

## Analysis of External and Internal Factors Causes of Student Learning Difficulties and Their Relation to Biology Learning Outcome in MAN 3 Padang

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Received January 19, 2023; accepted March 22, 2023; published March 30, 2023

### ABSTRACT

This study aims to determine the external factors and internal factors that cause learning difficulties and their relationship with the learning outcomes of Biology class XI IPA MAN 3 Padang. The change in the online learning process to offline learning since the Covid-19 pandemic has had an impact on external factors and internal factors that cause learning difficulties that affect student learning outcomes. This type of research is descriptive with quantitative research methods. The study was carried out at MAN 3 Padang with a population of 165 students of class XI science who were registered in the even semester of the academic year 2021/2022, with a sample of 33 students. The sampling technique is random sampling, which is done randomly, using an error rate of 5%. Data collection in this study used a questionnaire containing statements of external factors and internal factors of students' learning difficulties using a Likert scale, and documents on students' learning outcomes for Biology in the even mid-semester exams for the 2021/2022 academic year. From the results of the study, it is known that the level of learning difficulties for external factors obtained an average value of 3.52 in the high category, while the level of learning difficulties for internal factors had an average value of 3.26 in the high category. The results of the Pearson product moment correlation test using the SPSS 20 program obtained a value on the external factor of 0.073 which is strongly correlated and the form of the relationship is negative and the internal factor has a value of 0.910 which is perfectly correlated with the negative relationship between external factors and internal factors with Biology learning outcomes in students. class XI IPA MAN 3 Padang. The results of the t test showed that the external factor tcount was -1.853 and the internal factor tcount was -113 indicating that there was no influence of external factors and internal factors (X) on students' Biology learning outcomes (Y).

### KEYWORDS

Learning  
 Difficulties  
 Learning  
 Outcomes  
 Biology

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### 1. Introduction

Indonesia in 2020 was hit by an outbreak of the Covid-19 pandemic which caused a very large increase in the death rate. Unlike viruses in general, this virus spreads quickly from individual to individual through physical contact, etc. This pandemic caused many changes in all sectors of human life activities. The Indonesian government swiftly responded to this situation by locking down some public places.

Currently, all Indonesian people are given such free time to enjoy their lives. If all this time they have been required to live in a busy and fast-paced situation, work non-stop, then now is the time for the whole community to take a short break, and pay attention to health during this Covid-19 pandemic (Mastur, 2020). But not with education. Because education is one of the businesses that plays an important role in developing and advancing every nation. Without education in a nation, that nation will be considered a country that has no position anywhere. And what is even more worrying is that a nation will be very easily colonized by other countries, simply because of the low quality of education.

In the learning process, normally there is interaction between the teacher and students and there is a reciprocal relationship between the teacher and students in a

conducive and educative classroom situation due to the constraints caused by the Covid-19 pandemic. students' difficulties in dealing with the learning process.

Learning difficulties are not only caused by low intelligence but can also be caused by non-intelligence factors (Ahmadi and Supriyono, 2004). These factors can come from within the student (internal) or from outside the student (external). Internal factors that can cause learning difficulties include health, disability, intelligence, talents, interests, mental health, and special types of learning. While the external factors include the influence of the family, school, and community environment (Caryono and Suhartono, 2012).

According to (Slameto, 2010: 54), the internal factors of learning are physical factors, psychological factors, and fatigue factors. While the external factors of learning are family factors, school factors, and community factors.

Based on observations made at MAN 3 Padang on March 4 2022, it is known that learning difficulties at this time are the implementation of a hybrid system, where the teacher only uses WhatsApp grub media, because of that the teacher does not know whether the material provided has been conveyed properly. When the teacher wants to use learning media such as zoom, google meet, many students cannot use it with the problem of insufficient cellphone memory and the family's financial condition does not support buying a cellphone.

Based on the results of interviews with Biology teachers in class XI IPA, it is known that during the learning process, 50% of students did not pay attention to the teacher when explaining material in front of the class or WhatsApp grub and students were not punctual in submitting assignments given.

When the teacher asked about learning material, 50% of students could not answer the question. This shows a lack of attention, interest, motivation and concentration in student learning when participating in Biology lessons so that student activity can be seen in the process. This can also be caused because the method used by the teacher is not appropriate so that students are less active in the learning process.

## 2. Method

This type of research is descriptive research, with a quantitative research method with a correlation approach that analyzes the relationship between two variables, namely external factors and internal factors of students' learning difficulties with the results of Biology class XI IPA MAN 3 Padang. Collecting data in this study using three methods including observation, interviews, and questionnaires. Furthermore, research instrument testing was carried out including the validity test of the questionnaire, analysis of the reliability test of the questionnaire. after all the data has been collected the next step is to analyze the data which consists of descriptive analysis, normality test, homogeneity test, hypothesis testing.

## 3. Results and Discussion

Based on the results of data acquisition, the results of research regarding the analysis of external and internal factors that cause learning difficulties with Biology learning outcomes in class XI IPA MAN 3 Padang will be described. In this study, there were 33 students who were sampled from a population of 165 students. Each respondent who was the sample in this study filled out a questionnaire on external (X<sub>1</sub>) and internal (X<sub>2</sub>) factors causing difficulty in learning Biology. Data on students' Biology learning outcomes (Y) were obtained from the even-numbered midterm exam scores for the 2021/2022 academic year.

The results of the t test obtained tcount  $-1.853 < t_{table} 2.043$  for external factor variables and tcount  $-113 < t_{table} 2.043$  for external factor variables then H<sub>0</sub> was accepted and H<sub>1</sub> was rejected. This means that there is no influence of external and internal factors on learning outcomes significantly in class XI IPA MAN 3 Padang students.

Then the t test and f test were carried out to test the significance of the product moment correlation in SPSS 20. If the price of  $t_{count} > t_{table}$  at the real level  $\alpha = 0.05$  then there is a significant relationship. The relationship is not significant if  $t_{count} < t_{table}$ . From the results of the t test conducted, the following results were obtained:

Tabel 1. Coefficients

Model	Unstandardized Coefficients		Standardized Coefficients		t	Sig.
	B	Std. Error	Beta			
1 (Constant)	75.877	7.574			10.018	.000
x1	-.260	.140	-.316		-1.853	.073

F test of external and internal factors of learning difficulties

Tabel 2. Anova

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	1.060	1	1.060	.013	.910 <sup>b</sup>
Residual	2550.455	31	82.273		
Total	2551.515	32			

In accordance with Table 4.10, namely the results of the f test from the data above it can be seen that the significance value for external factors (X1) and internal (X2) on learning outcomes (Y) is  $0.910 > 0.005$  and f count  $0.013 < f_{table} 3.32$ , this prove that  $H_0$ : accepted and  $H_1$ : rejected. meaning that there is no significant influence of external factors (X1) and internal factors (X2) on learning outcomes (Y).

#### 4. Conclusion

The results of the calculation of external factors show that the mean (average) value of the family factor has a value of 3.34 in the low category and the standard deviation has a value of 12.27, then for the school factor it has an average value of 4.01 in the high category and the standard deviation has a value of 11.01 and the community factor has an average value of 3.23 in the low category and the standard deviation has a value of 6.26 on external factors causing learning difficulties for class XI IPA MAN 3 Padang. As well as the results of internal factor calculations, the mean (average) value of the health factor has a value of 2.95 in the low category and the standard deviation has a value of 48.73, then for psychological factors it has an average value of 3.71 in the high category and the standard deviation has a value of 46.75 and the fatigue factor has an average value of 3.12 in the low category and the standard deviation has a value of 41.31 in the internal factors that cause learning difficulties in class XI IPA MAN 3 Padang.

From the calculation of the t test, the value of the external factor variable is -1.853 and the internal factor variable is -1.13. This means that there is no significant relationship between external factors and internal factors with the Biology learning outcomes of class XI IPA MAN 3 Padang. It can be concluded that external factors and internal factors cause student learning difficulties and their relationship with Biology class XI IPA MAN 3 Padang learning outcomes do not contribute well.

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