

Patients satisfaction to quality of health services of family doctors in family medicine centers in left side of Mosul city

Mohammad Yousif Mohammad*, Firas Husam Ali**, Ammar Hazim Yahia***

*Nineveh Health Directorate /Public health department/ Immunization division / Manager of immunization unit ,**Nineveh Health Directorate/Manager at AI – Quds Family medicine training center ,***Nineveh Health Directorate/ Assistant Manager at AI – Quds Family medicine training center.

Correspondence: mohamadlibrahimy@gmail.com

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ABSTRACT

Background: Patient satisfaction is related to clinical outcomes, patient retention, and medical malpractice claims. It affects the timely, efficient, and patient-centered delivery of quality health care. The aim of study was to assess the level of patients' satisfaction to doctors in family medicine centers in Mosul city.

Patients and Methods: A cross sectional study was conducted in order to achieve the aim of the present study in which the data was taken from the attendants to family medicine centers in left side of Mosul city by direct interview using specially designed questionnaire (The Bulgarian EUROPEP questionnaire) after receiving health services during a period of 8 months started from 1st of May 2018 up to 30th of January 2019.

Results: The study includes 580 participants. More than half of them their ages were between 20 – 40 years from both sexes (male = 175, female = 135) and 38.8% of them were having university graduation. The overall satisfaction to medical services delivered by family doctors was 79.7%, Continuity and confidentiality constituted the higher satisfaction rate in 97%, 96.6%, while Informativeness satisfaction constitute 89.7%. Accessibility and Acceptability had the lowest satisfaction rate compared to other domains.

Conclusions: this study revealed high patients' satisfaction rate to doctors delivering health care at the family health centers in left side of Mosul city while there was lower satisfaction rate regarding Accessibility and Acceptability. Further wide scale studies are needed in the future and provision of appropriate infrastructure.

Keywords: patient satisfaction, family medicine, health care.

رضا المرضى عن جودة الخدمات الصحية لأطباء الأسرة في مراكز طب الأسرة في الجانب الأيسر من مدينة الموصل

محمد يوسف محمد*، فراس حسام علي**، عمار حازم يحيى***
 *دائرة صحة نينوى / قسم الصحة العامة/شعبة التحصين/مدير وحدة التحصين ،**دائرة صحة نينوى /مدير مركز القدس لطب الأسرة ،***دائرة صحة نينوى /وكيل مدير مركز القدس لطب الأسرة.

الخلاصة

الخلفية: يرتبط رضا المرضى بالنتائج السريرية واحتباس المرضى ومطالبات سوء الممارسة الطبية. ويؤثر على تقديم رعاية صحية عالية الجودة وفعالة و متمحورة حول المريض. كان الهدف من الدراسة هو تقييم مستوى رضا المرضى للأطباء في مراكز طب الأسرة في مدينة الموصل.

المرضى والطرق: تم إجراء دراسة مقطعية من أجل تحقيق هدف الدراسة الحالية حيث تم أخذ البيانات من المراجعين إلى مراكز طب الأسرة في الجانب الأيسر من مدينة الموصل عن طريق المقابلة المباشرة باستخدام استبيان The Bulgarian EUROPEP مصمم خصيصاً بعد تلقيهم للخدمات الصحية خلال فترة 8 أشهر تبدأ من 1 ايار 2018 حتى 30 كانون الثاني 2019.

النتائج: تضمنت الدراسة 580 مشارك. كان أكثر من نصفهم تتراوح أعمارهم بين 20-40 سنة من الجنسين (الذكور = 175 ، والإناث = 135) و 38.8% منهم تخرجوا من الجامعة. بلغ الرضا العام عن الخدمات الطبية التي يقدمها أطباء الأسرة 79.7% ، وشكلت الاستمرارية والسرية أعلى معدل رضا 97% ، 96.6% ، في حين شكلت رضاء المعلوماتية 89.7%. كان الوصول والمقبولية أقل معدل رضا مقارنة بالمجالات الأخرى

الاستنتاجات: كشفت هذه الدراسة عن ارتفاع معدل رضا المرضى للأطباء الذين يقدمون الرعاية الصحية في مراكز صحة الأسرة في الجانب الأيسر من مدينة الموصل بينما كان هناك قلة رضا بالنسبة لخدمات الوصول والمقبولية. هناك حاجة لمزيد من الدراسات واسعة النطاق في المستقبل وتوفير البنى التحتية الملائمة.

الكلمات المفتاحية: إرضاء المريض، طب الأسرة، الرعاية الصحية.

INTRODUCTION

Patient satisfaction is "an indicator for measuring the quality in health care".¹ Patient satisfaction is an important and commonly used indicator for measuring the quality and efficiency in health care system.² The potential cost-effectiveness of qualitative techniques involved in designing patient satisfaction surveys became significantly important.³ Patient satisfaction is related to their clinical outcomes, and decrease medical malpractice claims. It leads to patient-centered delivery of quality health care. Patient satisfaction is thus considered a very effective indicator to measure the success of doctors and hospitals.⁴ Literatures showed that satisfied patients are more likely to develop a good relationship with the health system, leading to improve compliance, continuity of care and ultimately better health outcome.⁵ The Internet encourages rapid and wide distribution of these opinions.⁶ The cost of obtaining a patient is high, so that, losing patient is a big loss in medical investment.⁷ "There is evidence of a mutual relationship between patient satisfaction and continuity of care (which is associated with better patient outcomes). On the other hand, dissatisfaction and complaints can mean not only loss of business/investment, but also increased risk of malpractice lawsuits."⁸ "health quality improvement, and risk management is greatly linked with continuity of patient care, which is important for surveying patient satisfaction through which can offer the patients a chance to participate in their care by reporting their care experiences and building engagement."⁹ Aim of study: The aim of study was to assess the level of patients' satisfaction to doctors in family medicine centers in Mosul city.

Subjects and Methods

The protocol was approved by Ethical and Scientific Committee in Nineveh health sector, and obtaining consent from each participant through a signed agreement letter. If the participants were

children, their relatives were involved in the interview. This study was conducted in a sample of family medicine centers in the left bank of Mosul city which were selected by simple random sampling technique out of six centers, namely (Al-Quds, Al-Araby and Al-Qadesya family medicine centers). A cross sectional study was conducted in order to achieve the aim of the present study in which the data were taken from the attendants to each centers through direct interview using specially designed questionnaire (The Bulgarian EUROPEP questionnaire)¹⁰ after receiving health services. In order to achieve the purpose of the study, an adequate sample size is calculated to estimate the population included in the study with a good precision. The total number of attendance to the three family centers over a period of one month were calculated and according to the equation of sample calculation for cross sectional study with standard error 5% and 95% confidence level¹¹ the sample was estimated, however; in order to overcome bias, higher number of participants were included in the study, that is out of the 6580 total attendants to the three family centers over a period of one month, five hundred and eighty attendants were randomly selected from each center every 2 other days in successive manner, as a week divided in to six days every 3 days return to the same center for collection of data over a period of eight month from 1st of May 2018 up to 30th of January 2019. In each center, the rule of inclusion patients was depending on numbers of family physician providing services in each center. If there was one doctor in the center, so every other patient was included in the study for purpose of randomization, while in center, where there was more than one doctor providing services, attendants were included in the study from each doctor in a manner of one by one from each doctors. No exclusion criteria were applied apart from randomization process. The sample size taken was higher than the required for The Europep instrument is a questionnaire that included 21 items that categorized into 7 qualitative

domains each measuring different aspects of care including (Confidentiality, Thoroughness{a large amount of care and attention to detail} , Informativeness { giving information; instructive in clarity}, Continuity{is concerned with quality of care over time}, Accessibility{the availability of good health services within reasonable reach of those who need}, Humaneness{the importance of human needs and values } and Acceptability{the extent to which

people receiving a healthcare intervention consider it to be appropriate stop human suffering}), all items are aggregated into 2 dimensions: clinical behavior (items 1 – 16) and organization of care (items 17 – 21). Data analysis were done using SPSS software with calculation of Z test of one proportion to find out significance in specific domain.

RESULTS

This study revealed that 310 (53.5%) of the attendants their ages between 20 – 40 years with male: to female ratio 1.1:1, table 1.

Table (1): Distribution of study population according to age and gender

Age group (in years)	Male		Female		Total		P* value
	No.	%	No.	%	No.	%	
< 20	35	6.0	45	7.8	80	13.8	0.08
20 – 40	175	30.2	135	23.3	310	53.5	0.045
> 40	95	16.4	95	16.4	190	32.8	0.38
Total	305	52.6	275	47.4	580	100	

*P value calculated used Chi square test with degree of freedom=1

Table 2 demonstrate that educational level of the study population, were 225 (38.8%) graduated from the university with only 8.6 % of the attendee were illiterate, with significant difference between male and female in most of the educational level.

Table (2): Educational level of the study population according to sex

Education level	Male		Female		Total		P value
	No.	%	No.	%	No.	%	
Illiterate	15	2.6	35	6.0	50	8.6	0.0008
Read & write	45	7.8	30	5.2	75	12.9	0.16
Primary school	35	6.0	15	2.6	50	8.6	0.009
Secondary school	80	13.8	100	17.2	180	31.0	0.008
University	130	22.4	95	16.4	225	38.8	0.046
Total	305	52.6	275	47.4	580	100	

*P value calculated used Chi square test with degree of freedom=1

Table 3 elucidate that 200 (34.5%) of study sample were employee (male = 120, female = 80) and 135 (23.3%) of the sample was house wife, the difference between employment status and working as students was statistically significant between male and female with p value =0.018, 0.009, respectively.

Table (3): distribution of study population according to occupation and gender

Occupation	Male		Female		Total		P value **
	No.	%	No.	%	No.	%	
Housewife	0	0.0	135	23.3	135	23.3	----***
Employee	120	20.7	80	13.8	200	34.5	0.018
Student	50	8.6	60	10.3	110	18.9	0.009
Skill worker	115	19.8	0	0.0	115	19.8	---***
Retired	5	0.9	0	0.0	5	0.9	----***
Others*	15	2.6	0	0.0	15	2.6	----***
Total	305	52.6	275	47.4	580	100	

*Others were those who cannot include them in the above classification, like unskilled workers and others.

**P value calculated used Chi square test with degree of freedom=1

***unable to calculate as chi square does not support cell values that are zero.

Lastly table 4 demonstrates satisfaction rates to medical services delivered through these family centers which represent that the overall satisfactions was 79.7% of the sample, and Confidentiality constitute 95% of the study population. Thoroughness and Continuity satisfaction rate were 97.4% and 93.1% respectively. Informativeness constitute 89.7%. Accessibility and Acceptability showed the lowest satisfaction rate 50%, 47.7% respectively. Using Z test of one proportion analysis shows significant difference between each domain related to others with P value less than 0.001 which is very highly significant.

Table (4): Satisfaction rates to the medical services delivered by the family centers

Overall satisfaction	Yes		No		P value*
	No.	%	No.	%	
	462	79.7	118	20.3	0.000
Domain	Satisfied		Unsatisfied		
	No.	%	No.	%	
Confidentiality	555	95.7	25	4.3	0.000
Thoroughness	540	93.1	40	6.9	0.000
Informativeness	520	89.7	60	10.3	0.000
Continuity	565	97.4	15	2.6	0.000
Accessibility	290	50	290	50	0.000
Humaneness	500	86.2	80	13.8	0.000
Acceptability	275	47.4	305	52.6	0.000

*Z test of one proportion was used to find out the significance of difference between different domains.

DISCUSSION

The degree of patient satisfaction can be used as ways of assessing the quality of health care and the personnel. "It reflects the ability of the provider to meet patients' needs. Satisfied patients are more likely than unsatisfied patients to continue using health care services, maintain their relationships with specific health care providers, and comply with care regimens"¹². Thus, it can be defined as the corner stone for national health. It has been reported that the cost-efficiency of health care would be better by transitioning the focus towards primary health care¹³. Studies have proved that "a satisfied client is more likely to comply with medical treatment, more likely to provide medically relevant information to the provider, and more likely to continue using the health"¹⁴.

The present study shows that half of attendants to family medicine centers in left side Mosul city their age was between 20 – 40 years (30.2 % male and 23.3% female) and 38.8% of the study sample were graduates from the university. Similar age distribution was obtained from other study conducted in Saudi Arabia which have been done on participants attending to their family centers, but 73.5 % of attendee were male¹⁵, this male predominance may be due to the religious point of view as more man go out than female. This age distribution was found also in Nigeria were 68.1 % of the sample of attendee their ages between (20 – 39 years) on the other hand the majority of them were females who constitute (71.3%) of the

attendance to the family health centers¹⁶ and this exhibition of a younger age may be related to the high fertility and the culture prevalent in this region. About thirty eight percent of present study population has completed their university education similarly to data obtained from Jubail city in Saudi Arabia¹⁷ but unlike other similar study implemented in Al Khartoum state which found that only 10.1 % of the study sample was graduates from the university¹⁸.

The present study demonstrates that 79.7% of the participants were expressing their overall satisfaction regarding health services delivered by family doctors in family medicine centers in left side of Mosul city.

These findings are relatively similar to other studies achieved in Riyadh, Saudi Arabia and Jahrom of Shiraz, Iran which found that the overall satisfaction to health services provided by PHC centers was 64.5%¹⁹ and (66.7%)²⁰, respectively. The doctors who gave an opportunity to patients to talk about their illness, provided instructions regarding dose and time of medication. advised follow up to the patients were constitute 93.1%, 89.7% respectively as represented by thoroughness and Informativeness. Contrary results were obtained from a study done in Scotland²¹ as only half of patients were reasonably satisfied with 14 various aspects of doctor-patient interaction and (87%), (79%) were the satisfaction rate regarding doctors' thoroughness and Informativeness; respectively. This difference in

satisfaction rate may be related to the level of population knowledge about the importance of malpractice claim audits effects related to upgrading of health system. In the present study Humaneness satisfaction rate constitute about 86% of study population Same result obtained from other international studies which reported that about 88–92% of their patients believed that they were treated with respect and dignity²²⁻²⁴. Acceptability satisfaction rate was relatively low in the present study which constitute just 47.4%. This domain regarded out of doctors controls as there is limited resources available at the family centers to be supplied to the patients which is due to the destruction of the infrastructures that happened to the Mosul city during ISIS war.

CONCLUSION

Patients were highly satisfied with doctors giving health services at the family health centers in left side of Mosul city.

RECOMMENDATIONS

It is recommended that further studies should be conducted to assess patient satisfaction to family medicine doctors including larger sample size and including the family physician doctors in different parts of Mosul city even in the private clinic.

Conflict of Interest

No conflict of interest.

Role of Funding Source

Authors self-supported study.

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