

Satisfaction level of patients regarding attitude of Dentists in private dental clinics

Bhuiyan ASMS¹, Shaheen ZA², Pathan NK³, Anwar HB⁴, Bhuiyan MAA⁵, Ahmed I⁶

Abstract:

To develop a strong patient relationships with high levels of satisfaction is challenging, but it is the ultimate goal. This study was conducted at five different private dental clinics in Dhaka city during the period between Jan- June 2009. A total number of 96 patients were interviewed to assess the satisfaction. During treatment generally 63.6% male were to be satisfied regarding the behavior of dentist. In case of female respondents only 39.02% thought that the attitude of dentist during treatment were satisfactory but majority (60.98%) voted for not satisfactory. Among the respondents majority with higher level of education were found to be satisfied more with the attitude of dentists during treatment ($P < .05$). 69% respondents were happy with consultancy time given by dentist and 68.8% of the patients expressing satisfaction with privacy.

(Bangladesh Dental Journal 2016; 32: 19-23)

Introduction:

As the health care industry shifts towards a consumer-oriented approach in the delivery of care patient satisfaction surveys have become an increasingly important tool in measuring the quality of dental services.^{1,2} Measurement of patient satisfaction stands poised to play an increasingly important role in the growing push toward accountability among health care providers. Overshadowed by measures of clinical processes and outcomes in the quality of care equation, patient satisfaction measurement has traditionally been relegated to service improvement efforts by hospitals and larger physician practices, and to fulfilling accreditation requirements of health plans, while some plans tie satisfaction scores to financial incentives as a portion of their calculation of payment bonus to primary care physicians with capitation contracts.³

Some authors describe four specific reasons for investigating patient satisfaction. First, satisfaction is an

objective of care; second, satisfaction is also a consequence of that care, and therefore an outcome; third, satisfaction can contribute to the effects of care, as a satisfied patient is more likely to comply with advice; finally, satisfaction is also the patient's judgment on the care that has been provided⁴.

As with every organization that is concerned with satisfying the users of its products or services, dental service providers are becoming more involved with patient satisfaction. This is due to increased evidence that the association between satisfaction, patient compliance and success of the treatment determines the quality of health care⁵. In recent reports, patient satisfaction is defined as a health care recipient's cognitively-based evaluation of, and affectively-based response to the important aspects of the structure, process and the result of their service experience. Newsome & Wright and Goedhart et al. have shown that health care is accepted as a complex mixture of the emotional, the physical, and the immaterial, and its consumers are directly involved in quality assessment.⁶ Thus, a marketing-oriented model is not appropriate for most medical services, and their consumption should be evaluated differently from that of a consumer product⁷.

Patient satisfaction is an important component of dental care. It influences patients' compliance, their use of dental services, and their anxiety, and it is also associated with health outcomes and health status.⁸ Perceived health, the nature of the provider-patient interaction, and structure of the dental care delivery system are also significant factors, which determine the level of dental service satisfaction⁸⁻¹².

1. Dr. A S M Saiyem Bhuiyan, BDS, MPH (NIPSOM), Assistant Professor. Dhaka National Medical College & Hospital.
2. Dr. Zakir Ahmed Shaheen. BDS, MS (Prosthodontics), Associate Professor & Head, Dental Unit, Dhaka National Medical College & Hospital.
3. Dr. Noushad Kaisar Pathan, BDS, MS (OMS), Lecturer, Dental Unit, Shaheed Suhrawardy Medical College, Dhaka.
4. Dr. Humayra Binte Anwar, BDS, PhD, Private Practitioner.
5. Dr. MD. Al-Amin Bhuiyan, BDS, PhD, Centre for Injury Prevention and Research, Bangladesh, CIPRB.
6. Dr. Ikramul Ahmed, BDS, MPH, Assistant Professor, Children, Preventive & Community Dentistry, Dhaka Dental College.

Address of Correspondence: Dr. A S M Saiyem Bhuiyan, BDS, MPH (NIPSOM), Assistant Professor. Dhaka National Medical College & Hospital.

Methods and Materials:**Study design:**

A cross sectional study was carried out to evaluate the level of satisfaction of the patients regarding attitude of dentist of the private dental clinics.

Place of study:

The study was carried out at five different private dental clinics in Dhaka city.

Sample Size:

The sample size was determined by the formula

$$N = Z^2 pq / d^2$$

Here,

N= Desired sample size, Z= Standard normal deviate,

Usually 1.96 that corresponds to 95% confidence limit

p= 50% (As level of satisfaction in private dental care setting in unknown)

$$q = 1 - 0.50$$

d= Degree of accuracy desired usually set at 0.05%

So, required sample size will be

$N = (1.96)^2 \times (0.50) \times (0.30) / (0.05)^2 = 384$ (Inflated the sample to 400 considering non-response and data discrepancy.) Considering the time and logistic limitation a multiple (.25) of the sample were targeted

$$\text{Final anticipated sample } 400 \times .25 = 100$$

Due to incompleteness of data 96 was preceded for final analysis and hence the total sample size considered in 96.

Sampling technique:

Patients were approached on their immediate exit from the dentist's clinic. Those who consented to participate were interviewed. Twenty each patient were targeted from each clinic, finally a total of 96 patients from the 5 clinics were recruited for the study and interviewed.

Ethical consideration:

Informed written consent was taken from the participant after explaining all the facts potential dangers (nothing significant) to the subjects. As there is no invasive procedure involved in the study, no further potential of ethical issue to be raised. The participants were assured that the information acquired will be used for academic purpose. They were assured of confidentiality, and for the purpose of data analysis no individual data were reported rather de identified data was preceded for analysis.

Data Presentation:

Data were presented in the form of table and graphs. Descriptive statistics were presented with frequency table. Association was presented in the form of cross table and

test statistics were added in the foot note of the table. Bar and pie charts were generated to illustrate descriptive statistics

Results:

In this cross-sectional study data were collected from five different private dental clinics at Dhaka city. A total number of 96 patients were interviewed for patient's satisfaction and socio-demographic information like age, sex, education, occupation, etc. The findings of the study were as follows:

Table-I

Distribution of the respondents by Age

Age in group	Frequency	Percent
<20 years	12	12.5
21 to 30 years	18	18.8
31 to 40 years	33	34.4
41 to 50 years	23	24.0
>50 years	10	10.4
Total	96	100.0

Mean-36.54, SD±10.5, Minimum-18, Maximum-60

Table-I shows that among the 96 respondents majority (34.4%) were at the age group (31-40) and followed by 24%, 18.8% 10.4% were (31-40), (41-50) and >50 years age. Mean age of the respondents were 36.54±10.5.

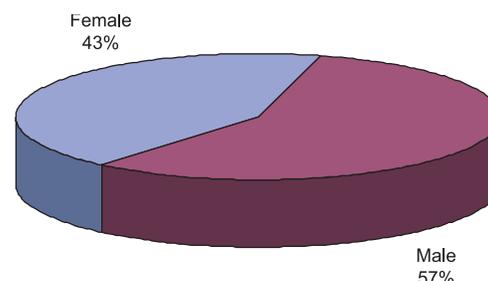
**Fig.-1: Distribution of the respondents by Sex**

Figure 1 shows that majority 57% of respondents were male and rest 43% were female.

Table-II

Distribution of the respondents by Level of education

Level of education	Frequency	Percent
Secondary	3	3.1
SSC	10	10.4
HSC	32	33.3
Graduation and Above	51	53.1
Total	96	100.0

Among the 96 respondents majority 53.1% have education at the level of graduation or above, 33.3% (32) have educational level HSC, 10 respondents passed SSC and only 3.1% have education at the level of Secondary.

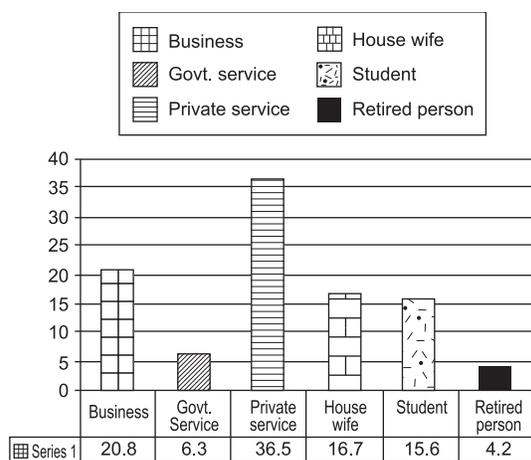


Fig.-2: Distribution of the respondents by Occupation

According to figure 2 it is observed that majority of the respondents were private service holder (36.5%), the next

one is business man (20.8%), followed by house wife (16.7%), student (15.6%), Govt. service holder (6.3%) and retired person (4.2%).

Table-III

Distribution of the respondents by maintaining Privacy of the patient

Maintain Privacy of the patient	Frequency	Percent
Maintain Privacy	66	68.8
Don't maintain privacy	30	31.3
Total	96	100.0

Table-III shows that 68.8% respondents found that doctor maintain privacy of the patient and rest 31.3% have complain about not maintaining privacy.

Table-IV shows overall satisfaction on patient-dentist interaction. 93.75% patients found that their dentist were friendly followed by 75%, 86.46% in dentist explained the procedures before treatment and dentist gave them advice after treatment.

Table-V reveal that level of education and attitude of the doctor is significant. Among the respondents majority with

Table-IV

Distribution of the respondents by Patient- dentist interaction

Patients ' satisfaction on PDI Item	Patient -dentist interaction			Total
	Disagree	Neutral	Agree	
Dentist was friendly	2 2.08%	4 4.17%	90 93.75%	96 100.0%
Dentist explained the procedures before start of treatment	6 6.25%	18 18.75%	72 75%	96 100.0%
Dentist gave the advice after treatment	13 13.54%	-	83 86.46%	96 100.0%

Table-V

Distribution of the respondents by Level of education and attitude during treatment of doctor

Level of education	Attitude during treatment			Total
	Very good	Satisfactory	Average	
Secondary	1 33.3%	1 33.3%	1 33.3%	3 100.0%
SSC	1 10.0%	8 80.0%	1 10.0%	10 100.0%
HSC	14 43.8%	15 46.9%	3 9.4%	32 100.0%
Graduation and Above	20 39.2%	14 27.5%	17 33.3%	51 100.0%
Total	36 37.5%	38 41.7%	22 20.8%	96 100.0%

Chi-Square-19.69, df-6, P=0.003

higher level of education were found to be satisfied more with the attitude of dentists during treatment ($P < .05$). Educated people were found to be less dissatisfied with the doctors.

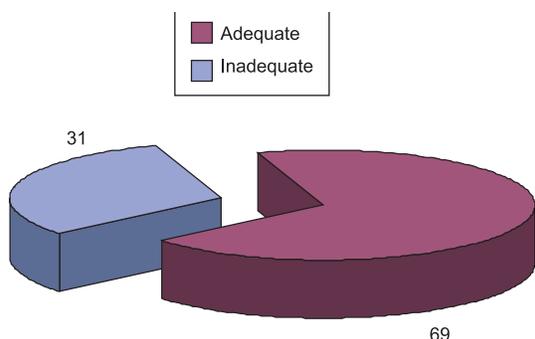


Fig.-3. Distribution of the respondents by Time given by doctor during consultancy

In figure 3 sixty nine percent respondents were happy with consultancy time of the doctor where 31% thought the time given by doctor during consultancy was inadequate.

Table-VI

Distribution of the respondents by sex and doctor's attitude during treatment

Sex of the respondents	Attitude during treatment		Total
	Satisfactory	Not Satisfactory	
Male	35 63.6%	20 36.4%	55 100.0%
Female	16 39.02%	25 60.98%	41 100.0%
Total	51 53.12%	45 46.88%	96 100.0%

Table-VI shows regarding attitude of the dentist during treatment 63.6% male found satisfied & rest (36.4%) were not satisfied. Among the female respondents only 39.02% thought that the Attitude of dentist during treatment were satisfactory and majority (60.98%) voted for not satisfactory. The association between sex of the respondents and Attitude during treatment is statistically significant ($P < 0.05$). Male were found to be more satisfied with Attitude of doctor during treatment than their female counter part.

Discussion:

This cross sectional study was performed to analyze the satisfaction level regarding attitude of dentist among the selected patient at private dental clinic in Dhaka city. In this current study among the 96 respondents majority 34.4% were at the age group between 31 to 40 years, 24% at the age group of 41 to 50 years, 18.8% (18) were at the

age group between 21 to 30 years. Only 10.4% aged more than 50 years. Mean age of the respondents were 36.54 ± 10.5 year, ranging from 18 to a Maximum of 60 year. Majority 57% of respondents were male and rest 43% was female. Regarding attitude of the dentist during treatment 63.6% male found satisfied. Among the female respondents only 39.02% thought that the Attitude of dentist during treatment were satisfactory and majority (60.98%) voted for not satisfactory. Among the respondents majority with higher level of education were found to be satisfied more with the attitude of dentists during treatment ($P < .05$). 69% respondents were happy with consultancy time given by dentist. With privacy 68.8% of the patients expressing satisfaction.

Mahrous¹³ analyzed the opinion of patients at the dental clinics of the college of Dentistry at Taibah University, Saudi Arabia. The result showed that overall satisfaction on patient-dentist interaction. Dentist explained the procedure before the treatment, which is very important aspect in the patient-dentist satisfaction domain represented with 78% of satisfaction among the patient. 98% respondent were agreed with that their dentist was friendly and 85.2% said that their dentist gave them advices after treatment. Regarding privacy of the treatment 90.7% were satisfied with the privacy. The present study revealed that 68.8% of the patients expressing satisfaction with privacy. Regarding patient dentist interaction 94% found their dentist was friendly, 75% respondent commend that their dentist explained the procedures before start of treatment & 86.5% respondent were happy with their dentist gave them advice after treatment.

Hayder Sur et al¹⁴ described the factors that may influences patient satisfaction in dental out patient clinic at State Hospital in Turkey. Studies have shown that privacy was the most satisfactory attribute of dental services in the study group, with 82.1% of the patients expressing satisfaction. This was followed by ‘‘dentist’s attitude’’(79.7%). ‘‘Explanation the procedures & diagnosis before starts of treatment’’ was the another important satisfactory issue, 72.1% of the patients expressing satisfaction with it. The findings of the present study agrees with the results reported in the literature, as 68.8% were satisfied with the privacy, 75% agreed with that their dentist explained the procedures before start of treatment & Regarding attitude of the dentist during treatment 63.6% male found satisfied, & rest (36.4%) were not satisfied. Among the female respondents only 39.02% thought that the Attitude of dentist during treatment were satisfactory and majority (60.98%) voted for not satisfactory.

Consumer opinion is an essential component and an important quality indicator in measuring the outcome of any medical service and thus assists health care providers in designing health management plans.^{15,16} Regarded as an outcome of care and is one of the major factors that contribute towards better patient compliance and consequently to better clinical outcomes.¹⁷ Patient satisfaction with dental care is a multidimensional concept reflecting patients' expectations, values and experiences.¹⁸

Conclusion:

The results of this study indicated that majority of the patients were satisfied with the overall attitude of dentist, maintenance of patients privacy, patient-dentist interaction at different private dental clinics except for attitude of the doctors during treatment. Only 39.02% female found very good and majority (60.98) voted for not satisfactory. Among the male respondents 63.6% thought that the attitude of doctor during treatment were very good and rest (36.4%) were not satisfied. The association between sex of the respondents and attitude during treatment is statistically significant ($P < 0.05$). Male were found to be more satisfied with Attitude of doctor during treatment than their female counter part.

Reference:

1. Stoeckle JD. From service to commodity: corporization, competition, commodification, and customer culture transforms health care. *Croat Med J.* 2000;41:141-3.),
2. Sitzia J, Wood N. Patient satisfaction: a review of issues and concepts. *Soc Sci Med.* 1997;45:1829-43
3. Guadagnino C, Press Ganey Associates' Robert Wolosin. <http://www.physiciansnews.com/cover/1203.html> Published December 2003
4. Gopalakrishna P, Munnalene V. Influencing satisfaction for dental services. *J Health Care Mark.* 1993;13: 16-22.
5. M Ashraf Hussain http://banglapedia.search.com.bd/HT/O_0026.htm.
6. Gu' rdal P, C, ankaya H, O' nem E, D' ync, er S, Y' lmaz T: Factors of patient satisfaction/ dissatisfaction in a dental faculty utpatient clinic in Turkey. *Community Dent Oral Epidemiol* 2000; 28: 461-9. C Munksgaard, 2000.
7. Newsome PRH, Wright GH. A review of patient satisfaction: 1. Concepts of satisfaction. *British Dental Journal* 1999; 186:161-5.
8. Reifel NM, Rana H, Marcus M. Consumer satisfaction. *Adv Dent Res.* 1997;11:281-90.
9. Ntabaye MK, Scheutz F, Poulsen S. Patient satisfaction with emergency oral health care in rural Tanzania. *Community Dent Oral Epidemiol* 1998;26:289-95.
10. Chu C.H.; Yeung C.Y.Y.J.; Lo E.C.M. Source: *Community Dentistry and Oral Epidemiology*, Volume 29, Number 5, 1 October 2001 , pp. 390-398(9).
11. SINGH S, PUSHPAANGAELI B. Dental patient satisfaction within working class people: Suva city, Fiji, and, Fiji School of Medicine, Suva, Fiji. *Journal of the American Dental Association*, Vol 121, Issue 5, 624-630.
12. Handelman SL, Fan-Hsu J, and Proskin HM , Patient satisfaction in four types of dental practice, Department of General Dentistry, Eastern Dental Center, Rochester, NY 14620.
13. Mahrous MS, Hifnawy T, Patient satisfaction from dental services provider by the College of Dentistry, Taibah University, Saudi Arabia. *Journal of Taibah University Medical Sciences*, December 2012;7(2):104-109.
14. Haydar S, Osman H, Celal Y, Gonca M. Patient Satisfaction in Dental Outpatient Clinics in Turkey, *Croatian Medical journal* 2004; 45(5):651-654.
15. Rowlands HS, Rowland BL: *Hospital and Health Systems Quality Management*, ed 1. Gaithersburg, Aspen, 1996, vol 2.
16. Ball R: Practical marketing for dentistry. 3. Relationship marketing and patient/customer satisfaction. *Br Dent J* 1996;180:467-472.
17. Donabedian A: The Lichfield Lecture. Quality assurance in health care: Consumers' role. *Qual Health Care* 1992;1: 247-251.
18. Sitzia J, Wood N: Patient satisfaction: A review of issues and concepts. *Soc Sci Med* 1997;45: 1829-1843.