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Satisfaction of patients and students at the Integrated Clinics of a Dental School

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Abstract

Aim: The objective of this questionnaire-based research was to evaluate the level of satisfaction of students and patients at the School of Dentistry of the University of Passo Fundo (FOUPF). Methods: The questionnaire was administered after the patient's care, as follows: first, the student explained the study purposes and methodology to the patient, the option of not participating and the full confidentiality of the information obtained. Patients were selected among those undergoing treatment at the Integrated Clinic I and II Disciplines (5th year of undergraduate dental course) between March and November 2010. Results: Satisfactory results were obtained, as most interviewed patients (49; 98%) considered the care given by FOUPF students as positive. Another important factor mentioned by patients was the use of individual protection equipment and biosafety measures adopted by the students; 98% (n = 49) of the patients affirmed that the students were properly wearing individual protection equipment. With regard to aspects that could be improved, 36.7% (n = 18) of interviewed patients mentioned the need to schedule appointments more than once a week, 12.2% (n = 6) felt the need to reduce waiting times for consultations, and 10.2% (n = 5) wanted to reduce appointment duration. As much as 98% of students (n = 49) declared being attentive to dentistry situations, 56% (n = 28) were satisfied with their technical aptitudes, and 96% (n = 48) mentioned enjoying helping patients. Conclusions: The care given to patients by FOUPF students is done well, not requiring significant changes.

Keywords: oral health, dental health services, dental clinics.

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Introduction

Dental schools play an important role in improving access to dental healthcare. Studies on patient satisfaction at healthcare teaching facilities can contribute to the creation of planning measures to improve the quality of service. It is also important to evaluate the social-economic-cultural level of students and patients, as well as the reason for choosing the school for learning/undergoing dental treatment. From these data, it is possible analyze the negative and positive points of assistance for students and patients, aiming to overcome possible deficiencies and improve existing qualities.

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Research studies on the quality of dental services at integrated clinics and patient satisfaction with them start from the premise that there are certain needs established for users. Patient satisfaction represents valuable feedback that contributes to considerations on the continuous improvement of teamwork. Therefore, constant investigations are necessary to identify the factors that promote the satisfaction of patients assisted by healthcare services.

Mendes¹ (2003) described that the concept of user satisfaction is part of a sociocultural and political context in a given society. The author also affirms that the quality of healthcare services depends on the subjects who practice the action, and particularly those who undergo the action the citizenry.

Garcia and Almeida² (2005), in a study involving the quality of dental healthcare services offered at a public dental care center (CEO Rodolfo Teófilo), concluded that the technical-scientific-assistance characteristics of health professions, in particular oral health, should be balanced within teaching practice. As such, the curriculum should promote integration between basic scientific concepts and clinical practice – with the latter valuing the human relationship between the dental surgeon and patient, within a realistic perspective.

According to Nobre et al.³ (2005), assessing client satisfaction in different teaching institutions is the best indicator to evaluate which standard of dental service is being offered to users. In a study conducted at the University of Fortaleza/CE (UNIFOR), these authors concluded that a large part of users are satisfied with the quality of the dentistry service provided by UNIFOR. Nevertheless, some flaws were found in the student-patient relationship with regard to communication and user autonomy, requiring reinforcement to some students on the importance of sharing the treatment plan and procedure to be performed.

In view of the theoretical reference exposed herein, the aim of the present work was to evaluate the quality of the dental services and education provided at the UPF School of Dentistry (FOUPF), by applying questionnaires directed at patients and students at the institution.

Material and methods

The present work was approved by the Ethics Committee of the University of Passo Fundo, RS, Brazil (Process #162/2009). It was regarded as a research field, performed by applying open-ended questionnaires to patients and students of the Integrated Clinical Practice I and II at FOUPF disciplines attending the 9th and 10th semesters of the undergraduate dental course. In such clinics are offered dental procedures in periodontics, surgery, endodontics, dentistry, occlusion and preventive orthodontics (approximately 350 weekly visits). The present study was divided into two different stages: A) Application of the questionnaire to patients: performed at the FOUPF waiting room by a researcher (was not self-administered) who gave users an informed consent form and the questionnaire containing the

open-ended questions (Panel 1). The questionnaire was administered after the patient's care, as follows: first, the student explained the objective and method of the research to the patient, the option of not filling it out, as well as the full confidentiality of the information obtained. It was also made clear that the answers would not influence the dental service provided at the clinics, and that the patient had the right, if so desired, to withdraw from the research at any time (free and informed consent form). The sample was randomly chosen, constituted approximately for 15% of the total number of patients treated during the study period (340 patients). Patients were selected among those undergoing treatment in the Integrated Clinic I and II Disciplines (5th year of the undergraduate dental course), between March and November 2010. To take part in the research, users had to have been assisted at least once at the FOUPF Integrated Clinic and should be willing to answer the questionnaire. It is noteworthy that most (70%, n = 35) of users surveyed had been treated 3 to 4 times at FOUPF. The questionnaires given to patients and students were previously applied by means of a pilot study and was developed based on work done by other authors³⁻⁵. (Panel 1)

B) Application of the questionnaire to students: performed at the FOUPF Integrated Clinics by a student participating in the research (was not self-administered), who gave students an informed consent form and the sheet containing the open-ended questions (Panel 2). FOUPF has approximately 500 students, of which 100 (20%) are enrolled at the Disciplines of Integrated Clinic I and II. The questionnaire was administered to 50 enrolled students in such disciplines (50%), corresponding to the 9th and 10th levels, chosen by lot (100 names of students placed on strips of paper stored in an urn, of which 50 names were removed). The questionnaire was administered after the clinical care, as follows: first, the student explained to the participant the objective and method of the research, the option of not filling it out, as well as the full confidentiality of the information obtained. It was also made clear that the answers would not influence the student's clinical performance/grade, and that the student had the right, if so desired, to withdraw from the research at any moment. Next, a significant sample was selected, by random draw, of students enrolled in the Integrated Clinic I and II Disciplines at FOUPF between March and November 2010, who were willing to fill out the questionnaire. (Panel2)

The response rate of questionnaires to students (n=50) and patients (n=50) was 100%, since all subjects responded. The variables to be analyzed are specified in the questionnaires above; the main focal point of the work is the satisfaction level of patients with regard to the services rendered by the institution. Data were arranged in an Excel spreadsheet and analyzed using frequency descriptive statistics.

Results

Fifty patients were interviewed, mostly female (54%, n = 27), at the fourth decade of life (34.6%, n = 17), and

Panel 1 - Questionnaire answered by patients

Age: M () F ()	11. Description of the service given by the st	udent Yes No Somewhat
City of residence:	Were you well treated?	() () ()
Clinic where treated: () Integrated I () Integrated II	Did the student portray confidence and se	curity
	during the procedures?	() () ()
1. Profession:	Was the student properly attired?	() () ()
	Did the student go over the treatment plan	with you? () () ()
2. Are you currently employed?	Did the student explain to you the procedu	ures
() yes	being performed?	() () ()
() no, I am unemployed	Were the explanations clear? Did you und	lerstand them? () () ()
() yes, and I am also retired	·	, , , , , ,
() no, I am retired	12. In general, how do you rate the service	ce given by the student?
		average () terrible
3. What is your monthly family income? (minimum wage R\$ 545.00)	(, , , , , , , , , , , , , , , , , , ,	() territor
() none	13. How do you rate the service given by	the dental school at the clinic?
() 1 to 2 times the minimum wage		verage () terrible
() 2 to 3 times the minimum wage	() GAGGIIGHT () gGGG () G	() terrible
() 3 to 5 times the minimum wage	14. What suggestions would you have to ir	morova sarvice at the clinic where you are
() 5 to 10 times the minimum wage	being treated?	inprove service at the chilic where you are
. ,		
() over 10 times the minimum wage	() nothing, it is fine as is	
4. What is your consulate advantional lavelO	() reduce wait time in the waiting room	
4. What is your complete educational level?	() more frequent appointments during the	
() none (cannot read or write)	() reduce wait time on the dentist's char	
() some middle school	() the student should be more experien	cea
() middle school		
() some high school	15. How did you perceive the environmen	• ,
() high school degree	excelle	
() some college	Organization ()	() ()
() college degree	Comfort ()	() ()
() graduate school	Cleanliness ()	() ()
	Lighting ()	() ()
5. Does your family own its home?	Student punctuality ()	() ()
() yes () no		
	16. How do you rate the clinic's screening	g service?
6. Why did you seek treatment at the FOUPF clinic?	() excellent () good () re	egular () terrible
() recommended colleagues, relatives or friends		
() already knew the student and was promised treatment by him/her	17. What was your impression of the clini	ic where you received treatment?
() was treated previously and did not conclude treatment	() clean () organized	() quiet
() could not currently afford private treatment	() dirty () disorganized	() noisy
() referred by a public or private dentist for specialized treatment		
() to get prosthetics	18. Were you well serviced by the person	n who made your appointment?
() because students have more patience with patients	() yes () no () avera	age
() because the quality of service is good		
() other reasons:	19. How do you rate the service fee?	
	() high () satisfactory	() low
7. Did you feel any pain during the treatment? () yes () no	, , , , , ,	
	20. Have you or would you recommend	the university's service to anyone?
8. At what time and why?	() yes () no	and ampoints
	(),,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
9. Was this solved by the student? How?	21. Give a score from 0 to 10 to the dental	service given by the university:
10. What were you most afraid of during your dental treatment?	22. Suggestions to improve service at FC)UPF
() was not afraid () the instruments used by the students		
() anesthesia () the drill () everything		
() the student's heavy hand () other		

Panel 2 - Questionnaire answered by students) F(Semester: () IX ()X () Single () Married 1. What is your monthly family income? (minimum wage R\$ 545.00) () none) 1 to 2 times the minimum wage) 2 to 3 times the minimum wage () 3 to 5 times the minimum wage) 5 to 10 times the minimum wage) over 10 times the minimum wage 2. What is the educational level of your parents? (you can mark more than one)) none (cannot read or write)) some middle school) middle school) some high school) high school degree) some college () college degree) graduate school 3. Does your family own its home? () yes () no 4. Are you attentive when dealing with the dental problems of your patients? () yes () no () sometimes 5. Do you feel prepared to perform actions as planned, and are able to do so? () yes () no () somewhat 6. Are you satisfied with the technical quality of your work? () yes () no () somewhat 7. Are your relationships with your patients satisfactory? () yes () no () somewhat 8. In your opinion, has your service promoted a high level of interpersonal relationship? () yes () no () somewhat 9. Do you enjoy helping patients? () no () yes () somewhat 10. Have you enjoyed working at the Integrated Clinic? () no () yes () somewhat 11. With regard to the faculty at the Integrated Clinic, are they available when you need help? () yes () no () not always

residing in the city of Passo Fundo/RS (51.1%, n = 26). The professions declared by the subjects were predominantly retirees (16.3%, n = 8), housewives (12.2%, n = 6) and

12. Suggestions to improve patient service and your learning experience:

farmers (12.2%, n = 6).

The most frequently reported reasons by patients for seeking dental care at FOUPF were recommendation by friends and colleagues (38%, n = 19), quality of service rendered (42%, n = 21), and lack of financial resources to pay for private dental treatment (26%, n = 13) – (Table 1). According to users, the students portrayed confidence and security during treatment (87.3%, n = 44), explaining procedures before performing them (100%, n = 50) and properly wearing individual protection equipment (IPE) in 97.8% of cases (n = 49) (Table 2).

Table 1- Reasons for patients to seek dental care at FOUPF

Reason that led the user to seek dental care at FOUPF	N	%
Good quality of treatment	21	42
Recommendation of colleagues, relatives or friends	19	38
Financial reasons	13	26
To get prosthetics	9	18
Unfinished previous treatment	7	14
Dentist referral for specialized treatment	4	8
Students have patience with patients	4	8
Other reasons	1	2
Knows the student, who promised to treat him/her	0	0

Table 2 – Characteristics of service given by students, according to the patients.

Characteristics of service (students)	Yes	No	Somewhat
	% (n)	% (n)	% (n)
Treated well	97.9% (49)	2.1%(1)	0% (0)
Portrayed confidence and security	87.3% (44)	2.1% (1)	10.6% (5)
Wore adequate individual protection equipment	97.8% (49)	2.2% (1)	0% (0)
Discussed treatment plan	82.2% (41)	17.8% (9)	0% (0)
Explained procedures beforehand	100% (50)	0% (0)	0% (0)
Gave clear explanations	89.1% (45)	0% (0)	10.9% (5)

A total of 24% of patients (n = 12) reported feeling pain during dental treatment in unspecified situations (Table 3).

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Table 3 – Situations reported by patients with pain.

Times at which pain was felt	N	%
Unspecified situations	12	24
Extraction	2	4
Root canal treatment	4	8
Prosthetic fitting	2	4
Anesthesia	2	4
Orthodontic appliance	1	2

To improve the quality of dental service given by FOUPF, 36.7% (n = 18) of patients suggest that appointments be made more than once a week (Table 4). Finally, it was observed that 49 (98%) of users do or would recommend the FOUPF dental service to someone.

Fifty students were interviewed (25 male and 25 female),

Table 4 – Patient suggestions to improve dental service at FOUPF.

User suggestions	% (n)
None, it is fine as is	36.7% (18)
More frequent appointments during the week	36.7% (18)
Reduce waiting time	12.2% (6)
Reduce appointment duration	10.2% (5)
The student should be more experienced	4.2% (2)

with mean age of 22.6 years. With regard to the Integrated Clinics, most students feel prepared to perform any procedure (58%, n=29), are attentive when dealing with clinical dentistry situations (98%, n=49), and enjoy working at the Integrated Clinics (70%, n=35) (Table 5).

Discussion

Patient satisfaction represents valuable feedback that contributes towards assessing the constant improvement required in teamwork. Thus, constant investigation is required in order to seek out the factors that promote the satisfaction of patients assisted at health services.

According to Brazilian curricular guidelines for dental school courses, the profile of professionals to be formed is to be generalist. Dental surgeons should act at all levels of healthcare, based on technical and scientific rigor. They are qualified to practice activities related to oral health of the general population, focusing their actions to transform reality for the benefit of society at large. Health professionals, within the scope of their profession, must be prepared to develop health prevention, protection and rehabilitation actions, at both individual and collective levels.

Mendes¹ (2003) described that the concept of user satisfaction is part of the sociocultural and political context of a given society. Also, the quality of healthcare services depends on the subjects who practice the action and especially those who undergo it – that is, the citizen. These aspects could be observed in the present research, as most patients rated positively the service provided by FOUPF students (97.9%, n = 49). It should be reminded that most patients seen at FOUPF are mostly farmers, retirees and stayat-home individuals, having an education level probably lower than that of the average population.

It is noteworthy that the level of education generally follows the income level of individuals. Thus, individuals

with less education and less sophisticated ordering treatments whose cost is generally lower. In the present study, this fact should be the subject of extensive analysis in the industry screening of college in order to perform a more careful selection of patients, primarily aimed at direct care to individuals with less education and lower income bracket.

According to Ferreira et al.⁶ (2004), anxiety is a phenomenon that can be characterized by subjective feelings of tension, apprehension, nervousness and preoccupation, experienced by an individual at a given time, such as during a dental appointment. Studies have shown that a large share of the adult population regards dental treatment as very uncomfortable and associated with stress. With regard to dental fear and anxiety, the present study diverged from the literature, as 87.3% (n = 44) of interviewed patients reported that the students portrayed confidence and security during treatment performed at FOUPF, and 48.9% (n = 24) of individuals were not afraid during the procedures.

According to Barbisan et al. 7 (1995), most patients assisted at the UFRGS Dental School were satisfied with the service provided, and more than half of them believe that students can perform at the same level of service as a more experienced professional. They further reported that the physical environment of the school is clean and organized, and that they had already recommended or would recommend the service to others, giving the treatment a score of 10. The findings of the present study agrees with the results reported in the literature, as 97.9% (n = 49) of patients declared they had been well treated and only 4.2% (n = 2) mentioned that students should be more experienced.

Ramos 8 (1997) analyzed the opinion of patients at the Integrated Clinic of the Federal Dental School of Diamantina/MG on what they most feared in a dental treatment. The results showed that 47.97% of patients were not afraid of anything and 52.03% had several causes for fear; moreover, 97.92% rated the service given students to users as excellent or good. Those results agree with the present study, as 48.9% (n = 24) of individuals were not afraid during the performed procedures, and 97.9% (n = 49) declared having been well treated by students and staff at FOUPF.

Pinheiro et al.⁹ (2002), based on data obtained in their work, reported that 94.09% of patients subjected to a research informed their preference for being served by dental surgeons wearing glasses, masks, gloves and hairnet. Those authors thereby concluded that most interviewed subjects were aware of the importance of individual protective equipment worn

Table 5 – Profile of FOUPF students

Student profile (soon to graduate)	Yes % (n)	No % (n)	Somewhat % (n)
Attentive with regard to dentistry situations	98% (49)	0% (0)	2% (1)
Prepared to perform dental work (skilled)	58% (29)	0% (0)	42% (21)
Satisfied with own technique	56% (28)	0% (0)	44% (22)
Satisfactory relationship with patients	88% (44)	2% (1)	10% (5)
Service provided with high level of interpersonal relationship	70% (35)	0% (0)	30% (15)
Enjoy helping patients	96% (48)	0% (0)	4% (2)
Enjoy working at the Integrated Clinics	70% (35)	4% (2)	26% (13)

to prevent infectious and contagious diseases. The present study revealed that 97.8% (n=49) of patients observed that the student assisting them was properly dressed and protected.

According to Nobre et al.3 (2005), assessing client satisfaction at various learning institutions is the best indicator to evaluate what standard of dental care is being offered to users. In a research study conducted at the University of Fortaleza/CE (UNIFOR), those authors concluded that the service process should be improved, especially with regard to the excessive wait until users are seen and unnecessary visits to the services. In that sense, it should be mentioned that 36.7% (n = 18) of patients interviewed at FOUPF mentioned the need to be seen more than once a week, 12.2% (n = 6) felt a need to reduce the waiting time, and 10.2% (n = 5) wanted to reduce appointment duration. On that same topic, Bottan et al.¹⁰ (2006) reported that the most prevalent negative feedback by patients concerned the waiting time until being called to begin treatment, waiting time in the waiting room and duration of the treatment at UNIVALI.

Mialhe et al.⁵ (2008), while evaluating the quality of dental service provided by graduates of the FOP/UNICAMP dental school, observed that 92.5% of interviewed subjects declared not feeling pain during clinical care. With regard to the characteristics of the service provided by students, most did so portraying security and confidence to the interview subjects, discussing and clearly explaining the proposed treatment plan. In the present study, 82.2% (n = 41) of patients mentioned that FOUPF students explained the treatment plan in detail prior to assisting the patients.

Santos¹¹ (2005) performed a research study in Campos dos Goytacazes/RJ among professionals and users of public dental service units, who filled out self-applied questio-nnaires. The author observed that patients were satisfied with the service, professionals were interested in solving patients' problems, and patients received care according to the explanations given for treatment. In the present study, 98% (n = 49) of students declared being attentive to dentistry situations, 56% (n = 28) claimed to be satisfied with their own technical skills, and 96% (n = 48) mentioned enjoying helping patients.

In general, it could be observed that the service offered to patients by FOUPF students was adequate, not requiring significant changes. Among the points to be modified with regard to satisfaction, patients emphasized scheduling visits more than once a week so that treatment could be completed sooner and in a more efficient manner.

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