

# Knowledge and awareness of Quality Management (QM) of Private Hospitals among the employees of selected Private Hospitals' setup of Chattagram City, Bangladesh

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## Abstract:

**Introduction:** Quality management has become an important focus in healthcare organizations (hospitals) during the last couple of decades due to governmental regulations, influence of customers and hospital management initiatives. The healthcare market is now changing from a producer-oriented to a customer-oriented market due to the increasing influence of customers and public pressures. The purpose of this study is to provide a framework for implementing the total quality management (TQM) concept that is compatible with the local culture of Bangladesh.

**Methods:** The survey has been done with 120 participants through a semi-structured and modified interview in some selected hospitals of Chattagram City, Bangladesh. A Non-Probability purposive sampling method was followed.

**Result:** The findings indicate a significant positive relationship between the private hospital service quality and TQM. TQM factors such as the individual's socio-demographic factors, employees/customer satisfaction, employee involvement, employees knowledge & attitude, continual improvement, processes, and top management commitment predict the variation in the service quality of the private hospital services in Chattogram city, Bangladesh. The findings show that the continual improvements by these selected private hospitals are the key to successfully adopt, improve and implement an effective TQM system inside their organizations.

**Conclusion:** Employees of these private hospitals have very poor knowledge of TQM, lack of adequate ongoing training & education and the high direct relationship between the continual improvements and processes of quality services. It was the highest influence among two factors in TQM. The other notable point is processes that influence service quality negatively, so processes must be aligned with continual improvements in a way that facilitates the work functions in the targeted organizations. Besides, the complex processes that add more bureaucratic practices in the work will influence the Service quality negatively.

**Keywords:** Quality, Hospitals, Employees, TQM, Setup, Management, Organizations, Knowledge, Attitude, Practices

## Introduction

Quality management has become an important issue in healthcare hospitals during the last couple of decades. The increased attention to quality is due to governmental regulations, influence of customers and hospital management initiatives. So, the role of the government as the main provider of healthcare (HC) services has changed. There are many difficulties in managing healthcare organizations in a competitive marketplace with a little support from official bodies especially in a developing country like Bangladesh. The evolution of concepts such as TQM and Six Sigma has only added to the repertoire of the word. TQM 'Total Quality Management' is practiced widely at different organizations and Hospitals are no exception to this. The Academicians and HR practitioners have discussed TQM 'Total Quality Management' as a new concept that had its roots in the Japanese management style. Zandin (2001) mentions that TQM helps improve the quality of services and goods through a collaborative approach and standardized performance. Whyte and Witcher (1992) explain TQM as an approach with a holistic perspective on Total, Quality and Management. Total-because TQM takes input from every department and individual; Quality- because TQM helps attain standard on customer service and end-user satisfaction; Management- because TQM brings to fore innovative new forms and practices on Management. The purpose of this study is to provide a framework for implementing the total quality management (TQM) concept that is compatible with the local culture of Bangladesh.

The study verifies that the proposed framework model provides an unbiased, perspective and comprehensive view of hospital reality that can human and other resources, patients, activities to organizational units. This study also will explore the influence of TQM practices in the private healthcare sector in Bangladesh to improve the quality of care in this sector and to determine if there is any relationship between TQM and the quality of service provided by the hospitals or healthcare sector.[1]

For study purposes, various private hospitals are selected for examining the existing healthcare services and also collected some additional data from other regions in this regard. As a number of private hospitals have been surveyed, the collected data is very complicated and it is difficult to find out the exact defective portion of the existing healthcare system. From this study some problems related with the healthcare system are extracted and possible solution techniques are proposed in the TQM.[2] Healthcare and quality are inseparable items and therefore giving services in a sector like healthcare without quality is not expected at all. In Bangladesh, healthcare is provided principally through hospitals run by the government or through private hospitals & clinics with a small proportion delivered by NGOs.

But the main problem is that the total system of health care services both in public and private sectors are not up-to-date genuinely and again the quantity of the doctors, nurses and employees are less than expected. To overcome this huge problem, redesigning the existing health care system or setting up an influential service plan is a must issue for Bangladesh. Firstly, the concentration in this study will be to discuss the basic problems and analyze them effectively. After that, the follow up will be to find out the most prominent issues both in the manpower and management sector according to the voice of the patient and voice of the employee.[3].

They focused on the extent of TQM adoption by the individual hospitals as a dependent variable. As for the independent variables, they selected five multi level constructs: the scope of the network cooperation, the nature of the network relationship, organizational identity, adoption strategy and organizational citizenship behavior.[4] In healthcare services there are three definitions distinguished TQM from other approaches: "TQM is a comprehensive strategy of organizational and attitude change for enabling personnel to learn and use quality methods, in order to reduce costs and meet the requirements of patients

and other customers” (Ovretveit, 2000) “Maximization of patient’s satisfaction considering all profits and losses to be faced in a healthcare procedure” (Donabedian, 1989).

TQM is a management method: “TQM/CQI – Continuous Quality Improvement – is about two things: a management philosophy and a management method”. They propose four “distinguishing functions”, which are often defined as the essence of good management which includes: Empowering clinicians and managers to analyze and improve process; Adopting a norm that customer preferences are the primary determinants of quality and the term “customer” includes both the patients and providers in the process; Developing a multidisciplinary approach which goes beyond conventional departmental and professional lines; and Providing motivation for a rational data-based cooperative approach to process analysis and change. [5] TQM programs in healthcare can be measured, without the need for a deep knowledge of the health industry unique circumstances [6]

**Materials & Methods:**

**Study Design:** The study was descriptive and a cross-sectional study designed followed consisted of data collection by questionnaire and presentation of data with statistical analysis. It has included 120 participants or respondents from Selected Private Hospital of Chattogram City, Bangladesh. Data were collected through surveys and analyzed by using both SPSS & Microsoft Excel as well.

**Study Population & Area:** Respondents from selected private Hospitals of Chattogram City, Bangladesh covered as study areas and populations.

**Study Period:** This study was started from September, 2022 and continued till March, 2023.

**Sample Size:** We took 120 samples as per discussion with supervisor.

**Inclusion Criteria:** Respondents with given consent who were willingly joined or participated in the study. Both male and female people were selected as participants.

**Exclusion Criteria:** Respondents who felt unwilling to participate and who were unable to provide information due to physical and mental illness or handicapped.

**Data Collection Tools:** A semi structured and modified interview administrated questionnaire was administered to collect data properly.

**Sampling Technique:** A non-Probability purposive sampling method was followed.

**Data Collection Technique:** By following a face to face interview of the participants/respondents.

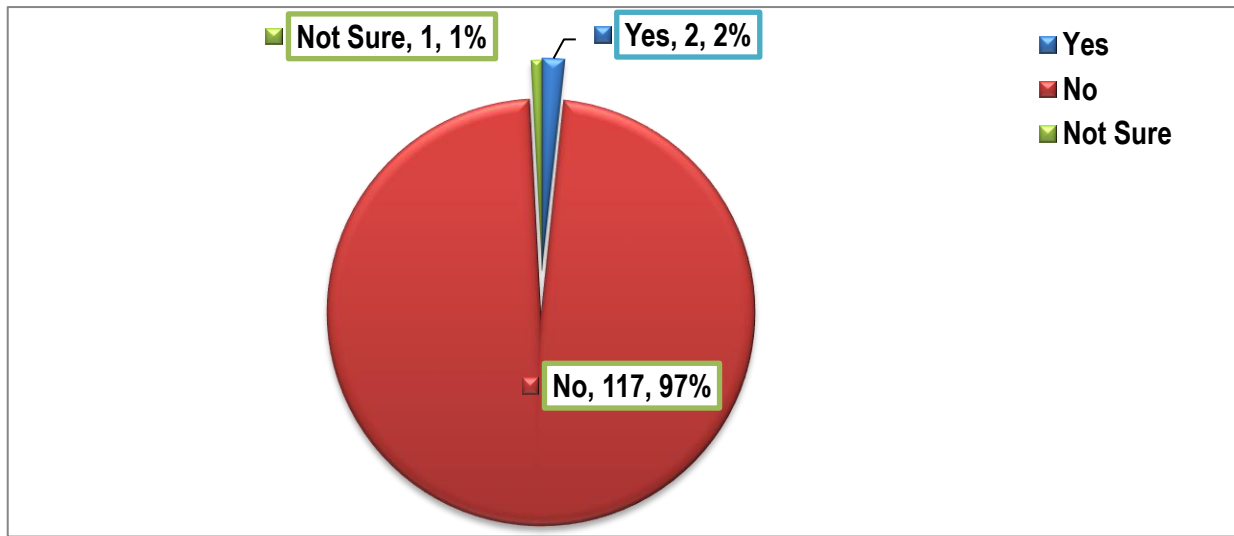
**Results:**

**Socio-demographic Variables:** Below table shows the frequency of socio-demographic variables of the respondents. Participants are mostly male (71%) and belong to the 26-30 age group (59%). Most of them are graduates (78.83%) and belong to executive designation (38.88%). Majority of them (61.67%) live in urban areas.

Questions	Options	Frequency	Percentage (%)
<b>Gender</b>	Male	71	59.17
	Female	49	40.83
<b>Age in years (By Age Groups)</b>	18 – 25 years	18	15
	26 – 30 years	59	49.17
	31 – 35 years	24	20
	36 – 40 years	17	14.17

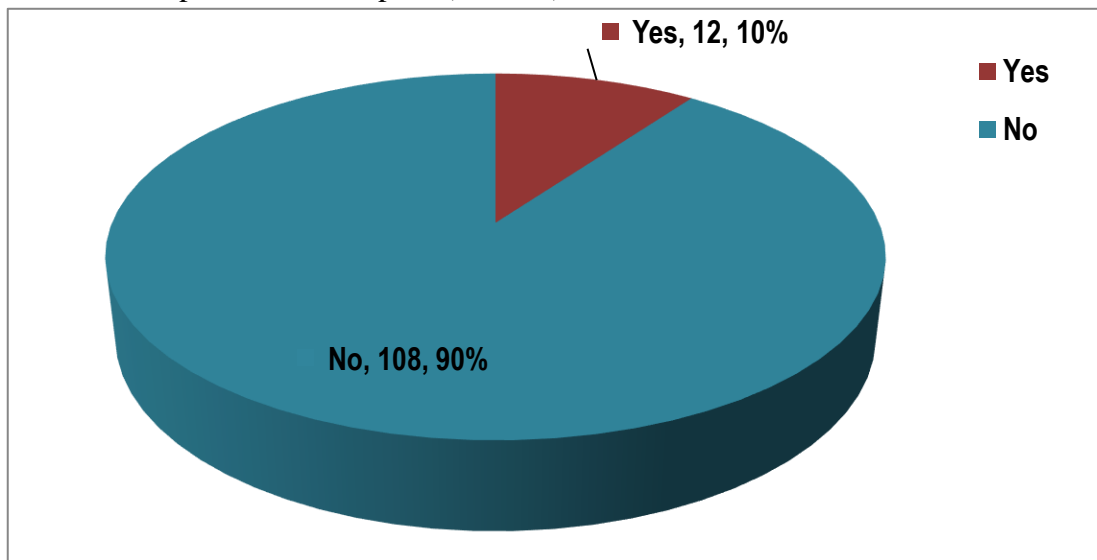
	41 – 45 years	2	1.67
	46 – 50 years	0	0
	50 + years	0	0
<b>Educational Status</b>	Up-to Primary	2	1.67
	Up-to SSC	4	3.33
	Up-to HSC	19	15.83
	Graduate	85	70.83
	Post degree	10	8.33
<b>Current designation</b>	Office Guard	0	0
	Pion	3	2.5
	MLSS	5	4.17
	Cleaner	5	4.17
	Office Assistant	10	8.33
	Lab Technician	20	16.67
	Junior Officer	0	0.00
	Officer	7	5.83
	Personal Secretary	0	0.00
	Executive	46	38.33
	Deputy Manager	12	10
	Manager	12	10
	Managing Director	0	0
<b>Types of Family</b>	Nuclear	35	29.17
	Joint	85	70.83
<b>Monthly family income in BDT – (In given range)</b>	Up-to 20k	2	1.67
	Between 21k – 30k	25	20.83
	Between 31k – 40k	35	29.17
	Between 41k – 50k	42	35.00
	50k and above	16	13.33
<b>Religion</b>	Muslim	88	73.33
	Hindu	28	23.33
	Christian	0	0.00
	Buddhist	4	3.33
<b>Living area</b>	Urban	74	61.67
	Semi-Urban	46	38.33
	Rural	0	0.00

**Familiar with TQM** – Distribution of study participants familiar with total quality management in hospital setup (n = 120)



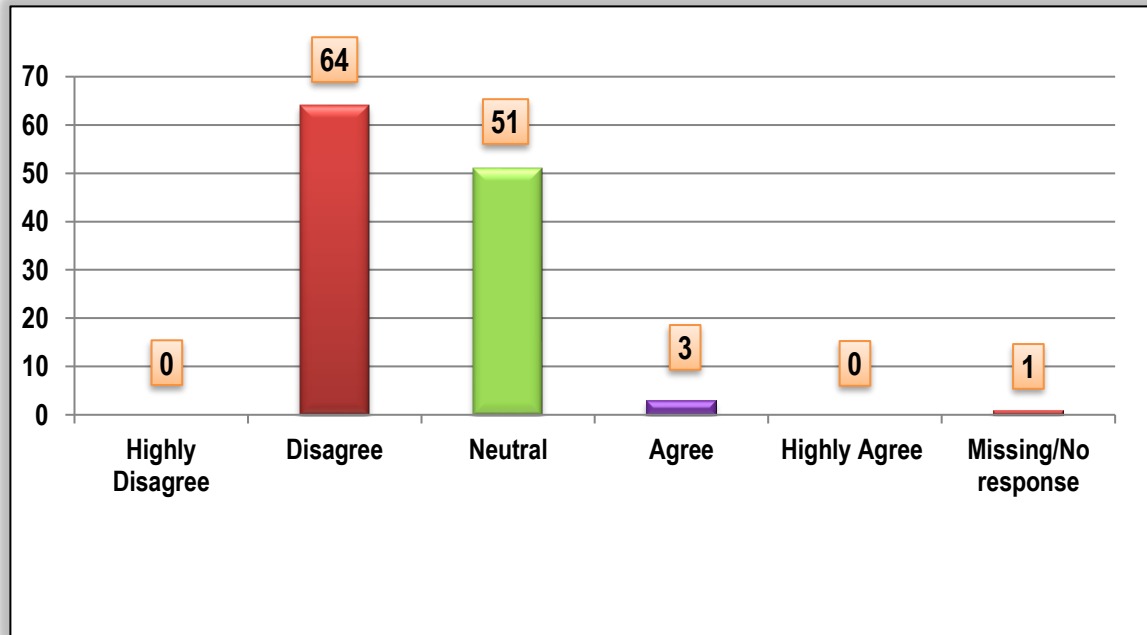
Among 120 participants frequency of “familiar with TQM (i.e. yes)” was 2 & the percentage was 1.67%, frequency of “Not familiar with TQM” (i.e. No) was 117 which was maximum and the percentage was 97.50% and the frequency of familiarity with “Not sure” was 1 and the percentage was 0.83%. From the above study distribution the familiar NOT working with TQM environment by the respondents in the selected private hospital was significantly high.

**Training for quality services** – Distribution of study participants received adequate training on quality services for healthcare practices in hospital (n = 120)



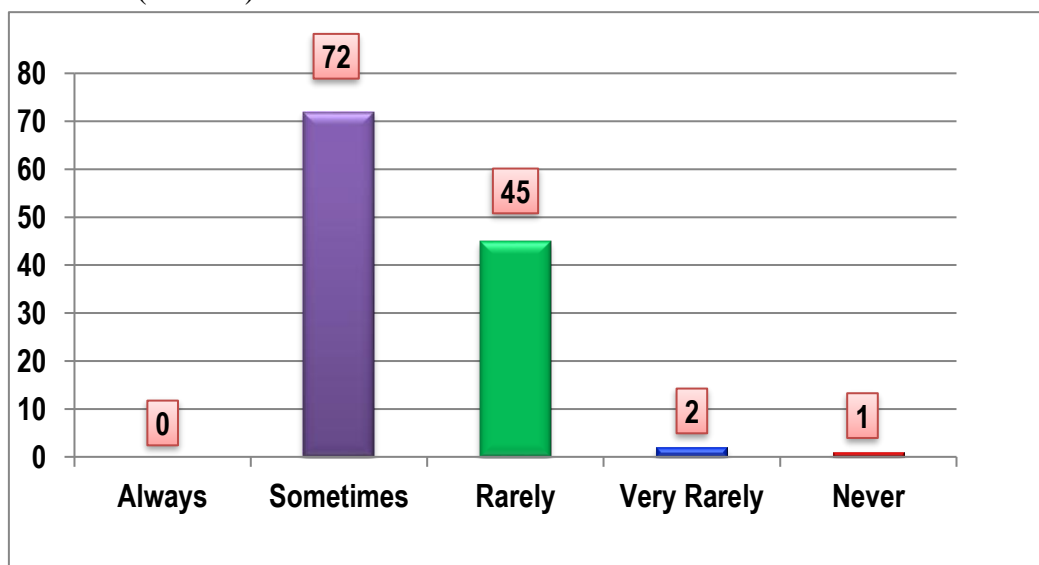
In this cross sectional study the distribution of study receiving adequate training for quality services for healthcare practices of the respondent’s hospital are shown. Among 120 participants frequency of “received adequate training (i.e. yes)” was 12& the percentage was 10%, and frequency of “Not received adequate training (i.e. No)” was 108 which was maximum and the percentage was 90%. From the above distribution of study the NOT received adequate training for quality service for healthcare practices in the selected private hospital was significantly high.

**Satisfied with quality management in organization** – Distribution of study participants satisfied with quality of hospital management in private hospital setup (n = 120)



Among 120 participants, the frequency of disagreement was 64, the percentage was 53.33% which was high, frequency of neutral was 51 and the percentage was 42.50%, frequency of agreement was 3 and the percentage was 2.50 and 1 responded did not answer, percentage was 0.83%. From the above distribution of study, satisfaction with quality of management in the organizations “i.e. disagree” by the respondents was high and was “neutral “in presenting any response also was significantly more.

**Customer satisfaction feedback** - Distribution of study participants maintaining patients/customer satisfaction feedback (n = 120)



This cross sectional study is showing the distribution of maintaining regular patient/customer satisfaction feedback among 120 participants in the hospital. The frequency of “satisfaction feedback taken sometimes” was 72 & the percentage was 60% which was high, frequency of “satisfaction feedback taken

rarely” was 45 and the percentage was 37.50 %, the frequency of “satisfaction feedback taken very rarely” was 2 and the percentage was 1.67% and the frequency of “satisfaction feedback taken never” was 1 & 0.83% Form the above distribution of study, maintaining regular patient/customer satisfaction feedback in the selected private hospitals “i.e. sometimes” by the respondents was significantly high.

**Time management protocol-** Distribution of study participants according to employees in & out time at office duty (n = 120)

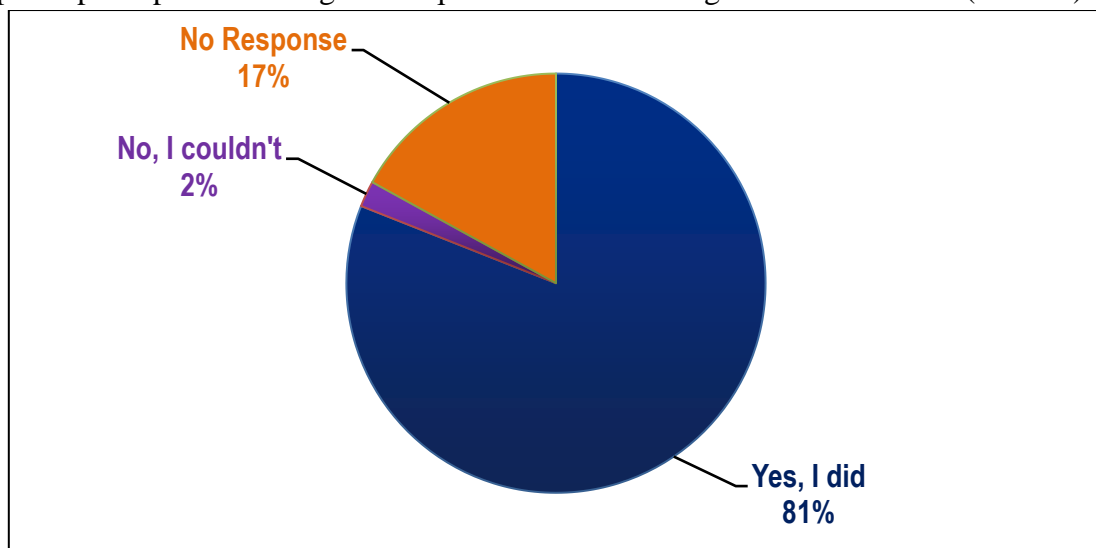
Questions	Options	Frequency	Percentage (%)
Does the time management protocol (Employees In & Out schedule) at office duty maintain properly?	Always	113	94.17
	Sometimes	7	5.83
	Rarely	0	0.00
	Very Rarely	0	0.00
	Never	0	0.00

This cross sectional study shows the distribution to maintain the time management protocol at office duty among 120 participants. From the Table, the frequency of “Always” was 113 and the percentage was 94.17% & was maximum, the frequency of “sometimes” was 7 & the percentage was 5.83%. From the above distribution of study, the proper time management protocol (employees In & Out schedule) in the selected private hospital category “always” by the respondents was maintained maximum.

**Quality management training by hospital:** Distribution of study participants according to staffs QM training by hospital (n = 120)

Questions	Options	Frequency	Percentage (%)
Have you attended previous regular quality management training by your hospital management?	Yes, I have	2	1.67
	No, I haven't	110	91.67
	I could not somehow	7	5.83
	I was not enlisted	1	0.83

**During COVID situation hospital handled & gave service effectively, strongly, carefully** - distribution of study participants performed regular hospital’s services during COVID situation (n = 120)





This cross sectional study of the distribution shows among 120 participants according to the hospital’s different service activities during COVID situation. The frequency of ‘Yes, I do’ was 97 and the percentage was 80.83%, the frequency of “No, I don’t” was 2 and 1.67% and the frequency of “Not sure” was 21 and the percentage was 17.50%.

**Organization very careful and conscious about update & latest hospital equipment-** distribution of the study of the participants according to the careful conscious about update hospital equipment (n = 120)

Questions	Options	Frequency	Percentage (%)
Do you think the organization is very much careful and conscious about updated and latest hospital equipment, instruments and setup?	a. Always	7	5.83
	b. Sometimes	83	69.17
	c. Rarely	30	25.00
	d. Very Rarely	0	0.00
	e. Never	0	0.00

In this cross sectional study of the distribution shows among 120 participants according to the careful & conscious about updating the latest hospital equipment. From the table 4.43 the frequency of "Always" was 7 and the percentage was 5.83%, the frequency of “Sometimes” was 83 and percentage was 69.17% which was very high, the frequency of “Rarely” was 30 and percentage was 25%.

**Discussion:**

The present study was designed to identify the Knowledge, Attitude & Practices of Total Quality Management (TQM) among the employees of a selected private hospital setup in Chattogram City, Bangladesh. This study aims to clearly address the role of TQM factors on the quality service of private hospitals. The findings indicate a significant positive relationship between the private hospital service quality and TQM. TQM factors such as the individual’s socio-demographic factors, employees/customer satisfaction, employee involvement, employees knowledge & attitude, continual improvement, processes, and top management commitment predict the variation in the service quality of the private hospital services in Chattogram city, Bangladesh. The findings show that the continual improvements by these selected private hospitals are the key to successfully adopt, improve and implement an effective TQM system inside their organizations.

From this cross sectional study among total respondents according to familiarity with Total Quality Management (TQM) in the hospital, 117 participants answered “NO” means were not familiar with TQM & the percentage was 97.50%, this was very significantly high. According to this cross sectional study among total respondents, 108 & 90% participants were not receiving adequate training for quality services, that means, NOT receiving adequate training for quality services for healthcare practices in the selected private hospital was significantly high /negativity.

From the above distribution of study, according to satisfaction with quality of management in the organizations, 64 with 53.33 % of participants “disagree” by the respondents which was high and 51 & 42.50% of participants was “neutral” in presenting any response also was significantly more.

The respondents were asked about taking the patient/customer satisfaction feedback regularly, in the reply - satisfaction feedback taken “Sometimes” was 72 & the percentage was 60% which was high, satisfaction feedback taken “Rarely” was 45 and the percentage was 37.50 %,satisfaction feedback taken “Very Rarely” was 2 and the percentage was 1.67% and the satisfaction feedback taken “Never” was 1 & 0.83%.



From the distribution of study, taken regular patient/customer satisfaction feedback in the selected private hospitals "i.e. sometimes" by the respondents was significantly high.

According to this cross sectional study the respondents were asked about maintaining the employees office In-Out time management protocol and found 113 participants were replied "Always" with 94.17% which was significantly high and participants 7 & 5.83% were replied "Sometimes".

When the respondents were asked if all the staff are trained / educated about problem solving then in reply 64 & 53.33% participants were "Neutral" to answer, 55 participants with 45.83% answered the "Agree" and 1 of them were replied "Disagree".

### **Conclusion:**

Total Quality Management (TQM) has gained increasing popularity as a method to introduce transformational change in an organization's managerial philosophy and operational effectiveness. Provision of quality service in healthcare is one of the most complex and difficult undertakings for organizations and governments. TQM among healthcare providers is a way of managing to improve the effectiveness, flexibility and competitiveness of the health care facilities and services provided. It is also a method of removing waste, by involving everyone in improving the way things are done. Concerns about the quality of health-care services in Bangladesh have caused people to lose trust in government hospitals. As a result, evaluating the country's private medical facilities has become critical, with the patient's voice playing an increasingly important role. Private hospitals are becoming more common. As a result, we must pay greater attention to improve the service quality of private medical facilities.

Top management commitment is the main factor among all six factors of TQM as well as called the critical success factors of TQM are "Management Commitment and Leadership; Continuous Improvement; Total Customer Satisfaction; Employee Involvement; Ongoing Training; Communication and Teamwork", which is highly responsible in influencing the service quality of private hospital services from the employee's point of view; decision-makers are responsible to follow up and keep the continual improvements of these private hospitals. The notable issue was employees of these private hospitals have very poor knowledge of TQM, lack of adequate ongoing training & education and the high direct relationship between the continual improvements and processes of quality services. It was the highest influence among two factors in TQM. The other notable point is processes that influence service quality negatively, so processes must be aligned with continual improvements in a way that facilitates the work functions in the targeted organizations. Besides, the complex processes that add more bureaucratic practices in the work will influence the Service quality negatively.

### **Recommendation & Future Perspective:**

It may be advised that the top management of these private hospitals pay most of the efforts, resources, and competencies to keep improving their quality of services that are aligned with the patients' needs and expectations, and to avoid the monotonic processes that affect the quality of their services negatively. Top management needs to be committed with their improvements and to keep an eye on achieving these decisions and how it will be reflected on the ground, and its role in improving the overall private hospital service quality in Bangladesh. . To improve and ensure implementing the TQM as well as quality care service in a private hospital, senior management has to take positive initiative to repeatedly arrange continuous training and educational programs over the years with all departments & all levels of employees.

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