Conference Paper

Academic Performance of University Students: A Case in a Higher Learning Institution

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Abstract

This research is to identify the relationships and main factors of academic performance degree students in a Higher Learning Institution. The researcher can see the increasing number of students did not graduate on time based on the data provided and it means the students did not perform well in their studies. This research was done by conducting a survey using the questionnaires were distributed to the students in the campus based on list name given by head of faculty. The degree students involved were from semester 4 and 5. The total of sample size is according to Krejcie & Morgan, (1970). The data from questionnaires were analyzed by Statistical Package for the Social Science (SPSS) version 23. The result analyzed using reliability analysis, frequency analysis, descriptive analysis, correlation analysis and multiple regressions. The results from the analysis show that this variable will lead to the academic performance towards degree students. The highest beta value is teaching and learning process. In a conclusion, this research gives some valuable information to the researcher, organization and the reader which is useful for basic knowledge. Moreover, the researcher also has recommended few strategies or ideas such as teachers need to create more on the ideas of teaching process, the institution need to take care of the students needs related to their learning process, and more concern on poor students in order to help them in academic performance among degree students semester 4 and 5 in the university.

Keywords: Academic Performance, Teaching and Learning Process, Family and Peers influence, Students’ Financial.

1. Introduction

There are many factors influencing students’ academic performance to ensure they are graduated on time. From past research, good performance of students might be from teaching and learning process, infrastructure of university, family and peers influence, and students financial. There are also the others hidden factors on why students extend maybe because health of the student but this seem only quarter having serious disease...
while studying that they need to take a special study leave. Academic performance of students will lead in increasing the employment. If the students perform well in their examination, then they will graduate on time. By getting the graduation on time they still have a lot of time to further their study for the next stage. That is why the students need to perform well in their study. By delaying or extend because of poor academic performance, a student might be tired and bored to study because they feel their study period are too long. It can conclude that, a person who study well or show interest in their study and can make it on time they will have more time to find the job since that the rate of employment in Malaysia will be increase (Ali et al., 2009). Students are tending to finish their study on time instead of delaying or extend. This is because if they make it on time they feel satisfied with their achievement it is meant they have a good academic performance. The academic performance will be affected if students did not have any interest on study and their parents still forced them to study and to make sure their children get the best place to study and also the best position once they graduate soon. So the purpose of this research is to investigate and answer the curiosity on why degree students did not perform their study and its impact towards the graduation on time (GOT).

2. Literature Review

2.1. Academic performance

Academic performance is important for an institution for the good outcomes that lead to the job performance in the future (Kuncel et al., 2005). According to (Hijazi & Naqvi, 2006) the academic performance is not affected by age, gender, and place of residence but they also said those who live near to university can perform much better than others who live far from university. According to (Hijazi & Naqvi, 2006) also weak students if group with good students will do better in academic and its will lead students to graduate on time. The fact is the effort from the students themselves if they want to improve their academic performance then they will (Zajonc, 1980). Moreover, poor study habits are also tend to delay the study (McKenzie & Schweitzer, 2001) and it will affect the Cumulative Grade Points Average (CGPA) of the students (Chapell et al., 2005). According to (Alimi, Ehinola, & Alabi, 2012) said the poor rate of academic performance also can resulted to the economy of the country.
2.2. Teaching and learning process

It communicates between both parties, students and teachers or lectures. Someone performed their lectures in front called teaching (Caroline, 2016). Meanwhile someone who receives the knowledge called learning process (Leki et al., 2006). Through this, it can build a better and improve students’ attitudes also in thinking and writing (Bonwell & Eison, 1991). According to (Chickering & Gamson, 1999) teachers and students who keeps connect to each other even outside from campus can encourage the students more motivated. Students who are actively in learning activities are tend to graduate on time (Tinto, 2004).

2.3. Infrastructure of the university

Infrastructure can be viewed as related to education such as classrooms, libraries, sports and recreation centres, furniture, laboratories; administrative blocks such as electricity and water (Ciborra & Hanseth, 1998). Within the facilities available in an institution the students are getting better expressed (Doane, 2008). According to (Doane, 2008) teaching and learning process are closely related to each other. A study said the smaller class, the students will receive clear instruction from the lecturers and it became easy for them to achieve such goals (Schneider, 2002). According to (Schneider, 2002) said It will become good if the students having a greater class in order to have good academic performance but the students need to put more effort to study. This is because nowadays, online learning is the fastest way for students to study (Ehiametalor, 2001). It can be conclude that, if the infrastructure are well equipped then it will have perfect attention by the lecturers and the results will show high motivation for the students in which they can have better academic performance and effective learning (Doane, 2008)

2.4. Family and peers influence

Some study said, parents with no qualification but if the mother’s education are strong than it will influence to their sons to finish their study on time rather than father (Ali et al., 2009). According to (Singh, Malik, & Singh) said that friends influence are more powerful rather than family. Peer support can also give an impact towards student’s grade point average (CGPA) (Chapell et al., 2005). According to (Tinto, 2004) students who are actively involve with the peers are tend to graduate on time.
2.5. Students' financial

The family income of students is likely to affect the college choice decision in terms of public-private institutions (Cullinane & Lincove, 2014). The study said many of the factors that influence the students which are most preferred to live at hostels, this is because the rental rates are cheaper that living outside of the campus, the room safety complete with hostel security (Khozaei, Ayub, Hassan, & Khozaei, 2010).

2.6. Conceptual framework

2.6.1. Independent variables Dependent Variable

![Figure 1: Conceptual framework.](image-url)

3. Methodology

In conducting this research, the type of investigation that the researcher used is correlational study. This is because the researcher is interested to identify the factors influence academic performance among degree student in semester 4 and 5 at this higher learning institution and its impact toward graduation on time.

The setting for this research is non-contrived. The researcher used field study which means there is minimal researcher interference. In other words, the researcher distributed the questionnaires without interfering the normal activities. It means that the student at Dungun Campus can do their job normally without any disruption from the researcher.
Furthermore, the researcher used individual unit analysis which is the data that was gathered from each individual and the researcher treats each student’s responses as an individual data source. The time horizon for this research is a cross-sectional study which means the data gathered just once over a period of time in order to answer a research question.

3.1. Data analysis

3.1.1. Correlation analysis

Correlation analysis needs to be done in order to know the relationship between two variables. The table below shows the Pearson Correlation Matrix.

| Pearson Correlation Are said to be | 0.8 and 1.0 | Very strong |
|-----------------------------------|-------------|-------------|
| 0.6 and 0.8                       | Strong      |
| 0.4 and 0.6                       | Moderate    |
| 0.2 and 0.4                       | Weak        |
| 0 and 0.2                         | Very Weak   |

Sources: Hair, Babin, Money, Samuel (2003)

Association between all of the variables needs to be tested in order to ensure that all of the independent variables are related to the dependent variable. Pearson correlation was used to test the association between all of the variables. The table below shows that there are relationships between academic performance and teaching and learning process, infrastructure of the university, family and peers influence and student’s financial. All of the dimensions for the independent variables which consist of teaching and learning process, infrastructure of the university, family and peers influence and students financial shows a relationship with academic performance as the value is recorded as \( r = 0.392, 0.431, 0.488, 0.587 \) respectively.

3.1.2. Regression analysis

Further analysis through regression, produces standardize measures (Beta Weights) of the strength for each dimension’s associations with academic performance. \( \beta \) is the values for the regression equation for predicting the dependent variable from the independent variable. Among the four independent variable; teaching and learning
TABLE 2: Summary of Regression Analysis.

| Model                  | Unstandardized Coefficients | Standardized Coefficients | t    | Sig. | Collinearity Statistics |
|------------------------|----------------------------|---------------------------|------|------|-------------------------|
|                        | B       | Std. Error | Beta |      | Tolerance | VIF          |
| (Constant)             | .869    | .256      |      | 3.396| .001       |              |
| Teaching and learning  | .380    | .072      | .363 | 5.302| .000       | .580         | 1.725 |
| Infrastructure         | .151    | .043      | .194 | 3.485| .001       | .879         | 1.138 |
| Family and peers       | .096    | .056      | .111 | 1.720| .087       | .658         | 1.519 |
| Student financial      | .201    | .049      | .243 | 4.130| .000       | .784         | 1.276 |

- Dependent Variable: academic performance

process (β 0.363, p<0.000), infrastructure of the university (β 0.194, p<0.229), family and peers influence (β 0.111, p<0.485), and students financial (β 0.243, p<0.000) only one variable is statistically not significant towards academic performance. That variable is the family and peers influence.

This result indicates that teaching and learning process has a higher Beta value that provides a strong evidence to be the factor that influenced the creation of academic performance. The table above also shows the collinearity statistic result. It consists of tolerance value and VIF value. The tolerance value that is more than 0.2 means that there is no duplication for each variable in which the respondents did not feel confused between the variable. There is no similarity between the variable which enable the respondents to clearly distinguish them. A tolerance under 0.2 usually means that the variable has correlation with their independent variable and should not be included. It can be concluded that the tolerance value for this study is more than 0.2: teaching and learning process is 0.580, while infrastructure of the university is 0.879, family and peers influence is 0.658 and students financial 0.784.

4. Conclusion

The result of the Pearson’s correlation test showed that there is moderate relationship with the value of correlation is 0.587. Apart from that, there is a positive relationship between teaching and learning process and academic performance. As supported by (Gil, 2006) the memorization should be on students and the lectures are acts as a facilitator for learning process and guide students to succeed.
The relationship between academic performance and student’s financial shows a moderate relationship where the value of correlation is 0.488. Apart from that, there is a positive relationship between student’s financial and academic performance. According to hossler, Braxton, & Coopersmith, 1989; Perna et al., (2008) there are positive relationships between academic performance and student’s financial whereas the higher the level of parents income lead to positive education outcomes.

The relationship between academic performance and family and peers influence shows a moderate relationship where the value of correlation is 0.431. Apart from that, there is a positive relationship between family and peers influence and academic performance. Most researchers agree that students’ academic performance with involvement or guide by parents has a positive influence to the students (Michael, 1991). Meanwhile students, especially in learning process who are actively involve with peers and academic staff will lead to graduate on time (Tinto, 2004).

The relationship between academic performance and infrastructure of the university shows a weak relationship where the value of correlation is 0.392. Apart from that, there is a positive relationship between infrastructure of the university and academic performance. According to (Cynthia & Megan 2008) positive relationship between infrastructure and student’s academic performance are confirmed. According to (Adeboyeje 1994, Vaisey 1968, Ejiogu 1997 and Nwagwu 2004) for completion in any educational goals for university those facilities or infrastructure to be used for teaching and learning such as classroom, table and chairs and library are needed and contribute for an institution in order to achieve the goals.

The highest beta value is teaching and learning process which is 0.363. Since teaching and learning is the main and significance factor that can influence the dependent variable which is academic performance, it answers the researcher’s question number two (2) of this study.

The table multiple regression shows that only two independent variables that are significant and they are teaching and learning process and students financial. Other independent variable which is infrastructure of the university and the family and peers influence is not significant. From that, researcher concludes that teaching and learning process and students’ financial is the major contributors that influence academic performance of degree students at the university and its impact towards graduation on time (GOT). The chi-square analysis is shows both are insignificant. This is because the alpha value is well above from 0.05.
5. Recommendations

After analyzing the four factors which are teaching and learning process, infrastructure of the university, family and peers influence and students financial, the researcher found out that only two independent variable of academic performance which are teaching and learning process and students financial able to improve for a better academic performance of degree students semester 4 and 5 at this higher learning institution. Hence, the researcher would like to suggest the management to focus on these two factors in order to improve academic performance of degree students semester 4 and 5.

5.1. Teaching and learning process

Different students are lead to different style of studying also their understanding for the subject (Bonwell & Eison, 1991). The lecturers should always have interaction with their students in the class. In addition, the lecturers can have recall session at the end of class to measure the understanding of the students during learning process. Students also should play an important role whereas they need to be active in class. Students should ask their lecturers' where never they did not understand during class.

5.2. Infrastructure of university

Infrastructure is the facilities provide by the university that aim for teaching and learning more comfortable for the students to study (Schneider, 2002). The university needs to upgrade the internet connection or WiFi connection for students can easily access because nowadays this kind of tool are important in learning process.

5.3. Family and peers influence

Family should play the main important role in order to make sure their children can graduate on time and perform well in their studies. The family should ask how their exam's result and give them moral support to their children.

Friends are the one who are always with us when we are in the college or at university. A good friend will influence us to be a good student. Find friends who can be with us through ups and down our life while studies. Find a friend who are keep telling you to
study and who are always see good in you. This is because friends also give impact on students’ academic performance (Ali et al., 2009).

5.4. Students’ financial

According to (Agus & bin Mohamed Makhbul, 2002) said those students who come from higher income of family will lead to better academic performance rather than the lower income of family. Student will have lot of incentive if they come from richer family (Checchi, 2000). But it is different to (Hijazi & Naqvi, 2006) said that there is negative relationship between family income and students’ performance.

References

[1] Agus, A., & bin Mohamed Makhbul, Z. K. (2002). An Empirical Study On Academic Achievement Of Business Students In Pursuing Higher Education: An Emphasis On The Influence Of Family Backgrounds. New Paradigm Of Borderless Education: Challenges, Strategies, And Implications For Effective Education Through Localization And, 168.

[2] Ali, N., Jusoff, K., Ali, S., Mokhtar, N., & Salamat, A. S. A. (2009). The factors influencing students’ performance at Universiti Teknologi MARA Kedah, Malaysia. Management Science and Engineering, 3(4), 81.

[3] Alimi, O. S., Ehinola, G. B., & Alabi, F. O. (2012). School Types, Facilities and Academic Performance of Students in Senior Secondary Schools in Ondo State, Nigeria. International Education Studies, 5(3), 44-48.

[4] Allen, J., Robbins, S. B., Casillas, A., & Oh, I.-S. (2008). Third-year college retention and transfer: Effects of academic performance, motivation, and social connectedness. Research in Higher Education, 49(7), 647-664.

[5] Arshad, M., Zaidi, S. M. I. H., & Mahmood, K. (2015). Self-Esteem & Academic Performance among University Students. Journal of Education and Practice, 6(1), 156-162.

[6] Bandura, A., & Cervone, D. (1986). Differential engagement of self-reactive influences in cognitive motivation. Organizational behavior and human decision processes, 38(1), 92-113.

[7] Bonwell, C. C., & Eison, J. A. (1991). Active Learning: Creating Excitement in the Classroom. 1991 ASHE-ERIC Higher Education Reports: ERIC.
[8] Chapell, M. S., Blanding, Z. B., Silverstein, M. E., Takahashi, M., Newman, B., Gubi, A., & McCann, N. (2005). Test anxiety and academic performance in undergraduate and graduate students. Journal of educational Psychology, 97(2), 268.

[9] Checchi, D. (2000). University education in Italy. International Journal of Manpower, 21(3/4), 177-205.

[10] Chickering, A. W., & Gamson, Z. F. (1999). Development and adaptations of the seven principles for good practice in undergraduate education. New directions for teaching and learning, 1999(80), 75-81.

[11] Ciborra, C. U., & Hanseth, O. (1998). Toward a contingency view of infrastructure and knowledge: an exploratory study. Paper presented at the Proceedings of the international conference on Information systems.

[12] Cosgrove, J. (2004). The impact of honors programs on undergraduate academic performance, retention, and graduation. Journal of the National Collegiate Honors Council–Online Archive, 137.

[13] Cullinane, J., & Lincove, J. A. (2014). The effects of institutional inputs on time to degree for traditional and nontraditional college students. Paper presented at the annual Association of Education Finance and Policy conference, San Antonio, TX.

[14] Doane, B. T. (2008). The relationship between school facilities and academic achievement. Master’s thesis, College of Education, Ohio University.

[15] Ehiametalor, E. (2001). School facilities management practice in Nigeria. Benin City, Nigeria association for educational administration and planning.

[16] Hijazi, S., & Naqvi, S. (2006). Factors Affecting Students Performance. A case of Private Colleges, Bangladesh. Journal of sociology, 3(1), 12-17.

[17] Khozaei, F., Ayub, N., Hassan, A. S., & Khozaei, Z. (2010). The factors predicting students’ satisfaction with university hostels, case study, universiti sains Malaysia. Asian Culture and History, 2(2), 148.

[18] Kuncel, N. R., Credé, M., & Thomas, L. L. (2005). The validity of self-reported grade point averages, class ranks, and test scores: A meta-analysis and review of the literature. Review of educational research, 75(1), 63-82.

[19] Leki, I., Cumming, A., & Silva, T. (2006). Second-language composition teaching and learning. Research on composition: Multiple perspectives on two decades of change, 141-169.

[20] McKenzie, K., & Schweitzer, R. (2001). Who succeeds at university? Factors predicting academic performance in first year Australian university students. Higher education research & development, 20(1), 21-33.
[21] Pavione C. S. N., Avelino, B. C., & de Souza Francisco, J. R. (2016). Factors that Influence the Teaching-Learning Process from the Perspective of Accountancy Students: Analysis at a Higher Education Institution in Minas Gerais. Revista de Educação e Pesquisa em Contabilidade, 10(2).

[22] Schneider, M. (2002). Do School Facilities Affect Academic Outcomes?

[23] Singh, S., Malik, S., & Singh, P. Research Paper Factors Affecting Academic Performance of Students.

[24] Tinto, V. (2004). Student Retention and Graduation: Facing the Truth, Living with the Consequences. Occasional Paper 1. Pell Institute for the Study of Opportunity in Higher Education.

[25] Winston, G., & Zimmerman, D. (2004). Peer effects in higher education College choices: The economics of where to go, when to go, and how to pay for it (pp. 395-424): University of Chicago Press.

[26] Zajonc, R. B. (1980). Feeling and thinking: Preferences need no inferences. American psychologist, 35(2), 151.