

## Patients' Satisfaction with the Medical Services in Bangladesh: A Case Study on the City Hospital Limited, Dhaka

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**Abstract:** Bangladesh is one of the most densely populated countries in the world. The desired and right medical services for people are very important for any healthy nation. Many private hospitals as well as public hospitals are operating in Bangladesh to provide medical services for the people of Bangladesh. We know the survival and success of a private hospital depend on its patients' satisfaction. The present study attempts to measure patients' satisfaction with the medical services provided by a leading private hospital in Bangladesh. To measure the satisfaction of patients, SERVQUAL model has been applied in this study. The research involved SERVQUAL instrument to the service quality dimensions and asking 50 respondents as sample of patients to complete the questionnaire. Patient's responses on the basis of service quality dimensions have been obtained. The study depicts that most of the patients are merely satisfied or neutral with the medical services of the hospital in general and patients are more satisfied with tangibility than any other dimensions of service quality. The study has enabled to identify the areas where improvements are needed from the patients' point of view. We know SERVQUAL model can be applied to measure the gaps between perception and expectation of the services provided, but this study is not including the gap measurement and the study is confined to a leading private hospital situated in Dhaka city only.

**Key Words:** Services, Patients, Satisfaction, Medical services, SERVQUAL, Service quality dimensions, Bangladesh.

### Introduction

Health is the root of all happiness and sound health is a basic physiological need and fundamental right for any human being. The government and the personnel involved in this sector are supposed to take the responsibility to provide health services for the entire population of a country. The standard of health services in most of the developing countries of the world is not up to the mark. A large number of people in developing countries do not have access to the basic health services. The services delivered by the health care providers are not up-to the level of need and perception of the clients. In recent years the World Bank and other donor agencies have been advising developing countries to ensure that limited resources not only have an optimal impact on the population's health at affordable cost but also that health care services are expected to

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respond directly to patients' preferences and demands ( De Geydent, 1995; Calnan et al., 1994, 1988; Kwan, 1994). The efforts of Bangladesh to improve its health care delivery system have increasingly emphasized quality of care (Aldana et al., 2001).

Bangladesh is one of the developing and densely populated countries in the world. The constitution of Bangladesh, Article 15(a) and Article 18(1), has given top priority to public health and nutrition as a state policy of the government of the People's Republic of Bangladesh. To execute the obligation of the constitution and expectation of the people, the governments of Bangladesh have taken measures to prepare a pragmatic health policy for the nation. Accordingly, there were attempts to formulate an acceptable health policy in 1990, 2000, and 2006 to ensure quality medical care and services to citizens (Daily Star, 2008).

Bangladesh has made significant improvement in health sector, which make it an example for other developing countries even though being a resource poor country. Over the last decades key health indicators such as life expectancy and coverage of immunisation have improved notably, whilst infant mortality, maternal mortality and fertility rates have dropped significantly (Ferdous Arfina Osaman, 2008). An effectively performing health system is essential in improving the population's health status, providing safeguard against health-related financial threat and enhancing the health sector's responsiveness to customers needs. A health system consists of all organizations, people and actions, whose primary intent is to promote, restore or maintain health (Global Fund, 2011). Bangladesh has made remarkable progress in some indicators of health such as controlling infant, maternal and under-five mortality. It has achieved a credible record of sustaining 90% plus vaccine coverage in routine EPI with NIDS (national immunizations days) since 1995 (WHO 2008).

The government of Bangladesh is delivering health facilities and medical services through public hospitals, community clinics and other organizations. Moreover, there are many private hospitals which are providing health care services for the people of Dhaka, the capital city of Bangladesh, as well as across the whole country. It is known that the problem of access to modern health care service and reliable treatment is acute in Bangladesh. We know that patient's satisfaction is the key to the survival and success of a health care service provider i.e. a hospital in private sector. Patients' satisfaction plays an important role to attract new patients and retain existing ones for health services. It is observed that dissatisfaction with the quality of health care services in Bangladesh has led a good number of Bangladeshi patients to go to the neighboring countries such as India, Thailand and Singapore.

### **Objective of the Study**

The objective of the present study is to evaluate patients' satisfaction with the quality of medical services provided by the City Hospital Limited, a leading private hospital in Dhaka city, through SERVQUAL model.

### **Literature Review**

The quality of health care is defined in a variety of ways in the context of varying socio-cultural and development settings, but so far there is no consensus on a single set of accepted criteria to measure quality. Donabedian (1980), a leading author on quality of care, defined quality of care as that kind of care, which is expected to maximise patient welfare, and depends on whether effective care is sought and individual and social preferences regarding care is manifested. It also underscores the importance of performance of health care practitioners, health care system and relative costs and benefits of patients. One of the most widely cited recent definitions indicates that quality of care is the “degree to which health services for individuals and populations increase the likelihood of desired health outcomes and are consistent with current professional knowledge” (Lohr 1990). Quality of care is also defined in terms of two key dimensions, access and effectiveness, which implies whether the users get the care they need and whether the care they receive is effective (Campbell, Ronald, and Buetow 2000).

Wisniewski (2005) has undertaken a research study aimed to apply the SERVAQUAL measurement instrument in a Scottish Colposcopy clinic. The study involved adapting the SERVAQUAL instrument to the Colposcopy setting and asking a sample of patients to complete the questionnaire. The results of the research were quite positive with high level of patient satisfaction but revealed the need for improved premises.

Consumer satisfaction is the fundamental requirement for health care providers. Satisfaction is important when patient themselves and institutional health care service buyers make selection decisions. Kandampully (2002) has identified various factors affecting patient satisfaction; researchers have explored various service quality dimensions considered by patients while evaluating quality at hospitals such as modern equipments, physical facilities, convenience at supplementary services, behavior by doctors and modern staff. In this study researchers investigated that weather service quality and patient satisfactions are independent or dependent in the context of five big general hospitals in Kolhapur city.

Bonshoff and Gray (2004) have conducted the studies on the relationships between service quality, customer satisfaction and buying intentions in the private hospital industry. The objective of the study was to investigate whether superior service quality and service transaction specific customer satisfaction will enhance loyalty among patients in the private health care industry. Study attempts to access what dimensions of both customer satisfaction and service quality derive ‘overall satisfaction’ and loyalty in the South African private hospital industry. The results reveal that the service quality dimensions, empathy of nursing staff and assurance impact positively on both loyalty and cumulative satisfaction. Results also reveal that the customer satisfaction dimensions are: satisfaction with meals, satisfaction with nursing staff and the satisfaction with fees all impact positively on both loyalty and cumulative satisfaction. The studies conducted aim to investigate the structural relationship between out satisfaction and service quality dimensions where patients have substantial freedom in choosing their medical service providers and to further study the causal relationship between service quality and satisfaction. Results show the pattern of relationships between service quality and patient satisfaction was similar across the gender, age and service type subgroups. It was also

found that the level of satisfaction on the other hand was not the same for subgroups when divided by age and the types of services received. Many of these service quality dimensions significantly influence patient satisfaction. The dimensions for evaluating health care quality are convenience, degree of concern shown and medical staff and physical facilities.

Respect for patients' demand and desire is central to any humane health care policy. As a result, patient satisfaction is widely considered as an integral part of the quality of care. Health care provider organizations wishing to meet those needs more effectively have shown growing interest in the use of patient evaluations and reports as a complement to other methods of quality assessment and assurance (Cleary et al., 1991). Increasing concentration has been given to the evaluation of patient satisfaction with care (Nguyen Thi et al., 2002). Furthermore, patient satisfaction is identified as an important dimension for assessing the quality of health care services (Calnan et al., 1994; Epstein, Laine, Farber, Nelson, & Davidoff, 1996; Williams, 1994). Indeed, quality assurance has evolved as an internationally important aspect in the provision of health care services (Nguyen Thi et al., 2002). Recently developing countries, influenced heavily by findings of developed countries, are increasingly interested in evaluating the quality of health care services (Prasanna et al., 2009). According to Donabedian (1980), client satisfaction is a fundamentally important measure of the quality of care because it offers information on the provider's success at meeting those expectations of most relevance to the client. Measures of satisfaction are, therefore, important tools for research, administration and planning. Patient satisfaction can also be used to evaluate the process of health care (Carey & Seibert, 1993; Etter, Perneger, & Rougemont, 1996; Fitzpatrick, 1991a, b; Guadagnoli & Cleary, 1995; Kane, Maciejewski, & Finch, 1997; Lasek,

Barkley, Harper, & Rosenthal, 1997; Linn et al., 1995; Ross, Steward, & Sinacore, 1995; Williams, 1994), as greater satisfaction may be related with superior compliance, improved attendance at return visits and better outcomes (Cleary, Keroy, Karapanos, & McMullen, 1989).

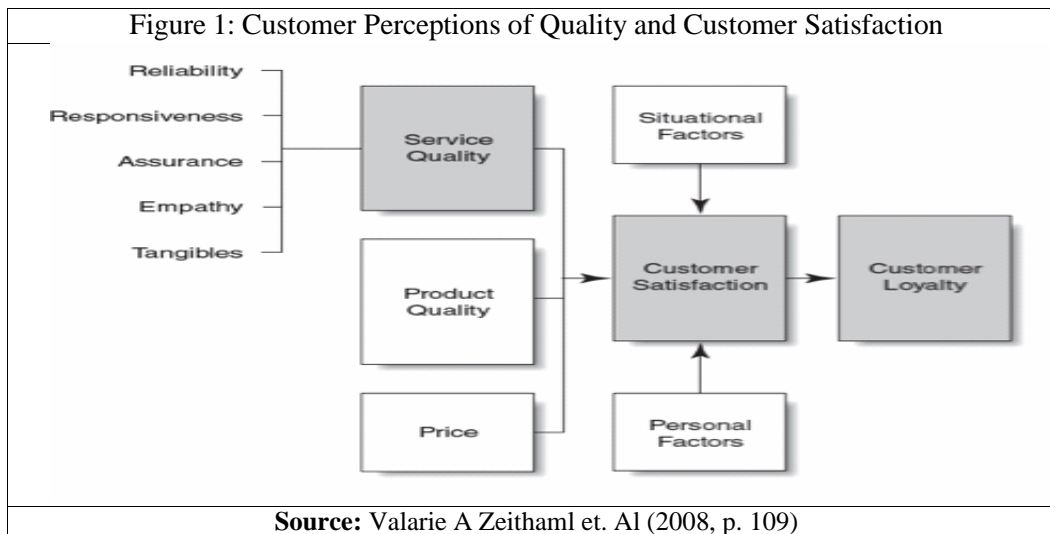
Factors associated with satisfaction are thought to include the structure, process and outcome of care as well as patient socio-demographic, physical and psychological status, and attitudes and expectations concerning medical care (Cleary & McNeil, 1988; Minnick, Roberts, Young, Kleinpell, & Marcantonio, 1997; Williams, 1994).

Client satisfaction is measured directly by asking whether respondents feel satisfied or dissatisfied with individual service quality items (Nathorst-Boos et al., 2001). In still others, the degree of discrepancy between expectations and perceived performance is defined as client satisfaction (Williams, 1994). In Bangladesh, very few studies have tried to measuring patient satisfaction with the quality of hospital services. Previous assessments of client satisfaction with services provided by government health workers in Bangladesh has usually constituted a marginal element in performance appraisals (Whittaker M et al., 1993; Khnun P et al., 1994; Mahbub F et al., 1991; Hashemi S et al., 1995; Al- Sabir et al., 1995). These studies have mostly been limited to family planning, but one finding worth mentioning is that quality of care was not always linearly associated with the level of satisfaction expressed by clients (see Aldana et al., 2001).

Aldana, Piechulek and Al-Sabir (2001, p. 512) have measured client satisfaction (operationalized directly as “very satisfied” to “very dissatisfied”) with general health-care clinic services in rural Bangladesh and noted that perceptions of provider behavior, especially respect and politeness, are strongly associated with satisfaction. Wait time is also important but perceptions of medical staff technical competence are relatively less important.

In a revolutionary article, Parasuraman et al. (1985) developed a gap model by synthesizing (1) the expectation-disconfirmation theory concerning consumer satisfaction (Churchill and Surprenant, 1982; Gronroos, 1982; Lewis and Booms, 1983; Oliver, 1980), and (2) previous explorations of the dimensions of service quality (Gronroos, 1982; Lehtinen and Lehtinen, 1982; Sasser, Olsen, and Wyckoff, 1978). They subsequently developed a multiple-item scale named SERVQUAL which conceptualizes and measures elements of service that are evaluated by service customers in assessing service quality. According to the SERVQUAL conceptualization, service quality can be assessed by five dimensions: reliability, responsiveness, assurance, empathy and tangibles (Parasuraman et al., 1988). But the use of SERVQUAL scale has been highly criticized in terms of both theoretical and operational issues. The SERVQUAL scale has also been criticized in methodology aspect, mainly due to its calculation mechanism using a difference score between expected performance and the actual performance of a service provider. Specific criticisms on SERVQUAL methodology include multicollinearity resulting from the auto-correlation between the measures (Spreng, Mackenzie, and Olshavsky, 1993), low reliability (Spreng and Singh, 1993), and problems with discriminant validity (Brown, Churchill, and Peter, 1993).

We know that satisfaction is a function of customers’ expectations and satisfaction is influenced by perceptions of service quality, product quality and price as well as personal and situational factors. The following figure reflects the relationship between customer perceptions of quality and customer satisfaction.



The SERVQUAL approach to the measurement of service quality has attracted considerable attention since first introduced by Parasuraman et al. in 1985. In the early 1980's Parasuraman, Zeithaml & Berry conducted an extensive program of qualitative research with business people and consumers to explore the concept of service quality. They concluded that service quality as perceived by customers depends on the gap between their expectations and the level of service that was actually provided. They also identified ten components of service quality, including constructs such as competence, courtesy, credibility, and security initially. This list was later reduced to five constructs - tangibles, responsiveness, empathy, assurance and reliability when they have extended their research in 1988 forming the basis of a scale called SERVQUAL ((Parasuraman, Zeithaml, & Berry, 1988)) with the respective meanings as given below:

- **Reliability:** The ability to perform the service dependably and accurately.
- **Responsiveness:** The willingness to help customers and provide prompt service.
- **Assurance:** Employees' knowledge and courtesy and their ability to inspire trust and confidence.
- **Empathy :** Caring individualized attention given to customers
- **Tangibles:** The appearance of physical facilities, equipment, personnel, and written materials.

### Methodology of the Study

In this study, a mixed form of research design combining exploratory and descriptive is followed. The objective of this study is to evaluate patients' satisfaction with healthcare services provided by a leading private hospital located in the capital city of Bangladesh and to attain the objective a model titled SERVQUAL developed by Parasuraman et al. (1988) has been used. In the study, a total number of 50 patients have been selected from a leading private hospital situated in Dhaka city through convenience sampling. The patients selected as sample took health care services from the said hospital sometime from October 1, 2013 to November 15, 2013. In processing data 03 questionnaires have been rejected due to incomplete filling by the respondents. To collect data from respondents, a structured questionnaire has been prepared based on SERVQUAL model containing 22 statements with 5 different dimensions. Data have been collected from respondents in a 5-point Likert Scale and processed using SPSS 16.

### Findings and Discussions:

**Table 1: Patients' Satisfaction with Different Dimensions of Services**

Dimensions	Average Score
Reliability	3.91
Responsiveness	3.405
Assurance	3.835
Empathy	3.412
Tangibles	4.25
	18.812/5=3.7624

Source: Author's Computation

From the above table it has been seen that average scores of the respondents regarding different dimensions of services such as-reliability, responsiveness, assurance, empathy, and tangibility are 3.91, 3.405, 3.835, 3.412, and 4.25 respectively indicating above neutral or positive responses towards patients’ satisfaction. Moreover, tangibility score is 4.25 among other dimensions indicating that patients are satisfied and have agreed that the appearance of the physical surroundings and facilities, equipment, personnel, and the way of communication are appealing. The average scores of reliability and assurance are 3.91 and 3.835 respectively which indicate that patients’ satisfaction related to these two dimensions are above neutral in average and closer to “agree (4)”, thus, it can be said that patients have agreed somewhat and are satisfied with the abilities of the hospital to perform the promised service dependably and accurately along with knowledge and courtesy of employees and their ability to convey trust and confidence. However, average scores of responsiveness and empathy are 3.405 and 3.412 respectively indicating that patients’ satisfaction about the hospital’s willingness to help and provide prompt service with caring, individualized attention the hospital provides its patients is closer to neutral and “agree” response. So, total average (3.7624) of these 5 dimensions is indicating that the patients are not highly satisfied toward medical services.

**Table 2: Patients’ Satisfaction with Reliability of Medical Services**

Reliability	N	Min	Max	Mean	Std. Deviation
When the hospital promises to deliver a service by a certain time, it does so.	47	2	5	3.80	.833
When patients have a problem, the hospital shows a sincere interest in solving it.	47	2	5	4.00	.728
The hospital performs the service right the first time.	47	2	5	3.86	.700
The hospital provides its service at the time it promises to do so.	47	2	5	4.00	.728
The hospital insists on error free records	47	2	5	3.92	.634
Valid N (listwise)	47				

**19.58/5=3.91**

It has been observed from the above table that the average score of patients’ satisfaction with the reliability of the medical services is 3.91 which is very close to 4 indicating patients are merely satisfied. The scores (4.00 and 3.86) in the table depict that the hospital was found sincere in solving the patients’ problem and try to deliver according to their promises. The scores 4.00 and 3.92 imply that the patients perceive that the hospital cannot maintain error free services and cannot maintain time in delivering their services. The standard deviations of patients’ satisfaction with reliability of the medical services are .833, .723, .700, .728 and .634 respectively because it shows that the individual responses to a question, on average, vary or "deviate" from the mean.

**Table 3: Patients' Satisfaction with Responsiveness of Medical Services**

Responsiveness	N	Min	Max	Mean	Std. Deviation
The hospital keeps patients informed about when services will be performed.	47	2	5	3.30	.886
The doctors and medical staff in the hospital give you prompt service	47	2	5	3.24	.657
The doctors and medical staff are always willing to help you.	47	2	5	3.88	.872
The doctors and medical staff are never too busy to respond to your request.	47	2	5	3.20	.756
Valid N (listwise)	47				

**13.62/4=3.405**

The table shows that the patients' satisfaction with the responsiveness of the medical services proved by the said hospital is 3.405 which mean most of the patients are neutral with the services of the hospital in this dimension. The scores in the table depict that the performance of the hospital in all elements of this dimension is not up to the expected level of the patients. As the scores are 3.30, 3.24, 3.88 and 3.20, it has been found that the service providers are not prompt and spontaneous in delivering services and has not always kept the patients informed about when services will be performed.

On the other hand, it has been observed that the standard deviations of patients' satisfaction with responsiveness of the medical services are .886, .657, .872 and .756 respectively because it shows that the individual responses to a question, on average, vary or "deviate" from the mean.

**Table 4: Patients' Satisfaction with Assurance of Medical Services**

Assurance	N	Min	Max	Mean	Std. Deviation
The behavior of doctors and medical staffs instills confidence in you	47	2	5	3.60	.782
You feel safe in taking services from this hospital	47	2	5	3.48	.707
The doctors and medical staffs are consistently courteous with you.	47	3	5	4.38	.725
The doctors and medical staffs have the knowledge to answer your questions.	47	3	5	3.88	.659
Valid N (listwise)	47				

**15.34/4=3.835**

The study reveals that the average score of patients' satisfaction with the assurance dimension of medical services provided by the hospital is 3.84 which indicate most of the patients are neutral with the hospital. As the score is 4.38, it can be implied that the service providers are courteous and consistent in their behavior with the patients. On the other hand, patients don't always feel safe in taking services from the hospital as the score (3.48) implies. Based on the scores in the table, it has been observed that the patients feel doctors and staffs are knowledgeable but they can't instill confidence to a large extent.



On the contrary, the table shows that the standard deviations of patients' satisfaction with assurance of the medical services are .782, .707, .725, and .659 respectively because it shows that the individual responses to a question, on average, vary or "deviate" from the mean.

**Table 5: Patients' Satisfaction with Empathy of Medical Services**

Empathy	N	Min	Max	Mean	Std. Deviation
The doctors and other medical staffs give you individual attention.	47	3	5	3.58	.673
The hospital has doctors and nurses who give you personal attention.	47	2	5	3.28	.834
The hospital has your best interests at heart.	47	2	4	2.92	.695
The doctors and medical staffs understand your specific needs.	47	2	5	3.34	.772
The hospital has service hours that are convenient to all its patients.	47	3	5	3.94	.712
Valid N (listwise)	47				

**17.06/5=3.412**

As the average score is 3.412, the study shows that patients' neutral or simply satisfied with empathy of medical services provided by the hospital. Based on score (2.92) it can be interpreted the hospital does not give highest focus on the interest of the patients. It is also revealed that patients are getting convenient service hours (mean response is 3.94) from the hospital. The study also shows that patients perceive the hospital gives individual attention to the specific problems, not to the highest level. Moreover, the hospital has little understanding on patients' specific needs as the score is 3.34. However, the standard deviations of patients' satisfaction with empathy of the medical services are .673, .834, .695, .772 and .712 respectively because it shows that the individual responses to a question, on average, vary or "deviate" from the mean.

**Table 6: Patients' Satisfaction with Tangibles of Medical Services**

Tangibles	N	Min	Max	Mean	Std. Deviation
The hospital has modern-looking equipment	47	3	5	4.26	.633
The physical facilities of the hospital are visually appealing	47	3	5	4.18	.596
The doctors and medical staffs of the hospital appear neat	47	3	5	4.26	.633
Materials associated with the service are visually appealing at UBL.	47	3	5	4.16	.681
Valid N (listwise)	47				

**16.86/4=4.25**

Above table shows that average score of patients satisfaction with tangibles of medical services is 4.25 which indicates patients' are satisfied and agreed to the services the hospital provides with tangibility dimension. As the score (4.26) is same on modern-looking equipment and appear neat respectively, it can be interpreted that the hospital is

providing modern-looking equipment where doctors and medical staffs appear neat in front of patients. In addition to that, physical facilities of the hospital and materials associated with the service are visually appealing.

On the other hand, the standard deviations of patients' satisfaction with tangibles of the medical services are .633, .596, .633, and .681 respectively because it shows that the individual responses to a question, on average, vary or "deviate" from the mean.

### **Conclusion:**

Patients' satisfaction is one of the most expected outcomes of any hospital. Although it can be based on the dimensions of services like reliability, responsiveness, assurance, empathy, and tangibility that a hospital provides but patients' satisfaction depends on how well these dimensions are working from all sides of the hospital. In that case, patients are satisfied in tangibility dimension of the hospital because the hospital has modern-looking facilities where doctors and medical staffs appear neat in front of patients. In reliability and assurance dimensions, it has been seen that patients are neutral or somewhat satisfied. On the contrary, it has been found that the hospital is lagging behind in responsiveness and empathy dimensions of services indicating these dimensions are not quite satisfactory for patients in the hospital. The respondents were not always responsive in answering to all the questions due to mental state at the time when they face and receive medical services from the hospital. In addition, no benchmark has been found to determine and compare patients' satisfaction because patients vary from one to another and so as their problems. So, the hospital should observe the patients continuously to incorporate performance for patients' satisfaction.

### **Limitations and Scope for Future Research**

The present study was conducted only on a leading private hospital situated in Dhaka city with a small sample of respondents selected through convenience sampling. The questionnaire was administered on fifty respondents out of which three questionnaires were rejected due to incomplete filling by the respondents. So, the results of the study may not illustrate the actual scenario about patients' satisfaction with the medical services provided by private hospitals in Bangladesh. In view of limitations of the study mentioned, a further study can be conducted on a larger number of hospitals situated in the capital city, divisional cities and district towns of Bangladesh. And, the study should be conducted with a larger sample size in multiple locations of Bangladesh to get an accurate picture of patients' satisfaction with the quality of medical services.

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## Annexure

### Questionnaire on Patients' Satisfaction with the Quality of Medical Services in Bangladesh

**Dear Respondents**

The data you are providing through this questionnaire will exclusively be used for research purpose and in no case will be disclosed to anybody.

Thank you very much indeed for your cooperation.

The Researchers

**B. Please tick (✓) any one from 1 to 5 in the boxes against a statement to show your agreements to the elements of service quality.**

Strongly Disagree					Strongly Agree
1	2	3	4	5	

<i>RELIABILITY</i>		Degree of Agreement				
STATEMENTS		1	2	3	4	5
i	When the hospital promises to do something by a certain time, it does so.					
ii	When you have a problem, the hospital shows its sincere interest in solving it.					
iii	The hospital performs the service right the first time.					
iv	The hospital provides service at the time it promises to do so.					
v	The hospital insists on error free records					

<i>RESPONSIVENESS</i>		Degree of Agreement				
STATEMENTS		1	2	3	4	5
i	The hospital keeps patients informed about when services will be provided.					
ii	The doctors and other medical staffs give you prompt service					
iii	The doctors and other medical staffs are always willing to help you.					
iv	The doctors and other medical staffs are never too busy to respond to your request.					

<i>ASSURANCE</i>		Degree of Agreement				
STATEMENTS		1	2	3	4	5
i	The behavior of doctors and other medical staffs instills confidence in you					
ii	You feel safe while you are taking services from the hospital.					
iii	The doctors and other staffs are consistently courteous with you.					

Patients' Satisfaction with the Medical Services in Bangladesh....

iv	The doctors and other medical staffs have the knowledge to answer your questions.					
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<i>EMPATHY</i>		Degree of Agreement				
STATEMENTS		1	2	3	4	5
i	The hospital gives you individual attention.					
ii	The hospital has doctors, nurses and other support staffs who give you personal attention.					
iii	The hospital keeps your best interests at heart.					
iv	The service providers of hospital understand your specific needs.					
v	The hospital has operating hours that are convenient to you.					

<i>TANGIBLES</i>		Degree of Agreement				
STATEMENTS		1	2	3	4	5
i	The hospital has modern-looking equipment					
ii	The physical facilities of the hospital are visually appealing					
iii	The doctors and medical staffs appear neat					
iv	Equipment associated with the medical service is visually appealing at the hospital.					

Thank You Very Much