

UNIVERSITY SUPPORT, MOTIVATION TO LEARN, EMOTIONAL ADJUSTMENT, AND ACADEMIC PERFORMANCE

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ABSTRACT

The main purpose of this study was to examine relationships between university support and academic performance, as mediated by motivation to learn and emotional adjustment among freshmen of X University. Data were collected from 327 X University's freshmen at the end of their first year. Results indicated that university support was positively related to motivation to learn as well as to emotional adjustment; while inadequate university support was negatively related to motivation to learn as well as to emotional adjustment. Moreover, motivation to learn and emotional adjustment were positively related to academic performance. Motivation to learn and emotional adjustment mediated the relationship between university support and academic performance as well as between inadequate university support and academic performance. Limitations and future research are discussed in the light of these findings.

Keywords: University's Support, Motivation To Learn, Emotional Adjustment, Academic Performance

INTRODUCTION

Academic performance is crucial since it has impact on job and income that students may gain after they graduate from university. X University, a private Catholic University in Indonesia, has concerns about its freshmen's academic performance. In the period from 2008 to 2011, the academic performance of freshmen from every faculty of X University was less good than the academic performance of second and third year students (Bureau of Academic Affairs and Administration of X University, 2012). Achieving a good academic performance in the first year is a challenging task since freshmen face not only academic challenges but also social challenges. Solving these challenges involves an integration process, in which freshmen have to adapt to the attitudes and values of their friends and university staff, and to become members of the academic and social system of the university (Nora & Rendon, 1990; Severiens & Schmidt, 2008). In the present study, we examined the students' relationship with university staff since in the first year freshmen have to adjust to interaction with the university staff without their parents' help. They have to plan their education with their academic supervisor, to ask information from the administration staff, and to understand their materials by asking their lecturers. Numerous studies have shown that students' appraisals of the support they receive from their university are related to their academic performance (Clifton, Perry, Stubbs, & Roberts, 2004; Komarraju, Musulkin, & Bhattacharya, 2010; Vermeulen & Schmidt, 2008). Social support consists of structural and functional support (Glazer, 2006). Structural support

refers to the presence of others in one's life. There are two components of functional support: instrumental and emotional. Instrumental support refers to tangible assistance. Emotional support refers to the provision of esteem and empathy (Clifton et al., 2004; Glazer, 2006; Komarraju et al., 2010; Vermeulen & Schmidt, 2008; Wang, 2009). In this study, we examined students' perception of support provided by X University and how this support influences freshmen's academic performance. Although there are numerous studies related to appraisal of the university environment, there is a gap in research related to the mechanisms through which university's support exerts its influence on academic performance. One important mediator to be analyzed is motivation to learn. Motivation to learn, which is defined as a set of interrelated beliefs and emotions that direct students' behavior to pay attention and learn materials presented in the academic program (Tucker et al., 2002; Wentzel, 1999), guides students to prioritize academic activities. There are several reasons to analyze motivation to learn as a mediator in the relationship between university's support and academic performance. Jakarta, where X University is located, is the capital city of Indonesia. Jakarta offers many facilities and activities to students which may attract their attention more than studying (e.g. part time jobs, shopping, other enjoyable activities).

These activities give them more direct reward (e.g. money and enjoyment) than studying. The more the students are interested in what Jakarta offers, the less they are motivated to learn. Thus, university has a challenge to design a support system that affect students' motivation to learn and that in turn influences their academic performance. Another reason for studying motivation to learn among freshmen is that the demands of high school are different from those of universities in Indonesia. At university, freshmen are required to plan and choose subjects and classes in order to amass the maximum possible credit points, involve themselves more in learning activities than they did at high school, and to manage many competing activities, such as doing assignments or joining various organized activities at the university. University support might influence them to deal with the challenges, and this motivation to learn in turn may influence their academic performance. A second important mediator between university support and academic performance may be emotional adjustment, which refers to a process of interactions between an individual and his/her environment, which requires a variety of coping responses in an attempt to develop emotional harmony between the demands and needs of an individual and those of his/her environment (Baker & Siryk, 1984; Bohlin & Hagekull, 2009; Ramsay, Jones, & Baker, 2007; Rey et al., 2013). Entering university is by nature a stressful experience (Gan, Hu, & Zhang, 2010).

Freshmen have to make adjustments to a new environment. In this situation, a major task for them is to learn to manage their feelings about their new situation and to express them appropriately (Sharma, 2012), such as to reflect on their feelings when they face difficulties in achieving their aims, to have courage to complete their assignments instead of avoiding these challenges, to be able to discuss their emotions and the demands of their new environment with friends and parents, and to be able to receive support in dealing with their new circumstances. In this study, we examined the mediating role of motivation to learn and emotional adjustment between university support and the academic performance of X University's freshmen. To study the mediating role of motivation to learn and emotional adjustment between university's support and academic performance, relationships between these variables have to be found. In the following, we elaborate these relationships.

University Support and Academic Performance

There are studies that show that university support influences academic performance (e.g. Komarraju et al., 2010). When students perceive their university as providing more opportunities for formal and informal interactions with staff, they are more likely to have opportunities to solve their academic difficulties and accept the university's standard level of academic skills, which in turn may enhance their academic performance (Komarraju et al., 2010; Marchant, Paulson, & Rothlisberg, 2001; Pascarella, Pierson, Wolniak, & Terenzini, 2004; Vermeulen & Schmidt, 2008).

University Support and Motivation to Learn

University support is related to motivation (Komarraju et al., 2010). When students perceive that members of the university staff are approachable and available for informal interaction, the staff is perceived as being more understanding and capable of meeting the students' need to enhance their learning. The support provided by the university also tends to enhance students' confidence in their academic skills, which in turn increases their motivation to exert energy and to persist when faced with learning problems (Komarraju et al., 2010).

University Support and Emotional Adjustment

To date, the only comparable study that could be found about the relationship between academic support and emotional adjustment was a study conducted among seventh and eighth grade students (Wang, 2009). Wang (2009) explained that students who perceived their teachers as caring and supportive, and tended to perceive their environment as emotionally supportive, could express themselves freely and could count on teachers for help for a range of problems. This situation increased their ability to cope with emotional problems. Applying Wang's findings to the present study, we assumed that when students perceive that the university gives them opportunities to participate in decision-making and provide emotional support, they tend to be able to express their autonomy and count on the university staff for support. This support will be related to their willingness to integrate into their new surrounding and may increase their emotional adjustment.

Motivation to Learn and Academic Performance

Studies have shown that academic performance is influenced by motivation to learn (Tucker et al., 2002). Motivation to learn drives the behavior that supports the learning process in order to achieve a better performance in an academic setting (Vermunt, 2005). Students with a higher motivation to learn tend to prioritize learning activities, persist with a learning task, and aim for high standards of academic performance.

Emotional Adjustment and Academic Performance

Studies have shown that freshmen's academic performance is also influenced by their emotional adjustment (Melendez & Melendez, 2010; Petersen et al., 2009). A possible explanation is that freshmen who show better emotional adjustment tend to have characteristics such as greater use of active coping to regulate their emotions, which prevent them from giving up something which is important and enable them to manage, decrease, or eliminate stressors or the emotional consequences of stressors they experience in integrating with university life's demands (Chemers, Hu, & Garcia, 2001; Yazedjian, Toews, & Navarro, 2009). In turn, they

are able to focus on academic activities, including during times of stress, which in turn leads them to a better academic performance (Wentzel, Barry, & Caldwell, 2004).

Motivation to Learn and Emotional Adjustment as Mediators between University Support and Academic Performance

Given that university support is related to motivation to learn and emotional adjustment, and that motivation to learn and emotional adjustment are related to academic performance, we assumed that differences in motivation to learn and differences in emotional adjustment may represent mechanisms through which university support exerts its influence on academic performance. This assumption implies that freshmen who perceive their university as supportive show more motivation to learn and are better adjusted to university life. Therefore, they achieve a better academic performance than those who perceive their university as less supportive.

METHOD

Participants

The sample included 114 (34.9%) male and 213 (65.1%) female students between 17-20 years old ($M=18.52$, $SD=.67$), from all faculties of X University. Most of the participants lived with their parents (82%), 14% rented a room, and 4% lived with relatives. They came from several senior high schools.

Measures

Academic Performance

Academic performance was assessed by students' grade point average (GPA) at the end of their first year. At X University, GPA is the overall weighted sum of all grades contributing to a student's final degree (range 0 to 4).

Motivation to Learn

Motivation to learn was assessed by a 10-item scale adapted from the Stages of Learning Motivation Inventory (SOLMI) developed by Cole, Harris, & Feild (2004). The participants rated their agreement on a 5-point Likert scale, ranging from "strongly disagree" (1) to "strongly agree" (5). A sample item is "I have been working hard to learn the information covered in the course/class." The SOLMI was carefully adapted and translated into the Indonesian language using the forward-back translation (ABBA) technique. The forward-back translation was conducted by three independent translators in the forward-translation phase and by three other independent translators in the back-translation phase (Sulastri, 2014). For each student, a total score was computed over the 10 items. Total scores ranged from 10 to 50. After the adaptation, the instrument was checked for its reliability in a pilot study. Cronbach's alpha was .84.

Emotional Adjustment

The Emotional Adjustment Scale used in the present study was developed in a pilot study (June, 2010). The scale was developed in the Indonesian language and based on indicators of healthy adjustment (Haber & Runyon, 1984): accurate perception of reality (e.g. "I feel I have no purpose in life."), ability to cope with stress and anxiety (e.g. "I feel anxious."), a positive self-

image (e.g. “*I am satisfied with myself.*”), ability to express the full range of emotions (e.g. “*I can express my emotions.*”), and good interpersonal relationships (e.g. “*I can cope with the demands of the environment quite well.*”). In that pilot study, the scale consisted of 12 items, and was distributed to 554 freshmen of X University at the end of their first year. The participants rated their agreement on a 4-point Likert scale, ranging from “*strongly disagree*” (1) to “*strongly agree*” (4). Cronbach’s alpha was .72, indicating a good internal consistency of the scale.

In that pilot study, the construct validity of the scale was addressed by investigating the relationships between this scale and other scales. Our hypothesis was that the scale would be negatively related to reported stress, anxiety, and depression symptoms (Demaray et al., 2005). Stress, anxiety, and depression symptoms were measured by the Depression, Anxiety, Stress Scale (DASS) developed by Lovibond and Lovibond (1995). DASS is increasingly used in a diversity of settings and possesses good psychometric properties (Crawford & Henry, 2003). The Emotional Adjustment Scale was significantly related to the Stress Scale ($r=-.41, p<.01$), the Anxiety Scale ($r=-.42, p<.01$), and the Depression Scale ($r=-.52, p<.01$).

The results of the construction of The Emotional Adjustment Scale from the pilot study were used in the present study, of which the data were reported in this manuscript. The data for the present study were collected during May and June 2011. In the present study, Cronbach’s alpha was .74, with students’ total scores ranging from 12 to 48.

University Support

The scale used in the present study to measure university’s support was also developed in a pilot study. In the first step of that pilot study (in April 2010), we asked 183 freshmen of X University two open questions to find out the kind of support from their university’s staff, facilities, rules, and culture that they perceived as supportive in helping them to adjust and perform during their first year at university. The first question was about the university’s staff, facilities, rules, and culture that they perceived as supportive, while the second asked them to explain how their university’s staff, facilities, rules, and culture supported them. Based on their answers to these open questions, we formulated a number of scale items. In the second step of that pilot study, we distributed the scale items to 554 freshmen of X University at the end of their first year. A factor analysis was carried out to detect dimensions of university’s support. This analysis revealed two factors. The first factor was dominated by high loadings (>.40) of items that expressed adequate university support, which we named the Supportive University Scale, while the second factor was dominated by high loadings of items that expressed inadequate support, which we named the Inadequate University Support Scale. For each factor, 12 items were highly loading.

We constructed two scales, a Supportive University Scale and an Inadequate University Support Scale. The construct validity of these two scales was demonstrated by correlating the scales scores with DASS. The Supportive University Scale was negatively and significantly related to the Depression Scale ($r=-.19, p<.01$), but not to the Stress Scale ($r=-.00$) and Anxiety Scale ($r=-.07$). The Inadequate University Support Scale was positively and significantly related to the Stress Scale ($r=.25, p<.01$), the Anxiety Scale ($r=.25, p<.01$), and the Depression Scale ($r=.36, p<.01$). In the present study, of which the data were used for this manuscript, the same scales were used. A sample item from the Supportive University Scale is “*The lecturers’ class management helps me concentrate on study*”, while a sample item of the Inadequate University Support Scale is “*The lecturers are not willing to answer the students’ questions.*”

The participants rated their agreement on a 4-point Likert scale, ranging from “*strongly disagree*” (1) to “*strongly agree*” (4). Cronbach’s alpha was .83 for the Supportive University Scale, and .82 for the Inadequate University Support Scale. For each scale, students’ total scores ranged from 12 to 48.

PROCEDURE

X University consists of 8 faculties, each of which is headed by a dean. To collect the data used in the present study, first, we sought the university’s permission. Our goal was to select 20% of freshmen from each faculty of X University. After receiving permission from the dean of each faculty, we randomly selected classes of students within faculties, until the criterion of 20% of freshmen of each faculty was reached. In the freshmen’s classrooms, the questionnaires were administered at the end of their first year at university by the main researcher and trained research assistants (during a two-week period between 23rd May and 4th June 2011). Students were given the questionnaires approximately 30 minutes before their scheduled classes ended. A script of the aims of the study, informed consent, and instructions were used to maintain consistency in the procedure. Only students who signed the informed consent form were allowed to participate. At the end of their first year (in July 2011), participants’ GPAs were obtained from the university data base.

RESULTS

Correlation Analysis

The first step in the analysis was to calculate correlations between the study variables. Table 1 presents these correlations. We found a positive relationship between supportive university on the one hand and academic performance ($r=.17, p<.01$), motivation to learn ($r=.57, p<.01$), and emotional adjustment ($r=.34, p<.01$) on the other hand. Negative relationships were found between inadequate university support on the one hand and academic performance ($r=-.24, p<.01$), motivation to learn ($r=-.38, p<.01$), and emotional adjustment ($r=-.36, p<.01$) on the other hand. Moreover, we found a positive correlation between academic performance and motivation to learn ($r=.27, p<.01$) and a positive correlation between academic performance and emotional adjustment ($r=.21, p<.01$).

Testing the Mediating Role of Motivation to Learn and Emotional Adjustment

Table 1. Correlations between supportive university, inadequate university support, motivation to learn, emotional adjustment, and academic performance

Variable	1	2	3	4	5
1. Supportive University	-	-.63**	.57***	.34**	.17**
2. Inadequate University Support		-	-.38***	-.36**	-.24***
3. Motivation to Learn			-	.32**	.27***
4. Emotional Adjustment				-	.21***
5. Academic Performance					-

Note. ** $p<0.01$ level (2-tailed); * $p<0.05$ level (2-tailed)

From Table 1 it is clear that supportive university and inadequate university support were significantly related to freshmen’s academic performance. In examining whether motivation to learn and emotional adjustment mediated the relationship between supportive university and academic performance as well as between inadequate university support and academic performance, we conducted multiple regression analyses.

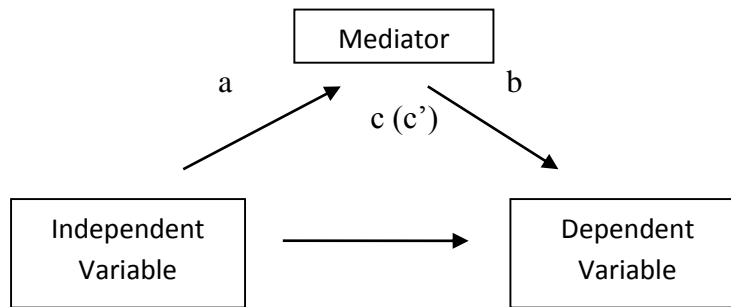


Figure 1. A model for depicting a causal chain (Baron & Kenny, 1986)

Baron and Kenny (1986) proposed a path diagram as a model for depicting a causal chain (Figure 1). In order to establish mediation, there must be four conditions: from regression analysis it has to be clear that (1) the independent variable affects the mediator as diagrammed in path a, (2) the independent variable affects the dependent variable as diagrammed in path c, (3) the mediator affects the dependent variable as diagrammed in path b, and (4) the effect of the independent variable on the dependent variable must be less when the mediator is introduced in the regression analysis as diagrammed in path c'. Perfect or full mediation is demonstrated if the effect of the independent variable on the dependent variable becomes non-significant after inclusion of the mediator in the regression analysis. Partial mediation is demonstrated if the effect of the independent variable on the dependent variable reduced but remains significant after inclusion of the mediator in the regression analysis (Baron & Kenny, 1986). We tested the significance of mediation of the independent variable on the dependent variable using Sobel tests.

Table 2. Regression analyses predicting academic performance by supportive university mediated by motivation to learn

	<i>R</i>	<i>R</i> ²	□ <i>R</i> ²	□
Regression analysis path a:				
To predict Motivation to Learn by Supportive University	.57	.32***		.57***
Regression analysis path c:				
To predict Academic Performance by Supportive University	.17	.03**		.17**
Hierarchical analyses				
Step 1: path b				
To predict Academic Performance by Motivation to Learn	.27	.07***		.25***
Step 2: path c'				
To predict Academic Performance by Supportive University (mediated by Motivation to Learn)	.27	.07	.00	.03

Note * = $p < .05$; ** = $p < .01$; *** = $p < .001$

Table 3: Regression Analyses Predicting Academic Performance by Inadequate University Support mediated by Motivation to Learn

	<i>R</i>	<i>R</i> ²	Δ <i>R</i> ²	β
Regression analysis path a:				
To predict Motivation to Learn by Inadequate University Support	.38	.14***		-.38***
Regression analysis path c:				
To predict Academic Performance by Inadequate University Support	.24	.06***		-.24***
Hierarchical analyses				
Step 1: path b				
To predict Academic Performance by Motivation to Learn	.27	.07***		.21***
Step 2: path c'				
To predict Academic Performance by Inadequate University (mediated by Motivation to Learn)	.30	.09**	.02	-.16**

Note * = $p < .05$; ** = $p < .01$; = $p < .001$

In Tables 2 and 3, we presented the results with regard to the mediating role of motivation to learn between the two university support factors and academic performance by examining the four Baron and Kenny's conditions that have to be met to conclude to a mediating effect. From Table 2 and 3, it is clear that when the motivation to learn was entered in the regression equation, the standardized regression coefficient of supportive university on academic performance was reduced from .17** to .03, and the standardized regression coefficient of inadequate university support on academic performance from -.24*** to -.16**. A Sobel Test confirmed a significant full mediation of motivation to learn with regard to the relationship between supportive university and academic performance ($t=3.81$; $p<.01$) and a significant partial mediation of motivation to learn in the relationship between inadequate university support and academic performance ($t=3.42$; $p<.01$).

Table 4. Regression analyses predicting academic performance by supportive university mediated by emotional adjustment

	<i>R</i>	<i>R</i> ²	Δ <i>R</i> ²	β
Regression analysis path a:				
To predict Emotional Adjustment by Supportive University	.34	.12***		.34***
Regression analysis path c:				
To predict Academic Performance by Supportive University	.17	.03**		.17**
Hierarchical analyses				
Step 1: path b				
To predict Academic Performance by Emotional Adjustment	.21	.04***		.17**
Step 2: path c'				
To predict Academic Performance by Supportive University (mediated by Emotional Adjustment)	.23	.06	.01	.12*

Note * = $p < .05$; ** = $p < .01$; = $p < .001$

Table 5. Regression analyses predicting academic performance by inadequate university support mediated by emotional adjustment

	<i>R</i>	<i>R</i> ²	ΔR^2	Δ
Regression analysis path a: To predict Emotional Adjustment by Inadequate University Support	.36	.13***		-.36**
Regression analysis path c: To predict Academic Performance by Inadequate University Support	.24	.06***		-.24***
Hierarchical analyses Step 1: path b To predict Academic Performance by Emotional Adjustment	.21	.04***		.14*
Step 2: path c' To predict Academic Performance by Inadequate University Support (mediated by Emotional Adjustment)	.27	.07**	.03	-.18**
Note * = $p < .05$; ** = $p < .01$; *** = $p < .001$				

In Table 4 and 5, we presented the results with regard to the mediating role of emotional adjustment between the two university support factors and academic performance by again examining the four Baron and Kenny's conditions that have to be met to conclude to a mediating effect. From Table 4 and 5, it is clear that when emotional adjustment was entered in the regression equation, the standardized regression coefficient of supportive university on academic performance was reduced from .17** to .12*, and the standardized regression coefficient of inadequate university support on academic performance from -.24*** to -.18**. We found evidence of a significant partial mediation of emotional adjustment on the basis of the Sobel Test for the relationship between supportive university and academic performance ($t=2.64$; $p<.01$) and for the relationship between inadequate university support and academic performance ($t=2.30$; $p<.05$).

DISCUSSION

This study showed that there was a positive relationship between university support and academic performance and that there was a negative relationship between inadequate university support and academic performance. These results showed that university support is related to freshmen's ability to deal with their new learning environment. In this study, although most of the participants lived with their parents and might still be supported by their parents, and despite the fact that 48.2% of the participants' fathers and 34.3% of the participants' mothers have at least a bachelor's degree, university support seems necessary for them. This means that university support has to be provided for freshmen since most of the students spend their time at university not only for academic reasons but also for their personal enhancement. Examples of support are fair demands from the university, interactions between university staff and students that support them when they have difficulties in completing academic tasks and solving problems, opportunities for freshmen to receive feedback for improving their ability in learning and to have discussions on topics about which they have questions, and organizations that offer the students opportunities to develop their personal talents. This result supported previous studies (Komarraju et al., 2010; Marachant, Paulson, & Rothlisberg, 2001; Pascarella et al., 2004; Vermeulen & Schmidt, 2008). This study also

showed a positive relationship between a supportive university and motivation to learn. This result means that students' perception that their university was relatively supportive, was positively related to students' persistence when faced with difficult academic tasks. A possible explanation is that through participation in organisations supported by X University and supportive interactions with university staff, freshmen develop their personality and talents and feelings that they are not alienated and distanced from the university, which is related to a high motivation to learn (Komarraju et al., 2010). We also found significant relationships between university support and emotional adjustment as well as between inadequate university support and emotional adjustment. These results suggest that interactions with other students and university staff provide opportunities for freshmen to discuss their feelings and difficulties with others about how to cope with stress and anxiety. Their discussions may lead to solutions to their problems. Their ability to overcome problems is related to the development of their positive self-image and their ability to express the full range of emotions.

Motivation to learn fully mediated the relationship between university support and academic performance. This finding means that students who perceived that their university's support impacted them positively, achieved a higher academic performance by developing a higher motivation to learn. The result that motivation to learn partially mediated the relationship between inadequate university support and academic performance, means that academic performance was caused not only by a direct influences of inadequate university support on academic performance but also by an indirect influences of inadequate university support on academic performance through motivation to learn. Emotional adjustment partially mediated the relationship between university support and academic performance as well as between inadequate university support and academic performance. These findings mean that higher academic performance achieved by freshmen who perceived that their university's support impacted them positively, was caused not only by a direct influence of university support on academic performance but also by an indirect influence of university support on academic performance through emotional adjustment, while lower academic performance achieved by freshmen who perceived that their university's support impacted them negatively, was caused not only by a direct influence of inadequate university support on academic performance but also by an indirect influence of inadequate university support on academic performance through less well emotional adjustment.

This research is the first to investigate motivation to learn and emotional adjustment in mediating the relationships between supportive university and academic performance as well as between inadequate university support and academic performance. The results showed that the more support X University gives to freshmen, the more it enhances the students' motivation to learn and their emotional adjustment, which in turn increases their academic performance. Motivation to learn and emotional adjustment will boost the effect of X University's support in its role in enhancing students' academic performance. To study students' integration into a new level of education, especially higher education, we need not only to explore student relationships with university staff, but also to explore interaction with other students. We encourage further research to explore how the relationships among all university members collaborate to support the students in achieving a good academic performance.

Implications of the Research

The results of the present study have important implications not only for X University, but also for other universities, particularly in designing interventions for new university students. Given that the results of this study highlight the role of the university's policies, staff and

facilities in enabling freshmen to achieve a better academic performance, it is essential for universities to design programs for all the university staff with the aim of developing support within the university. Examples of such programs are sessions for the university staff on how to promote supportive communication with students; for university staff and students on how to promote communication between them in formal as well as informal situations; and for the university's policy makers on how to establish a routine evaluation of and improvement in the university's policies, learning process, and facilities based on students' opinions. Especially for universities that have a counseling unit, we encourage the provision of assistance not only for the students, but also for the university staff to enhance their capacity to deal with the staff's problems (e.g. their family problems). The program that assist the staff to cope with their problems will enhance the competence of staff in carrying out their work, including their interaction with the students, which in turn influence the university atmosphere perceived by the students.

Limitations and Future Research

The present study is a correlational study. We encourage future longitudinal research to examine the causal relationships of the variables in the present study. The results of this study are based on information from students of one private Indonesian university. Therefore, the possibility of generalizing the findings for use in other institutions in Indonesia and other universities elsewhere may be limited. We encourage other studies to examine the role of the university in academic performance at other universities. In this study, we gathered retrospective and self-report information about the students' perception of the university's support. This could lead to biased findings resulting from social desirability. Although the university's support is perceived by the students as having impact on their behavior, multiple measures (from university staff and students) would be a valuable addition to this investigation. Future research could add information from the university's staff and the results of observations of, for example, communication between university staff and students, to strengthen the investigation.

In this study, we measured academic performance at the end of the first year. We found that the university's support influenced academic performance, mediated by motivation to learn and emotional adjustment. We encourage future research to measure academic performance during the following years in its relationship with the students' perceptions of the university's support. The results of these analyses will give us information about the role of the university's support in academic performance in the following years. In this study, we measured university support by two scales, i.e. supportive university and inadequate supportive university. In order to find out which aspect of the university is most needed to be improved, such as lecturers, administration staff, facilities, we encourage future research to measure the relationship between each of these aspects and students' academic performance.

In explaining the theoretical relationship between a supportive university on the one hand and motivation to learn, emotional adjustment, and academic performance on the other hand, we used certain characteristics, such as motivational beliefs and coping, that are related to university support, motivation to learn, emotional adjustment, and academic performance. However, we did not examine the relationship between those characteristics and university support, motivation to learn, emotional adjustment, and academic performance. We encourage future research to examine the relationships between these variables, such as the mediating role of motivational beliefs and coping in those relationships in order to verify in more detail the relationships we found.

CONCLUSION

This study, with Indonesian student participants, revealed that a supportive university has a positive impact on freshmen's academic performance, while inadequate university support has a negative impact on their academic performance. Measures should be considered to ensure that university students receive the support they need from their universities. Motivation to learn and emotional adjustment seem to mediate the relationships between university support and academic performance. University support affects students' motivation to learn and emotional adjustment. Good support results in a better motivation to learn and emotional adjustment, and has, therefore, a positive influence on students' academic performance.

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