



EVALUATING THE PERFORMANCE OF SELECTED HEALTH CENTERS DEPENDENT SOUTH HEALTH CENTER TEHRAN UNIVERSITY OF MEDICAL SCIENCES IN 2018

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ABSTRACT

Introduction: Given the importance of evaluation in order to ensure the quality of performance and services offered at health centers, this study was carried out uses indicators of access, First Contact, Longitudinality, comprehensiveness, coordination, family focus and community orientation to evaluate the performance of health centers south Health center Tehran University of Medical Sciences in 2018.

Method: This study was a descriptive - analytical, in 2017, among patients referred to health care centers dependent on South Health Center Tehran University of Medical Sciences. The sample size were selected by proportional allocation sampling method using the Cochran formula 384 participants. In order to gather information used from questionnaires (PCAT) or Primary Care Assessment Tool, which consists of two parts. The first part demographic questions and the second part of the questionnaire, questions related to the indicators assess the health centers. After collecting the questionnaires, the data were analyzed by SPSS software using descriptive statistics, Independent-Samples T Test and One-Way ANOVA.

Finding: 360 People Referring to centers participated in the present study that 333 of them were women (92/5percent). The average age of 33 years old, 96/1percent were married, 91/7percent have insurance, 27/5 percent low literate patients and 20/6 percent were referred for the first time. Meysam health care center in terms of mean all of the indices most points (2/10 out of 4) and the Qamar Bani Hashem health care center lowest score (1/17 out of 4) and all centers in the all of the indices points (1/56 out of 4) below the average (2) were obtained.

Results: performance of all health care centers Lower than the average and All they need to improve performance and can intervention to improve the functioning started of the centers with a score lower. As well as each of the indicators in depth are examined in order any planning to promote done.

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INTRODUCTION

One of the most important historical events in the evolution of supply and production of health services is the decision of the international community to adopt the method of primary health care (Primary Health Care) in order to achieve various goals, including achieving justice in public access to primary health services. These services are the main part of the health system and socio-economic development, as well as the first level of contact of the individual, family and society with the health system of countries (1).

Health care is a fundamental right of all people in any society, and these rights are recognized by almost all governments of the world (2).

The health care system of Iran is organized in three levels: national, provincial and city. At the national level, the Ministry of Health, Treatment and Medical Education is the main coordinated headquarters of the health, treatment and medical education system. At the provincial level, the universities of medical sciences and health services are responsible for overseeing the activities of the city health network, supporting the units providing services and providing medical education in related fields. At the city level, there are health service executive units that provide services under the title of city health network (3).

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The health network of the city is the smallest independent unit of the health system of Iran and each city has an urban and rural population of about 100 to 300 thousand people. The first unit to provide services to the population is an urban or rural health center whose staff includes physicians, midwives, technicians, and pharmacy and laboratory technicians. The main task of health centers is to provide health care to the covered population and, if necessary, to refer them to higher levels, including hospitals. The purpose of providing desirable health care services is to ensure complete physical, mental and social health for the people of the community as much as possible, which should have characteristics such as availability, good quality and acceptability (4).

Primary care represents the basis for many health systems by providing preventive and curative care, comprehensive and accessible to the most common health needs of the community by coordinating care with other levels, ie when referral is required. Population health indicators are one of the criteria for evaluating the quality of government performance in providing health services to the populations covered (5). Performance appraisal is a formal process in the organization that compares performance between performance and expected performance based on objective goals or subjective elements. The importance of this process is so great that more than 90% of large organizations have a performance appraisal system and more than 75% of them perform performance appraisals annually. In health care organizations, evaluation is done to ensure the quality of performance and services provided and its ultimate goal is to improve the quality of patient care and ensure his safety (17). The aim of this study was to determine the performance of selected health centers affiliated to the South Health Network of Tehran University of Medical Sciences.

MATERIAL AND METHOD

The type of research is descriptive-analytical and applied in terms of purpose, which was conducted in 1397 with the aim of determining the performance of selected health centers affiliated to the South Health Network of Tehran University of Medical Sciences. Research population of people referring (1,400,000 people) to health centers affiliated to the South Health Network of Tehran University of Medical Sciences, which includes 32 centers in 5 geographical regions (region 19 has 8 centers, region 17 has 7 centers, region 16 It had 8 centers, District 11 had 5 centers and District 10 had 3 centers) in 2018.

The sample size was 384 people were selected by proportional sampling method using Cochran's formula. To conduct the research, 16 centers were randomly selected from 5 regions and 32 health centers. (From District 19, four centers, District 17, four centers, District 16, four centers, District 11, two centers, and District 10, two centers) and then, referring to the centers in different months of the year, 24 people were randomly selected from among the applicants. While providing the necessary explanations, they were asked to complete the questionnaire. A questionnaire (PCAT) or Primary Care Assessment Tool was used to collect information.

Then, using the questionnaire method, it consists of two parts, the first part is related to demographic information (8 questions) and the second part of the questionnaire includes 83 questions related to health center evaluation indicators, of which 11 questions are related to access index, 3 questions are

related to first index. Level of care, 10 questions related to care continuity index, 22 questions related to comprehensiveness index, 19 questions related to coordination index, 6 questions related to family-centered or family-focused index and 5 questions related to community-based index and 6 questions related to characteristics Was a presenter and was evaluated in the form of Likert scores (five points). Retesting and Cronbach's alpha, the correlation coefficient was 0.8, which resulted in the reliability of the questionnaire.

In order to collect research information, questionnaires were randomly distributed among people referring to selected health centers in the south of Tehran and they were asked to answer the questions carefully and patiently. After collecting and analyzing the data using SPSS16 and Excel 2013 software, descriptive statistics methods were used and in the inferential statistics section, t-test was used to test the studied components. After collecting the questionnaire, the data were analyzed by SPSS software using descriptive statistics (mean and standard deviation) and Independent-Samples T Test and One-Way ANOVA.

RESULTS

One of the study centers was excluded from this study due to lack of cooperation. 92.5% of the subjects were male and the rest were female (7.5%). The mean age of participants in the study was 33 (in the range of 35-36 years) and also the highest frequency in the age groups was in the range of 35-36 (49.4%). Married people made up the majority of participants in the study (96.1%). More than half of the participants in the study had a diploma (50.8%). 330 (91.7%) of the participants in the study had insurance and 30 (8.3%) had no insurance.

286 (79.4%) of the participants in the study had referred to the center more than once and 74 (20.6%) had referred to the center for the first time. Also, the most reason for referring to health centers was related to the family health unit (36.7%). The number of participants in the study was 24 (6.7%) according to the proportional sampling method from each health care center.

The results of One-Way ANOVA test showed that there is no significant relationship between gender and the mean of all performance evaluation indicators ($p > 0.05$). Also, there is no significant relationship between age and the mean of accessibility indicators, first level of care, comprehensiveness, family-centered and community-oriented ($p > 0.05$), but there is a significant relationship with the average indicators of continuity of care, coordination, provider characteristics and total ($p < 0.05$). There is no significant relationship between the cause of referral and the mean of the indicators of the first level of care, continuity of care and family-oriented ($p > 0.05$). But there is a significant relationship with the mean of accessibility, comprehensiveness, coordination, community-oriented, provider specificity and total ($p < 0.05$). There is no significant relationship between job and the mean of access indicators, first level of care and family-oriented ($p > 0.05$) but there is a significant relationship with the mean of continuity of care, comprehensiveness, coordination, community-oriented, provider specificity and total ($p < 0.05$). There is no significant relationship between the level of education and the mean of the first level of care, continuity of care and the characteristics of the provider ($p > 0.05$), but there is a significant relationship with the mean of access, comprehensiveness, coordination, family-centered,

community-oriented and total indicators. Has ($p < 0.05$). There is no significant relationship between the cause of referral and the mean of the indicators of the first level of care, continuity of care and family-oriented ($p > 0.05$). But there is a significant relationship with the mean of accessibility, comprehensiveness, coordination, community-oriented, provider specificity and total ($p < 0.05$).

Independent-Samples T-Test was used to analyze some variables and showed that there is no significant relationship between marital status and the mean of all performance evaluation indicators ($p > 0.05$). Also, there is no significant relationship between insurance status and the average of all performance appraisal indicators other than the characteristics of the provider ($p > 0.05$). There is no significant relationship between the number of referrals with the mean of accessibility, comprehensiveness, family-centered and community-based indicators ($p > 0.05$). But there is a significant relationship with the mean of the first level of care, continuity of care, coordination, provider specificity and the whole ($p < 0.05$).

The findings also show that Meysam Health Services Center has the highest score in terms of the average of all indicators (2.10 out of 4) and QamarBaniHashem Health Services Center has the lowest score (1.17 out of 4) and all centers in All indices scored (1.56 out of 4) less than the average (2).

Table 1 Relationship between study variables and center performance

Hypothesis	Model Relationship	P-Value	Correlation
H1	Performance & Accessibility	0/039	0/612
H2	Performance & Level of Care	0/051	0/411
H3	Performance & Follow Up Rate	0/033	0/519
H4	Performance & comprehensiveness	0/027	0/658
H5	Performance & coordination	0/022	0/746
H6	Performance & Focus On Family	0/037	0/436
H7	Performance & community-oriented	0/064	0/258
H8	Performance & Population covered	0/041	0/427

There was a significant relationship between the performance of the centers and their access to health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected. 69.4% of the clients stated that facilities and services were not available around the clock in the study centers. Also, 74.4% of them expressed dissatisfaction with the lack of a telephone to make an appointment.

There was no significant relationship between the performance of the centers and their level of care in health centers ($P > 0.05$), so the null hypothesis (H_0) is not rejected. 50.3% of the clients were satisfied with the time spent by the doctor to visit the patient.

There was a significant relationship between the performance of the centers and their follow-up in health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected. 61.9% of the patients expressed satisfaction with the moral and humane behavior of health care providers during treatment. 59.7% of the subjects also expressed dissatisfaction with the lack of knowledge and follow-up of the treatment team about the treatment process after the visit.

There was a significant relationship between the performance of the centers and the comprehensiveness of their services in the health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected. 76.4% of clients were satisfied with the completeness of health services in health centers.

There was a significant relationship between the performance of the centers and their coordination in health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected. 52.6% of the clients did not have medical records available in the next visits, 51.7% did not request a child health card by the service providers, 61.4% did not have a business card for the post-pregnancy period and 57.8% Clients expressed dissatisfaction with the lack of explanation of the various referral options provided by service providers.

61.4% of the clients believed that the results of the specialist doctor's treatment were not discussed at all in the primary care center. They also believed that the health care providers were concerned about the quality of the specialized care services. They do not express themselves. 73.1% of clients believed that health care providers did not ask any questions about people's living conditions such as water availability or unemployment.

There was a significant relationship between the performance of the centers and the focus on their families in the health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected. 75.6% of the clients expressed dissatisfaction with the lack of communication between health care providers and their families, despite the clients' willingness.

There was a significant relationship between the performance of the centers and their community-oriented health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected. 64.7% of people believed that health centers did not take any action to improve the living conditions of people in the community with the help and cooperation of other organizations. There was also a significant relationship between the performance of the centers and the population covered by them in health centers ($P < 0.05$), so the null hypothesis (H_0) is rejected.

The highest score was related to the community-based index of Meysam Health Center and the lowest score was related to Nematabad. The highest score was related to the service provider characteristic index related to ShahidAyat Health Center and the lowest score was related to ShahidAhmadi. Macinko study in Brazil (6) showed that the overall performance of health care centers was higher than the average and the performance of modified health care centers (PSF, which is a care team including: physician, nurse and family health) compared to traditional medicine physicians. They were higher and in all centers had the highest score in the Continuity of Care Index, which was in line with the present study and the lowest score was related to the Access Index. However, in the present study, the overall performance of health care centers was lower than average, which is significant due to the similarity of the care system in Brazil and Iran.

In the present study, all centers were lower than the average in the index of the first level of care. It was not done in health centers so that patients could be noticed and followed up. The Tsai study in Taiwan (8) showed that the overall performance of health care centers was higher than average and the performance of UHC centers was higher than other centers. In UHC centers, the highest score was related to the first level of care index and the lowest score was related to the community-centered index, and in other centers, the highest score was related to the comprehensiveness index and the lowest score was related to the community-based index. But in the present study, the overall performance of health care centers was lower

than the average and the highest score was related to the care continuity index and the lowest score was related to the comprehensiveness index, which is not consistent with the above study.

The Kristjansson study found that older patients reported higher care continuity but those with higher education and employment reported lower care continuity. The present study also showed that the older people are, the higher the score of continuity of care, but in this study, there was no significant relationship between education and employment with the index of continuity of care (9).

Findings from the Jatrana study in New Zealand indicated that care continuity is generally high in New Zealand and showed that people with higher health needs scored higher on the care continuity index. This study also showed that the care continuity index in all centers was higher than the average and with increasing the number of referrals to the centers, this index had gained more points (10).

In the present study, all centers in the community-based index were lower than average, which is not consistent with the Muldoon study in Ontario, where primary care providers scored high on the community-based index (11).

Findings of Shi study showed that the overall performance of the health care center was higher than the average and the highest score was related to the first level of care index and the lowest score was related to the comprehensiveness index, which is not consistent with the results of the present study (12).

DISCUSSION

Human health is a part of the national capital that is constantly under threat. In fact, the health of the individual and its society are so intertwined that no boundaries can be drawn between them. In today's world, the responsibility and duty of governments to the health of the people of their country is clearly defined and accepted.

Today, the evaluation of health care systems is an integral part of the quality improvement process of any system. By continuously evaluating each health care system, senior managers will know well what level of quality the system is in and what are its pros and cons (13).

All centers had a score (1.56 out of 4) lower than the average (2) in all indicators. The highest score in all centers was related to the continuity of care index and the lowest score was related to the comprehensiveness index. The highest score of total performance evaluation was related to Meysam Health Center and the lowest score was related to QamarBaniHashem (AS). The highest score was related to the access index of Imam Hassan Health Center and the lowest score was related to fourteen infallibles.

The highest score was related to the index of the first level of care related to Besat Park Health Center and the lowest score was related to fourteen innocent people. The highest score was related to the care continuity index of ShahidAyat Health Center and the lowest score was related to Noor Saadat. The highest score was related to the comprehensiveness index of Meysam Health Center and the lowest score was related to Nematabad.

The highest score was related to the coordination index of Imam Hassan Health Center and the lowest score was related to Qamar Bani Hashem. The highest score was related to the family-centered index of Meysam Health Center and the lowest score was related to ShahidVahedi.

According to the findings of the present study, the comprehensiveness of the services provided has the lowest score, which can be improved by changing the basic service package and completing it. The performance of all health care centers is lower than average and all of them need to improve their performance and the intervention to improve their performance can be started from the centers with lower scores. Also, each of the indicators should be examined in depth and planning should be done in order to improve each one.

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