

Health Beliefs Related to Salt-Restricted Diet in Patients with End-Stage Renal Disease



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INTRODUCTION

Health beliefs are an important factor that may affect adherence to diet. Definition of health beliefs related to adherence to diet is helpful in terms of building ordered interventions toward the patients to alter their beliefs and maintain adherence.¹ It has been reported that the health belief model (HBM) is effective in improving diet adherence. This model is used to develop and maintain healthy behaviors.^{2,3} The health beliefs builds ‘perceived benefits’ and ‘perceived barriers’ have tested especially beneficial in adherence literature to date, due to their potentially replaceable nature upon which interventions could be improved.^{1,2}

Thus, to comprehend and/or modify behaviour in patients who are considered non-adherent; the HBM builds of perceived benefits and perceived barriers reinforcement investigators predictive capability in this field.² Efficient in changing health behaviors and providing adherence with health-promoting activities are important interventions based on this model.¹⁻³ However, there is limited information about the health beliefs and adherence of hemodialysis patients with their treatment and diet. In this study, it is focused on the perceived benefits and barriers of the behavior while evaluating patients’ beliefs concerning adherence to health beliefs related to salt-restricted diet.

PURPOSE

The purpose of this study is to examine the health beliefs related to salt-restricted diet and some related factors in hemodialysis patients.

Methods: The sample of this study is composed of 215 hemodialysis patients in two hemodialysis units of Sivas. A descriptive, correlational design was employed. The data were collected by a Patient Information Form and Beliefs about Dietary Compliance Scale (BDCS). The statistical analyses were conducted using the SPSS for Windows version 22.0 statistical software. Descriptive statistics (means, medians, standard deviations, frequency distributions, percentages) were computed.

The study was approved by the research Ethics Committee of the Cumhuriyet University Hospital. Informed consent was provided by all patient participants prior to entry into the study.

Results: The mean age of the study group was 51.3 years ($SD = 14.8$) and the average duration of dialysis of the respondents was 56 ± 38 months, ranging from 4 – 57 months. The majority of the participants were male (58.1%), were married (85.6 %), had completed primary education (51.2%), and were not working (67.4%). About half of the participants (72.1%) had a comorbid condition.

Table 1: Some Characteristics of HD Patients

Features	
Mean age of the study group; mean (SD)	51.3 years ($SD = 14.8$)
Gender; n(%)	
Male	125(58.1)
Female	90(41.9)
Marital status; n(%)	
Married	184(85.6)
Single	31(14.4)
Education level; n(%)	
literate	32 (14.9)
Primary School	110 (51.2)
Secondary School-High School	52 (24.1)
Colleague or University	21 (9.8)
Employment status	
Employment	70 (32.6)
Unemployed	145(67.4)
Comorbid diseases	
Yes	138 (64.2)
No	77 (35.8)
Average duration of dialysis of the respondents; months (SD)	56 ($SD=38$) months, ranging from 4 – 57 months.

Table 2: The mean, standard deviation and minimum-maximum values of the Beliefs about Dietary Compliance Scale.

Beliefs about Dietary Compliance Scale	M (SD)	Min-maximum (midpoint)
Perceived benefits score of the patients	25.0 ($SD = 4.0$)	7-35 (21)
Perceived barriers score	18.6 ($SD = 3.2$).	5-25 (15)

Table 3. The relationship between some characteristics of HD patients and Beliefs about Dietary Compliance Scale

Variable	Perceived Benefits Mean (SD)	p	Perceived Barriers Mean (SD)	p
Gender				
Female	28.9 (3.5)	0.168	12.8 (2.8)	0.624
Male	27.7 (4.2)		12.9 (3.9)	
Marital status				
Married	28.2 (4.6)	0.957	12.6 (3.1)	0.142
Unmarried	27.9 (3.3)		13.4 (4.1)	
Education level				
Literate	26.2 (3.8)	0.618	13.0 (3.4)	0.478
Primary School	26.9 (4.0)		12.5 (3.1)	
Secondary-High School	27.1 (3.9)		12.4 (3.6)	
Colleague or University	27.3 (4.2)		12.0 (3.2)	
Employment status				
Employment	27.3(6.4)	0.323	12.8 (3.6)	0.078
Unemployed	26.8(5.7)		12.9(3.2)	
Duration of dialysis				
<5 years	26.8 (3.8)	< .001	13.6 (3.8)	.004
≥5 years	29.7 (3.5)		11.9 (3.0)	

The mean perceived benefits score of the patients was 25.0 ($SD = 4.0$). The mean perceived barriers score was 18.6 ($SD 3.2$) (Table 2). The most frequently identified benefit was “Eating a low-salt diet keeps me healthy”, and the majority of the participants identified barrier was the poor taste of food on a low-salt diet.

Perceived benefits score of married patients was higher than single. On the other hand, the perceived benefits score of the patients with high education level was found to be high and the perceived barriers score was low. There is a significant relationship between the duration of dialysis and the perceived benefits - perceived barriers scores of the patients (Table 3).

CONCLUSION

The mean perceived barriers score is relatively below the midpoint of this subscale. Thus, this results shows that the patients perceive a moderate level of barriers while restricting salt in their diet. Besides these findings provide important findings to nurses about the care of hemodialysis patients. Knowing the health beliefs and the affecting factors will improve the patient's adherence. Continuous education about the need for a salt-free diet for HD patients can reduce the barrier perception.



REFERENCES

- Walsh E, Lehane E. (2011). An exploration of the relationship between adherence with dietary sodium restrictions and health beliefs regarding these restrictions in Irish patients receiving haemodialysis for end-stage renal disease. *Journal of Clinical Nursing*, 20(3-4), 331-340.
- Janz NK, Champion VL & Strecher VJ. (2002). The Health Belief Model. In K. Glanz BK. Rimer & F. M. Lewis (Eds.), *Health behavior and health education* (pp. 45-63). San Francisco, CA: Jossey-Bass.
- Kara B. (2014). Health Beliefs Related to Salt-Restricted Diet in Patients on Hemodialysis: Psychometric Evaluation of the Turkish Version of the Beliefs About Dietary Compliance Scale. *Journal of Transcultural Nursing*, 25(3) 256-264.