Determinants Of Student's Satisfaction On Higher Education Institution In Purwokerto
(Study At Universitas Jenderal Soedirman)

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Abstract. This research has the aims to analyze the effect of visual identity ,academic reputation and service quality on student satisfaction at Unsoed and how the student's satisfaction can lead to word of mouth communication to others. This research is descriptive research with survey method by using questionnaire to collect the data. Research results show that visual identity, academic reputation and service quality has positive effects on student satisfaction and lead to word of mouth marketing for Unsoed . Based on research result, Faculty Economics and Business Unsoed should increase the way to maintaining their visual identity satisfaction by improving physical facilities ,increasing their academic reputation by expanding collaboration with external parties and enhancing service quality and increasing service quality by academic staff. If this strategies conducted well, then it will lead to word of mouth marketing to attract potential students.

Keywords : visual identity, academic reputation, student satisfaction, word of mouth.

1   Introduction

The development of the current era has demanded an improvement in the quality of human resources as one of the inputs for production factors needed in various sectors of livelihood. The university is a higher education institution that produces graduates who are expected to be able to contribute quality human resources as both businessmen and employees in companies.

A professional workforce in their sector is in high demand due to the high demand for the provision of quality human resources. In order to address these needs, a variety of educational institutions that provide a great variety of majors have emerged. Unsoed as public higher education institution in the southern part of Java Island has taken a number of development initiatives in response to the growing intensity of competition among established universities. Higher education institutions currently need to create effective and innovative strategies to attract and retain good relationships with students as key stakeholders for universities due to the intense competition among higher education institutions.

An important aspect that can be the determining factor for the sustainability of a university is the establishment of student satisfaction as the primary consumer of the university. Student satisfaction at a higher education institution can be influenced by the visual identity of the university [2], the quality of service received [3] and the reputation of the university [8].

University visual identity is one of the useful assets for universities in competing between universities to maintain the number of students to a certain level in order to maintain their status as major universities. The concept of university visual identity is a concept that refers to the concept of corporate identity. University visual identity is a strategically planned identity with the intention of getting a positive image in the community. The positive image of the university is the outcome of associations formed by the community regarding a university. University visual identity refers to the visual or physical appearance of the university including its name, logo, tagline, colors, and architectural features. University visual identity can also be in the form of community behavior about the identity of a university [2] More specifically, according to Bosch [5], the visual identity of an organization consists of all symbols and graphical elements that express the essence of an organization. Research by Baker and Balmer at the University of Strathclyde [4] highlights the importance of visual identity in formulating strategies and solving problems relevant to the physical aspects of a university.

Another factor that can affect student satisfaction in studying at a university is the academic reputation of the university itself. According to [8], student satisfaction is determined by academic reputation.

The third factor that affects student satisfaction in higher education institutions is the service quality received by students during their studies. Parasuraman et al [18] concluded that the consumer's perception of service quality is the outcome of a comparison between expectations and the actual service experience. The perception of the service quality received by students is a form of student interaction with academic staff, lecturer and head of department at the university . If the organization (in this case the university) is able to provide a level of service that exceeds consumer expectations, consumers will give a high rating for the quality of the services that the organization provided [15] .According to [16], an institutions can obtain student satisfaction through the quality of services provided as part of establishing a sustainable competitive advantage.

The satisfaction experienced by students while attending Unsoed can have a positive effect in the form of verbal promotions that these students will convey to other potential students. Verbal promotion carried out by consumers against other potential consumers is known as word of mouth communication [12]. Word of mouth communication (WOM) is a crucial part of marketing strategy, especially when it comes to influencing consumers decisions on which universities to attend [7].

Jenderal Sudirman University (Unsoed) is a leading government-owned higher education institution in the southern part of Java. According to the Webometrics version of data obtained from the Ministry of Research, Technology, and Higher Education of the Republic of Indonesia, or Kemristek Dikti, Unsoed currently ranks 56 out of 1,144 universities in Indonesia (www. Inews.id, 05 February 2022). This shows Unsoed's position as one of the universities in Indonesia with a good reputation. Based on data obtained from the spmb.unsoed.ac.id website as of July 9, 2022, the number of Unsoed enthusiasts decreased by 5.22%. From 96,256 SNMPTN enthusiasts in 2020, it decreased to 91,227 enthusiasts in 2021. This should be a concern for Unsoed because fewer applicants may indicate that there is a decrease in the level of satisfaction felt by students.

As the key stakeholders of the university, the satisfaction of students as the main consumers needs to be Unsoed's priority. This aims to maintain the sustainability of Unsoed as a leading higher education institution in Indonesia and as an effort to achieve Unsoed's vision to become a world class University. Unsoed has implemented a number of internal and external strategies to preserve student satisfaction in order to achieve this goal. To accommodate teaching and learning activities in the Unsoed environment, Unsoed has completed a variety of physical aspect developments in order to achieve student satisfaction. Unsoed also collaborates with numerous external parties to improve its academic reputation. Furthermore, there is constant effort made to improve the services provided to students. Due to the high level of student satisfaction, Unsoed students will encourage high school graduates to continue their study at Unsoed in order to increase the number of enthusiasts and students at Unsoed.

There are currently very few studies that examine the physical aspects that influence the level of student satisfaction at universities, especially in Indonesia. Therefore, it is expected that the findings of this study will be able to contribute scientifically to the development of research with the object of higher education. The findings of this study are expected to be used by Unsoed as evaluation material and suggestion, especially for the program to develop strategies for for maintaining student satisfaction as the main consumers of the university in the future.

2   Literature Review And Hypothesis Development

University Visual Identity and Students Satisfaction

University visual identity is a concept that developed from the concept of corporate identity. Baker and Balmer [4] have data related to a number of universities that have started to adapt the concept of corporate identity into the development of university growth strategies. The findings of another study from [8] have even been able to develop a corporate identity model for the education sector. University identity, according to Alessandri et al. [2] is the appearance of a university that has been strategically planned and contains a specific goal to gain a positive image in the community. University visual identity consists of the visual appearance of the university itself, in the form of the name, logo, colors, tagline, architectural features and community behavior about the university. University visual identity variable in this study refers to the concept developed by Alessandri [2] Elements of a corporate visual identity consists of all symbols and graphical elements that can express the essence of an organization.

Melawar and Akel [16] believe that a visual identity will be able to raise public awareness of an institution's capabilities, strengths, products, services, and exclusivity of an institution. Logo design, color schemes, symbols, building architecture, name usage and slogan designs can be used to shape an institution's image as perceived by consumers. According to [16] and [15]] university visual identity has a positive effect on consumers satisfaction. Based on the description above, the first hypothesis in this study can be formulated as follows:

H_1: University visual identity has a positive effect on student satisfaction.

Academic Reputation and Students Satisfaction

Reputation is a valuable intangible asset of a company. According to Low and Kalafut [10], reputation is how different individuals perceive an organization. A more specific definition of corporate reputation is stated by Gotsi and Wilson 14]. Gotsi and Wilson [14] defined corporate reputation as the evaluation of all stakeholders of the company over time. Through social interaction and public communication, reputation is gradually created over a very long period of time.

From the definition of corporate reputation stated above, it can be concluded that stakeholder experiences with universities, whether direct or indirect, and information collected by stakeholders through a variety of communication channels and symbols, create university reputation (Alessandri et al, 2006). The concept of university reputation, according to Alessandri et al. (2006), has three dimensions, namely the quality of the university's academic performance, the quality of the university's external performance, and the emotional connection that students have with the university.

One of the indicators of student satisfaction at a university is its academic reputation. This is indicated by the findings of a study on German higher education services by Gruber et al. [3]. One of the findings of his study shows that there is a positive effect between academic reputation and student satisfaction. Another study from Kao [11] also shows a positive influence of academic reputation on student satisfaction. Based on the description above, the second hypothesis in this study can be formulated as follows:

H_2: University academic reputation has a positive effect on student satisfaction

Service Quality and Students Satisfaction

According to Lupioyadi [13], service quality is a determining factor for the success and quality of a company. Service quality is the level of expected performance and quality control to meet consumer needs. Parasuraman et al [18] defined service quality as the difference between reality and consumer expectations for the services received. Indicators of service quality according to Zeithmal et al [18] consist of Tangibility (physical condition of the service provider, including the facilities, tools, appearance of employees, and communication technology in use); Reliability (ability to deliver services convincingly and accurately); Responsiveness (employees' initiative to help customers and meet their needs of services); Assurance (knowledge, ability, and politeness of employees when providing services); Empathy (individual attention given by service providers to their customers).

In order to achieve university sustainability, one of the goals of the university is to offer the best services to students. According to [22], one of the main objectives of higher education institutions is to offer students excellent service. According to Poh et al [19] and Abd Rahman et al [1], service quality has a positive effect on student satisfaction). Based on the description above, the third hypothesis in this study can be formulated as follows:

H_3: University service quality has a positive effect on student satisfaction.

Student Satisfaction and Word of Mouth Communication

Satisfaction is an evaluation based on a comparison of the experience and the expectations after using a product or service [8] .Meanwhile, according to Tjiptono [20] consumer satisfaction is a person's feelings following a comparison of performance to expectations. Consumers will be satisfied if the product (goods/services) they use performs as promised, on the other hand, if consumers are disappointed with the product's performance, it will lead to dissatisfaction. Satisfaction can lead customer to recommend the products to other potenstial consumers. This promotional strategy called Word of Mouth (WOM) communication/ marketing.

Word of mouth communication is a concept that is rarely studied in higher education institutions. According to Arndt (1967) in Jiewanto [9], WOM is a pattern of person-to-person oral communication between a sender and a recipient in which the recipient interprets the message as a non-commercial message about a brand, product or service. WOM represents consumers' desire to recommend products or services to others in the future [6] Application of WOM concept in higher education sector is still rare, whereas the student choice to study at higher education commonly affected by prior students references. Those references has been proved became main consideration when students choosing university. Based on Jiwanto [9] students satisfaction has positive effect on intention to do word of mouth communication. Based on the description above, the fourth hypothesis in this study can be formulated as follows:

H_4: Student satisfaction has a positive effect on Word of Mouth Communication

Based on above explanation, research framework can be see in following figure. This framework will showing how the effect of visual identity, academic reputation and service quality will analyzed toward students satisfaction and how the students satisfaction will lead word of mouth communication to others.
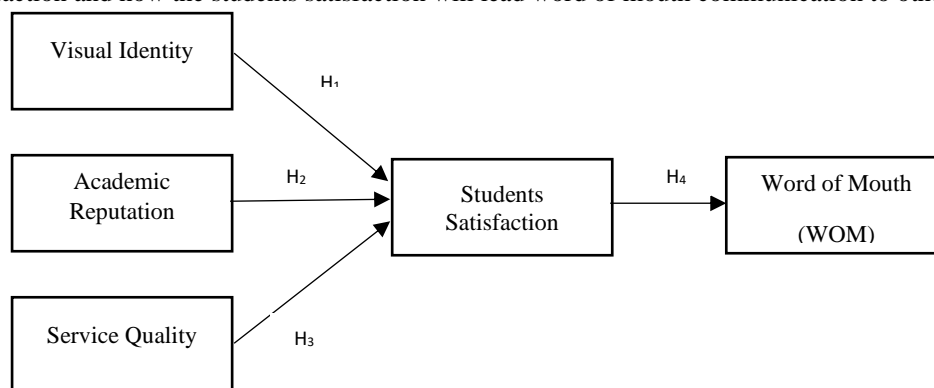

Fig 1. Research Framework

3   Research Method

This is a descriptive study that used a survey method and a questionnaire to collect data. The Stratified Sampling Method was used to take samples from active Unsoed students as the population. A Likert scale was used to measure respondents' responses, and multiple regression analysis was used to analyse the effects of each independent variables on the dependent variable.

4   Results

Respondents

According to data obtained from the Unsoed website as of May 31, 2021, the number of active Unsoed students in the 2020/2021 academic year was 21,799 students. The sampling technique was carried out using the stratified sampling method to ensure that the number of samples could accurately represent students from all faculties at Unsoed. By using the Slovin formula, the minimum number of samples needed for this study were 393 Unsoed students with the following details:

Table 1. Research Respondents

Faculty	Number of Active Students (people)	Sample (people)
Agriculture	2.884	52
Biology	1.045	19
Economics and Business	3.769	68
Animal Husbandry	1.540	28
Law	2.209	40
Social Science and Political Science	2.363	43
Medicine	1.102	20
Engineering	1.466	26
Health Science	2.063	37
Humanities	1.594	29
Mathematics and Natural Science	930	17
Fisheries and Marine Science	834	15
Total	21.799	393

Validity And Reliability Test

Validity and reliability tests were carried out to test the feasibility of the indicators in the questionnaire which were used as data collection instruments. The validity test was carried out using the Pearson Product Moment correlation test, while the reliability was measured using the Cronbach Alpha. The test results show that the calculated r value is greater than the r table value (0.374), while the alpha value is greater than the cut off value of 0.7, so that the indicators used in the questionnaire can be declared valid and reliable.

Goodness of Fit Test

The goodness of fit test used can be seen from the value of the coefficient of determination (R^2) and the calculated F value. This study is divided into two substructures, where the first structure analyzed how visual identity, academic reputation, and service quality affect student satisfaction, while the second structure analyzed how customer satisfaction affects word-of-mouth communication. The coefficient of determination (R^2) for the first substructure is 32.8%, while the coefficient of determination (R^2) for the second substructure is 30.8%. The two substructures' coefficient of determination (R^2) values are in the 30 percent range. These findings indicate that the variation of the consumer satisfaction variable can be explained by the variation of the variables of visual identity, academic reputation and service quality by 32.8%, and the variation of the WOM variable can be explained by the variation of the variable of customer satisfaction by 30.8%, while the rest is explained by other variables not examined in this study.

The calculated F value for the first substructure is 63,397 (sig 0.000), while the calculated F value for the second substructure is 174,076 (sig 0.000). The research model can be deemed suitable because the two calculated F values are more than F table and significances are smaller than α.

Hypothesis Testing Results

The multiple regression analysis method was used to test the research hypothesis. Multiple regression analysis was used to determine the partial effect of the independent variable on the dependent variable by comparing the t count with the value of t table. The findings of the t counts are all more than the t table value withthea significance value lesser than α : 0.05, therefore all hypotheses are accepted. The following table shows the entire results of the data test:

Table 2. Hypothesis testing results, t table : 1, 645 ; α : 0,05

Hypothesis	t count	Sig	Results
H_1 : University visual identity has a positive effect on student satisfaction	2,384	0,018	Accepted
H_2 : University academic reputation has a positive effect on student satisfaction	4,961	0,000	Accepted
H_3 : University service quality has a positive effect on student satisfaction	6,364	0,000	Accepted
H_4 : Student satisfaction affects word of mouth communication	13,194	0,000	Accepted

The findings of the multiple regression analysis above are used to explain the partial effect of the variables of visual identity, academic reputation and service satisfaction on Unsoed student satisfaction.

5 Discussion

The Effect of Visual Identity on Student Satisfaction

Based on data analysis using SPSS, the t-count value is 2.384. The first hypothesis is accepted because the t-count value is greater than the t-table value (1.645). The findings of the data analysis show that university visual identity of Unsoed has positive effect on student satisfaction.

Visual identity consists of various physical features that are visible to students. The numerous facilities offered to support various student activities reflect Unsoed's visual identity. According to respondents' responses, Unsoed is considered to have variety of architectural designs for new buildings that are magnificently modern and impressive, very comfortable lecture rooms, motivational taglines and complete educational support facilities. Viewed from the relational aspect, the university is considered to have been successful in creating positive relationships with students and maintaining positive relationships among various elements of the campus. The level of student satisfaction while studying at Unsoed can be affected by the complete support services, which are reflected in the complete library, laboratory, and sports facilities.

The findings of this study show that Unsoed has been successful in improving various aspects of its visual identity in an effort to satisfy students. The development of infrastructure and supporting facilities is always carried out by Unsoed as part of its efforts to become one of the leading higher education institutions in the world. The findings of this study support those of Melawar and Akel [16] and Marzo-Navarro et al. [15] which show a positive effect of a university visual identity on consumer satisfaction.

The Effect of Academic Reputation on Student Satisfaction

Based on data analysis using SPSS, the t-count value is 4.961. The second hypothesis is accepted because the t-count value is greater than the t-table value (1.645). The findings of the data analysis show that academic reputation of Unsoed has positive effect on student satisfaction.

Unsoed's academic reputation is formed from the quality of the university's academic performance, the quality of the university's external performance and the amount of emotional connection that students have with the university. The development of a solid academic reputation will also help to keep students satisfied with their studies at Unsoed. The findings of this study support the research of Kao [11] and Gruber et al [8] which show a positive effect between academic reputation and student satisfaction.

The Effect of Service Quality on Student Satisfaction

The t-count value of 6.364 is greater than the t-table value (1.645), so that the third hypothesis which claims that there is a positive effect between service quality and student satisfaction is accepted. Service quality is the main factor that determines student satisfaction as university consumers. The quality of services provided by the university to students can be seen from politeness level of employees and lecturers in providing services to students. Measurement of service quality in this study was used by using five indicators of the SERVQUAL concept. The five indicators consist of Tangibility (material aspect of the service quality provided by Unsoed); Reliability (aspects of the lecturer and education staff's accuracy in serving students); Assurance (hospitality and politeness of lecturer and educational staff when giving services); Responsiveness (the capability of lecturer and educational staff to help students in resolving problems); and Emphaty (level of concern for lecturer and educational staff to students). In general, interactions between students as consumers and Unsoed as a service

provider can produce high-quality service. The better the service quality provided to students, the higher the level of student satisfaction. The findings of this study are in line with studies by Poh et al [19] and Abd Rahman et al [1] which state that there is a positive effect between service quality and student satisfaction, especially at the higher education level.

The Effect of Student Satisfaction on WOM

The t-count value of student satisfaction is 13.194. the t count value is greater than the t-table value (1.645), so that the fourth hypothesis is accepted. The findings of the data analysis show that student satisfaction can affect WOM. The form of word of mouth communication made by students to prospective students can be in the form of positive or negative communication. Communication between students and prospective students can be an effective and efficient promotional strategy to increase the number of Unsoed students in the future. The findings of this study are in line with findings from research conducted by Sumardi and Nuraryo [17] that stated that cuatomer satisfaction can lead to good word of mouth communication to others.

6 Conclusions And Implications

The findings of this study show that Jenderal Sudirman University's visual identity, academic reputation, and service quality all have a positive effect on students satisfaction. In order to maintain the level of student satisfaction, Unsoed needs to improve its physical facilities to support learning activities as a visual identity of Unsoed. The addition of facilities and renovation of the existing structures can be done to provide comfort for students in studying at Unsoed. Unsoed's academic reputation can be improved by Building strong relationships with external parties, such as with other educational institutions (both local and international), the government and related agencies as well as with the media. A well-maintained academic reputation will be able to increase student pride as well as student satisfaction. Lecturer and educational staff at Unsoed must prioritize students as the main consumers when serving their needs. Unsoed can provide training for education staff to maintain and improve the service quality they offer to students. To improve WOM, Unsoed must continue improving its facilities and service quality to students, in order to encourage students to give positive recommendations about Unsoed.

The conducted research still has its limitations, including the R^2 value which is still in the range of 30% indicating the small contribution of the effect of the independent variable to the dependent variable. For further research, researchers can add other variables such as tuition fees or perceived academic quality as an independent variable that can affect student satisfaction, and student loyalty as the dependent variable.

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