https://doi.org/10.55453/rjmm.2023.126.2.11
The article was received on December 12, 2022, and accepted for publishing on February 18, 2023.

Original Article

A Comparative Study of Patients' Trust in Physicians and Nurses in COVID-19 and Non-COVID-19 Wards in a Reference Hospital in Tehran, Iran

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Abstract: *Trust in health care professionals is considered as a basis for patients' care. This study aimed to compare the level of patients' trust in physicians and nurses in both general and COVID-19 wards in a reference hospital in Tehran during the pandemic. This was a cross-sectional descriptive study. The study population comprised patients from Baqiyatallah Hospital in 2022. The data collection tool was the scale of patients' trust in nurses and the Wake-Forest physician trust scale. Data analysis was performed using SPSS-26 software. The level of patients' trust in physicians in COVID-19 wards was significantly lower than in Non-COVID-19 wards (P<0.001), but there was no difference between the two groups in the trust of nurses. The lowest level of trust was in the receiving of required information from nurses, which had a lower score compared to other questions in the questionnaire, and the average amount of receiving required information for patients in general wards was significantly lower than that of patients in COVID-19 (P=0.006). Trust in nurses and physicians in both COVID-19 and general wards was optimum. During the COVID-19 pandemic, the medical staff worked tirelessly and despite the difficulties and complications of the pandemic, patients have high trust in physicians and nurses.*

Keywords: *trust; nurses, physicians; COVID-19; coronavirus*

INTRODUCTION

Physicians and nurses, as the main members of the medical staff, take on different roles, considering the physical, psychological, and social needs of patients. They may act as educators, counselors, mentors, informers, advocates, and act as experts. To play such roles, physicians and nurses need to establish a good relationship with their patients [1,2]. Trust forms the basis of the relationship between the physician or nurse [3] and patient and provides the conditions for the physician or nurse and patient to work together for a better care plan [4]. The relationship between trust and health outcomes is different in individual studies [5]. For example, in a sample of patients with diabetes, trust in a healthcare professional was positively associated with objective and mental health outcomes (glycemic control, health-related quality of life, and patient satisfaction] [6].

The hypothetical relationship between trust and health outcomes is also reinforced by the ethical claims derived from trustworthy and patient-centered relationships in clinical settings [7]. Studies show that patients who have more trust in their therapist are more satisfied with the care and are more likely to follow treatment recommendations [8,9]. Patients' experiences of trust in nursing depend on nurses' knowledge, and the commitment to conversation to build and develop relationships [10]. Therapeutic staff must receive appropriate training to build a bond of trust between themselves and the patient to establish a trustable relationship between themselves and the patient [11]. Trust between patient and therapist is essential to reduce patients' anxiety and build the capacity to control them [12]. The COVID-19 epidemic has created special conditions in the relationship between the medical staff and patients [13]; furthermore, the need for social distancing and the use of protective equipment on the

one hand, as well as an increasing number of patients, especially those with severe illnesses, epidemics, illnesses and dementia and lack of time to provide medical care, on the other hand, has created a different kind of doctor-nurse relationship with the patient that may affect patients' trust [14]. Considering the importance of patients 'trust in physicians and nurses in adhering to treatment and the effectiveness of medical care, this study was designed to compare the level of patients' trust in physicians and nurses in general and COVID-19 wards in a reference hospital in Tehran during the pandemic.

MATERIALS AND METHODS

This study was descriptive and cross-sectional. The study population consisted of patients admitted to both the general and COVID-19 wards of Baqiyatallah Hospital, Tehran, Iran in 2022. Inclusion criteria included the age range of age: 20-70, hospitalization for more than three days in hospital wards, having no serious psychological disorders, and submitting consent to participate in the study. The data collection tools included the patient's trust scale in the nurse and the Wake-Forest physician trust scale. The Nurse Trust Scale has been validated by Nouripour et al [15]. The Physician Trust Questionnaire has been validated by Forati et al [16].

The scale of patient trust in the nurse contains five questions about Responding to the need, Usefulness of measures, Trust in measures and Practice of treatment" and Giving sufficient information to the patient by the nurse with the scales Never, Rarely, Sometimes, Most of the time, Usually, Always". The Physician Trust Questionnaire includes nine questions about Trust in Skills, Treatment Selection, and Physician Decisions on a scale of "Strongly Agree, Agree, Neither Agree Nor Disagree, Strongly Disagree and Disagree".

Patients with more than three days of hospitalization were randomly selected from the ward list. First, patient satisfaction with the study was obtained and then a questionnaire about patients' trust in physicians and nurses was filled in by an interviewer. Data analysis was performed using SPSS-26 software. Descriptive analysis was performed with mean, standard deviation, frequency, percentage, and analytical analysis depending on the type of data with t-test and Chi-square test.

RESULTS

Four hundred patients participated in this study. Descriptive values related to the age of these patients by group and in general are displayed in Table 1. The mean age of patients in the COVID-19 group was 53.3 years and in the Non-COVID-19 group was 53.8 years. This study included 257 male patients (64.3%). In addition, the sex distribution was the same in the two groups of patients with COVID-19 and Non-COVID-19 and no significant difference was observed in the sex distribution of the two groups (P=0.132).

Table 1: Descriptive characteristics of the patients admitted to Covid-19 and non-Covid-19 wards

Variable		COVID-19	Non-COVID-19	P Value
Age (Mean ±SD]		5.3 ± 14.53	3.8 ± 17.53	0.11
Sex	Male	120	137	13.0
	Female	79	65	
Education	Less than a Bachelor's degree	99 (54.1 %)	147 (8.72 %)	<0.001
	Bachelor degree	57 (1.31 %)	49 (3.24 %)	
	Senior	22 (0.12 %)	5 (5.2 %)	
	PhD	5 (7.2 %)	1 (5.0 %)	

In total, 198 patients (49.5%) with COVID-19 and 202 (50.5%) Non-COVID-19 patients were considered in this study. The overall mean of trust in nurses in the COVID-19 group was not significantly different from that of the Non-COVID-19 group.

Most people in both COVID-19 (85.3%) and Non-COVID-19 (86.6%) groups reported that nurses were available, most of the time or always when they needed them.

Most patients in both COVID-19 (99.4%) and Non-COVID-19 (97.4%) groups believed that the nurse's activity was useful to them, most of the time or always. The mean usefulness of therapeutic activities in patients in general wards was 0.1 higher than in patients in COVID-19 wards but this difference was not significant (P>0.05).

Most patients in both COVID-19 (99%) and Non-COVID-19 (95%) groups believed that they trusted the care of nurses always. The average level of trust in medical care for patients in general wards was 0.1% lower than that of patients in COVID-19 wards. But the difference was not significant (P>0.05).

In the COVID-19 group, 93% of patients often or always followed the advice of the nurses, while in the Non-COVID-19 group, 96.5% of patients most of the time or always followed the statements and recommendations of the nurses. The mean rate of treatment of patients with therapeutic recommendations in general wards was significantly higher (0.4) than patients admitted to the COVID-19 ward (P<0.001).

In the COVID-19 group, most patients (71.8%) believed that most of the time, or always, nurses provided enough accurate information about their disease. While in the Non-COVID-19 group, about half of the patients (55%) believed that most of the time or always the nurses provided them with sufficient accurate information about their disease. The average amount of information required for patients in general wards was 0.3 less than for patients admitted to the COVID-19 ward. There was a significant difference in the amount of information required for patients in general wards and COVID-19.

Table 2: Descriptive values related to the trust variables of the patients admitted in the Covid-19 and non-covid-19 wards

Variable	COVID-19			Non-COVID-19		
	SD ± Min	Min	Max	SD ± Min	Min	Max
Responsibility for patient needs	4.6 ± 1.1	2	6	4.6 ± 1.1	2	6
The usefulness of therapeutic activities	8.2 ± 0.5	3	6	8.3 ± 0.5	1	6
Reliability of medical care	3.5 ± 8.0	3	6	2.5 ± 1.1	1	6
Following the recommendations	5±0.9	3	6	4.5±0.9	2	6
Patients' access to the necessary information	4.2± 1.3	1	6	3.9± 1.6	1	6
Satisfaction with the nurse	7.0 ± 9.4	2.6	6	7.0 ± 9.4	2.6	6
Satisfaction with the physicians	3.5±0.3	2.8	4.3	3.7±0.3	2.2	4.5

DISCUSSION

Patients' trust in nurses and physicians is important and at the same time complex phenomenon that to achieve it, some professional characteristics must be created and strengthened and some ethical principles must be observed [17]. In the study of patients' trust in nurses of Baqiyatallah Hospital, Tehran, Iran, we used the questionnaire of patients' trust (P=0.006). The results of the study assessing the patients' trust in the physicians showed that most patients participating in the study in both groups of COVID-19 (92.4%) and Non-COVID-19 (97.5%) had a high level of trust in physicians. Considering the mean difference, it can be said that the average trust in physicians in COVID-19 patients was significantly lower by 0.14 than in Non-COVID-19 patients (P<0.001).

Ravdin and Cabral nurses, which was validated by Nouripour et al [15]. This questionnaire had five questions, and in what follows, we will review the results obtained from the questions.

The level of responding to patients' needs and being available to them when needed, the level of use of treatment activities, and the level of trust in medical care in both general and COVID-19 wards were desirable. The rate of follow-up to treatment recommendations was favorable in both groups, but the mean rate of follow-up to treatment recommendations of patients in general wards was significantly higher than patients admitted to the COVID-19 ward. Studies have shown that there is a positive relationship between the level of trust in the nurses and the level of treatment adherence [18]. Trust in the health care specialist has been proposed as a basis for effective and basic treatments for patient-centered care [19-21]. However, the novelty of COVID-19 and the fact that there is still no definitive cure for the disease is a problem noted in the study by Baker [22]. The lack of definitive treatment and protocol for this disease and frequent changes in health protocols during this period may reflect scientific uncertainty; meanwhile, the uncertainty of scientific evidence reduces patients' trust to follow the recommendations of medical staff compared to other diseases and overshadows their treatment adherence.

In this study, the lowest level of trust was in the average amount of information required for patients, which had a lower score compared to other questions in the questionnaire, and the average amount of information required for patients in general wards was 0.3 less than patients in the COVID-19 ward. Nurses in both the COVID and general wards have the lowest level of patients' trust in providing the necessary information. In Ozaras and Abaan study, the use of medical terms or terms that the patient does not fully understand, the lack of anticipation or understanding of patients' information needs, and neglecting responsibilities and factors related to nursing work such as busyness, etc. have been mentioned as important causes in reducing the provision of the necessary information to patients [23]. It seems that to improve the provision of information to patients, some programs should be implemented in the hospital and the nursing department.

The level of patients' trust in physicians in COVID-19 wards was significantly lower than in Non-COVID-19 patients. Gupta et al. showed that the pandemic coronavirus disease 2019 (COVID-19) has posed new threats to the trust in medical staff [24]. Factors such as the high prevalence and involvement of doctors during the epidemic peaks, as well as the specific way of communicating with the patient (personal protective equipment and social distancing, etc.] and that the patient does not even know and see the face of the treating physician well, are involved in this issue [25]. Identifying the causes of this difference requires further study and investigation of the issue from different respective.

CONCLUSION

Trust in nurses and physicians in both COVID-19 and general wards was optimum. This finding indicates that during the COVID-19 pandemic, the medical staff worked tirelessly and despite the difficulties and complications of the pandemic, patients have high trust in physicians and nurses.

Acknowledgments
Researchers thank guidance and advice from the Clinical Research Development Unit of Baqiyatallah Hospital.

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