

Investigating the Effect of The Communication Skills of the Treatment Staff on the Endurance of Patients Through the Mediation of Work Ethics

Hassan Shahvaroughi Farahani *Phd Student in Educational Psychology, Islamic Azad University tabriz Branch, Iran*

Abstract

Article history:

Received: 29 Jan 2025
Accepted: 25 Mar 2025
Available online: 13 May 2025

Keywords:

Communication skills
Patient endurance
Work ethic
Treatment staff

Purpose: The purpose of the present study is to investigate the effect of the communication skills of the treatment staff on the endurance of patients through the mediation of work ethics. **Method:** This research is of the correlation type, and the statistical population of the research was the people working in medical-health and service centers in Tehran, 300 people were selected by simple random sampling method. The data collection tool is the standard work ethic questionnaire, mental toughness questionnaire (MTQ-48) and Barton Communication Skills Inventory (BCSI). In order to analyze the data, zero order correlation and multiple regression were used in hierarchical form. Findings: The research findings indicate that verbal and listening skills and feedback skills have a positive effect on patient endurance. Work ethic also mediates between patients' perseverance and verbal and listening skills of the communication skills of the treatment staff, but feedback skills only directly affect patients' perseverance and work ethic does not mediate for this component. **Conclusion:** having a positive view of communication skills from the treatment staff with higher work ethics can improve patient endurance.

Cite this article as: Shahvaroughi Farahani H. Investigating the Effect of The Communication Skills of the Treatment Staff on the Endurance of Patients Through the Mediation of Work Ethics. J Emerg Health Care. 2025;14(1):23. <https://doi.org/10.22034/14.1.23>.

Introduction

In recent years, chronic medical problems, which are long-term diseases, have become increasingly common. These chronic diseases cause physical changes in the body and limit the functions of the patient and are usually incurable and the treatment period is long and the recovery steps are difficult (1). Some people can cope with these challenges, but others are unable to cope with their problems and show low endurance. On the other hand, people who have high mental endurance have a great tendency to compete and despite the environmental stress, they do their best to succeed. They can prevent the entry of unwanted information

that creates obstacles in achieving their goals (2). Endurance is a learned skill. A skill that can help us endure more persistence in the path of our goals during mental and physical pressures. Energy and endurance help us to manage our goals and life in different situations and times (3).

Mental endurance is: the ability to deal with pressures and hardships, overcome obstacles and failures, focus on the goal, maintain and gain peace after failure, perform stably at high levels of competition and competitiveness. Also, mental endurance is a skill that empowers a person and makes them succeed in difficult and stressful situations (4). Researchers stated that

Correspondence:

Hassan Shahvaroughi Farahani
E-mail: hassanfarahani@hotmail.com



This work is licensed under a Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International (CC BY-NC-SA 4.0) which allows users to read, copy, distribute and make derivative works for non-commercial purposes from the material, as long as the author of the original work is cited properly.

mental toughness includes 4 elements of control, commitment, challenge and self-confidence. According to this model, people with high mental endurance consider negative experiences such as stress and anxiety as a challenge that they can overcome and believe that they have the ability to deal with negative experiences and control them and are committed to achieving their goals (5). The patient's mental endurance is based on effectively overcoming the pressure and severity of the disease so that the continuation of life is not affected by this stressful situation. One of the most important things that can improve the ability and mental endurance of patients is the way the treatment staff communicates with patients. How the communication and interaction between the treatment staff and the patient has played an effective role in patient satisfaction, treatment results, medical costs, clinical adequacy of the staff and even complaints from the treatment staff (6).

Communication skills are skills through which people can engage in interpersonal interactions and the communication process, that is, the process in which people share their information, thoughts and feelings through verbal and non-verbal exchange (7). In fact, communication skills are a set of purposeful behaviors related to the situation that are learnable and under the control of the individual, and include verbal communication skills (speaking and writing), non-verbal communication (vocal and non-vocal behaviors), Effective listening and giving feedback. The lack of emotional, psychological and social skills and abilities is one of the things that can make people vulnerable in the face of problems and expose them to the loss of public health (8). Therefore, communication skills have an effect on the mental health and endurance of patients. Communication skills can be seen as a means of learning behaviors that enable a person to create satisfactory relationships, receive positive responses from others, and make social life easier (9). This can be achieved not only through science, but also through correct ethical methods in the workplace.

Work ethic is explicitly defined as an individual difference that is described by a set of beliefs and behaviors that reflect the basic value of work and is especially considered as a personal variable (10). Work ethic expresses the feeling that a person has towards his job and profession, which in this case shapes his attitude and behavior. In other words, business ethics are the principles and standards that define right behavior and actions and distinguish them from wrong actions (11). Business ethics, as a branch of ethical knowledge, examines the ethical duties in a profession and its ethical issues, and in the definition of a profession, it is considered a certain activity that leads a person to a determined position with specific ethics (12). For this reason, it can be said that it is reasonable to predict the

endurance of patients through the communication perceptions of the treatment staff in the field of values and ethics in the work environment.

In their study, Timuri et al. (2023) investigated the communication skills of doctors and patients in predicting treatment compliance. Stepwise regression analysis showed that doctors' communication skills were a positive factor in medication adherence ($p < 0.001$, $\beta = 0.336$) and following medical orders ($p < 0.001$, $\beta = 0.137$). Also, patients' communication skills had a positive effect on medication adherence ($p = 0.01$, $\beta = 0.331$) and overall adherence to medical orders ($p < 0.001$, $\beta = 0.205$). The results of the study showed that the communication skill of doctors and patients is a positive predictor of compliance with medical and pharmaceutical orders after discharge from the hospital (13).

Hatami et al. (2023) investigated the effectiveness of communication skills training on flexibility, awareness of self-responsibility, and professional commitment of Arak dental students in relation to patients. The results showed that there is a significant difference between the average scores of the post-test of flexibility and self-responsibility of the experimental and control group students, and there is no significant difference in the variable of professional commitment. Based on the results, it can be said that teaching communication skills has an effect on students' flexibility and awareness of their own responsibility; Therefore, the interventional method of teaching communication skills, due to strengthening the mental ability to control unpleasant and inflexible thoughts, leads to mental flexibility and avoiding automatic thoughts and irrational cognitive distortions in the individual and fulfilling their student-career tasks positively strengthens (14).

Moslanjad and Abdollahi Far (2020) conducted a research entitled "Investigating the level of empathy with patients and its alignment with communication skills and compliance with professional ethics in Jahrom medical students: a pilot study in southern Iran". Based on the regression results, it was found that empathy can significantly predict communication skills. There was a significant relationship between empathy and some sub-domains of communication skills and then with indicators of professional ethics. Communication skills were also related to compliance with professional ethics (15).

Chatterjee & Kulaki (2015) showed in their research that communication systems play an effective role in reducing interpersonal conflicts (16).

Research method

This research is of the correlation type, and the statistical population of the research is made up of people working in medical-health and service centers in

Tehran, 300 people were selected by simple random sampling method. The research tools are:

- Questionnaire based on the standard work ethics questionnaire: this questionnaire measures work ethics through a 50-option index that measures the four dimensions of ethics which is designed based on the spectrum of five Likert options from strongly agree (5) to strongly disagree (1). The subscales of the mentioned questionnaire are attachment and interest in work, perseverance and seriousness in work, human relations in the workplace and collective spirit and participation in work. The mentioned questionnaire has been investigated in various studies in the country, including in a research, the reliability of the questionnaire was obtained based on Cronbach's alpha coefficient of 0.81 (17).

- Questionnaire based on Mental Tolerance Questionnaire (MTQ-48): This questionnaire has 48 statements and includes challenge, commitment, control and trust subscales. Each of the trust and control subscales consists of two factors (emotional control and life control, self-trust and interpersonal trust). Answers

are measured by a five-point Likert scale ranging from (1=completely agree) to (5=completely disagree). The sum of the scores of each subscale gives the score of the individual in that subscale and the sum of the scores of all the statements for the entire questionnaire and the score of mental endurance (18).

- Questionnaire prepared based on Barton's Communication Skills Inventory (BCSI): This questionnaire contains 18 items designed by Barton in 1990 and has verbal and listening skills subscales as well as feedback skills, each subscale includes has 6 questions. The scoring of this questionnaire is done on a five-point Likert scale from completely disagree (1) to completely agree (5). The range of scores for the entire questionnaire is between 18 and 90 and between 6 and 30 in each of the three skills. The higher the person's score, the higher the level of the person's communication skills. In the research of Safavi et al. (2016), the reliability of the entire questionnaire was 0.80 (19).

Table 2. Correlation matrix of studied variables

Variables	1	2	3	4
Verbal and listening skills	-			
Feedback skills	0.25**	-		
work ethic	0.30**	**0.13	-	
Endurance of patients	0.41**	*0.21	0.49**	-

*P< 0.05, ** P< 0.01

Table 3. Results of simultaneous hierarchical multiple regression

predictor variable	R	R2	F	P	B	t	P
The first step: the prediction rate of patients' endurance by communication skills							
Verbal and listening skills	0.43	0.19	0.5746	0.000	0.38	7.54	.000
feedback skills					0.10	2.24	0.01
The second stage: the degree of prediction of work ethic by communication skills							
Verbal and listening skills	0.30	0.10	20.034	0.000	0.27	4.89	
feedback skills					0.50	0.001	N.S.
The third stage: the predictive rate of patients' endurance by communication skills with work ethic control							
Verbal and listening skills	0.57	0.34	66.72	0.000	0.26	5.28	
feedback skills					0.90	2.20	0.03
work ethic					0.39	0.358	0.000

Findings

In order to investigate how the research variables are related, their zero order correlation was calculated. The results are presented in table number 2.

In order to answer the research question, i.e. to investigate the mediating role of work ethics in relation to the communication skills and endurance of patients, multiple regression was used in a simultaneous hierarchical manner according to the stages of Baron and Kenny (1998). Table 3 shows the results of this review.

In order to investigate the mediating role of work ethics in relation to the communication skills of the treatment staff, the path coefficients of verbal and listening skills and feedback skills from the first to the third stage were compared with the endurance of the patients. And by reducing the coefficients of the direct paths of verbal and listening skills on patients' endurance, work ethic was considered as a mediating variable of contribution between verbal and listening skills in the communication skills of the treatment staff and patients' endurance. The final results by removing

the paths that were not meaningful are shown in Figure 1.

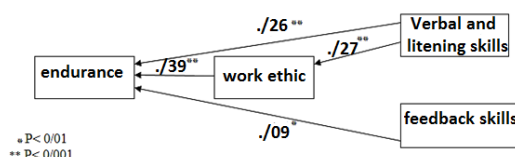


Figure 1. The final model of research

Discussion

The aim of the current research is to investigate the effect of the communication skills of the treatment staff on the endurance of patients through the mediation of work ethics. The research findings are presented as follows:

- After the simultaneous entry of influential variables in the analysis, verbal and listening skills and feedback skills have a positive effect on the endurance of patients.
- Work ethic mediates between patients' endurance and verbal and listening skills of communication skills, but feedback skills only directly affect patients' endurance, and work ethic does not mediate for this component.

Therapists and counselors describe the four stages of communication skills to people in full compliance with professional ethics:

1- In the interpretation stage, the counselor and the individual work together to identify and understand the person's unique relationships, to identify or reveal the people around them and their problems to the individual.

2- The next stage is the visualization stage in which a person discovers his goals, hopes and dreams for the future in interaction with the people around him.

3- The next stage is the communication stage in which people identify the methods through which they

can use the interaction with the people around them to achieve their goals.

4- The final stage is the stage of transformation in which the person identifies and welcomes new growth and changes and plans to continue living (8).

Conclusion

In explaining the findings of this research, it can be stated that having a positive view of communication skills can improve patient endurance. One of the concepts raised in communication skills is that a person can see the failures and hardships of his life as events that he was able to survive. Therefore, communication skills and highlighting one's abilities in dealing with others can help to improve patient endurance in people.

The communication skills of people with the obligation of professional ethics provide a change in the way of interaction from what is wrong to what is right. Instead of focusing on reducing patients' symptoms of impatience and weakness or correcting perceived personal weaknesses, a counselor uses communication skills to help people change the way they think about themselves and their lives (14). This approach helps a person to strengthen the endurance of patients by facing the realities of the lives of those around them and believing that they are capable of dealing with problems. Perseverance is an emotional force that directs the imagination toward positive things. Endurance gives people energy and equips a person. Endurance gives a person flexibility, vitality, and the ability to get rid of the blows that life imposes on him/her and increases life satisfaction (11).

The limitations of the research include the delay in the cooperation of some members of the statistical community in answering and the possibility of lack of honesty in people when answering. In order to carry out future researches, it is suggested that this research should be investigated for statistical societies in different work categories and its results should be compared.

References:

- [1] Mok J, Brown MJ, Akam EC, Morris MA. The lasting effects of resistance and endurance exercise interventions on breast cancer patient mental wellbeing and physical fitness. *Scientific Reports*. 2022 Mar 3;12(1):3504.
- [2] Dallaway N, Lucas S, Marks J, Ring C. Prior brain endurance training improves endurance exercise performance. *European Journal of Sport Science*. 2023 Jul 3;23(7):1269-78.
- [3] Alix-Fages C, Grgic J, Jiménez-Martínez P, Baz-Valle E, Balsalobre-Fernández C. Effects of mental fatigue on strength endurance: A systematic review and meta-analysis. *Motor control*. 2022 Dec 12;27(2):442-61.
- [4] Keshavarz Mohammadi R, Agha Bozorgi S, Shariat S, Hamidi M. The effectiveness of positive psychotherapy on mental endurance, self-compassion and resilience of infertile women. *Journal of Social Behavior and Community Health*. 2018 Nov 10;2(2):235-44.
- [5] Pourfahimi A, Khaneh Keshi A, Homayouni A. The Mediating Role of Mental Toughness in the Relationship between Mindfulness and Body Image Concern in Amputees. *Shafaye Khatam* 2023; 11 (4) :42-53.
- [6] Gutierrez-Puertas L, Marquez-Hernandez VV, Gutierrez-Puertas V, Granados-Gamez G, Aguilera-Manrique G.

Educational interventions for nursing students to develop communication skills with patients: a systematic review. *International journal of environmental research and public health*. 2020 Apr;17(7):2241.

[7] Ziaei F. The Effectiveness Of Emotional Interactions And Pre-Communication Skills In Social Skills Of Children With Autism Spectrum Disorder. *Int J Med Invest* 2021; 10 (4) :144-155.

[8] Arjmand S A. Predicting Emotional Divorce Based on Communication Beliefs and Ambivalence in Expressing Emotion. *Int J Med Invest* 2021; 10 (3) :111-121.

[9] Mata ÁN, de Azevedo KP, Braga LP, de Medeiros GC, de Oliveira Segundo VH, Bezerra IN, Pimenta ID, Nicolás IM, Piuevezam G. Training in communication skills for self-efficacy of health professionals: a systematic review. *Human resources for health*. 2021 Dec;19:1-9.

[10] Jia Y, Chen O, Xiao Z, Xiao J, Bian J, Jia H. Nurses' ethical challenges caring for people with COVID-19: a qualitative study. *Nursing ethics*. 2021 Feb;28(1):33-45.

[11] Turale S, Meechamnan C, Kunaviktikul W. Challenging times: ethics, nursing and the COVID-19 pandemic. *International nursing review*. 2020 Jun;67(2):164-7.

[12] Honarmand Jahromy F, Jahromy S A M. Examination of the Social Factors Affecting the Employees' Ethical Behavior in Jahrom University of Medical Sciences. *Int J Med Invest* 2020; 9 (4) :13-20.

[13] Timuri, Mohaddeseh, Akbarzadeh Pasha, Abazar, Yadullahpour, Mohammad Hadi, Qolizadeh Pasha, Abdur Rahim, Khafri, Soraya, Faramarzi, Mahbubeh. (2023). The role of doctor-patient communication skills in predicting

treatment adherence, *scientific journal of Babol University of Medical Sciences*, 25 (1), 195-203.

[14] Hatami, Atiyeh, Ramezani, Khosro, Mardpour, Alireza. (2023). The effectiveness of communication skills training on flexibility, awareness of self-responsibility and professional commitment of Arak dental students in relation to patients, *Knowledge and Research in Applied Psychology*, 24(2), 133-146.

[15] Mosallinejad, Leila, and Abdulahi Far, Saeed. (2020). Investigating the level of empathy with patients and its alignment with communication skills and compliance with professional ethics in Jahrom medical students: a pilot study in southern Iran. *Future of Medical Education Journal*, 10(1), 28-33.

[16] Chatterjee, A., & Kulaki, A. (2015). A study on the impact of communication system on interpersonal conflict. *Procedia – Social and Behavioral Sciences*, 210, 320-329.

[17] Moharramzadeh, Mehrdad, and Fattahi, Hoshir. (2018). The relationship between work ethics and organizational entrepreneurship. *Ethics in Science and Technology*, 13(3), 116-122.

18[Khayat Sarkar, Fatemeh, and Shirazi, Mahmood. (2017). The effectiveness of cognitive behavioral therapy on mental endurance and life expectancy in multiple sclerosis patients. *Medical School Journal*, 75(8), 593-599.

[19] Monhaser, Roqeyeh. (2023). The effectiveness of cognitive behavioral therapy on couples' communication skills, *Journal of Horine Psychology*, 1(1), 28-32.