

Full Length Research Paper

Does service quality affect students' performance? Evidence from institutes of higher learning

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Accepted 6 August, 2010

Service quality is widely used and experimented in various sectors. Five dimensions of service quality are the dimensions that can be applied in every sector whether manufacturing or services sector. This paper is also aimed to see impact of service quality on satisfaction and motivation of students. Finally importance of satisfaction and motivation is also searched for performance of students. This paper is useful to see the importance of service quality to satisfy customers. SERVQUAL model of service quality given by Parasuraman et al. (1988) is used. It contains five dimensions tangible, reliability, responsiveness, assurance and empathy. Findings show significance of relationship between dimensions of service quality that is, tangibles, assurance and empathy with satisfaction while tangible, responsiveness and assurance are significantly related with student motivation. Finally looking, at the performance aspect of students academic career it has been observed that both student's satisfaction and motivation are important for better performance of students.

Key words: Service quality, educational sector, students, motivation, satisfaction, performance.

INTRODUCTION

Education sector is one of the most important sectors of economy. Many countries are now shifting their economies from manufacturing to services sector. Education sector is one of the most important service sectors. Education sector is now considered as important as other sectors of the economy. Competition is now increasing with in the industries in service sector. Researchers and academicians are emphasizing their attention towards educational sector.

As organizations operating in educational sector are competing with each other on the basis of service offered. Studying services and important of service offered to all stakeholders is an important consideration since the recent past. Now organizations are trying to evaluate the services provided by these organizations and comparing these services with competitors to determine status of competitive advantage. To be

competitive organizations evaluate quality of service offered to all the stakeholders. To see the service quality offered at the educational sector, service quality model given by Parasurman et al. (1988) is widely accepted. In the words of Deming (2000) education sector should apply service quality concept as manufacturing and service sector of the economy.

Service quality model consists of five dimensions that is, tangibles, reliability, responsiveness, assurance and empathy. These dimensions of service quality are widely accepted and used by researchers in various industries. Various researchers have investigated service quality in various dimensions of educational set-up, like Hill (1995) investigated the use of service quality in higher education; Anderson (1995) used SERVQUAL to evaluate quality of administration department in educational set up; Banwet and Datta (2002) studied impact of service quality in library.

Out of the stakeholders of the educational quality, students are considered to be one of the most important one, as these are directly affected by the quality of service and satisfaction of other stakeholders like

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parents, employer etc. is dependent upon the satisfaction of students. Considering what makes students satisfied has been widely discussed by the researchers. One of the tools used by the researchers is service quality. Service quality has been widely accepted and used where so ever service quality is going to be studied. This paper is aimed to study impact of service quality on satisfaction and motivation of students with teaching quality of higher learning institutes. Impact of satisfaction and motivation is also discussed in the form of students' performance. This would be a valuable contribution in the educational researcher and it will show importance of service quality for better performance of students.

LITERATURE REVIEW

Students are one of the most important stakeholders of education quality. To satisfy students is one of the prime purposes in education sector. Satisfied students are source of competitive advantage and are source of word of mouth marketing for educational institutions. Satisfaction and motivation of students in educational sector may be attributed to provision of quality at the institute. In order to see what quality satisfies or motivates students, quality of institute should be measured. In order to measure quality SERVQUAL model might be the best option, because of its wide acceptability and use. The following section contains literature regarding the service quality and its impact on satisfaction and motivation.

SERVICE QUALITY AND STUDENTS' SATISFACTION

Various researchers have given their findings regarding students' concern for quality and use of students to measure the quality of service provided. As Gold (2001) says that students should be considered as primary customers and educational institutes should focus on student-centered education. Students should be assessed as the product of the institute (Emery et al., 2001).

The relationship between students and institutions is two fold, schools rely on students for financial needs and students depend on institutes to impart knowledge and help to forge meaningful employment. Educational institutes are conducting student satisfaction survey with the aim to improve quality of service offered to students (Low, 2000).

Quality has been defined "as the ability of a service to satisfy customers" (ISO, 9004-2) (ISO, 1991). Asthiyaman (1997) defined service quality as "Perceived service quality is defined as an overall evaluation of the goodness or badness of a product or service". Studies have confirmed that service quality is antecedent of satisfaction (Cronin and Taylor, 1992; Shemwell et al., 1998). Service quality is considered by various researchers to be used in educational sector because of its importance and

outcomes. Various researchers have investigated service quality in various dimensions of educational set-up, like Hill (1995) investigated the use of service quality in higher education, Anderson (1995) used SERVQUAL to evaluate quality of administration department in educational set up; Banwet and Datta (2002) studied impact of service quality in library. Deming (2000) suggested that education sector should apply service quality concept as manufacturing and service sector of the economy. According to Gronroos (1982) service quality dimensions can be divided into two groups, technical (outcome) and functional (process). The SERVQUAL model given by Parasuraman et al. (1988) contains five dimensions of service quality containing one tangible dimension (Tangible) and four intangible dimensions of service assurance, responsiveness, reliability, and empathy. Cavana et al. (2007) has discussed five dimensions of quality named as empathy, responsiveness, assurance, convenience and reliability; these dimensions are considered as significantly for quality concept. In this study service quality model given by Parasuraman et al. (1988) is used as it is widely accepted and used by researchers and academicians.

Athiyaman (1997) found that there is strong relationship between service quality and customer satisfaction and all service encounters should be managed in order to increase consumer satisfaction. Ahmed et al. (2010) found that there is positive and significant relationship between service quality provided and customer satisfaction. Satisfaction has been defined as consumer's evaluation judgment regarding pleasure derived from utilization of level fulfillment (Oliver, 1981). "Satisfaction is emotional reaction to a product or service experience" (Spreng and Singh, 1993).

Satisfaction is an outcome of service quality (Shemwell et al., 1998; Cronin and Taylor, 1992; Bolton and Drew, 1991). Veloutsou et al. (2004) found that student's main criteria for selection of university is quality of education and service offered at university. Low (2000) notes that provision of service quality is key source of attraction, satisfaction and retention of students and it has direct impact on funding, job security and viability of educational institute.

The teaching staff (tangibles), the teaching methods (responsiveness and reliability) and administration of university leads to student satisfaction (Navarro et al., 2005). The quality issue should be considered by every personnel of institutes whether in front-line contact, teach students or part of management (Gold, 2001; Low, 2000). The management of university should focus on service quality, information and facilities to increase satisfaction and loyalty of university students, and service quality is most important of all (Helgesen and Nettet, 2007). Satisfaction of students reflects perception of service quality differences offered (Gruber et al., 2010). Communication and responsiveness are most crucial determinants of student satisfaction but absence of

responsiveness, tangibles, communication leads students to dissatisfaction (Douglas, 2008).

Donaldson and Runciman (1995) service quality is a key performance measure in educational excellence and is a main strategic variable for universities to increase market share. Perceived quality creates positive image in the mind of students which ultimately leads them to satisfaction (Alves and Raposo, 2010). Mazzarol (1998) say that higher education institutions should maintain a distinctive image to have a competitive advantage. Customer satisfaction is dependent on customer expectations and perception regarding service quality (Ekinci, 2004; Christou and Sigala, 2002; Cronin and Taylor, 1992).

Students with positive experience at educational institution are more likely to be more satisfied with institute than those who don't have positive experience (DeShields Jr et al., 2005). Students have certain expectations with the institutes and how well these expectations are met affects students' level of satisfaction with the institutions and their perceptions regarding institutional effectiveness (Juillerat and Schreiner, 1996). Service quality is positively related to students' satisfaction and students' loyalty; so management should pay attentions most to the quality of service offered (Helgesen and Nettet, 2007).

It has been widely discussed that customer satisfaction leads towards customer retention (Mittal and Kamakura, 2001). Quality services provided to customers bring positive future intentions in customers to stay with the company (Ahmad et al., 2010). Student satisfaction is positively related to student loyalty (Schertzer and Schertzer, 2004; Navarro et al., 2005). Perceived quality and student satisfaction has direct relation with post-lecture intentions of students (Banwet and Datta, 2003). Navarro et al. (2005) argues that teaching staff, enrolment and course organization have an impact on satisfaction of students and satisfaction leads to intent to return to university, helps university to improve and maintain its reputation, and its number of students. Translating university services considers intentions of further studies in the same institute, using ancillary services and lastly willingness to recommend others (Blackmore et al., 2006). Outcome of service is most important factor affecting satisfaction regarding service (Banwet and Datta, 2002; Patterson and Spreng, 1997). Satisfaction level of students has a direct bearing on performance of student (Chambel and Curral, 2005). Eom et al. (2006) found that there is positive relation between student satisfaction and their success ratio; successful candidates are more satisfied then unsuccessful candidates.

STUDENTS' MOTIVATION AND PERFORMANCE

Motivation of students has been one of the very highly discussed topics in higher education. Motivation of

students is directly related to the academic performance of students. Motivation of students is an element that leads students towards learning process. Numerous studies are conducted to see relation of motivation and students academic performance. Various researchers have defined students' motivation. For example, Lumsden (1994) analyzed motivation as students' involvement in education. Marshal (1987) said that students' motivation is a force that is beneficial to the learner. Ames (1990) viewed that motivation of learning is dependent upon quality attached to learning and process of learning. Autonomous motivation was reported to be significantly associated with the students' perceptions of course quality, in terms of the meaningfulness and value of the educational experience (Sobral, 2004). Rost (n.d.) argues that motivation has an effect on effort, efforts affect results, and finally positive results lead to an increase in abilities. Successful candidates are more satisfied then unsuccessful candidates (Eom et al., 2006). Students with high motivation level will learn more and will be more successful than those with less motivation (Frankola, 2001; LaRose and Whitten, 2000). There is strong relation between lack of motivation and dropout rates (Frankola, 2001; Galusha, 1997). Bomia et al. (1997) has suggested that student willingness to, need to, desire to and obligation to participate learning is outcome of students motivation. There is positive relation between students motivation and students academic performance. Greater is level of motivation greater will be academic performance (Afzal et al., 2010) Figure 1.

RESEARCH HYPOTHESIS

- H1a: Tangibles are positively related with the students' satisfaction.
- H1b: Reliability is positively related with students' satisfaction.
- H1c: Responsiveness is positively related with the students' satisfaction.
- H1d: Assurance has a positive relation with the students' satisfaction.
- H1e: Empathy is positively related with students' satisfaction.
- H2a: Tangibles are positively related with the students' Motivation.
- H2b: Reliability has a positive relation with students' Motivation.
- H2c: Responsiveness is positively related with the students' Motivation.
- H2d: Assurance is positively related with the students' Motivation.
- H2e: Empathy is positively related with students' Motivation.
- H3: There is significant relationship present between students' satisfaction and their performance.
- H4: There is significant relationship present between students' Motivation and students' performance.

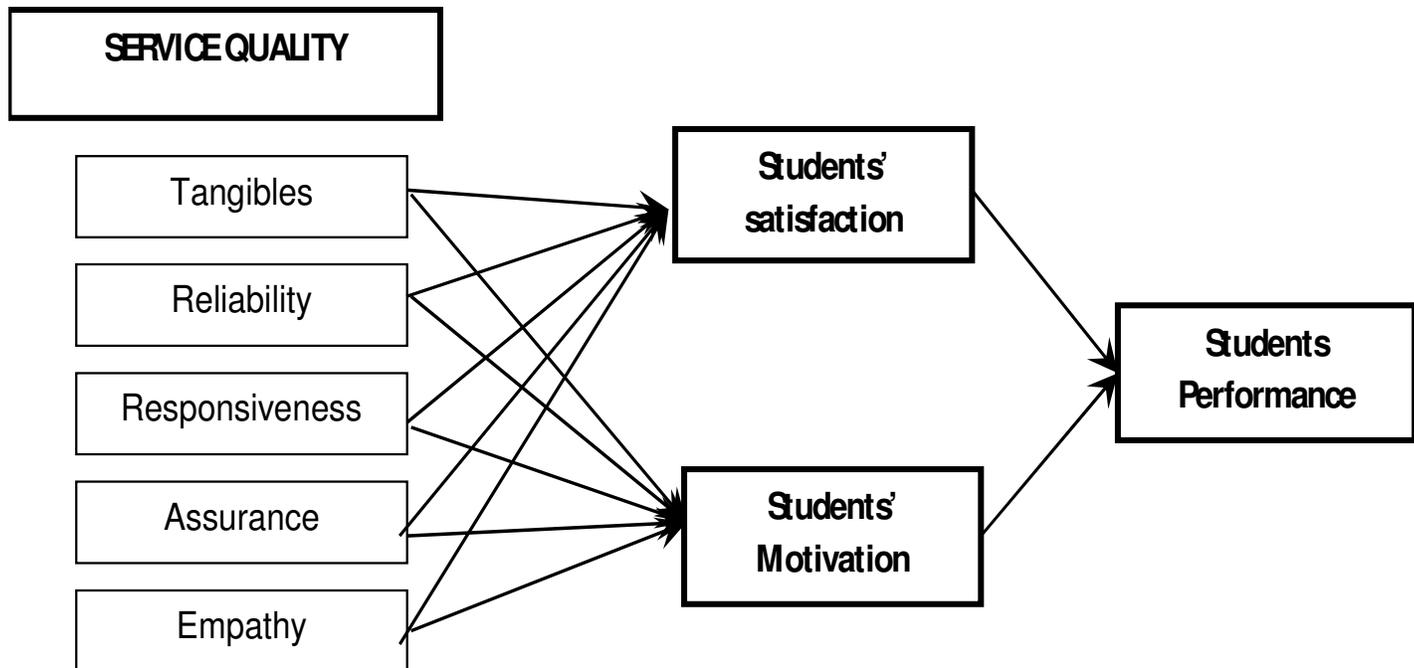


Figure 1. Research model.

RESEARCH METHODOLOGY/DESIGN

Sample

600 students were selected for data collection from different universities both from public and private sector on the basis of multistage sampling. In first stage 6 universities (3 from public sector and 3 from private sector) were selected on simple random sampling basis.

In second stage students were selected on the basis of stratified sampling from these universities. Personally administrated questionnaire were used for data collection. 495 questionnaires were received back with a response rate of 83%. Male students were 56% of the total strength, and rest 44% were female students, average age of students was 23.59 years.

Measurement instrument

In order to operationalize and measure the students' satisfaction and dimensions of service quality, the instrument was adopted from the research work of Banwent and Datta (2003). This instrument consists of five dimensions that is, tangibles, reliability, empathy responsiveness and assurance. The instrument was on 7 point likert scale to see the more realistic response of students' regarding quality of service offered at their institutes.

Data analysis

The research was conducted to measure the students' satisfaction and motivation regarding quality of service in higher educational institutes located in various cities of Pakistan. Data collected was analyzed through using SPSS 17.0 and AMOS 16.0. Findings are discussed in the following section.

Table 1. Descriptive statistics.

	Mean	Std. deviation	N
Tangibles	5.1178	0.87709	400
Reliability	5.1092	0.98891	400
Responsiveness	4.8300	1.07967	400
Assurance	4.7398	1.18446	400
Empathy	4.2191	1.11507	400
Satisfaction	4.7975	1.37020	400
Motivation	4.8450	1.63176	400

FINDINGS AND CONCLUSION

The results regarding the issue are as follows. Table 1 presents score means and standard deviation of students' satisfaction with respect to service quality in their institutes. The score mean and standard deviation of student motivation is also presented in the table. The questionnaire used for collection of data consists of 7 point likert scale ranging from highly dissatisfied to highly satisfied. The score mean for quality of service is 4.8032 which show that respondents are slightly satisfied with overall quality of service of their educational institute. The mean scores of all the dimensions of service quality represent that respondents are slightly satisfied with the responsiveness, tangibles, reliability and assurance, whereas they are neutral regarding empathy. The satisfaction with the service quality of education students

Table 2. Index of model fit.

Index of fit	Chi-Square (df)	P	GFI	AGFI	NFI	CFI	RMR
Value	175.655	0.000	0.919	0.514	0.905	0.906	0.133

Table 3. Regression weights (results of hypotheses tests).

Path	Estimates	S.E.	C.R.	P	Hypothesis	Results
Tangibles-satisfaction	0.397	0.067	5.906	0.000	H1a	Accept
Reliability-satisfaction	0.064	0.052	1.231	0.218	H1b	Reject
Responsiveness-motivation	0.235	0.068	3.445	0.000	H1c	Accept
Assurance-satisfaction	0.032	0.068	0.467	0.641	H1d	Reject
Empathy-satisfaction	0.257	0.059	4.349	0.000	H1e	Accept
Tangibles-motivation	0.186	0.082	2.276	0.023	H2a	Accept
Reliability-motivation	0.020	0.063	0.317	0.751	H2b	Reject
Responsiveness-motivation	0.169	0.083	2.036	0.042	H2c	Accept
Assurance-motivation	0.339	0.083	4.102	0.000	H2d	Accept
Empathy-motivation	0.277	0.072	3.847	0.000	H2e	Accept
Satisfaction-performance	0.257	0.031	8.363	0.000	H3	Accept
Motivation-performance	0.191	0.026	7.337	0.000	H4	Accept

are slightly satisfied with the quality offered. Same results have been extracted for the motivation of students. So in summing up we can say that students are slightly satisfied and slightly motivated regarding the quality of education and institute. The findings of model fit and regression weights of the variables are shown in the following section.

The index fit of the model is shown in the Table 2. With (175.655) degree of freedom into consideration, most index values satisfy the general standard values for index fit. The general accepted standards for model fit are; Chi-square value (significant level > 0.05), goodness of fit index (GFI > 0.80), adjusted GFI (AGFI > 0.80), Normed fit index (NFI > 0.90), comparative fit index (Close to 1 or > 0.90), and root means square residual (RMR < 0.05). As this model fulfills most of the requirements of the model fitness so it can be considered as acceptable model.

The results of hypotheses tests of the relationship between constructs of service quality, customer satisfaction and consumer retention are given in Table 3 and Figure 2. Findings show that there is significant relationship between three dimensions of service quality (Tangible, responsiveness and empathy) with satisfaction that is, (P < 0.01), while two other dimensions of service quality that is, reliability and assurance have no significant relation with students' satisfaction. While moving towards students' motivation, it was found that assurance, empathy were strongly related with service quality at 0.01 significance level, while tangibles and responsiveness were positively related with motivation at 0.05 significance level and reliability was not having any relation with motivation. Finally looking towards the impact of satisfaction and

motivation with performance of students, it is proved that there is positive and significant relationship between satisfaction, motivation and performance of students (p < 0.01).

So we can conclude that students' satisfaction and motivation increases performance level of students and satisfaction and motivation are influenced by dimensions of service quality.

DISCUSSION

The findings show that customers are found to be slightly satisfied with the quality of service of their institute where all service quality few dimensions have positive and significant relation with students' satisfaction and motivation. Tangibles, responsiveness and empathy are positively related with students' satisfaction while reliability and assurance were having no relationship with students' satisfaction. Except reliability all other dimensions of service quality are having significant and positive relationship with student motivation. Finally looking at the relationship of student satisfaction and motivation with students' performance, it was found that student satisfaction and motivation are positively related with performance of students.

We can conclude that provision of better service quality can increase performance of students, students being the direct stakeholder of educational quality is most important of all the stakeholders of educational institutions. If educational institutes want that their students should perform well then educational institutes should satisfy and motivate them and the best of their satisfaction and

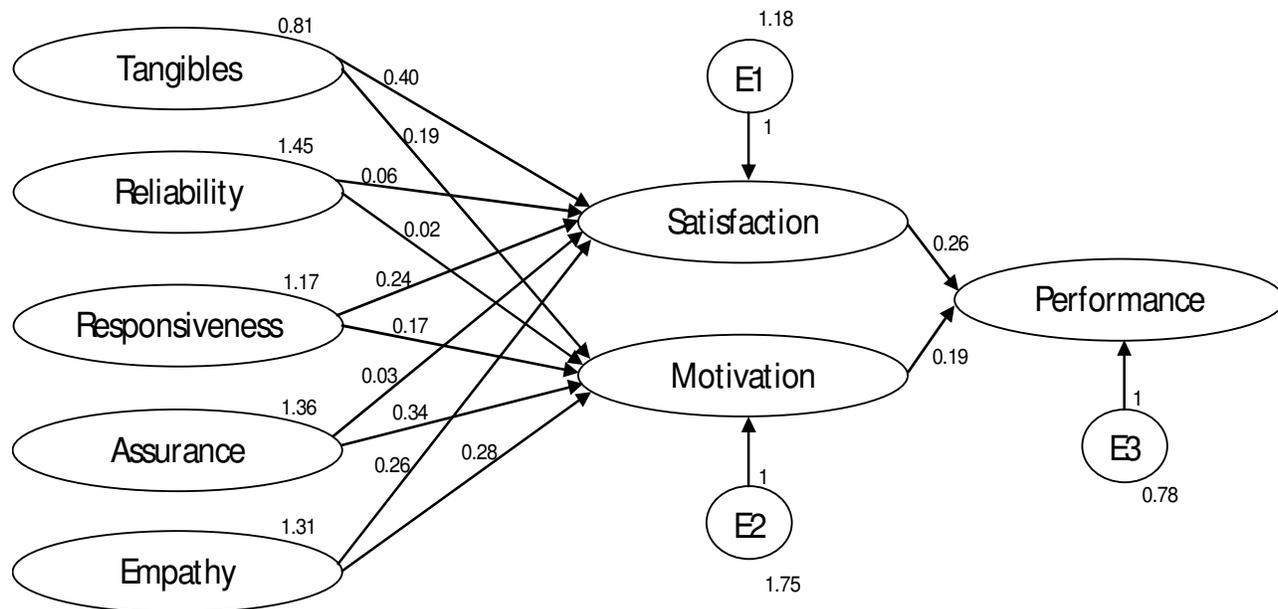


Figure 2. Structural equation model for the service quality, satisfaction, motivation and performance.

motivation is providing best quality services with respect to teaching.

LIMITATION OF THE STUDY

This study aims to address service quality dimensions and their impact on students satisfaction, motivation and performance. Its scope can be further broadened by adding more dimensions of service quality. This study considers satisfaction of only one stakeholder that is, student and other stakeholders should also be considered to address the issue. The scope of the study should be broadened and other stakeholders should be included in the study.

IMPLEMENTATION OF THE STUDY

This study is a valuable contribution in Pakistani scenario, as government is increasing its educational budgets and to justify these spending and to get maximum returns, evaluation of services offered is necessary. This study would provide direction to future researchers and would help policy makers to consider the importance of service offered to get desired outcomes in shaper of satisfaction, motivation and students' performance.

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