

Analysis of Factors that Influence First Year Students to Choose Biology Education Study Program in Universitas Tidar

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Abstract

This study aimed to determine the factors that influence first year students to choose Biology Education study program in Universitas Tidar and further discover the dominant one. Survey used as a data collection method in this study with population included all 90 first year students of Biology Education study program in Universitas Tidar in 2018. Sample size in this research is 74 students which is determined by Slovin formula. This research's data was collected using closed model Likert scale questionnaires and then analyzed descriptively and factor analysis exploratory using SPSS 22.00 for windows. The results showed that there are four factors that influence first year students to choose Biology Education study program in Universitas Tidar: (1) campus condition (with variables encompass: tuition fee, campus administrator, and campus location); (2) self motivation (including variables: interest, future goals, and talent); (3) campus attractiveness (consists of variables: career opportunity, campus facilities, and campus promotion); and (4) reference group (with variable: parents and friends influence). Campus condition factor was found as the most dominant factor while interest as the most dominant variable.

1. INTRODUCTION

Recently, many universities establish new study programs. This measure taken because of this era development which stipulate the increasing fulfillment of society needs, included education service. Universitas Tidar as one of the institution that enforce education service, in 2017 establish new study programs, one in particular is Biology Education study program, to respon society necessity.

The establishment of Biology Education study program based on several considerations. First, there are no universities whether state universities or private universities in the ex-Residency of Kedu region which now consists of Kebumen, Magelang, Temanggung, Purworejo, and Wonosobo that hold Biology Education study program. Secondly, the limited students capacity owned by other universities having Biology Education study program around the ex-Residency of Kedu, such as UNNES (Semarang), UNS (Surakarta), UNY, UIN Sunan Kalijaga, dan UAD (DIY) compared to the number of people have interest in it. Third, the lack of teachers availability in the Biology field to fulfill the demands from

educational institutions that are spread throughout Indonesia.

Biology Education study program in Universitas Tidar start to operate in 2018. The number of new students in the first year participated in the lecturers as many as 90 students divided in three classes. Previously they were prospective students who had taken admission selection through Seleksi Nasional Masuk Perguruan Tinggi Negeri (SNMPTN), Seleksi Bersama Masuk Perguruan Tinggi Negeri (SBMPTN), or Seleksi Masuk Mandiri (SMM). They come from different backgrounds such as area of origin, economic conditions, and school origin. Along with the fact that the first year students are plentiful enough in numbers and come from a number of different backgrounds, it shows that the opening of the study program in its initial year had quite a good response from the community.

However, in the future it is likely that with the high demand from community, many universities will open new study programs and there will be unavoidably competition between universities that have similar study programs. In this case, higher education will compete with each other

to get prospective students in the new student admission program. Therefore, currently universities must have the ability to compete and make the necessary efforts to remain attractive to the community. Biology Education study program in Universitas Tidar as a newcomer needs to make the necessary efforts to increase its attractiveness in order to remain an alternative choice for people in education service providers.

Higher education requires information as material for development especially to increase attractiveness to the community in choosing the study program offered. Information about the factors that influence student decision in choosing a study program is important to be owned by universities. This information can provide many descriptions as a consideration for universities to make policies.

The decision making process for students to choose a study program in a college involve several alternative choices. According to Zulkarnaen (2013) the decision is the process of selecting the best alternative from several alternatives systematically to be followed up. While decision making is the choice of behavior alternatives from two or more alternatives (Terry, 2008). Whereas Griffin (2012) argue that decision making is the act of choosing an alternative from a series of alternatives. All of the opinions above suggest that the decision-making process involves several alternative choices.

Moreover, choosing a study program for prospective students is similar to deciding on the selection of a product to be used which will go through several stages. According to Kotler P. (2002) these stages, namely problem recognition, information search, alternatives evaluation, purchasing decisions, and post-purchase behavior. Prospective students as parties who will use the product in the form of education services at the beginning of the selection process encounter problems about what study programs and universities will be chosen. Then prospective students look for information about the alternatives of existing study programs and colleges. Furthermore, prospective students select from these alternatives by considering certain factors. After the alternative decreases, only one alternative remains.

A person's decision to choose an alternative from the existing alternatives involves various factors for consideration. Before prospective students choose a particular study program and college, initially comparing alternatives that arise by observing several factors. Which study program and college will be chosen by prospective students is as if a buyer who will buy a product. Nalim (2012) states that prospective students are parties who have the right to provide an assessment of the attractiveness of an educational institution.

There are several opinions about variables considered by someone in choosing a product. According to Lamb (2001) the level of involvement

in product selection depends on experience, interests, risks, situations and social views. While Munandar and Sunyoto (2001) argue that the decision to choose one's product will be influenced by cognitive, affective, personality traits, culture, family, social status, and reference groups.

A person's behavior in determining the product to be used according to Kotler and Keller (2009) is influenced by 4 factors, namely cultural, social, personal, and psychological factors. Cultural factors can be in the form of nationality, religion, racial group, and geographical regions. Social factors in the form of reference group, family, role and status variable. Personal factors are in the form of age and life cycle, work, economic conditions, personality and self-concept, and values and lifestyle variable. Psychological factors are variables of motivation, perception, learning, and memory. Students as consumers in the educational service industry can be influenced by all or some of these factors.

Research on the factors that influence students in choosing a study program has been done several times. Among the results of previous studies concluded several factors that influence the selection of a study program for prospective students are as follows. According to Iranita (2012) product factors, physical evidence of the college, motivation, group, price, and people's factors. While Suryani & Ginting (2013) found that process, motivation, physical evidence, references, costs, and location are the factors. Ary (2016) stated that the factors consist of academic reputation, financial assistance, availability of academic programs, social atmosphere and geographical location, student population, and university size. According to Suriyani (2016) socioeconomic background, peer interaction, achievement motivation, and reputation became the factors. Saputro (2017) argue that the factors are family, colleagues, personality of prospective students, school of origin, campus image, and employment prospects. Nuryadin, Sangen, & Albusairi (2017) conclude that brand loyalty factors, normative and informational reference groups, brand awareness, brand associations, external environmental influences, human resources quality and learning atmosphere and facilities are the factors. The results of these studies provide a description that each college has distinctive factors that influence students decision about study program choice. This can happen because each university has a different condition or quality. In addition, it can also be caused by the prospective student's own factors who have different backgrounds.

Based on the elucidation, the researchers consider it necessary to conduct research in revealing the factors that influence first year students choosing Biology Education study program in Universitas Tidar and discover what factors and

variables are the most dominant. The results of this study are expected to provide useful information for Universitas Tidar in particular the biology education study program and generally for other universities in order to carry out the process of improvement and development in an effort to increase its attractiveness to the community.

2. RESEARCH METHODS

This research is a survey research attempted to extract information from a population. This research is deductive because it exerts to generalize variables into simpler factor groups. The population of this study was students of the first year Biology Education study program Universitas Tidar in 2018 involved for the first semester lectures. This study used a sample of 74 students. The sample was taken using the sampling formula from Slovin according to Siregar (2013):

$$n = \frac{N}{1 + Ne^2}$$

Where:

n = sample size

N = population number

e = error level prediction (0,01)

The data collection instrument of this study is a Likert scale questionnaire that contains statements about the variables that influence the student in choosing the Biology Education study program in Universitas Tidar. Research subjects were asked to respond to these statements in accordance with the conditions they experienced. The answer of the questionnaire is closed type, where the choice of answers is provided, namely very appropriate, appropriate, less appropriate, and not appropriate. Scoring is undertaken by giving a number to each answer with a weighted weight according to the order of answer choices, namely 4, 3, 2, 1. In addition, there are also additional questions about the future goals of students and the media used by students in obtaining campus promotions.

This research uses descriptive data analysis techniques and Exploratory Factor Analysis (EFA). Descriptive data analysis is used to discover the general description of the data obtained after the data collection stage carried out. Category criteria about how the level of consideration of each variable in decision making by students based on descriptive analysis are presented in table 1. EFA is a multivariate statistical analysis. According to Williams, Onsmann, & Brown (2010) EFA is often used in educational research. EFA is a type of analysis that attempts to find dimensions that may occur from several variables which are mutually independent. "In general, factor analysis or principal component analysis aims to reduce data and interpret it as a new variable in the form of formed

variables" (Daely & Sinulingga, 2013). With EFA, researchers can also determine the extent to which each variable can be explained by each dimension / factor obtained. In this study, the initial variables that could influence students choosing the Biology Education study program in Universitas Tidar were analyzed to search the dimensions so that a simpler group of new factors could be obtained. Completion of Exploratory Factor Analysis in this research data uses SPSS 22.00 for Windows software.

Table 1. Criteria for Descriptive Analysis Categories

Average Range of Scores	Category
$3 < N \leq 4$	Highly Considered
$2 < N \leq 3$	Considered
$1 < N \leq 2$	Less Considered
$N = 1$	Not Considered

Based on the theory about the variables that influence people in choosing a product, as well as previous research that has the same goal, and also the typical conditions of Biology Education study program in Universitas Tidar as it is a new study program with its initial students, researchers limit the variables that will be analyzed on:

- a. campus administrator: is the stakeholder that organizes campus activities. In this case Universitas Tidar is a university organized by the government so that it is called a state university,
- b. campus facilities: are physical and non-physical devices owned by the campus in conducting lectures,
- c. campus location: is a geographical location where campus conducts lecture operations,
- d. tuition fees: are costs incurred by students to be able to enrolled and attend lectures on campus,
- e. family influence: is a contribution from the family in influencing decision making process of choosing a study program,
- f. influence of friends: is the contribution of people who are considered to have a close relationship outside the scope of the family in influencing the decision making process of choosing a study program,
- g. interest: is the heart's tendency towards something,
- h. talent: is the ability or skill possessed as self potential,
- i. future goals: are hopes of desired conditions in the future,
- j. level of competition: is a perception of the level of competition in the selection process in the study program enrollment,
- k. career opportunities: are perceptions about the ease of career that will be obtained after studying in the study program,

1. campus promotion: is a socialization effort conducted by the campus to inform the study program to the community.

3. RESULTS AND DISCUSSION

This study uses 12 initial variables that can influence student decisions in choosing a Biology Education study program based on the theory and results of similar studies that have been conducted. The 12 variables were then analyzed using Exploratory Factor Analysis. As for some conditions requirements a data can be analyzed using Exploratory Factor Analysis according to Williams, Onsmann, & Brown (2010) are having a sample adequacy that is indicated by the Kaiser-Meyer-Olkin (KMO) Measure of Sampling Adequacy value between 0.5 - 1 and has a real relationship between variables indicated by the significance value of Bartlett's Test of Sphericity which is less than 0.05. In addition, each variable analyzed must have a Measure of Sampling Adequacy (MSA) value of more than 0.5.

Based on the initial assumption test for Exploratory Factor Analysis, the results showed that these variables have a value (KMO) Measure of Sampling Adequacy of 0.643, meaning that the data has a sample adequacy and is feasible to be analyzed by Exploratory Factor Analysis. Significance value of Bartlett's Test of Sphericity is 0,00, which means that each variable has a real relationship between each other. The MSA values of each variable are more than 0. For variables: campus administrator, campus facilities, campus location, tuition fees, family influences, influence of friends, interests, talents, future goals, career opportunities, and campus promotions. Therefore, all of these variables are pointful to be analyzed. The level of competition variable has been excluded from the analysis because the results of the previous MSA calculation only showed a value of 0.436 which means it is not feasible to be further analyzed. The next analysis does not involve competition level variable in the calculation.

Table 2 below exhibits information about the value of communalities which shows how much new factors formed from the results of the analysis can explain the initial variables. This value can be seen in the extraction column. Thus it can be explained that the new factors formed can explain campus administrator variable by 59.9%, campus facilities 56.7%, campus location 79.6%, tuition fees 64.6%, family influence 68.69%, influence of friends 69.8%, interest 63.1%, talent 68.1%, future goals 66.1%, career opportunities 53%, and new factors formed can explain campus promotion variable by 70.7%.

Tabel 2. Communalities Value

Variable	Extraction
Campus administrator	.599
Campus facilities	.567
Campus location	.796
Tuition fees	.646
Family influence	.686
Influence of friends	.698
Interest	.631
Talent	.681
Future goals	.661
Career opportunities	.530
Campus promotion	.707

Tabel 3. Initial Eigenvalues

Variable	Initial Eigenvalues		
	Total	% of Variance	Cumulative %
1	2.625	23.866	23.866
2	2.069	18.807	42.672
3	1.439	13.080	55.753
4	1.069	9.721	65.474
5	.868	7.892	73.366

The number of new factors that are formed from the analysis of the initial variables can be found in table 3 which contains Eigen values. With the provisions of the total value to be taken to determine the number of factors formed is more than 1, then based on table 4 shows that the initial variables can be grouped into only 4 groups of new factors because if categorized into five group then total values is less than 1 (0.868). These four factors can explain the initial variables by 65.474%, so the remaining 34.526% cannot be explained by the four groups of new factors that are formed. This indicates that there are still other variables that have not been observed that can influence student decisions in choosing the Biology Education study program in Universitas Tidar.

The results of Exploratory Factor Analysis have divided 11 initial variables into 4 groups of new factors. In determining the members of each new factor it can be seen at table 4. The requirement is the initial variables that have the greatest correlation value to one of the new factors become a member of these factors. Thus, it indicated that members of factor 1 are variables of talent, interests, and future goals. Members of factor 2 are variables of influence of friends and family influence. Members of factor 3 are variable career opportunities, campus facilities, and campus promotions. While members of variable 4 are variables of campus location, tuition fees, and campus administrator.

Tabel 4. Rotated Component Matrix^a

Variable	Factor			
	1	2	3	4
Talent	.798	.108	.143	-.110
Future goals	.767	-.117	-.048	.239
Interest	.765	.063	-.064	-.194
Influence of friends	.131	.823	-.060	-.019
Family influence	-.133	.770	.209	.181
Career opportunities	-.087	.005	.707	.151
Campus facilities	.207	.157	.697	.120
Campus promotion	-.006	.577	.587	-.171
Campus location	-.106	.042	.183	.865
Tuition fees	.179	.494	-.009	.608
Campus administrator	-.167	-.153	.510	.536

Name appropriation of new factors that are formed can simplify the mention of the initial variables incorporated in it. The labelling of these new factors is based on the linkages between initial variables as members of the new factor. Based on these considerations, factor 1 labelled as a self-motivation factor, factor 2 as reference group factor, factor 3 as campus attraction factor, and factor 4 as campus condition factor.

Tabel 5. Factors influencing students' decisions to choose Biology Education study program in Universitas Tidar

No	Factor and Variables Member			
	Self-Motivation Factor	Reference Group	Campus Attractiveness	Campus Condition
1	Talent	Influence of friends	Career opportunities	Campus location
2	Future goals	Family influence	Campus facilities	Tuition fess
3	Interest		Campus promotion	Campus administrator

Table 6 shows the new factors that are formed along with the initial variables as the members. Thus, it can be said that the factors influence students in choosing the Biology Education study program in Universitas Tidar in the first year of their opening are 4 factors, namely self motivation, reference groups, campus attractiveness, and campus conditions. Each has different variable components.

Descriptive analysis is presented in table 6. It can be seen that the scores of each factor filled by 74 students of Biology Education study program of Universitas Tidar gave varied results.

Tabel 6. Results of Descriptive Analysis of Variables

Factor	Variable	Average Score	Category
Self Motivation	Interest	3,40	SD
	Future goals	3,19	SD
	Talent	2,97	D
Reference Group	Family influence	2,09	D
	Influence of friends	1,76	KD
Campus attractiveness	Career opportunities	2,82	D
	Campus facilities	2,73	D
	Campus promotion	2,10	D
	Tuition fees	3,35	SD
Campus condition	Campus administrator	3,31	SD
	Campus location	3,18	SD

Where:

SD = Highly considered

D = Considered

KD = Less considered

Motivation Factor

Motivation factor give influence to students in choosing the Biology Education Study Program at Universitas Tidar through talents, future goal, and interests variables. Motivation according to Schunk (2012) is a process to initiate and maintain activities that directed at achieving goals. Uno (2011) argued that motivation is the basic drive that moves someone to behave. Meanwhile, Oemar Hamalik (2011: 158) stated that motivation is a changing energy in a person that is characterized by the emergence of feelings and reactions to achieve goals. In conclusion, motivation is something that comes from within that influences the emergence of an action.

Talent, future goal, and interests are subject matters exist within each prospective student, so that it can influence the emergence of actions in the form of study program selection. Descriptively table 6 indicates the responses of students of the Biology Education study program of Universitas Tidar to talent variables have an average score of 2.97, future goal of 3.19, and interests of 3.4054. Therefore from those three motivation variables the highest score is obtained by interest variable with highly considered criteria. According to Salih & Wahab (2004) interest can be explained as a tendency to give attention and act to people, activities or situations that become objects of interest with a feeling of pleasure. Interest is formed along with growth, thinking maturity, learning process and experience. Interest can change according to one's development and growth phase. The more mature a person is, the more stable the

conditions of interest in him both quantitatively and qualitatively.

Prospective students of the Biology Education study program before entering tertiary education have gone through many learning experiences from elementary school to high school, so they could have preferred subject tendencies. From the results of the interview with the subject of this study, it was known that they chose the study program because they wanted to avoid math based on calculation, while biology is a science based on rote learning.

Future goal variable have highly considered criteria. Based on the survey results with an open questionnaire about what goals students want after graduating from the Biology Education study program of Universitas Tidar are shown in table 7. It can be seen that the majority occupation as the future goal chosen by students are teachers, second place is tertiary education lecturers, and ranked third are become both teachers and entrepreneurs. There is one unique goal, as it is not in line with the educational program that will be obtained in the Biology Education study program, namely female police or policewomen.

The talent variable received a considered criteria. Talent in this study is the ability or skills possessed as self potential. This means that in choosing the Biology Education study program of Universitas Tidar have considered and adapted to the potential they have in themselves.

Table 7. Future Goals (in the form of Occupation) of Biology Education students in Universitas Tidar 2018

Future Goals	Percentage (%)
Teacher	60,34
Tertiary Education Lecturer	17,24
Teacher & enterpreneur	6,9
Enterpreneur	5,17
Researcher	3,45
Tertiary Education Lecturer & enterpreneur	1,72
Teacher & researcher	1,72
Laboratory assistant	1,72
Police woman	1,72

Respondent: 54 subjects

Reference Group Factors

The reference group factors have an influence on the student's decision to choose the Biology Education study program of Universitas Tidar through family influence variable and the influence of friends. Schiffmen and Kanuk (2008) stated that referral groups involve one or more people who are used as a basis for reference

between reference points to shape affective responses and cognitions of one's behavior.

Reference groups are oriented towards two forces, namely normative reference groups and informational reference groups. Normative reference groups are reference groups that influence values or behaviors that are determined in general or broad scope. Informational reference groups are reference groups that are placed as benchmarks for attitudes or behaviors that are specifically or narrowly determined.

Family influence as a reference group can come from a nuclear family or extended family. The nuclear family can come from father, mother, brother or sister. While extended families can come from anyone who still has a kinship relationship.

The influence of friends as a reference group can come from friends at the previous school level or friends in other communities. Slavin (2008) explains that peer environment is an interaction with people who have similarities in age and status. In the tendency of election to a matter someone prefers to join people who have the same thoughts, hobbies and circumstances.

Based on the descriptive analysis (table 7) it can be seen that family influence variables have an average total score of 2.09, while the influence variables of friends have an average total score of 1.76. It can be interpreted that family influence variable is more considered in determining student decisions in choosing the Biology Education study program of Universitas Tidar than the influence of friends variable. Students consider more suggestions from their own family than from their friends. The family as the smallest unit in the community structure that is relatively more understanding of the condition of someone as their family members is indeed supposed to give a greater positive influence than other parties who are not part of their family members.

In this study, the influence of friends variable got the smallest average score when compared to other variables. It can be interpreted that there are not many students in making decisions to choose a Biology education study program who are influenced by their friends.

Campus Attractiveness Factor

The attractiveness of the campus factor that influences students in choosing the Biology Education program consists of career opportunity, campus facilities, and campus promotion variables. Product attractiveness according to Tjiptono (1997) is everything that can be offered to be considered, asked, sought, bought, consumed as fulfillment of needs. The attractiveness of the product must have three characteristics which are meaningful, distinctive, and trusted. Meaningful shows the benefits that make consumers prefer or are more interested in the products. Distinctive must state

what makes the product better than other products. In the last, trusted is that it must be able to convince consumers of the truth of the quality of the product being promoted.

Career opportunities in this study means the perception of prospective students about the ease of career that will be obtained after studying in the Biology Education study program. According to Kotler P. (2002) perception is a process used by someone to choose, organize, and interpret input information to create an image that has meaning. The perception is caused by the receipt of messages or information from outside (Schiffmen and Kanuk, 2008). The initial perception of prospective students on the ease of career that will be obtained after taking a college gets an average score of 2.82 which means that the variable is considered by students. Career opportunities as the alternative choices of students based on table 6 are 9 alternatives, namely teachers, lecturers, teachers as well as entrepreneurs, entrepreneurs, researchers, lecturers as well as entrepreneurs, teachers as well as researchers, laboratory staff, and policewomen.

Campus facility variable obtained an average score of 2.73, which means that these variables are considered by students. With the criteria of "considered", it can be interpreted that the facilities of Biology Education study program Universitas Tidar could be a special attraction for students. The study program, although newly established, can carry out lecture operations with adequate facilities both physically and non-physically. Prospective students also observe the overall facilities owned by Universitas Tidar in addition to the facilities in the study program to take in consideration.

Campus promotion variable also got considered criteria, meaning that students are interested in promotions conducted by the campus so that they choose the Biology Education study program of Universitas Tidar. The data about what sources become the most media for students in obtaining campus promotions are shown in table 8. Based on table 8, it can be seen that the most widely used by students in viewing information about campus promotions is the Universitas Tidar website which percentage exceeds 63%. While offline or printed newspapers have the smallest percentage of only 1.19%.

Table 8. Means of Campus Promotion

Promotion Source	User Percentage (%)
Untidar website	63,10
Social media	22,62
Offline flyers	7,14
Non-Untidar website	5,95
Offline newspaper	1,19

Respondent: 84 subjects

Factor of Campus Conditions

Tuition fees, campus administrator, and campus location variables are included in one new factor, namely campus conditions. Tuition fees variable in the descriptive analysis had an average score of 3.35. This means that tuition fees are highly considered by prospective students in choosing the Biology Education study program of Universitas Tidar. Based on economic law, it is stated that humans want to get the maximum profit but with the smallest cost. Hansen & Mowen (2009) argues that prospective students will certainly choose alternative study programs in higher education with lower tuition fees if they still be able to obtain good services. The Biology Education study program of Universitas Tidar as a newcomer has tuition fees that is still affordable by the community. The affordable cost encourage students to choose the this program.

Campus administrator variable in the descriptive analysis got an average score of 3.31. That means the campus administrator variable belongs in the category highly considered by students in deciding to take Biology Education study program of Universitas Tidar. Based on its administrator, Universitas Tidar is a state university which is organized by the government. Universitas Tidar was formerly a private university with the name Universitas Tidar Magelang organized by the Tidar College Foundation. In 2014 Universitas Tidar Magelang switched to being managed by the government based on the Republic of Indonesia Presidential Regulation Number 23 of 2014 and changed its name to Universitas Tidar. State universities in Indonesia appear to be attractive to prospective students because the community believes that they have better quality and their graduates will likely get higher credit in the job enrollment. Therefore, it can be considered more in choosing a study program.

Campus location variable in the descriptive analysis got an average score of 3.18. This indicates that the location of the campus is a variable which is also highly considered by students in choosing the Biology Education study program of Universitas Tidar. Universitas Tidar is located in the city of Magelang in Central Java region. The city of Magelang is in a strategic position because of its proximity to major cities such as Jogjakarta, Kulon Progo, Semarang, Temanggung, Wonosobo, Purworejo, Kebumen, and Salatiga. Besides that, the access road to Universitas Tidar is also very easy to reach because it is close to cross-provincial roads. These ease of the location is encourage the prospective students to consider it highly in choosing a study program.

Dominant Factors

Based on the category of variables in each factor presented in table 6, it can be seen that each factor has variant category of variables. Self-motivation factor has 2 variables that are included in "highly considered" category and 1 variable categorized as "considered". The factor of the reference group has 1 variable categorized as "considered" and 1 variable "less considered". The attractiveness of the campus factor has 3 variables categorized as "considered". The campus condition factor has 3 variables that are categorized as "highly considered". Thus, based on the composition of the categories of variables, the ranking order of the factors from most dominantly to the least in choosing the Biology Education study program of Universitas Tidar are campus conditions, self motivation, campus attractiveness, and reference groups.

Campus conditions is found to be the most dominant factor in influencing students to choose study programs. Prospective students as consumers or users of educational services, certainly do not want to "buy a cat in a sack". Prospective students consider how the condition of the campus that will be used as a place to study.

The reference groups is the factor that gets the last order from the four factors. It can be interpreted that prospective students are indeed human beings who have approached the adult phase of personality development, so that in considering something they have independence. Influence from parents or friends is used as input for consideration in choosing but not to be placed as a final choice.

The ranking order of variables based on the highest to the lowest average score is interest, tuition fees, campus administrator, future goals, campus location, talents, career opportunities, campus facilities, campus promotion, family influence, and the influence of friends. Consequently, if the variables are separately observed without considering new factors that are formed, then interest is a matter of great consideration for students in choosing Biology Education study program of Universitas Tidar. Without interest in the study program itself, even though the college has good quality, it will still be difficult to be an option.

4. CONCLUSIONS AND RECOMMENDATIONS

This study concludes that out of the 11 variables that influence first-year students in choosing Biology Education study program of Universitas Tidar, 4 main factors are formed, namely self-motivation, reference groups, campus attractiveness, and campus conditions. The campus motivation factor consists of variables of talent, future goals, and interests. The reference group factor encompasses of friends' influence and family

influences variables. The attractiveness of the campus factor including career opportunities, campus facilities, and campus promotions variables. The factor of campus condition consists of campus location, tuition fees, and campus administrator variables.

Ranking of factors from the most dominant considered by students is campus conditions, self-motivation, campus attractiveness, and reference groups. The ranking order of variables from the most considered by students is interest, tuition fees, campus administrator, future goals, campus location, talents, career opportunities, campus facilities, campus promotion, family influence, and the influence of friends.

The results of this study can be a recommendation for all parties in the context of further research and hopefully it could be as material for improvement or development of college study programs. This study has limitations in determining the initial variables that influence students in choosing a study program, so that the results of the analysis are limited to the initial variables that have been determined.

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