

# The Impact of LSSR Policy on the Anxiety Level of Undergraduate Students during COVID-19

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***Abstract: Coronavirus Disease (Covid-19) is an infectious disease caused by the new corona virus and causes most sufferers to experience respiratory disease. The current situation of Covid-19 until December 15, 2020 is known to be 623,309 people in Indonesia who have been confirmed as infected Covid-19. As a result of the continuous increase in the number of confirmed Covid-19 cases, the government implemented a LSSR policy to prevent the spread of Covid-19. However, this policy is felt to have a negative impact on the education sector, especially for undergraduate students. This research was an observational analytic study using a cross-sectional method located in cities and districts in East Java Province and was conducted from August to November 2020. The population in this study were all final semester students domiciled in East Java in 2020 with the number a sample of 385 people. This study was conducted to determine the effect of LSSR policy on the level of anxiety of final semester students in East Java. This study found that there was a significant influence between the implementation of the LSSR policy and the level of student anxiety in the final semester in East Java that was positive. This means that if there is an increase in the effect of the implementation of the LSSR policy on respondents, the level of anxiety will also increase.***

***Keywords: LSSR Policy, Covid-19, Anxiety, Undergraduate Students, Lockdown***

## 1. INTRODUCTION

Coronavirus Disease (Covid-19) is a contagious disease caused by the new corona virus and causes most sufferers to experience mild to moderate respiratory disease in a condition without comorbidities<sup>[1]</sup>. Covid-19 predominantly attacks the elderly population with comorbidities such as diabetes mellitus, immune disorders, chronic respiratory disease and cardiovascular disease<sup>[2]</sup>. Covid-19 spreads and transmitted directly from human to human through droplets released when coughing or sneezing<sup>[3]</sup>. The current situation of Covid-19 is not only a concern of Indonesia, but also be a concern of all countries in the world. As of December 15, 2020, it is known that there are 623,309 people in Indonesia and 71,051,805 people in the world who have been confirmed as infected with the Covid-19 virus<sup>[4]</sup>.

Seeing the increasing number of Covid-19 cases which are increasingly worrying, the Indonesian government has issued various kinds of policies, one of which is Large-Scale Social Restrictions (LSSR) policy. LSSR is a limitation on certain activities of residents in an area that is suspected of being infected with a disease and/or contamination in such a way as to prevent the possibility of spreading disease or contamination<sup>[5]</sup>. The implementation of the LSSR includes school and workplace dismiss; restrictions on religious activities; restrictions on activities in public places or facilities; restrictions on social and cultural activities; restrictions on transportation modes; and restrictions on other activities specifically related to defense and security aspects. The Regional Government in implementing the LSSR policy have coordinates with relevant agencies, including law enforcement officials, security forces, manager/persons in charge of health facilities, and local logistics agencies.

The LSSR policy in Indonesia has a system that is almost similar to lockdown in other countries. However, in its implementation the LSSR policy is more like a partial lockdown implemented in Vietnam<sup>[6]</sup>. The LSSR policy application to control the spread of Covid-19 has an impact on all the life aspects of the Indonesian people. One of the aspects affected is the educational aspect, where all students are not allowed to carry out massive activities at school or college and are encouraged to carry out teaching and learning activities online at their own homes<sup>[7,8]</sup>.

This policy provides few pros and cons, especially for students. The reason is that not all teaching and learning activities can be easily carried out with online method, such as research, work and thesis guidance. So that there will be many negative impacts for undergraduate students. Another impact that may occur among undergraduate students when various LSSR policies are implemented during the Covid-19 pandemic is anxiety. Anxiety can be interpreted as a total human response to a threat or danger involving perceptions and thoughts about the danger resulting in excessive anxiety reactions as a source of intense pressure on one's physiological functions<sup>[9]</sup>. Anxiety can strike anyone, especially someone who is used to facing challenges and demands in life, including students.

Anxiety caused by delays in taking student research data for final assignments so that they have to change the technical research in their final project due to pandemic conditions such as having to change ethical tests, difficulties in carrying out the guidance process with supervisors, the extension of the study period for one semester this has caused the delay in working on the final project or thesis. Based on this explanation, it is necessary to conduct a study on the impact or influence of LSSR policies during the Covid-19 pandemic on the level of anxiety of undergraduate students. Based on this explanation, it is necessary to conduct research on the effect of the implementation of the LSSR policy on the anxiety level of undergraduate students during the Covid-19 pandemic.

## **2. RESEARCH ELABORATIONS**

This research is an analytic observational study using cross-sectional method. This research is located in cities and districts in East Java Province, Indonesia. The location selection was made based on the consideration of the large number of universities in East Java with the possible availability of the research population. When this research was conducted from August to November 2020.

The population in this study were all undergraduate students domiciled in East Java during 2020. The sample in the study was determined based on the following inclusion criteria, namely undergraduate students at least semester 6, domiciled in East Java and process of working on their thesis. Because the number of undergraduate students who are domiciled in East Java is unknown, the sample determination uses the Lemeshow formula as follows<sup>[10]</sup>:

$$n = \frac{1.96^2 \cdot 0.5(1-0.5)}{0.05^2}$$

$$n = \frac{1.96^2 \cdot 0.5(0.5)}{0.05^2}$$

$$n = \frac{3.4816 \cdot 0.25}{0.0025}$$

$$n = \frac{0.9604}{0.0025}$$

$$n = 384.16$$

Explanation:

- n : minimum sample size
- Z $\alpha$  : level of confidence 95% ( $\alpha=1.96$ )
- P : population proportion 50% (0.5)
- d : error limit 5% (0.05)

The number of samples in this study by the calculation of the formula above was 385 respondents. In order to find research samples, the sampling technique used was accidental sampling. Data processing in this study begins with conducting validity tests, reliability tests, data collection, normality test, chi-square test to determine the relationship between variables and simple linear regression test to determine the effect between variables.

### 3. RESULTS

#### a. *Validity test*

Table 1. Results of the Validity Test of the LSSR Policy Variable Question

Variables	r count	r table	Results	Variables	r count	r table	Results
Item 1	0.633	0.104	Valid	Item 6	0.372	0.104	Valid
Item 2	0.499	0.104	Valid	Item 7	0.507	0.104	Valid
Item 3	0.589	0.104	Valid	Item 8	0.384	0.104	Valid
Item 4	0.618	0.104	Valid	Item 9	0.325	0.104	Valid
Item 5	0.363	0.104	Valid	Item 10	0.517	0.104	Valid

Based on table 1, it can be seen that the calculated R value of all question items in the LSSR variable is greater than the R table value. If R count > R table then the question item is declared valid. So, it can be concluded that all questions in the LSSR policy variable are valid.

Table 2. Results of the Validity Test of the Anxiety Variable Question

Variables	r <sub>count</sub>	r <sub>table</sub>	Results	Variables	r <sub>count</sub>	r <sub>table</sub>	Results
Item 1	0.637	0.104	Valid	....	....	0.104	Valid
Item 2	0.707	0.104	Valid	Item 17	0.265	0.104	Valid
Item 3	0.730	0.104	Valid	Item 18	0.531	0.104	Valid
Item 4	0.699	0.104	Valid	Item 19	0.500	0.104	Valid
....	....	0.104	Valid	Item 20	0.616	0.104	Valid

Based on table 2, it can be seen that the calculated R value of all question items on the anxiety variable is greater than the R table value. So, it can be concluded that all questions in the anxiety variable are valid. The questionnaire used to measure respondents 'anxiety was adopted from the Anxiety Scale Questionnaire as well as the process of calculating and categorizing the respondents' values <sup>[11]</sup>.

**b. Reliability Test**

Table 3. Reliability Test Results of Questions on Variable LSSR policy and Anxiety

Variable	Cronbach's Alpha	N of Items
LSSR	0.613	10
Anxiety	0.906	20

Based on table 3, it can be seen that the Cronbach's Alpha value is greater than 0.60, namely the LSSR variable  $0.613 > 0.60$  and the variable  $0.906 > 0.60$ . If the Cronbach's Alpha value is greater than 0.60 then the question item on that variable is declared reliable. So, it can be concluded that the questions on the two variables are declared reliable or constant.

**c. Respondent Data Distribution**

Table 4. Distribution of Respondents

LSSR	Anxiety Levels				Total
	Mild	Severe	Advanced	Extrem	
Not Effected	1	0	0	0	1
Quite Effected	22	10	6	0	38
Effected	95	88	36	8	227
Very Effected	39	36	35	9	119
Total	157	134	77	17	385

$p=0.013 < 0.050$

Based on the results of the chi-square test analysis in table 4, the p value is obtained =  $0.013 < 0.050$ , which means that there is a relationship between the implementation of LSSR policy during the Covid-19 pandemic and the anxiety level of students in the final semester in East

Java. The level of anxiety most experienced was mild anxiety (40.8%) and was dominated by respondents in the influential group as many as 97 people (25.2%).

**d. Normality Test**

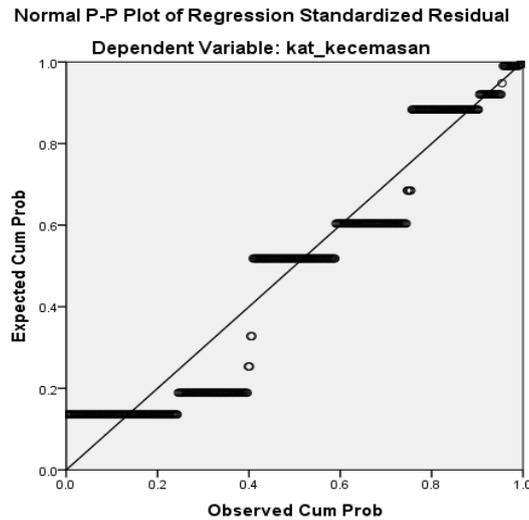


Figure 1. P-P Plot Normality Test Diagram

Based on the test results using the SPSS 21 program on the Normal Plot P-P in the regression test section, it is known that the data spreads around the diagonal line and follows the direction of the diagonal line. It can be concluded that the normality test on this research variable has a normal distribution pattern.

**e. Simple Linear Regression Test**

Table 5. Impact of LSSR policy on Anxiety Levels of Undergraduate Students during Covid-19

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	0.963	0.234		4.120	0.000
	LSSR	0.286	0.072	0.200	3.995	0.000

sig=0.000<0.05

Based on the results of the simple linear regression analysis in Table 5, it can be seen that the value of sig = 0.000 <0.05, which means that there is an influence between the implementation of LSSR policy on the level of anxiety of final semester students in East Java. In addition, we can also know that the two variables have a positive influence based on the t value, with a coefficient value of 0.200. This means that every time there is an increase in the value of the effect of the LSSR policy by 1%, the anxiety will increase by 0.200.

Table 6. The Magnitude of the Effect of LSSR policy on the Anxiety Level of Undergraduate Students during Covid-19

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.200	0.040	0.037	0.862

In table 6, it can be seen that the influence of LSSR implementation on the level of anxiety of final semester students in East Java can be seen. The value of R square shows that the implementation of LSSR has an effect of 4% on anxiety, the remaining 96% comes from the influence of variables not studied.

*f. Discussion*

This study shows that undergraduate students experience higher anxiety who feel that the policy of implementing LSSR policies during the Covid-19 pandemic affects their lives. Based on the results of the analysis with the chi-square test in table 4 for the relationship between the application of LSSR policy during the Covid-19 pandemic to the anxiety level of undergraduate students, it is known that there is a relationship between the implementation of LSSR policy during the Covid-19 pandemic and the anxiety level of undergraduate students. These results are in line with previous research which states that the level of anxiety and depression of students in Indonesia during the Covid-19 pandemic is higher than during normal conditions<sup>[12,13]</sup>. Previous research in other countries has also shown that lockdown policies during the Covid-19 pandemic are associated with an increased incidence of anxiety among students<sup>[14-16]</sup>.

Based on the results of the simple linear regression analysis in Table 5, it can be seen that there is an influence between the implementation of LSSR policy on the anxiety level of undergraduate students during Covid-19. This is in line with the results of previous studies which state that social life restrictions among students can have a significant effect on health problems in the form of anxiety<sup>[17,18]</sup>. The results of this study also in line with previous research on students in the United States which stated that more than 70% of students experienced increased stress and anxiety due to tough policies such as lockdowns and stay-at-home orders during the long-lasting Covid-19 pandemic<sup>[19]</sup>. In addition, the results of this study are also supported by the results of previous studies which state that students experience increased anxiety to experience severe anxiety when strict regulations at home are enforced and lockdowns during the Covid-19 pandemic. In addition, the results of this study are also supported by the results of previous studies which state that students experience increased anxiety to experience severe anxiety when strict regulations at home are enforced and lockdowns during the Covid-19 pandemic<sup>[20-22]</sup>.

In addition, we can also see that the two variables have a positive effect, which means that the greater the influence of the LSSR policy, the anxiety will also increase. Previous research also explained that the increase in student anxiety is directly proportional to the increase in adherence to rules or restrictions on social interactions in everyday life<sup>[23,24]</sup>. Previous research also explained that the longer the lockdown was implemented, the higher the student's anxiety level<sup>[2,16,17,20,21,25-29]</sup>.

#### 4. CONCLUSIONS

The implementation of SSR policies during the Covid-19 pandemic affected the level of anxiety of undergraduate students in Indonesia. The magnitude of the influence of the LSSR policy is in line with the increasing anxiety of undergraduate students during the Covid-19 pandemic. The majority of anxiety experienced by undergraduate students due to the LSSR policy is at a low level of anxiety.

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