Factors Affecting Customer Orientation in Iranian Hospitals

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ABSTRACT: Customer orientation is one of the new approaches which is recently considered by the Iranian Healthcare Centers. The present study aims to identify the main factors of customer orientation in Iranian hospitals. The study is done through analysis of a questionnaire designed after recognition of the main variables. Iranian Social Security Organization Hospitals (the major governmental health institutions in Iran) were chosen as a sample among all Iranian healthcare centers (n=48). Content validity and construct validity were assured with expert judgment and the reliability of the questionnaire was determined using Cronbach's alpha and Pearson correlation (1st and 2nd times). Cronbach's alpha coefficient was respectively as 0.826 and Pearson correlation was (p<0.001) 0.975. The questionnaire was filled out by the research community. After collection of sufficient samples, the exploratory and confirmatory factors were analyzed. The findings of the study showed two factors after factor analysis; namely, "consideration about customer" and "consideration about stakeholder". The calculated fitness indexes proved the desirability and appropriateness of the factors and their structural relations. It is concluded that these factors have substantial roles in the implementation of customer orientation approach in these organizations.

Keywords: *Customer Orientation, Iranian Healthcare, Social Security Organization*

INTRODUCTION

Customer orientation refers to focus on customer interests in firms and companies. This orientation has been extensively discussed in the recent literature (Yua et al., 2007). Customer orientation has been an important issue to health care managers. Many previous studies have developed and applied customer orientation as a quality improvement tool for health care providers. (Burroghs, 1999; Young et al., 2002; Cheng et al., 2003).

Following the increased level of competition among healthcare centers the emphasis on consumerism has become an important measurement for monitoring health care performance (Cheng et al., 2003) as determinations of customer satisfactions has been reported in many studies (Tukonaga et al., 2000; Hargraves et al., 2001).

Customer orientation, being a part of outcome quality, has become an important endpoint in outcomes research and benchmarking of services. Sometimes the quality of recovery is also integrated into outcome quality, to form a 'patient-orientated' outcome. When patient satisfaction is also brought into consideration the concept of satisfaction is very complicated and far from being clear. It is influenced by cultural, cognitive and affective components (Heidegger et al., 2006).

In general, patient orientation has been regarded as the patients' judgment on all aspects of quality of care (Jayasekara et al., 2008).

Patient perceptions have become a major indicator in the evaluation and improvement of quality in health care and it is one of the most commonly used outcome measures, as shown in the increased number of tools

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created to assess satisfaction in recent years. Some authors go as far as considering patient satisfaction one of the primary outcomes of health care (Hendriks et al., 2001; Gonzalez et al., 2005).

Respect for patients' needs and wishes were central to any human healthcare system. Providers, wishing to meet those needs more effectively, have shown growing interest in the use of patient evaluations and reports as a complement to other methods of quality assessment and assurance. Increasing attention has been paid to the assessment of patient satisfaction. Furthermore, the patients' own evaluations of their experiences in the hospital have been used to improve the quality of care. Indeed, patient satisfaction is generally considered as an integral part of the quality of care. In his formulation, satisfaction consist of a cognitive evaluation and an emotional reaction to the structure, process and outcome of services. For Donabedian (1980), client satisfaction is a fundamentally important measure of the quality of care because it offers information on the provider's success at meeting those expectations which are most relevant to the client. Measures of satisfaction are, therefore, important tools for research, administration and planning. Patient satisfaction can also be used to evaluate the process of care as greater satisfaction may be associated with superior compliance, improved attendance at return visits and better outcomes (Thi et al., 2002).

In healthcare systems, stakeholders are considered as customers besides the patients.

Stakeholder theory describes how organizations operate and predict organizational behavior. Stakholder issues are among major concerns of business practitioners. Stakeholder orientation has important bearings on a company's performance and managers have already tried to measure its importance and the factors (Yau et al., 2007).

Thi mentioned that - although numerous hospitals have developed ongoing programs for the routine assessment of patient perceptions of the quality of care, and many patient satisfaction surveys have been published - few research has been devoted to factors that may affect level of satisfaction (Thi, 2002). Also Sitzia believes that, despite peer-reviewed health-related journals publish numerously on evaluative patient and stakeholder satisfaction each year, only few of them dealt with main factors of patients and stakeholders satisfaction (Sitzia, 1999).

Although previous studies in Iran have tended to report very high levels of overall satisfaction, it can be said that factors that affect customer orientation in Iranian hospitals and other healthcare centers are not fully recognized and studied till now. Therefore, the present research was performed with objectives such as the identification of factors affecting customer orientation in the Iranian hospitals.

RESEARCH METHOD

First, the researchers developed a questionnaire based on variables impacting customer orientation in hospitals. To assess the validity of the questionnaire, expert judgment method was applied. So the designed questionnaire, along with explanations regarding terms and concepts were presented to five university professors, three managers in the ministry of health, and two officials in charge of quality improvement in hospitals, and they were asked to express their views on its construct, content, formal appearance, and writing mode. Then the necessary amendments were made and the validity of its content and construct were assured.

Iranian Social Security Organization's Hospitals , which were known to have applied at least one of the customer orientated models, were chosen for the purpose of this study (n=48).

To determine the reliability of the questionnaire, it was sent to all Social Security Organization hospitals. The questionnaire was filled out by the research community two times within an interval of 14 days. The members of research community were in charge of quality improvement of the Social Security Organization hospitals. Then the reliability of the questionnaire was determined using Cronbach's alpha and Pearson correlation (1st and 2nd times). Cronbach's alpha coefficient of the component "customer orientation", was respectively as 0.826 and Pearson correlation was (p<0.001) 0.975. it showed that the questionnaire was reliable.

Kaiser-Meyer-Olkin was used to determine the sufficiency of sample size, and Bartlet Test of Sphericity was applied to calculate the meaningfulness of correlation matrix. The exploratory factor analysis was performed with maximum probability approach to identify the rate of loading of variables identified in the component, and Varimax orthogonal approach was used to interpret the variables. The confirmatory factor analysis was used, with application of Lisrel 8.7, to

verify the fitness of factors achieved during the explanatory factor analysis. The fitness indexes were as follows:

Chi square index, goodness of fit index (GFI), comparative fit index (CFI), normed fit index (NFI), non-normed fit index (NNFI), incremental fit index (IFI), related fit index (RFI), adjusted goodness of fit index (AGFI), root mean square error of approximation (RMSEA), and root mean square residual index (RMSRI). If CFI, GFI, NFI, NNFI, IFI, RFI and AGFI are higher than 0.90 and RMSEA and RMSRI are less than 0.050, it proves a desirable and appropriate fitness (Alexopoulos and Kalaitzidis, 2004).

RESULTS AND DISSCUSSION

Demographic characteristics of the research community indicated that a major portion of the research community were familiar with customer orientation topics in some details and most of them hold academic university degrees (table1).

In the first step, correlation of each variables, and internal consistency of all variables were calculated in the component. The correlation and internal consistency was suitable.

In the next step and before explanatory factor analysis, the Kaiser-Meyer-Olkin approach was used to determine the sufficiency of sample volume for each component and Bartlet test of sphericity was used to establish whether the correlation matrix has meaningful difference with zero or not.

The sufficiency of sampling and meaningfulness of the correlation matrix for the component "customer orientation" was respectively: 0.735 & $p<0.001$, 133.258. It shows that the explanatory factor analysis is permissible.

The explanatory factor analysis was performed with maximum probability approach and the variables were interpreted with Varimax rotation approach. The results showed that two factors were extracted for the component "customer orientation", with special values of bigger than 1. The 1st and 2nd factors showed respectively 45.547 and 14.334 percent of the total variances of variables. These two factors totally showed 59.881 percent of the total variances of the variables of "customer orientation". For this component, the following variables formed the first factor:

Table 1: Frequency distribution of research community in accordance with demographic characteristics

Demographic factors		Frequency percentage
Sex	Female	44%
	Male	56%
Age groups	Below 30	6%
	30-39	54%
	40-49	37%
	50 and above	3%
Educational degree	Associate degree	10%
	Bachelor degree	59%
	Higher	31%
Acquaintance with customer orientation topics	Very high	14%
	High	47%
	Medium	33%
	Low	3%
	Very low	3%

- Identification of stakeholder's expectations;
- Consideration about stakeholder's complaints.

The following variables formed the second factor:
- Identification of customer requirements;
- Determination of customer expectations;
- Consideration about customer complaints;
- Practical implications of customer satisfaction tests;
- Identification of requirements explicitly specified by customers.,
- Determination of requirements which were not explicitly stated by the customers (table2).

The confirmatory factor analysis was made with the use of the software "Lisrel 8.7" to verify the fitness of the factors achieved by the explanatory factor analysis. Figure 1 shows path diagram of customer orientation component.
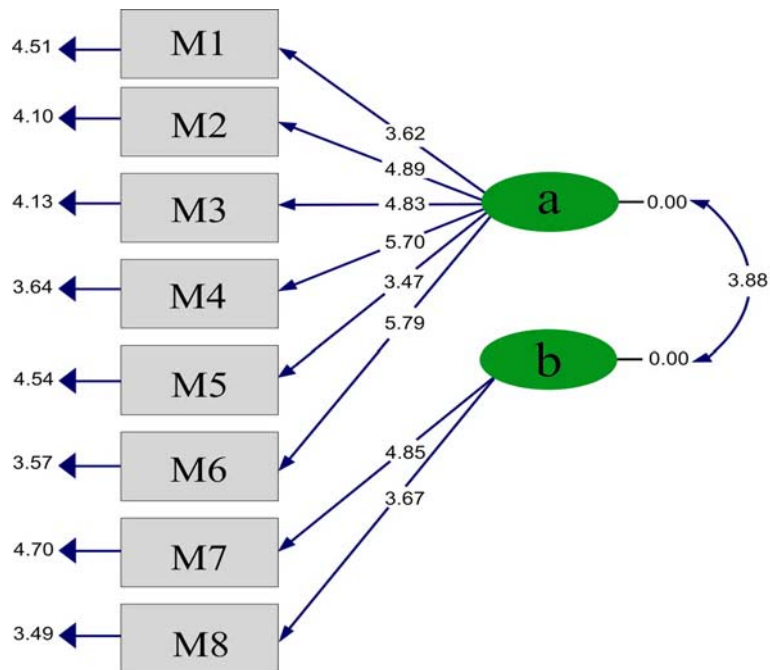
The fitness indexes of RMSEA, GFI, CFI, NNFI, IFI, AGFI and RMSRI were respectively 0.048, 0.91, 0.93, 0.90, 0.94, 0.92 and 0.028 for the component "customer orientation''. The findings of confirmatory factor analysis showed that these fitness indexes calculated for the component "customer orientation'' were desirable. NFI and RFI were respectively 0.88 and 0.87 and Pvalve was less than 0.05 in the component "customer orientation". Nevertheless, other fitness indexes are evidences of desirable and appropriate fitness (table3).

In the component "customer orientation" the first and second factors were named respectively "consideration of stakeholders" and "consideration of customers".

Table 2: Recycled matrix of factors

	Customer orientation				
Code	Variables	1st factor	2nd factor	t	R^2
M1	Identification of customer requirement		0.490	3.62*	0.38
M2	Determination of customer expectations		o.616	4.89*	0.46
M3	Consideration of customer complaints		0.664	4.83*	0.45
M4	Implications of customer satisfaction tests		0.831	5.70*	0.58
M5	Identification of requirements explicitly specified by customers		0.468	3.47*	0.36
M6	Determination of requirements not stated by customers (implied)		0.632	5.79*	0.59
M7	Identification of stakeholder's expectations	0.978		4.58*	0.85
M8	Consideration about stakeholder's complaints	0.536		3.67*	0.47

* t>1.96

Figure 1: Path diagram of customer orientation component

Table 3: Fitness indexes calculated for the component

Component / index	RMSEA	GFI	CFI	NFI	NNFI	IFI	RFI	AGFI	RMSRI	x^2	P- value
Customer orientation	0.048	0.91	0.93	0.88	0.90	0.94	0.87	0.92	0.028	32.08	P=0.031

RMSEA: Root Mean Square Error of Approximation   IFI: Incremental Fit Index
GIF: Goodness of Fit Index   RFI: Related Fit Index
CFI: Comparative Fit Index   AGFI: Adjusted Goodness of Fit Index
NFI: Normed Fit Index   RMSRI: Root Mean Square Residental Index
NNFI: Non-normed Fit Index

CONCLUSION

Findings of this research identified two factors regarding customer-orientation. First factor has been called "consideration of stakeholders" and the second one was "consideration of customers". The confirmatory factor analysis, too, indicated that the structural model of these factors was proper.

Also the findings of the research done by Gonzales (2005) state that "consideration of patients' satisfaction" is one of the most important factors which impact customer-orientation. In this research also "patients' satisfaction" has been recognized as the main factor of customer-orientation. Thi et al., (2002) who have also performed a research to recognize main factors regarding patients' satisfaction, have implicitly referred to two main factors. These factors are consideration about "needs stated by the patients" and "needs implied by the patients". The findings of the present study is, therefore, in conformity with the findings of Gonzales (2005) and Thi et al., (2002) regarding two said main factors as the major variable.

Heidegger (2006) states that main factors impacting customer orientation and qualitative results of offering medical services include "consideration of patients' satisfaction", "recognizing their expectations and needs", and "following up their complaints." Thus it can be said that the findings of this research correspond with Heideggr (2006) in many respects.

Rezaiea et al., (2010) have recognized main factors impacting process management in their research. They have identified customers", "determining their needs and expectations", "analyzing their complains", "analyzing customers' satisfaction", "reviewing customers' needs" and "consideration of customers" as main variables involved in customer-orientation .

Dawson et al., (2010) in their research refer to "patients' satisfaction analysis" and "consideration of patients' satisfaction" as the factors impacting customer-orientation.

Naidu (2009) has studied the factors impacting customer-orientation and recognized "consideration of patients' satisfaction and their complains" as one of the main impacting factors in this regard.

Olander and Londin (2008) have dealt with recognizing factors impacting "stakeholder management process" in their research. In their work "consideration of stakeholders' needs and expectations" has been identified as one of the main factors.

Yau et al., (2007), in their research recognize "consideration of stakeholders' needs and expectations" and "consideration of their complains" as the factors impacting "consideration of stakeholders".

Based on the results achieved through the present research, and taking into account that the factors such as "consideration about stakeholder" and "consideration about customer" have been regarded by the those in charge of quality improvement in the Social Security Organization hospitals, It may be concluded that these factors have a substantial role in the performance of customer orientation and are the main components in the performing of prime importance customer orientation in these organizations.

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