

Personal growth initiative as a predictor of psychological distress in college students during the covid-19 pandemic

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Abstract

This study aims to determine the role of personal growth initiative (PGI) towards psychological distress among undergraduate students during COVID-19 pandemic. The hypothesis in this study is that there is a role of PGI in psychological distress among undergraduate students during the COVID-19 pandemic. Respondents in this study were 200 active undergraduate students in Indonesia. The sampling technique used was purposive sampling. The measuring instruments were the General Health Questionnaire-12 (GHQ-12) and the PGI scale. The results show that PGI had a significant role in psychological distress, with $F(1,198) = 13.784$, $p = 0.000$, $R^2 = 0.065$, and R^2 adjusted = 0.060. The regression coefficient ($\beta = -0.175$) indicated that an increase in PGI on average could decrease the psychological distress score by 0.175. Thus, the hypothesis proposed in this study can be accepted.

Keywords

college students, COVID-19, personal growth initiative, psychological distress

Introduction

The COVID-19 pandemic, which has lasted more than two years, has had an impact on the community. Community life, which originally ran normally, is now starting to change in various aspects, one of which is in the educational aspect (Cahyawati & Gunarto, 2020). The education system that was originally offline was changed to online during the COVID-19 pandemic. Online learning is defined as learning via the internet or computer where students interact with teachers and other students but do not depend on their physical location to participate in this online learning experience (Singh & Thurman, 2019).

Online learning implemented by colleges makes many contributions. Viewed from the positive side, online learning allows students to have more time and more flexibility in studying anytime and anywhere (Fitriyani et al., 2020). However, online learning has led to a low learning interest (Wijoyo, 2020), lack of involvement in learning activities (Dumford & Miller, 2018), lack of motivation and understanding of the material, a decreased level of communication, and feelings of isolation felt by students (Alawamleh et al., 2020).

This change in the learning system is a challenge for students. New obstacles that students experience and must face as a result of the effects of the pandemic are research delays, changes in teaching and examination systems, and reduced access to campuses (Hamza et al., 2021). Many of them feel burdened because of the increasing demands for college and assignments (Astuti et al., 2021). This is in line with the study of Rahmawati & Putri (2020) which shows that students view doing assignments during the COVID-19 pandemic era as being more difficult than before. The reduced two-way interaction between lecturers and students also reduces the understanding of the material received by

students (Hasan & Bao, 2020). The COVID-19 pandemic has made students face various and predominantly negative socio-emotional states, such as uncertainty, worry, sadness, stress, nervousness, unhappiness, anger, confusion, despair, and many other emotions (Andrade, 2021).

Another challenge experienced by students during the pandemic was related to social interaction. The research of Sirrini et al. (2021) showed a change in student friendships. Research by Hamza et al. (2021) showed that students who did not have mental health problems pre-pandemic in fact experienced increased psychological distress due to social isolation and loneliness during the COVID-19 pandemic. Tasso et al. (2021) in their research explained that during the pandemic students reported various symptoms related to interpersonal problems which ultimately caused psychological distress. In order to reveal whether Indonesian students also experience psychological distress, the researchers conducted a preliminary study in the form of a survey of 174 undergraduate students. It was found that 56.8% of students experienced psychological distress as indicated by feelings of depression, sleeping difficulty, reduced role for useful things, difficulty concentrating, etc.

St. Mary's College of Maryland (2021) states that psychological distress in students can be in the form of real anxiety, inability to concentrate or relax, decreased or increased appetite and sleep, loss of interest in fun activities such as attending classes and social relationships, irrational fears, and physical complaints without a medical cause (eg

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headaches, stomachaches, etc.). Meanwhile in everyday life, psychological distress can interfere with daily activities because those who experience it will feel psychologically uncomfortable. The extent to which individuals feel unable to meet the demands of life and give rise to feelings of discomfort, tension, and anxiety is what is known as psychological distress (Krys et al., 2020). Mirowsky & Ross (2003) define psychological distress as an unpleasant subjective state of depression and anxiety, which has both emotional and physiological manifestations. According to (Drapeau et al., 2012), psychological distress is a state of emotional distress characterized by symptoms of depression and anxiety. Other names for psychological distress are mental distress and emotional mental disorder (Idaiani & Kristanto, 2009). The protective factor for psychological distress is personal growth initiative or abbreviated as PGI (Robitschek et al., 2012). This is reinforced by research by Blackie et al. (2015) who revealed that individuals need PGI to achieve adaptive function so as not to experience psychological distress.

The role of PGI is very useful in helping the life of students. The function of PGI in dealing with psychological distress felt by students is as encouragement that comes from within to assist them in adapting to environmental demands and changes. The existence of PGI owned by students can help them to be able to develop themselves properly according to the stages of their development and enable them to see challenges in college life as growth opportunities (Weigold et al., 2020). PGI is defined as a set of skills developed for self-improvement and includes cognition and behavior that a person brings to life experiences (Robitschek et al., 2012). Individuals with a high PGI level will strive to achieve well-being in their mental, emotional and social aspects (Saraswati, 2019). They will also be aware of their potential, open to new experiences, and change to reflect success (de Jager-van Straaten et al., 2016). Conversely, individuals with low PGI levels will have difficulty overcoming the problems they pass (Hardin et al., 2007).

This study aims to determine whether PGI can be a predictor of psychological distress in college students during the COVID-19 pandemic. To the best of our knowledge, there is lack of references related to similar research, thus we hope that this research could become a reference for further research. In the end, these findings could help educational institutions to create and develop intervention and prevention programs for students experiencing psychological distress.

Method

Research Design

This research design uses quantitative methods. This method emphasizes its analysis of quantitative data collected through measurement procedures and processed using statistical analysis methods (Azwar, 2019). With the quantitative method, significance and information regarding the causal relationship (cause and effect) between the PGI variable and the psychological distress variable will be obtained.

Participants

The participants in this study were 200 active undergraduate students throughout Indonesia who experienced psychological distress, where the data is not known with certainty. If a subject has a GHQ-12 score above 15, he or she may experience psychological distress. For this reason, researchers used a non-probability sampling technique with a purposive type of sampling, where certain considerations or characteristics are used to determine the sample (Sugiyono, 2018). The characteristics used as subjects are active undergraduate students who experience psychological distress. The number of participants used as a trial sample (try out) was 100.

Research Instrument

There are two Likert scales used for this study, namely the psychological distress scale and the PGI scale. The PGI scale was distributed via Google Forms from December 15 to 27, 2021.

For the psychological distress scale, the researchers used the GHQ-12 from Goldberg (1979). The GHQ-12 is a valid and reliable measurement tool with fairly stable items across diverse samples and cultures (Picardi et al., 2001). The GHQ-12 used in this study is GHQ-12 which has been adapted to Indonesian (Idaiani & Suhardi, 2006). This study identified two aspects of GHQ-12: general dysphoria and social dysfunction. The scale score range is 0 – 3 in which a total score of more than 15 indicates that the subject experiences psychological distress. After testing, all 12 items on the trial scale are valid with a value of $\alpha = 0.827$. Subjects were asked to fill in all items on the scale. An example of an item on this scale is "Have you had trouble sleeping in the past 30 days because you were worried?" with four choices ranging from "absolutely not", "not more than usual", "somewhat more than usual", and "much more than usual".

The PGI scale was compiled by the researchers themselves with reference to the four PGI dimensions from Robitschek et al. (2012), namely readiness for change, planfulness, using resources, and intentional behavior. Of the 56 items on the trial scale, 16 valid items were obtained with a value of $\alpha = 0.835$. The scale score range is 1 – 4 and consists of 7 favorable items and 9 unfavourable items. The subjects fill in all the scale items. One example is "I will take every opportunity to improve myself" which has four choices of answer, namely "strongly disagree", "disagree", "agree", and "strongly agree".

Procedures and Data Analysis

The data analysis used in this study is simple linear regression with the IBM SPSS version 22 application to predict one variable using another. Simple linear regression analysis is used to determine the form of the relationship between two variables (Hastono, 2016). Prior to data analysis, assumptions were tested first to ensure that the data were normal and linear.

The normality test used Kolmogorov Smirnov with the monte carlo technique. The monte carlo technique is a normality test technique that produces reliable estimates (Mehta & Patel, 2012). While the residual value is used for the normality test, the normality test for regression analysis does not use independent or dependent variables, but uses the residuals (Suyono, 2015). The normality test results show a

Table 1. Participants' Demographic Data

| Category | F | % |
|--|-----|------|
| Gender ($M = 1.92, SD = 0.28$) | | |
| Male | 17 | 8.5 |
| Female | 183 | 91.5 |
| Age ($M = 1.91, SD = 0.294$) | | |
| Adolescents | 19 | 9.5 |
| Early adulthood | 181 | 90.5 |
| Type of college ($M = 1.33, SD = 0.471$) | | |
| PTN | 134 | 67 |
| PTS | 66 | 33 |

Table 2. Variable Distribution

| Variables and Scores | Category | F | % |
|---|----------|-----|------|
| Psychological distress ($M = 1.175, SD = 0.38$) | | | |
| 16 – 25 | Moderate | 165 | 82.5 |
| >25 | Severe | 35 | 17.5 |
| PGI ($M = 1.585, SD = 0.493$) | | | |
| $X < 40$ | Low | 83 | 41.5 |
| $40 \leq X$ | High | 117 | 58.5 |

KS-Z coefficient of 0.087 and sig. of 0.100 ($p > 0.05$). This result means that the residual values are normally distributed.

Furthermore, a linearity test was carried out to see whether the two variables had a linear relationship or not (Duli, 2019). The results of the linearity test show that the research variable is linear with an F of 15.581 with sig. 0.000 ($p < 0.05$). These results indicate that the two variables are linearly related.

Result

Based on these data, the majority of participants in this study were female with 183 people (91.5%). The categories are divided based on Erikson's theory of developmental stages where participants are called adolescents if they are 13-18 years old and early adulthood if they are 19-30 years old. Therefore, the majority of the research participants were in early adulthood with 181 people (90.5%). Based on the type of college (PT), the majority of the participants studied at state universities (PTN), with as many as 134 (67%).

Based on the results of the distribution of these variables, the majority of the participants had moderate psychological distress, with as many as 165 people (82.5%), which means that the level of psychological distress of the participants was not classified as severe enough to require professional treatment. In the PGI, the participants were in the high PGI category with 117 people (58.5%). Individuals with high PGI levels tend to care about others and are able to improve their communication skills (Robitschek & Keyes, 2009).

Simple linear regression was used to predict the personal growth initiative as a predictor of psychological distress in college students during the covid-19 pandemic. Data obtained that $F(1.198) = 13.784, p = 0.000, R^2 = 0.065$, and R^2 adjusted = 0.060. The regression coefficient ($\beta = -0.175$) shows an increase in the average PGI and a decrease in the psychological pressure score of 0.175. The p or significance level of 0.000 indicates that the hypothesis is accepted. PGI is a predictor of psychological distress in college students during the COVID-19 pandemic. The R square value of 0.065 means that PGI predicts psychological distress of 6.5% and

the rest is predicted by other factors that are not involved in this study.

Discussion

The results of the simple linear regression analysis on PGI on psychological distress indicate that the hypothesis is accepted. This means that PGI is able to predict the emergence of psychological distress in students who are the subjects of this study. In contrast to this study which measured PGI as a whole, Weigold et al. (2013) examined PGI from each of its dimension and the results showed that three of the four PGI dimensions were negatively related to psychological distress. However, the findings of Robitschek et al. (2012) showed that PGI could be measured either using the total score or the individual score for each dimension. Another study using the overall PGI score is conducted by de Freitas et al. (2016) where PGI is negatively related to factors associated with lower levels of well-being, such as stress, anxiety, and depression.

Based on the data obtained, the psychological distress level of the active undergraduate students is generally at a moderate level, which indicates a person experiences emotional problems or is going through a difficult time (O'Sullivan et al., 2007). Measurement of psychological distress with the GHQ-12 is used to assess individual psychological symptoms, such as loss of self-confidence, feeling depressed, difficulty concentrating and sleeping, thinking oneself is useless, etc. (Saravanan et al., 2020). In this method of measurement a moderate level indicates the subject is categorized as experiencing psychological distress but not classified as severe and does not require professional treatment.

The moderate level of psychological distress on the participants can occur due to a protective factor from psychological distress, namely education (Jorm et al., 2005). Research of Cao et al. (2020) on students in China shows that students who live in urban areas do not experience severe psychological distress because urban areas have good sanitation and educational resources. These students also acquire extensive knowledge to prevent transmission of the virus and live with parents who have stable income. That is, they are quite capable of controlling stressors that can affect the level of psychological distress due to external resources that support them to survive.

In addition, a moderate level of psychological distress can occur in the participants because of the students' adaptability. Unlike previous research which explained that students' opportunities to meet new people were limited during the pandemic, students are now getting used to life during the COVID-19 pandemic (Vaterlaus et al., 2021). Difficulties in adapting to change were indeed felt by students at the beginning of the pandemic, but they have been able to live life during the pandemic. In line with the research by Gultom et al. (2022) which revealed that as many as 76.4% of 140 students in 13 colleges in Jakarta prefer online over offline lectures during the COVID-19 pandemic. Another study of 48 students also showed that 73% of them hoped that online learning would be extended because they could study from home without having to come to campus (Parwati, 2022).

The phenomenon of psychological distress experienced by students during the COVID-19 pandemic is indeed common almost everywhere. This finding is in line with the results of a study by Zimmermann et al. (2020) which shows that the level of psychological distress among students, as seen from symptoms of depression and anxiety, is much greater during the pandemic than during the 2019-2020 academic year. Changes in conditions that occurred during the pandemic required individuals to foster change in order to overcome the crisis that occurred (Effendy & Widianingtanti, 2020). When facing new conditions, each individual needs to develop psychologically to be ready to face changes in adaptation and perceive changes in the current pandemic era as a challenge to grow for the better. This is in line with Aughterson et al. (2021) who explained that the pandemic actually brought opportunities for personal growth which involved increasing self-reflection to appreciate the small things in life, improving relationships with those closest to them, and reducing excessive activity.

The COVID-19 pandemic is a change that must be faced. Changes that are considered as disturbing situations will create new perceptions for individuals, so PGI is needed (Dewi, 2012). PGI is needed for the psychopathological recovery process (Loo et al., 2014). According to Blackie et al. (2015), PGI encourages individuals to seek activities they like which can counteract some of the effects of psychopathological conditions. When faced with a difficult problem, individuals with high PGI levels are better able to identify specific ways of responding to problems, feel more confident in their ability to solve problems, and thus experience less psychological distress than individuals with low PGI (Hardin et al., 2007).

PGI plays a role in improving students' mental health. Students as individuals also need to evaluate their experiences in order to understand and modify their personal weaknesses (Eka et al., 2019). The research of Robitschek & Kashubeck (1999) shows that PGI can minimize the emergence of psychological distress or even accelerate the recovery of psychological distress. PGI will make students tend to explore, seek, mingle, and create personal meaning for themselves (Ivtzan et al., 2011).

In addition, there are several PGI roles that can be seen in students' life. Individuals with planning will find it easier to face challenges in their lives, so they could avoid psychological distress (Luyckx & Robitschek, 2014). In the academic sphere, students who are active in organizations will interact more with friends from diverse backgrounds. This opportunity to develop themselves will hone their abilities and potential (Pertwi et al., 2015). To develop themselves, students also need to depend on the resources around them. However, the difficulty of finding these resources makes students depend on their internal growth rather than utilizing existing external resources (Weigold et al., 2013). Therefore, the ability to adapt to changes in this pandemic era is needed, for example using technology to facilitate discussions in classes (Radesty, 2020).

Students' personal growth can also be improved through learning. With repeated behavior, individuals will go through basic learning mechanisms (Mazar & Wood, 2018). These individuals in their mental processes will learn the world and they will be more open to experience (Deyoung et al., 2014).

Apart from PGI, other factors that influence psychological distress are in accordance with the research of Dambrun & Dubuy (2014) which shows that practicing optimism, altruism, and gratitude significantly reduces psychological distress.

Furthermore, there are differences in psychological distress between male and female subjects. The mean results show that female subjects experience higher levels of distress than male subjects. This is because women express more of their feelings or emotions (Divaris et al., 2013). This sensitivity of women to their emotions in the end also makes them more sensitive to their feelings of anxiety (Zulkarnain, 2009). Agustine & Borualogo (2021) explain that women are less effective at dealing with problems and make them less able to maintain emotional balance than men. The hormones estrogen and progesterone that women have tend to make them potentially experience anxiety and depression (Imania et al., 2022). The results of the study by Jorm et al. (2005) show that several negative events during life such as childhood difficulties, negative interactions with family, and poor health are factors that cause psychological distress in women.

One limitation of this study is the PGI as a whole only contributes 6.5% to the prediction of psychological distress. This percentage is quite small because the rest are other factors which are not examined. The other limitation is the subjects are only active undergraduate students. However, we hope that these limitations may open new avenues for further research.

Conclusion

As previously explained, the research yields significant results, so the research hypothesis is accepted. It can be concluded that PGI is a possible predictor of psychological distress in college students during the COVID-19 pandemic. PGI could help individuals to identify ways to deal with the problems they face so that they experience less psychological distress.

Recommendation

To reduce the level of psychological distress, students can start to accustom themselves to learning in a new atmosphere of the COVID-19 pandemic, avoid habits that can interfere with concentration during lectures and classes, and increase their enthusiasm for learning by doing positive activities that they like. These could help students avoid psychological distress because they consider stressors as a challenge that can help their personal growth in the future. For further research, it is recommended that PGI measurements be carried out based on each individual dimension, not as a whole, to find out how much each PGI dimension contributes to predicting psychological distress. Further researchers could also use other factors not examined in this study to identify which psychological distress factor plays a greater role. In addition, they could expand the research subject, for example all active students in Indonesia with the possibility that there are differences in the level of psychological distress at each level of education.

Declarations

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Author contributions

Conceptualization: A.B.F. and S.A.M.; methodology: A.B.F. and S.A.M.; formal analysis: A.B.F. and S.A.M.; writing manuscript draft: A.B.F. and S.A.M.; reviewing and editing: A.B.F. and S.A.M.

Conflict of interest

The researchers declare that they have no conflicts of interest.

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