, the indicators reflect that students tend to try to eliminate learning difficulties, improve learning weaknesses and identify how to learn effectively. The self-regulated learning tendency of generation Z students needs to be improved to achieve optimal learning goals so that they can have competitive in the era of the industrial revolution 4.0. One way is through a process of self-awareness among students themselves to begin understanding, planning and implementing self-regulation of learning in the activity process in the MBKM program.

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