Effects of Service Quality on Student Satisfaction: A Study Using the SERVQUAL Model

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ABSTRACT

This study investigates the effects of service quality of higher education institutions on student satisfaction using the SERVQUAL model. Conducted in the Khulna region, Bangladesh, the quantitative research collected data from students across various universities using a questionnaire comprising 24 Likert scale statements. SPSS v27 was used for statistical analysis. The findings revealed a positive and significant effect of university service quality on student satisfaction. The study also suggested that the service quality of the universities can explain a 90% variation in student satisfaction. These findings have the potential to empower educational institutions in identifying areas of strength and improvement, fostering continuous growth and benchmarking against peers. Prospective and current students can leverage this study to evaluate or plan for higher education institutions. The study was limited on various fronts including time constraints, financial limitations, and probable respondents' biases. Addressing these limitations can enhance the accuracy and applicability of future studies.

Keywords: Higher education, Service quality, Student satisfaction, and SERVQUAL.

INTRODUCTION:

Understanding the intricate relationship between service quality and student satisfaction is essential for institutions of higher education striving to meet the diverse needs and expectations of their student body. In today's competitive educational landscape, where universities compete not only for enrolment but also for reputation and retention rates, delivering high-quality services has become imperative. This study seeks to explore the effects of service quality on student satisfaction, employing the SERVQUAL model as a conceptual framework to delve into the nuanced dimensions of service provision within academic settings.

Despite the considerable body of literature exploring the relationship between service quality and student satisfaction within higher education, a notable research gap exists regarding the nuanced interplay between specific dimensions of service quality and their differential effects on student satisfaction. While existing studies have provided valuable insights into the overall impact of service quality on student perceptions, there remains a dearth of empirical research that comprehensively examines how variations in individual service dimensions contribute to overall satisfaction levels (Sari, 2023). This study aims to fill this gap by examining the direct relationship between service quality and student satisfaction, as well as the individual effects of SERVQUAL Model dimensions on satisfaction. This study aims to address gaps in previous research by providing specific insights into unclear areas and focusing on two primary objectives. First, it seeks to

analyze the direct relationship between university service quality and satisfaction among students. Second, it seeks to investigate the unique effects of SERVQUAL Model aspects on student satisfaction. These objectives of the study will be achieved through answering the following research questions

1. Does Tangibles exhibit a positive and significant relationship with Student Satisfaction?
2. Is there a positive and significant relationship between Reliability and Student Satisfaction?
3. Does Responsiveness demonstrate a positive and significant relationship with Student Satisfaction?
4. Is there a positive and significant relationship between Assurance and Student Satisfaction?
5. Does Empathy show a positive and significant relationship with Student Satisfaction?

Previous research usually included mediating or moderating variables, resulting in a little investigation of the direct relationship between service quality and student happiness. This study aims to enhance understanding of this topic by emphasizing these objectives.

Review of Literature
The literature related to this study revolves around two core concepts- Service Quality and Student Satisfaction.

Service Quality
Service quality is a measure of how well a business meets its customers' expectations. Customer's acquire services in response to unique demands (Kandampully, 1998). They have particular criteria and expectations for how a company's service delivery meets those demands, whether they are conscious of it or not. A firm with great service quality provides services that meet or surpass their consumers' expectations (Zeithaml, 1990). Service quality is integral for establishing sustainable positive relationships with consumers (Abu hasan & Ilias, 2008). In the context of universities, service quality refers to the extent to which the educational institution meets or exceeds students' expectations and needs in various aspects of their academic and non-academic experiences (Onditi & Wechuli, 2017). It encompasses the delivery of services and support related to teaching, learning, administrative processes, facilities, and overall campus environment (Kok, 2011). Service quality in universities is measured by factors such as the reliability of

academic programs, responsiveness of faculty and staff to student inquiries and needs, assurance of academic support services, empathy in addressing student concerns, and the quality of physical facilities and resources available to students (Hussain & Birol, 2011). Additionally, it involves aspects related to communication, accessibility, transparency, and fairness in administrative processes and policies. Overall, service quality in universities aims to create a positive and supportive environment conducive to student success, satisfaction, and holistic development (Aithal & Maiya, 2023).

Student Satisfaction
Student satisfaction encompasses perceptions meeting expectations in educational services, influencing happiness and contentment throughout academic life (Taskın *et al.,* 2023). Research indicates correlations between satisfaction and factors like curriculum quality, teaching effectiveness, and career preparation (Mahi *et al.,* 2018). Online learning quality significantly impacts student satisfaction and retention (Misnan *et al.,* 2018). Studies employ various scales, such as the University Students Satisfaction Scale (U-SSS), to gauge satisfaction levels (Ozok *et al.,* 2022). Factors influencing satisfaction include support services, teaching quality, and social support (Kim, 2020). Simulation-based learning and staff behavior contribute to satisfaction in healthcare education (Camilleri, 2021). Academic satisfaction relates to faculty competence, curriculum design, and learning facilities (Syahmer *et al.,* 2022). However, there may not be a direct correlation between personal satisfaction and academic achievement (Malik *et al.,* 2013). Overall, evaluating student satisfaction is crucial for program efficacy and student success (Alaa, 2015).

Relationship between the Service Quality and Student Satisfaction
The service quality of educational institutes is a crucial factor behind student satisfaction, especially in higher-level education. There have been a lot of studies that have investigated the association between student satisfaction and service quality. An investigation conducted in 2019 shows that there is a favorable and significant impact of service quality on students (Chandra *et al.,* 2019). However, the same study shows that student satisfaction fosters a

direct influence on student attachment which increases the university's reputation. Another research conducted in 2020 found out significant impact of service quality on student satisfaction and student loyalty (Purwanto & Cahyono, 2020). The same investigation suggests that service quality can be improved by working on parameters like tangibles, empathy, responsiveness, reliability, and assurance. A study conducted in 2020 by Alsheyadi and Albalushi measured student satisfaction utilizing the SERVQUAL Model and showed that tangibles, assurance, reliability, empathy, and responsiveness dimensions have a direct influence on student satisfaction (Forid *et al.,* 2022). Studies comparing public and private universities show that government-owned institutions tend to excel in quality culture and service provision (Iqbal *et al.,* 2023), while private universities in Bangladesh prioritize factors such as comfortable facilities and attentive staff to enhance student satisfaction and loyalty (Hoque *et al.,* 2023). Research in Chittagong, Bangladesh, indicates that both private and public universities' management and academic characteristics significantly influence student satisfaction (Mahi *et al.,* 2018). Moreover, service quality plays a crucial role in generating student loyalty and satisfaction, with universities recognizing its importance in maintaining competitiveness (Doan, 2021; Twum & Peprah, 2020). Service quality, defined as meeting or exceeding stakeholder expectations, greatly impacts students' perceived value and trust in educational institutions (Abdel-Aziz, 2019). For public universities, ensuring service quality is essential for student retention, attracting foreign students, and building trust with stakeholders who invest in education (Iqbal *et al.,* 2023). In essence, prioritizing service quality not only enhances student satisfaction but also contributes to the overall success and reputation of educational institutions.

SERVQUAL
Numerous studies, including those by (Anisseh and Akbari, 2023; Wang, 2022; Fazli-Salehi *et al,* 2019), have utilized the SERVQUAL model to assess service quality in higher education. Other studies, such as those by Shafaqat *et al.* (2020) and Marimon *et al.* (2019) have proposed alternative approaches. Modified versions of SERVQUAL have been applied in various countries, including Pakistan and Oman (Eldean & Bartamani, 2018; Muhammad *et al.,* 2018). Tools like HEISQUAL (Alhazmi, 2020) and HEdPERF (Muhammad *et al.,* 2018) have been suggested for measuring service quality in higher education institutions. These studies highlight the importance of analyzing and improving service quality to enhance student satisfaction and experience, identifying areas for enhancement such as administrative efficiency and non-academic services. Overall, the SERVQUAL model serves as a comprehensive framework for evaluating service quality, aiding organizations in understanding consumer satisfaction and addressing gaps between perception and expectation to improve service delivery effectively. The SERVQUAL Model has 5 dimensions. They are discussed below:

Tangibles
Tangibles, such as physical facilities and amenities, significantly influence student satisfaction in universities (Solinas *et al.,* 2012; Wardi *et al.,* 2018). A visually appealing and well-equipped campus enhances satisfaction levels (Ningsih *et al.,* 2020). Research indicates that tangibles play a crucial role in shaping overall service quality perceptions (Shahdadnejad & Vakil Alroaia, 2013). While tangibles positively impact satisfaction, other factors like dependability and responsiveness may not have a substantial effect (Agus, 2017). The physical aspects of universities, including infrastructure and learning resources, are closely tied to student satisfaction (Khairusy & Febriani, 2023). Improvements in intangibles, such as teaching quality and infrastructure, can enhance overall student happiness and loyalty (AlBalushi & Kamareddine, 2019). Tangibles, alongside other factors like faculty quality and curriculum, contribute significantly to student satisfaction and retention (Skea, 2017). Thus, investing in infrastructure and service environment is crucial for enhancing student satisfaction and global competitiveness (Mizintseva *et al.,* 2016). Therefore, from the existing literature, it can be hypothesized that,

H1: Tangibles has a positive and significant relationship with student satisfaction.

Reliability
Reliability, a key dimension in service quality, assesses a university's ability to deliver services consistently and as promised. Studies emphasize its significance in enhancing student satisfaction and overall service quality (Nurrahmawati *et al.,* 2019).

For instance, in IT service sections, reliability was found to be crucial for both employees and students (Janky *et al.,* 2022). Research also indicates that reliability significantly impacts student satisfaction, with variances observed among universities (Yuniarti, 2014). Addressing reliability is crucial to bridge the gap between students' expectations and perceptions of service quality (Torres *et al.,* 2014). While some studies highlight areas where universities fall short of meeting expectations, others show that students rate service reliability higher than average (Hrnciar & Madzik, 2015). Improving reliability is essential for universities to enhance student happiness and maintain competitiveness (Ali, 2014). Therefore, from the existing literature, it can be hypothesized that,

H2: Reliability has a positive and significant relationship with student satisfaction.

Responsiveness

Responsiveness, the promptness, and effectiveness of a university's service delivery, significantly impacts student satisfaction (Harangi-Rákos *et al.,* 2022). Positive student perceptions of digital learning during the pandemic underscore the importance of universities adapting swiftly to new technologies (Banahene *et al.,* 2018). Service quality, measured by HEdPERF, positively affects student happiness in private universities (Jereb *et al.,* 2018). Factors like program concerns and faculty assistance influence student satisfaction (Caruso *et al.,* 2014). Enhancing both teaching and non-teaching aspects, including responsiveness, is crucial for universities to improve satisfaction and reputation (Raut *et al.,* 2022). Positive staff-student relationships and student-instructor interaction contribute to overall satisfaction and value for money (Haverila & Haverila, 2021; Rowan & Grootenboer, 2016). University social responsibility positively influences student loyalty through its impact on service quality and satisfaction (Latif *et al.,* 2021). However, the relationship between loyalty and satisfaction is complex and influenced by cognitive and emotional factors (Kok Keong *et al.,* 2018). Nonacademic staff behavior directly affects student satisfaction levels (Sivalingam, 2015). Sustainability initiatives and learning environments also shape student happiness (Arambewela & Hall, 2013; Enache, 2011). Classroom amenities and faculty qualifications are crucial for student satisfaction in Saudi Arabian universities (Alashwal, 2020). Responsive conduct,

including quality instruction and support services, enhances student satisfaction and retention (Carter, 2014; Najib *et al.,* 2011). Variables like a classroom setting, resource availability, and student-faculty rapport impact student satisfaction (Benjamin, 2019). Satisfaction with academic success and service quality predicts overall student satisfaction (Pseiridis *et al.,* 2017; Sanjay & Govender, 2018). Improving the learning process and non-teaching assistance can elevate satisfaction levels (Bawamenewi *et al.,* 2022). Overall, responsiveness and service quality significantly influence student satisfaction and institutional reputation (Hwang & Choi, 2019; Wang & Liu, 2022). Therefore, from the existing literature, it can be hypothesized that,

H3: Responsiveness has a positive and significant relationship with student satisfaction.

Assurance

Assurance, characterized by employee skills and expertise, is crucial for student satisfaction in higher education (Rachuonyo & Kiriri, 2018). It significantly impacts word of mouth and service quality perceptions, influencing student happiness and loyalty (Widikusyanto, 2022). Students' perception of trust and security in educational services is vital for their satisfaction (Mashenene, 2019). A positive view of assurance leads to higher satisfaction levels, while its absence may result in discontent (Rouf *et al.,* 2016). Assurance, along with other service quality factors, determines overall student satisfaction and affects various aspects, including dormitory living and academic services during crises like COVID-19 (Krishnan & Hoo, 2021; Susanti *et al.,* 2019). Strengthening assurance and overall service quality is essential for improving student satisfaction in higher education (Tamnge, 2016). Therefore, from the existing literature, it can be hypothesized that,

H4: Assurance has a positive and significant relationship with student satisfaction.

Empathy

Empathy, crucial for understanding and prioritizing customer needs, is strongly correlated with student satisfaction and well-being in universities (Commey *et al.,* 2020; Munoz *et al.,* 2022; Santos *et al.,* 2023). It positively impacts student start-ups, adjustment to university life, and academic service quality (Kashapov *et al.,* 2022; Park, 2022; Ross *et al.,* 2022). Universities fostering empathy enhance

student satisfaction, engagement, and retention, thereby boosting competitiveness (Elsharnouby, 2015; Tubulingane & Baporikar, 2020). Factors such as faculty competence, educational resources, and institutional support significantly influence student happiness and academic success (Khairusy & Febriani, 2023; Lai *et al.,* 2015; Sinclaire & K., 2014). Additionally, self-compassion among students correlates with higher life satisfaction and better resilience to challenges (Diaconu & Dinescu, 2012; Terry *et al.,* 2012). Prioritizing student satisfaction through empathetic actions and effective

resource management enhances teaching and learning processes, contributing to overall institutional success (Hamed *et al.,* 2022; Hendricks *et al.,* 2020; Kasalak & Dağyar, 2020). Therefore, from the existing literature, it can be hypothesized that,

H5: Empathy has a positive and significant relationship with student satisfaction.

Conceptual Model and Hypotheses Development
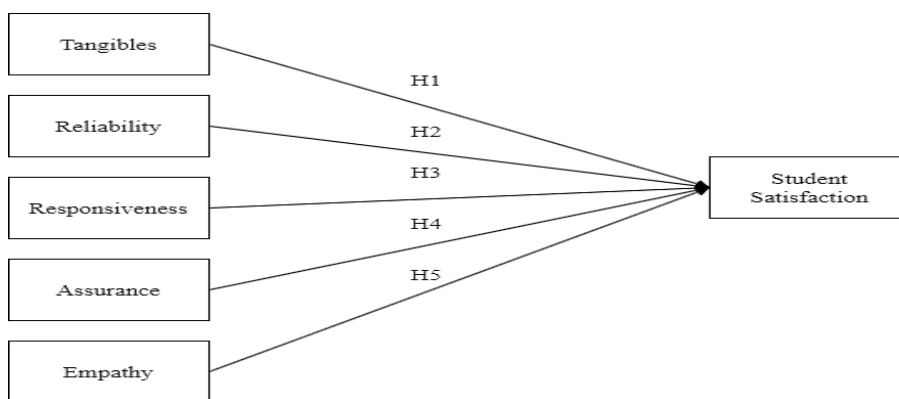The conceptual model derived from the literature above is as follows:

Fig. 1: Conceptual Model of SERVQUAL and Student Satisfaction

METHODOLOGY:
For this study, a quantitative method is implemented to statistically evaluate the relationship between service quality and student satisfaction using the SERVQUAL Model. Different statistical data and their traits such as reliability, regression analysis, correlation, and ANOVA test, and their results will be analyzed to investigate the hypothesis. This study is focused on approximately 15000 students studying in different public universities of Khulna, Bangladesh according to the information collected from the university website. According to Hair *et al.* (2012) there is a technique to determine adequate sample size (Ainur, 2017). It suggests that every parameter should take 5 observations. This study has a total of 24 items. Following this technique, the adequate sample size for this study is 24×5=120. However, 125 samples were used to conduct this study because increasing sample size leads to better statistical results (Choi *et al.,* 2021). A convenient sampling technique was implemented for sampling. Google form was used to collect required data from students. Data was collected from students from 3 public universities in Khulna. They are Khulna University, Khulna University of Engineering and Technology, and Khulna Agriculture University.

Help from representatives in different universities was acquired for data collection. The five-point Likert scale has been used in the questionnaire. The purpose of the study was clarified to the respondents with other ethical issues. The survey data was collected using a questionnaire. The questionnaire was developed with the influence and help of previously done studies that are relative to this study. The questions or statements were adapted from (Parasuraman, 1988; Meesala and Paul, 2018). The questionnaire had 24 items and it was separated into 6 portions. Each portion contained variables and related statements. Each statement was closed-ended and had a 5-point Likert Scale for answering them. Where the points denote like this 1 = Strongly Agree, 2 = Agree, 3 = Neutral, 4 = Disagree, 5 = Strongly Disagree. Among the independent variables, Tangibles had 4 statements, Reliability had 4 statements, Responsiveness had 4 statements, Assurance had 3 statements, Empathy had 2 statements and Student Satisfaction as a Dependent variable had 7 statements in the questionnaire. Respondent's demographic information was not collected through the questionnaire. The construct of the questionnaire the number of items and the sources are described below:

Table 1: Item Table.

Construct	Number of items	Source
Tangibles	4	
Reliability	4	
Responsiveness	4	(Parasuraman, 1988)
Assurance	3	(Meesala & Paul, 2018)
Empathy	2	
Student Satisfaction	7	
Total	24	

To analyze the collected data, descriptive analysis will be used which includes a Reliability test, Student Satisfaction scenario (Mean, Mode), Correlation analysis, Regression Analysis, ANOVA Test, and finally Coefficient interpretation will be done to test the hypotheses.

RESULTS:

Reliability Analysis

Table 2: Reliability.

Sl.	Variable	N. of items	Cronbach Alpha
1	Tangibles	4	0.806
2	Reliability	4	0.761
3	Responsiveness	4	0.778
4	Assurance	3	0.751
5	Empathy	2	0.738
6	Student Satisfaction	7	0.889
	Overall	**24**	**0.787**

Source: Presented by the researcher using SPSS v27 Outputs.

The high value of Cronbach's Alpha means the better reliability of the instrument and its intention to measure. The above table showcases that Cronbach's Alpha (α) value for all variables is higher than 0.71 which indicates that they have good statistics and are acceptable (Cronbach, 1951). The value of the reliability of the overall data set is 0.787 which is statistically a good number according to scholars. So, it can be said that the data used for this study to measure dependent and independent variables are quite accurate and reliable.

Univariate Analysis

Univariate analysis is the simplest and easiest form of analyzing statistical data and it is a descriptive analysis (Pacheco Salles *et al.,* 2020). Univariate data includes central tendencies such as median, mode, mean, and dispersion such as range, standard deviation, variance, quartiles, maximum, etc. (Zaman *et al.,* 2023).

Table 3: Scenario of Student Satisfaction.

Variable	Mean	Mode
Tangibles	4.1320	4.50
Reliability	4.1320	4.50
Responsiveness	4.1780	4.50
Assurance	4.1200	4.33
Empathy	4.1600	4.00
Student Satisfaction	4.2103	4.71

Source: Presented by the researcher using SPSS v27 Outputs.

Here, the mean value portrays the average response collected from the respondents/participants. According to the above table, the mean values of independent variables (Tangibles, Reliability, Responsiveness, Assurance, and Empathy) are 4.1320, 4.1320, 4.1780, 4.1200, and 4.1600. This level of value indicates a high level of satisfaction among students. The mode value represents the most commonly

observed responses from the respondents. According to the above table, it can be said that most of the students are highly satisfied with the tangibles, reliability, responsiveness, assurance, and empathy traits of their respective universities. Here, the table shows that the overall student satisfaction mode value is 4.71 which mean most respondents are highly satisfied with the service quality of the universities they study.

Correlation Analysis

Table 4: Correlations.

		Tangibles	Reliability	Responsive ness	Assurance	Empathy	Student Satisfaction
Tangibles	Pearson Correlation	1					
	Sig. 2 tailed						
Reliability	Pearson Correlation	.855	1				
	Sig. 2 tailed	.000					
Responsiveness	Pearson Correlation	.794	.873	1			
	Sig. 2 tailed	.000	.000				
Assurance	Pearson Correlation	.769	.796	.761	1		
	Sig. 2 tailed	.000	.000	.000			
Empathy	Pearson Correlation	.770	.763	.744	.750	1	
	Sig. 2 tailed	.000	.000	.000	.000		
Student Satisfaction	Pearson Correlation	.871	.884	.862	.862	.849	1
	Sig. 2 tailed	.000	.000	.000	.000	.000	.000

**Correlation is significant at the 0.01 level (2-tailed). *Correlation is significant at the 0.05 level (2-tailed).

Source: Presented by the researcher using SPSS v27 Outputs.

In these results, the correlation between Tangibles and Student satisfaction is 0.871. It indicates that there is a highly favorable relationship between variables. The p-value of the correlation between Tangibles and Student Satisfaction is significant at 0.000, this is less than 0.001 which interprets that the correlation coefficient is statistically significant. In these above results, the correlation between Reliability and Student Satisfaction is 0.884 which is the highest among all other variables. This indicates a strong positive relationship between the dependent and independent variables. The p-value of the correlation between Reliability and Student Satisfaction is significant at 0.000, which is less than 0.001 which indicates that the correlation coefficient is statistically significant. In these acquired results, the correlation between Responsiveness and Student Satisfaction is 0.862. This indicates a very strong relationship between variables. The p-

value of the correlation between Responsiveness and Student Satisfaction is significant at 0.000, this is less than 0.001 which indicates that the correlation coefficient is statistically significant. In these results, the correlation between Assurance and Student Satisfaction is also 0.862, which indicates a high level of strong connection between variables. The p value of the correlation between Assurance and Student Satisfaction is significant at 0.000, this is less than 0.001 which indicates that the correlation coefficient is statistically significant. In these results, the correlation between Empathy and Student Satisfaction produces a value of 0.849 which describes a strong positive relationship between variables. The p-value of the correlation between Empathy and Student Satisfaction is significant at 0.000, which is less than 0.001 which indicate that the correlation coefficient is statistically significant (Aktar MS., 2021).

Regression Analysis

Table 5: Model Summary.

Model	R	R Square	Adjusted R square	Std. Error of the Estimate
1	.951ᵃ	.904	.900	.17556

Predictors: (Constant), Empathy, Assurance, Reliability, Tangibles, Responsiveness

Dependent Variable: Student Satisfaction

Source: Presented by the researcher using SPSS v27 Outputs.

By interpreting the above table, it can be said that the value of R is 0.951 which is an indicator of highly strong positive correlation between dependent and independent variables. Here, the value of R^2 is 0.904 which assess how much available variability of the dependent variable (Student Satisfaction) is caused for by independent variables (Tangibles, Reliability, Responsiveness, Assurance, and Empathy). Adjusted R^2 gives an idea of how good the model fits. In the above table, an R^2 value of 0.900 suggests that independent variables (Tangibles, Reliability, Responsiveness, Assurance, and Empathy) can explain 90% of the impact on student satisfaction.

Table 6: ANOVA.

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	34.642	5	6.928	224.791	.000ᵇ
Residual	3.668	119	.031		
Total	36.007	124			

a. Dependent Variable: Student Satisfaction

b. Predictors: (Constant), Empathy, Assurance, Reliability, Tangibility, Responsiveness

Source: Presented by the researcher using SPSS v27 Outputs.

The significance value in the above table suggests how good the model is or the quality of the model. The significance value is 0.000 ($p<0.05$), which means the model used for this study matches the data because the lower significance value interprets that the model is well fit.

Table 7: Coefficients.

Model	Unstandardized Coefficient		Standardized Coefficient	t	Sig.
	B	Std. Error	Beta		(p-value)
(Constant)	.297	.119		.2493	.014
Tangibles	.186	.054	.206	3.467	.000
Reliability	.145	.066	.157	2.194	.030
Responsiveness	.179	.058	.189	3.100	.002
Assurance	.224	.045	.257	4.976	.000
Empathy	.210	.044	.237	4.774	.000

Source: Presented by the researcher using SPSS v27 Outputs.

It is obvious from the accompanying table that the model's p-value is 0.014 which falls below 0.05. It implies that the hypothesis is supported by the model. It reveals a significant association between the independent variable (Tangibles, Reliability, Responsiveness, Assurance, and Empathy) and the dependable variable (Student Satisfaction). The other independent variables' P values are 0.014, 0.030, 0.002, 0.000, and 0.000, respectively. These values reveal that there is a positive and strong correlation between student satisfaction and tangibles, reliability, responsiveness, assurance, and empathy. It suggests that there is a positive and strong correlation between every independent variable and the dependable variable. Regarding Tangibles, the dependent variable, student satisfaction, and the independent variable, Tangibles, have a significant and positive connection (p-value of 0.000<0.05) with a beta value of .206. The statistical significance of the difference between the impacts of Biological Hazard and the constant is demonstrated by the value of t statistics being above +2, particularly 3.467. The first hypothesis (H1) is accepted based on the findings. It suggests that there

is a high association between student satisfaction and tangibles. Furthermore, in the reliability example, the dependent variable (student satisfaction) and the independent variable (reliability) show a positive and significant connection (p-value =.030<0.05). The beta value is 157. T statistics has a value of 2.194, which is more than +2. This suggests that there is statistical significance in the relative impact of the constant and dependability. Thus, it is determined to accept the second hypothesis (H2). The outcome reveals that student satisfaction is greatly impacted by reliability. The association between responsiveness (the independent variable) and student satisfaction (the dependent variable) is positive and significant, as demonstrated by the responsiveness beta value of 0.189 and the p-value of .002<0.05. T statistics have a value of 3.100, which is likewise more than +2. This demonstrates that a statistically significant link between responsiveness and student satisfaction exists. It follows that the third hypothesis (H3) is true and accepted. The outcome reveals that responsiveness has a large favorable influence on student satisfaction. Addi-

tionally, the dependent variable, student satisfaction, and the independent variable, assurance, have a positive and significant correlation, as evidenced by the beta value of 0.257 and the p-value of 0.000<0.05 for assurance. T statistics has a value of 4.976, which is more than +2. This suggests that there is a statistically significant association between Assurance and student satisfaction. The fourth hypothesis (H4) is accepted in light of this observation. As a result, the data that is given, reveals that assurance has a statistically significant effect on student satisfaction. Lastly, for Empathy, the independent variable and student satisfaction indicate a positive and significant relationship (beta value of.237 and p-value of.000<0.05, respectively). T statistics has a value of 4.774, which is higher than 2. It implies that there is a substantial and positive relationship between empathy and student satisfaction. The conclusion in this case adds support to the fifth theory. Consequently, the fifth hypothesis (H5) is accepted. As a result, the findings reveal that empathy greatly affects student satisfaction.

Table 8: Hypothesis.

Hypothesis	Beta Value	t value	p-value	Result
H1	.206	3.467	.000	Accepted
H2	.157	2.194	.030	Accepted
H3	.189	3.100	.002	Accepted
H4	.257	4.976	.000	Accepted
H5	.237	4.774	.000	Accepted

DISCUSSION:

With the aim of investigating the effects of higher education service quality on student satisfaction, the study found that service quality indeed has a profound impact on the satisfaction of university students (Chandra *et al.,* 2019). On account of the determinants of the SERVQUAL model, the study confirms that the factors namely, Tangibles, Reliability, Responsiveness, Assurance, and Empathy- all have positive and significant effects on Student Satisfaction. This aligns with the findings from the majority of the previous studies. The study found that the Tangibles, such as the physical facilities and the amenities have a positive and significant effect on student satisfaction. This aligns perfectly and confirms the findings by (Agus, 2017; AlBalushi and Kamareddine, 2019; Khairusy and Febriani, 2023; Mizintseva *et al.,* 2016; Ningsih *et al.,* 2020; Shahdadnejad and Vakil Alroaia, 2013; Skea, 2017;

Solinas *et al.,* 2012; Wardi *et al.,* 2018). On a similar note, Reliability, a key dimension representing the university's ability to deliver the services consistently and as promised, was also found to positively and significantly affect student satisfaction. This aligns perfectly with the findings of (Ali, 2014; Hrnciar and Madzik, 2015; Janky *et al.,* 2022; Nurrahmawati *et al.,* 2019; Torres *et al.,* 2014). Responsiveness, indicating the promptness and effectiveness of a university's service delivery, also had a positive and significant effect on student satisfaction. This was in tune with the findings of (Alashwal, 2020; Arambewela and Hall, 2013; Banahene *et al.,* 2018; Bawamenewi *et al.,* 2022; Biswas *et al.,* 2022; Carter, 2014; Caruso *et al.,* 2014; Dhawan, 2022; Ghansah *et al.,* 2019; Harangi-Rákos *et al.,* 2022; Haverila and Haverila, 2021; Hwang and Choi, 2019; Jereb *et al.,* 2018; Kok Keong *et al.,* 2018; Latif *et al.,* 2021; Najib *et al.,*

2011; Pseiridis *et al.,* 2017; Sanjay and Govender, 2018; Sivalingam; 2015). The study also concludes that Assurance, indicating the employee's skills and expertise, has a positive and significant effect on student satisfaction. This too aligns perfectly with the findings of (Krishnan and Hoo, 2021; Mashenene, 2019; Rachuonyo and Kiriri, 2018; Rouf *et al.,* 2016; Susanti *et al.,* 2019; Tamnge, 2016; Widikusyanto, 2022; Yusof *et al.,* 2022). Finally, the study concludes that Empathy, very crucial for understanding and prioritizing student needs, was found to have a positive and significant effect on student satisfaction. This aligns with the findings of (Commey *et al.,* 2020; Santos *et al.,* 2023; Munoz *et al.,* 2022; Park, 2022; Kashapov *et al.,* 2022; Ross *et al.,* 2022; Tubulingane and Baporikar, 2020; Elsharnouby, 2015; Khairusy and Febriani, 2023; Sinclaire and K., 2014; Lai *et al.,* 2015; Diaconu and Dinescu, 2012; Terry *et al.,* 2012; Kasalak and Dağyar, 2020; Hamed *et al.,* 2022; and Hendricks *et al.,* 2020).

CONCLUSION:

This study was aimed to understand the relation-ship between service quality of universities and student satisfaction. The SERVQUAL model and its dimen-sions that are related to student satisfaction were put under statistical test to prove the proposed hypo-thesis. All the dimensions (Tangibles, Reliability, Responsiveness, and Assurance) of the SERVQUAL model have a significant and positive relationship with Student Satisfaction. Previously conducted studies had mediating and moderating factors for which the impact of dimensions of the SERVQUAL model couldn't be evaluated with Student Satis-faction directly. However, this result suggests that it has a significant direct relationship with the depend-able variable. The result of this study also focuses on that the students are exposed to Tangible proof of the institution. Reliability can strongly boost Student Satisfaction. Furthermore, Responsive-ness can also have a strong positive impact on the satisfaction of students. Assurance is another positive trait that is very helpful for enhancing student satisfaction. Empathy showed a great impact on student satis-faction. This study can help to understand how student satisfaction can be increased among students. As this study was done in the confinement of the Khulna region, the findings of this study may not apply to different geographic or demographic backgrounds. The education industry is one of the most crucial service-providing industries in the society. Higher education institutions contribute to the betterment of society by providing quality services. Student Satisfaction can improve one's personal and societal performance. When students are satisfied it can enhance the brand value and reputation of universities which is very crucial for this competitive world in the current scenario.

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No conflicts of interest are disclosed by the author.

REFERENCES:

1) Abdel-Aziz, A. S. (2019). Effect of service quality on graduates' satisfaction. *Quality Assurance in Education.*

2) Abu hasan, H. f., & Ilias, A. (2008). Service quality and student satisfaction: A case study at private higher education institutions. *Inter Business Research*, **1**, 163-175.

3) Agus, S. (2017). Analisis faktor-faktor yang memengaruhi kepuasan layanan akademik mahasiswa prodi diploma i kepabeanan dan cukai.

4) Ainur, A. K. (2017). Sample Size and Non-Normality Effects on Goodness of Fit Measures in Structural Equation Models. *Pertanika J. of Science & Technology.*

5) Aithal, P., & Maiya, A. K. (2023). Development of a New Conceptual Model for Improvement of the Quality Services of Higher Education Institutions in Academic, Adminis-trative, and Research Areas. *Inter J. of Management, Technology and Social Sciences (IJMTS)*, **8**(4), 260-308.

6) Alaa, A. (2015). Undergraduate Medical Research Programme: A Cross-Sectional Study of Students' Satisfactions, Perceived Chall-enges, and Attitudes. *Global J. of Health Science.*

7) Alashwal, M. (2020). Quality Education Factor Effects on Student Satisfaction in Saudi Arabian Universities. *J. of Education and Practice.*

8) AlBalushi, M. Y., & Kamareddine, P. F. (2019). Examining International Students'

Satisfaction at UK universities Using the Weka Data Mining Tool. *EasyChair Preprint*.

9) Alhazmi, F. (2020). Saudi University Students' Perceptions of Service Quality in Higher Education. *J. of Edu. and Learn.*, **9**, 151. https://doi.org/10.5539/jel.v9n5p151

10) Ali, Y. S. (2014). Service Quality Provided by Higher Education Institutions in Somalia and Its Impact on Student Satisfaction. *European J. of Business and Management.*

11) Anisseh, M., Sharifi, N., & Akbari, Z. (2023). Evaluation of universities service quality through Servqual method. *J. of Engineering Management and Competitiveness*, **13**, 3-10. https://doi.org/10.5937/JEMC2301003A

12) Arambewela, R., & Hall, J. (2013). The inter-actional effects of the internal and external university environment, and the influence of personal values, on satisfaction among inter-national postgraduate students. *Studies in Higher Edu.*, **38**(7), 972-988.

13) Aktar MS. (2021). Determinates service quality and its effect on patients' satisfaction of private medical college hospitals, Rangpur, Bangladesh, *Int. J. Manag. Account*. **3**(4), 91-105. https://doi.org/10.34104/ijma.021.0910105

14) Banahene, S., Kraa, J. J., & Kasu, P. A. (2018). Impact of HEdPERF on students' satisfaction and academic performance in Ghanaian universities; mediating role of attitude towards learning. *Open J. of Social Sciences*, **6**(5), 96-119.

15) Bawamenewi, A., Sitanggang, N., & Nasrun. (2022). Higher Education Management in Academic Service to FKIP Student Satis-faction. *Indonesian J. Of Educational Research and Review*.

16) Biswas, K., Bose, S., & Shams, S. (2022). Determinants and Consequences of Student Satisfaction in Australian Universities: Evidence from QILT Surveys. *Accounting & Finance*. https://doi.org/10.1111/acfi.12930

17) Camilleri, M. A. (2021). Evaluating service quality and performance of higher education institutions: a systematic review and a post-COVID-19 outlook. *Inter J. of Quality and Service Sciences*, **13**(2), 268-281. https://doi.org/10.1108/IJQSS-03-2020-0034

18) Carter, P. (2014). A Case Study oF Student Satisfaction.

19) Caruso, D., Carter, L., & Erichsen, S. (2014). Student satisfaction and WIL: a case study of a marketing capstone unit.

20) Chandra, T., Hafni, L., & Chandra, J. (2019). The influence of service quality, university image on student satisfaction and student loyalty. *Benchmarking: An Inter J.*, **26**(5), 1533-1549. https://doi.org/10.1108/BIJ-07-2018-0212

21) Choi, J., Nandram, B., & Keane, T. (2021). Large Sample Problems. *Inter J. of Statistics and Probability*, **10**, 81.

22) Commey, N. O., Adom, K., & Abubakar, A. (2020). Service Quality and Business Students Satisfaction in Private Ghanaian Universities. The Moderating Role of Brand Positioning *J. of Marketing and Consumer Research*, **74**. https://doi.org/10.7176/JMCR/74-04

23) Cronbach, L. J. (1951). Coefficient alpha and the internal structure of tests. *Psychometrika*, **16**, 297-334. https://doi.org/10.1007/BF02310555

24) Dhawan, S. (2022). Higher Education Quality and Student Satisfaction: Meta-Analysis, Sub-group Analysis and Meta-Regression. *Meta-morphosis*, **21**(1), 48-66. https://doi.org/10.1177/09726225221082376

25) Diaconu, M., & Dinescu, F. (2012). Student Satisfaction, Resultant Of Marketing Orientation Of University Under Current Conditions. *Scientific Bulletin - Economic Sciences*, **11**, 3-9. https://ideas.repec.org/a/pts/journl/y2012ispecialp3-9.html

26) Doan, T. T. T. (2021). The effect of service quality on student loyalty and student satisfaction: An empirical study of universities in Vietnam. *The J. of Asian Finance, Economics and Business*, **8**(8), 251-258.

27) Eldean, N., & Bartamani, M. (2018). University Service Quality in the Community Service and Continuing Education Center at Sultan Qaboos University: An Empirical Study Using SERVQUAL Scale. *J. of Educat. and Psychol. Studies* **12**, 16. https://doi.org/10.24200/jeps.vol12iss1pp16-39

28) Elsharnouby, T. H. (2015). Student co-creation behavior in higher education: The

role of satisfaction with the university experience. *J. of marketing for higher education*, **25**(2), 238-262.

29) Enache, I. (2011). Customer behaviour and student satisfaction. *Bulletin of the Transilvania University of Brasov. Series V: Economic Sciences*, **4**(53).

30) Fazli Salehi, R., Esfidani, M., Torres, I., & Zúñiga, M. (2019). Developing a Specialized Service Quality Model for Universities. *Services Mark. Quarterly*, **40**, 1-18. https://doi.org/10.1080/15332969.2019.1630175

31) Forid, M., Hafez, M., & Khan, W. (2022). Student Satisfaction and Retention: Impact of Service Quality and Digital Transformation. Marketing and Management of Innovations. *Marketing and Management of Innovations*, **13**, 2022.

32) Ghansah, B., Andoh, J., & Okogun-Odompley, J. (2019). The Determinant of Student Satisfaction in Academic and Administrative Services in Private Universities. *Inter J. of Applied Management Sciences and Engin.*, **6**, 58-73. https://doi.org/10.4018/IJAMSE.2019070104

33) Hair, J. F., Sarstedt, M., & Ringle, C. M. (2012). The use of partial least squares struc-tural equation modeling in strategic man-agement research: a review of past practices and recommendations for future applications. *Long range planning*, **45**(5-6), 320-340.

34) Hamed, S., Jamil, S., & Rafiq, H. A. (2022). University Branding And Student Satisfaction: The Emerging Landscape of Universities in Pakistan. *Pakistan J. of Educational Research*, **5**(2).

35) Harangi-Rákos, M., Ștefănescu, D., & Fenyves, V. (2022). Thrown into Deep Water: Feedback on Student Satisfaction & mdash; A Case Study in Hungarian and Romanian Universities. *Education Sciences*, **12**(1), 36.

36) Haverila, M., & Haverila, K. (2021). The impact of the student - instructor relationship on student-centric measures. *J. of Applied Research in Higher Education*, *ahead-of-print*. https://doi.org/10.1108/JARHE-12-2020-0435

37) Hendricks, L., Reysen, S., & Đặng, Q. (2020). Student Satisfaction: Importance of Civility and University Identification Predictors. *Inter Research in Higher Education*, **5**, 1-13. https://doi.org/10.5430/irhe.v5n4p1

38) Hoque, U. S., Akhter, N., & Al-Mamun, A. (2023). Assessing Service Quality Using SERVQUAL Model: An Empirical Study on Some Private Universities in Bangladesh. *Trends in Higher Education*, **2**(1), 255-269.

39) Hrnciar, M., & Madzik, P. (2015). Quality of Services with Respect to their Unique Characteristics - The Field of Education. *Athens J. of Education*, **2**, 65-76. https://doi.org/10.30958/aje.2-1-5

40) Hussain, K., & Birol, C. (2011). The assessment of non-academic and academic service quality in higher education. *Eurasian J. of Educational Research*, **42**, 95-116.

41) Hwang, Y.-S., & Choi, Y. K. (2019). Higher education service quality and student satisfaction, institutional image, and behavioral intention. *Social Behavior and Personality: an international j.*, **47**(2), 1-12.

42) Iqbal, S., Ashfaq, T., & Rizal Razalli, M. (2023). The effect of quality culture on service quality of public and private Universities: A comparative analysis. *Plos one*, **18**(4), e0283679.

43) Janky, B., Schubert, C., & Spaunhorst, R. (2022). Universities as Service Providers. *Open Conference Proceedings*.

44) Jereb, E., Jerebic, J., & Urh, M. (2018). Revising the Importance of Factors Pertaining to Student Satisfaction in Higher Education. *Organizacija*, **51**, 271-285. https://doi.org/10.2478/orga-2018-0020

45) Kandampully, J. (1998). Service quality to service loyalty: A relationship which goes beyond customer services. *Total quality man-agement*, **9**(6), 431-443.

46) Kasalak, G., & Dağyar, M. (2020). University student satisfaction, resource management and metacognitive learning strategies. https://doi.org/10.15663/tandc.v20i1

47) Kashapov, M., Smirnov, A., & Solovyeva, E. (2022). Empathy as an intersubjective resource of the university students` adaptation in the conditions of digitalization of the educational environment. *Perspectives of Science and Education*, **56**, 152-167. https://doi.org/10.32744/pse.2022.2.9

48) Khairusy, M., & Febriani, R. (2023). University Student Satisfaction A Syste-matic Literature Review. *JBTI: J. Bisnis: Teori dan Implementasi*, **14**, 267-272. https://doi.org/10.18196/jbti.v14i1.17035

49) Kim, E. (2020). Feasibility Analysis of University Education Satisfaction Survey Tools - Focused on SSI Scale in the U.S. *Asia-Pacific J. of Educational Management Research*, **5**, 29-38. https://doi.org/10.21742/AJEMR.2020.5.1.05

50) Kok, H. B., Mobach, M. P., & Omta, O. S. . (2011). The added value of facility management in the educational environment. *J. of Facilities Management.*, **9**(4), 249-265.

51) Kok Keong, L., Baharun, R., & Abdul Wahid, N. (2018). Provide Good Service Quality to Satisfy Students' Needs and Make Them Become Loyal Students. *Inter J. of Supply Chain Management*, **7**, 36-42.

52) Krishnan, U. M., & Hoo, W. C. (2021). Service Quality and Students' Satisfaction in Public Higher

53) Education Institutions During Covid-19 in Malaysia. *J. of Business and Social Sciences*, **2021**(1).

54) Lai, M.-M., Lau, S. H., & Chew, K.-W. (2015). Assessing antecedents and consequences of student satisfaction in higher education: evidence from Malaysia. *J. of marketing for higher education*, **25**. https://doi.org/10.1080/08841241.2015.1042097

55) Latif, K. F., Bunce, L., & Ahmad, M. S. (2021). How can universities improve student loyalty? The roles of university social respon-sibility, service quality, and "customer" satis-faction and trust. *Inter J. of Educational Management*, **35**(4).

56) Mahi, U., Kalsom, A., & Aktaruzzaman, K. M. (2018). Impact of service quality (SQ) on student satisfaction: empirical evidence in the higher education context of emerging econo-my. *Nilai Malaysia: Islamic Science University of Malaysia Faculty of Leadership and Management.*, **16**, 31-67.

57) Malik, M., Nordin, N., & Sirun, N. (2013). An Exploratory Study on the Relationship between Life Satisfaction and Academic Performance Among Undergraduate Students of UiTM, Shah Alam. *Procedia - Social and Behavioral Sciences*, **90**, 334-339.

58) Marimon, F., Mas-Machuca, M., & Llach, J. (2019). UnivQual: a holistic scale to assess student perceptions of service quality at universities. *Total Quality Management & Business Excellence*, **30**, 184 - 200.

59) Mashenene, R. (2019). Effect of Service Quality on Students' Satisfaction in Tanzania Higher Education.

60) Meesala, A., & Paul, J. (2018). Service quality, consumer satisfaction and loyalty in hospitals: Thinking for the future. *J. of Retailing and Consumer Ser.*, **40**, 261-269.

61) Misnan, N., Zakaria, Z., & Salleh, W. A. (2018). Service Quality: A Study of Students Satisfaction in Higher Institution. *The J. of Social Sciences Research*, 490-497. https://doi.org/10.1787/hemp-v16-art19-en

62) Mizintseva, M., Komarova, T., & Tatiana, Y. (2016). Key Aspects of Managing the Students' Satisfaction with the Learning Environment at the International University. *Indian J. of Science and Technology*, **9**. https://doi.org/10.17485/ijst/2016/v9i36/102030

63) Muhammad, N., Kakakhel, S., & Ali, F. (2018). Service Quality the Road Ahead for Student's Satisfaction. *Review of Public Administration and Management*, **06**. https://doi.org/10.4172/2315-7844.1000250

64) Munoz, L., Fergurson, J. R., & Fleming, D. (2022). Does Empathy Matter? An Exploratory Study of Class-Transition Satisfaction in Unplanned Course Interruptions. *J. of Marketing Education*, **44**(2), 217-234.

65) Najib, N., Yusof, N. A., & Zainul Abidin, N. (2011). Student residential satisfaction in rese-arch universities. *J. of Facilities Management*, **9**, 200-212. https://doi.org/10.1108/14725961111148108

66) Ningsih, N., Widari, D., & Artawan, I. (2020). Analisa Kepuasan Mahasiswa terhadap Kuali-tas Pelayanan Pendidikan. *WACANA EKON-OMI (J. Ekonomi, Bisnis dan Akuntansi)*, **19**, 24-29. https://doi.org/10.22225/we.19.1.1403.24-29

67) Nurrahmawati, N., Wiwitan, T., & Fuady, M. (2019). The Analysis of Private University Service Quality and Image.

68) Onditi, E. O., & Wechuli, T. W. (2017). Service quality and student satisfaction in

higher education institutions: A review of literature. *Inter j. of scientific and research publications*, **7**(7), 328-335.

69) Ozok, H., Kayri, M., & Tanhan, F. (2022). University Student Satisfaction Scale: Validity and Reliability Study. *Yuzunci Yil Universitesi Egitim Fakultesi Dergisi.*

70) Pacheco Salles, F. L., Maciel Ferreira, D., & Bull Loose, M. E. (2020). Evaluation of the Satisfaction of Undergraduate Students Thro-ugh the Structural Equations Modeling. *J. of Education*, **200**(1), 23-31.

71) Parasuraman, A. P., Zeithaml, V., & Berry, L. (1988). SERVQUAL: A multiple- Item Scale for measuring consumer perceptions of service quality. *J. of retailing.*

72) Park, D.-Y. (2022). The effects of professor's empathy leadership on student"s learning engagement and learning satisfaction: focused on university students of majoring in hotel & tourism. *J. of Hospitality and Tourism Studies.*

73) Pseiridis, A., Agiomirgianakis, G., & Lianos, T. (2017). The Determinants of Student Satisfaction Acquired by University Education: The Case of the Hellenic Open University. *Theor. Econ. Letters*, **07**, 1318-1334.

74) Purwanto, A., & Cahyono, Y. (2020). Impact of Service Quality, University Image and Stu-dents Satisfaction Towards Student Loyalty: Evidence from Indonesian Private Universities. **7**, 142-155.

75) Rachuonyo, O. M., & Kiriri, P. N. (2018). Impact of Assurance and Responsiveness Dimensions on Customer Satisfaction in Higher Education Sector: A Case of Universities in Kenya.

76) Raut, S. K., Sakpal, S., & Soni, R. (2022). Understanding the service quality dimensions and achieving resilience in service retail. In *Handbook of Research on Supply Chain Resiliency, Efficiency, and Visibility in the Post-Pandemic Era* (pp. 136-156). IGI Global.

77) Ross, J., Hicks-Roof, K., & Arikawa, A. (2022). Instructor and Student Perceptions of Teacher Empathy in Higher Education. *College Teaching*, **71**, 28-37.

78) Rouf, M., Rahman, M. M., & Uddin, M. (2016). Students' Satisfaction and Service Quality of HEIs. *Inter J. of Academic Research in Business and Social Sciences*, **6**, 376-390.
https://doi.org/10.6007/IJARBSS/v6-i5/2155

79) Rowan, L., & Grootenboer, P. (2016). Student Engagement and Educational Rapport in Higher Education. *Palgrave Macmillan Cham.*

80) Sanjay, S., & Govender, K. (2018). South Africa university students' perceptions of key education service quality determinants. *Problems and Perspectives in Management*, **16**(3), 377-388.

81) Santos, T., Turpo, J., & Huanca-López, S. (2023). Social Support and Empathy as Predictors of Life Satisfaction in Brazilian University Students. *J. of Educational and Social Research*, **13**, 1.
https://doi.org/10.36941/jesr-2023-0084

82) Sari, A. (2023). Impact of Service Quality Dimensions on Student Satisfaction in Universitas Amikom Yogyakarta. *Inter J. of Social Science and Human Research*, **06**.

83) Shafaqat, S., Kausar, A. R., & Ali, S. A. (2020). Conceptualization of Higher Education Institutions (HEI) as a service system using SD logic lens. *NICE Res. J.*, 47-99.

84) Shahdadnejad, R., & Vakil Alroaia, Y. (2013). The effect of TQM on customer satisfaction in higher education. *Management Science Letters*, **3**, 891-896.

85) Sinclaire, & K., J. (2014). An Empirical Investigation of Student Satisfaction with College Courses. *Research in Higher Education J.*, **22**.

86) Sivalingam, T. (2015). Factors Influencing Postgraduate Student Satisfaction Towards Non-academic Staff Behaviour in UUM. [Universiti Utara Malaysia].

87) Skea, C. (2017). Student satisfaction in higher education: settling up and settling down. *Ethics and Education*, **12**, 1-14.

88) Solinas, G., Maria, D., & Muresu. (2012). What Really Affects Student Satisfaction? An Assessment of Quality through a University-Wide Student Survey. *Creative Education*, **03**.
https://doi.org/10.4236/ce.2012.31006

89) Susanti, D., Rahmidani, R., & Armiati, A. (2019). Analysis of Student Satisfaction on

Academic Services ISO 9001: 2008 Certified.

90) Syahmer, V., Nurcahyo, R., & Kristiningrum, E. (2022). Student satisfaction measurement in higher education. *Communications in Humanities and Social Sciences*, **2**(1), 14-21.

91) Tamnge, N. R. (2016). Regresi Logistik Biner dalam Menentukan Pengaruh Kualitas Pelay-anan Terhadap Kepuasan Mahasiswa Fakultas Keguruan dan Ilmu Pendidikan Universitas Muhammadiyah Surabaya. *J. of Mathematics Education, Science and Technology*, **1**(2), 222-233.

92) Taskın, N., Kandemir, B., & Erzurumlu, K. (2023). University Student Satisfaction and Behavioural Engagement During Emergency Remote Teaching. *Canadian J. of Learning and Technology*, **49**(1), 1-26.

93) Terry, M., Leary, M., & Mehta, S. (2012). Self-compassion as a Buffer against Homesickness, Depression, and Dissatisfaction in the Transi-tion to College. *Self and Identity - SELF IDENTITY*, **12**, 1-13.

94) Torres, A. G. l., Quiroz, C. P., & Ojinaga, E. P. (2014). Analysis and Quality Assessment on the Service Customer Case: University Insur-gents. *Asian J. of Business and Management*, **2**(2).

95) Tubulingane, B., & Baporikar, N. (2020). Student Satisfaction Approach for Enhancing University Competitiveness. *Inter J. of Tech-nology-Enabled Student Support Services*, **10**, 31-54.

96) Twum, F., & Peprah, W. (2020). The Impact of Service Quality on Students' Satisfaction. *Inter J. of Academic Research in Business and Social Sciences*, **10**, 169-181.

97) Wang, Y., & Liu, C. (2022). The Construction Path of First-Class Undergraduate Majors in Local Application-Oriented Universities in China-an Empirical Study Based on Student Satisfaction Evaluation. *J. of Education and Practice*, **6**(2), 35-55.

98) Wardi, J., Putri, D. L., & Hamuddin, B. (2018). Seeing University in Tangibles Dimension: A Landmark as a Marketing Strategy for Unilak, is it Needed? *Academy of Marketing Studies Journal*, **22**, 1.

99) Widikusyanto, M. (2022). Menguji Lebih Dalam Dampak Dimensi Service Quality Perguruan Tinggi pada Satisfaction, Word of Mouth dan Service Switching (Testing More Deeply The Impact of The Higher Education Service Quality Dimensions on Satisfaction, Word of Mouth and Service Switching). *Sains J. Manaj. dan Bisnis*, **14**, 258-276.

100) Yuniarti, Y. (2014). Pengaruh kualitas pelay-anan terhadap kepuasan mahasiswa program ekstensi fakultas ekonomi universitas jambi. *Trikonomika*, **13**(1), 49-61.

101) Yusof, N. M., Asimiran, S., & Kadir, S. A. (2022). Student Satisfaction of University Service Quality in Malaysia: A Review. *Inter J. of Academic Research in Progre-ssive Education and Development,* **11**(1), 677-688. https://doi.org/10.6007/IJARPED/v11-i1/10985

102) Zaman, Z., Shanjabin, S., & Islam, S. A. (2023). Impact of Occupational Hazards on Healthcare Professionals' Mental (Psychological) Health: Evidence from Government-Owned Hospitals in Khulna, Bangladesh. *Inter J. of Human Resource Studies*, **13**(1).

103) Zeithaml, V. A., Parasuraman, A., & Berry, L. L. (1990). Delivering quality service: Balan-cing customer perceptions and expectations. *Simon and Schuster.*