Study on the Effect of Improving Awareness of Disease Knowledge on Treatment in Patients with Chronic Kidney Disease

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Abstract: Objective To investigate the effect of improving the knowledge of chronic kidney disease (chronic kidney disease,CKD) on the therapeutic effect.Methods 160 CKD patients were selected from July 2016 to December 2017 in Anci District Hospital of Langfang City, and all patients were investigated CKD knowledge awareness rate.Results The awareness rate of CKD knowledge was relatively low among all patients ,70.6% were not qualified, the behavior of following doctor's advice was better than before intervention (P<0.05), the hospitalization time, hospitalization cost and incidence of cardiovascular and cerebrovascular diseases were lower than before intervention (P<0.05).Conclusion improving the awareness rate of disease knowledge in CKD patients can help to shorten the hospitalization time, reduce the medical expenses, reduce the occurrence of adverse events, and improve the quality of life of patients effectively. It is beneficial to clinical application and promotion.

1. Introduction

Due to the improvement of living standard and the change of life style, the incidence of chronic kidney disease (chronic kidney disease,CKD) patients has gradually increased in recent years, especially the end-stage nephropathy caused by chronic kidney disease, which seriously affects the quality of life of patients. At the same time, its high medical costs to their families and society caused a heavy economic burden^[1-2]There is no fully effective treatment for CKD patients with a clinical syndrome caused mainly by multiple causes of renal function injury. Early detection and early intervention can effectively prevent the deterioration of CKD patients^[3]Although CKD is a common and frequently-occurring disease, most patients have insufficient knowledge of the disease, and the overall awareness of the disease knowledge is relatively low, which makes it easy to delay treatment and accelerate the progress of the disease^[4-5]. In this study, the author investigated and analyzed the disease awareness rate of CKD patients, and then discussed the effect on the treatment effect. The report is as follows:

2. Information and Methods

General data selected 160 CKD patients from July 2016 to December 2017 in Anzi District Hospital of Langfang City, 102 men, 58 women, Age 42-80, Average age (56.23 ± 9.25) years; Course 1-8 years, average course of disease (3.23 ± 1.48) years. Inclusion criteria :(1) all patients diagnosed clinically meet the relevant diagnostic criteria of the CKD; (2) Patients were informed and volunteered to join the study. Exclusion criteria :(1) severe dysfunction of heart, liver and kidney; (2) Patients with mental illness or cognitive impairment can not cooperate with the researcher; (4) Persons suffering from immune or infectious diseases.

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2.1 Method

all patients CKD knowledge awareness rate survey: specifically: using nephropathy experts combined with many years of clinical experience to design their own CKD knowledge questionnaire, The basic contents of the survey mainly include :(1) the sex, age, occupation and education of the patients; (2) CKD related knowledge, It mainly includes the causes and clinical manifestations of the disease, Related diagnosis, preventive measures and health education, 50 questions, All topics are single topics, Got two points right, The total score is 100, 75 qualified. After the patient is explained in detail by the special nursing staff, By the patient according to their own actual situation to fill in, In this study, 160 questionnaires were distributed ,160 questionnaires were collected, The recovery rate is 100.

effective intervention was carried out on the basis of CKD patients' knowledge of disease. The specific measures were as follows :(1) issuing health manuals on disease knowledge to patients after admission, and explaining them by nursing staff. To promote the patient to understand and master accurately, explain the patient in detail according to the relevant matters. (2) According to the importance of the test indicators, the patient is advised to be aware of the test indicators that require long-term testing and to be able to remain in the normal range, and to be able to review them regularly and in a timely manner so as to have a detailed understanding of his condition and development. (3) Dietary guidance is provided to patients to control their daily protein intake and to supplement their energy so that they can develop a specific diet plan and inform the patients and their families in detail so that the patients can accurately understand the daily diet. (4) Medication guidance, effective guidance for patients to take drugs, and strictly follow the doctor's instructions to take, in case of allergies and other adverse reactions should inform the doctor. (5) Teach patients to be able to effectively regulate their own bad emotions, and encourage patients to actively communicate and communicate with their families, to guide patients to participate in appropriate exercise, such as walking, and to increase the amount of exercise according to their physical condition.

2.2 Observation Indicators

observe and record the patient's compliance behavior before and after the intervention, including regular medication, reasonable diet, smoking cessation and abstinence, and proper exercise.

observe and record the treatment effect of the patients before and after the intervention, including the hospitalization time, the cost of hospitalization and the incidence of cerebrovascular adverse events in the heart for 2 years.

The quality of life of patients before and after 1.3.3 intervention was compared, and the health questionnaire (Chinese version SF-36 scale) was used to evaluate the quality of life of patients before and after intervention. It mainly includes mental health, physical pain, social, emotional and physiological functions. The higher the score, the better the living condition.

Statistical data processing: the SPSS18.0 software package is used for statistical processing of relevant data, the measurement data is expressed by (±s), the mean of the two samples is compared by the t test of two independent samples, and the counting data is expressed by the number of cases or percentage, and the chi-square test is used for statistical processing, P<0.05 is statistically significant. \bar{x}

3. Results

3.1 Findings Ckd All Patients with Relevant Knowledge

3.1.1 Basic Information on All Respondents, See Table 1

Table 1 Basic Questionnaire For Ckd Patients

Essential information		Number of questionnairesn(%)	
Sexual distinction	man	102 (63.8)	
	woman	58 (36.2)	

Age (years)	≤ 60	107 (66.9)
	>60	53 (33.1)
Degree of education	Lower secondary	93 (58.1)
	Senior middle school	52 (32.5)
	College or above	15 (9.4)
Occupation(medical relevance)	Yes	3 (1.9)
	NO	157 (98.1)
Course (years)	<3	67 (41.9)
	3-7	91 (56.9)
	≥ 8	2 (1.2)

3.1.2 The Scores of All Respondents Ckd the Relevant Knowledge Questionnaire (n=160), as Shown in Table 2

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Total score	Scores	Average score (points,	(%) score
(sub)	(points)	x±s) –	index
20	10~20	16.0±2.2	80.0
12	2~12	7.8±2.5	65.0
22	8~20	15.4±2.9	70.0
16	6~16	11.1±2.4	69.4
30	14~28	21.9±3.4	73.0
	Total score (sub) 20 12 22 16 30	Total score Scores (sub) (points) 20 10~20 12 2~12 22 8~20 16 6~16 30 14~28	Total score (sub) Scores (points) Average score (points, $x\pm s$) 20 10~20 16.0 ± 2.2 12 2~12 7.8 ± 2.5 22 8~20 15.4 ± 2.9 16 6~16 11.1 ± 2.4 30 14~28 21.9 ± 3.4

Table 2 Ckd Patients' Knowledge Questionnaire Score

3.1.3 Awareness Rate Ckd All Patients

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The questionnaire survey showed that :113 patients with less than 75 points ,76-90 points 31 cases, more than 90 points 16 cases, the average score (72.18 ± 10.71) points, non-qualified 70.63, all patients CKD the awareness rate of relevant knowledge is relatively low.

3.2 Comparison of the Behaviors of Patients Following Doctor's Advice Before and after Intervention

After intervention, the behavior of following doctor's instructions was better than that before intervention (P<0.05), as shown in Table 3.

Table 3 Comparison of Compliance Behavior of All Patients Before and after Intervention

(Cases,%)

Group	Regular administration	Reasonable diet	Quit smoking and quit	Proper exercise
After intervention	148(92.50)	146(91.25)	142(88.75)	130(81.25)
Pre-intervention	103(64.38)	94(58.75)	76(47.50)	83(51.88)
X ²	8.923	9.079	11.206	9.743
Р	<0.05	< 0.05	< 0.05	< 0.05

3.3 Comparison of Treatment Effects Before and after Intervention

For patients after intervention, the hospitalization time, hospitalization expenses and the incidence of cerebrovascular disease after 2 years follow-up were lower than those before intervention (P<0.05), see Table 4.

Table 4 .Comparison Of Therapeutic Effects of All Patients Before and after Intervention

(X±S)			
Group	Hospitalization time (d)	Hospitalexpenses (RMB)	Cardiovascular and
			Cerebrovascular Diseases
			Incidence (%)
Pre-intervention	17.7±2.1	3709.5±180.4	44(27.5)
After intervention	12.8±1.4	3308.1±138.9	26(16.3)
X^2	11.037	14.982	5.814
Р	<0.05	<0.05	< 0.05

3.4 Comparison of Quality of Life Scores Before and after Intervention

After intervention, the quality of life scores were higher than those before intervention (P<0.05), as shown in Table 5.

$(\Lambda \pm 3)$							
Group	Number	Mental	Social	Emotional	Physiological	Physical	Overall
	of cases	health	function	functions	functions	pain	health
Pre-intervention	160	58.2±8.3	61.5±6.2	38.2±6.1	55.3±6.0	66.2±9.1	59.0±8.6
After intervention	160	67.7±7.6	79.1±5.7	61.0±5.6	79.3±8.7	79.0±8.6	72.3±6.9
Т	/	12.813	11.437	15.092	14.716	13.628	14.119
Р	/	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05

Table 5 Comparison of Quality of Life Scores for All Patients Before and after Intervention

4. Discussion

(x+s)

CKD is a common chronic non-infective disease in clinic, and it has irreversible characteristics. If it is not treated in time and effectively, it will lead to further development and deterioration of the disease, which will have a serious impact on the physical and mental health of the patients^[6]. In this study, CKD knowledge awareness rate was relatively low among all patients, with 70.6% failing. Because the awareness rate of disease related knowledge in CKD patients is relatively low, there are bad behaviors such as not following the doctor's instructions in the course of treatment, which leads to the deterioration of the condition and even the development of end-stage kidney disease, which endangers the life safety of the patients^[7-8]As a result, raising awareness of disease-related knowledge among patients with CKD has a positive effect on improving therapeutic effectiveness^[9-10]As community reform continues to deepen and advance, we should step by step strengthen the dissemination of community CKD patient-related knowledge. Kidney damage is a relatively long process, because its clinical signs and symptoms are relatively lacking, so it is very important to strengthen the publicity of relevant knowledge, so that patients can understand and master the relevant knowledge of CKD and daily attention, reduce the incidence of complications, delay the progress of disease, reduce the incidence of end-stage renal disease and disability, mortality, reduce medical costs is of great significance^[11-13].

According to this study, the behavior of following doctor's advice after intervention was better than that before intervention (P<0.05), and the hospitalization time, hospitalization cost and the incidence of cerebrovascular disease after 2 years follow-up were lower than those before intervention (P < 0.05). It can be seen that targeted health education for CKD patients can promote the behavior of patients according to doctor's instructions, shorten the hospitalization time of patients, reduce the cost of hospitalization, and improve the therapeutic effect significantly, which is beneficial to the prognosis of patients. Doing a good job of popularizing the knowledge related to the disease of CKD patients can promote the patients to understand the causes of the disease accurately, the accurate treatment plan and nursing measures, etc. In addition, the actual condition of the patients should be analyzed and the communication and communication with the patients and their families should be strengthened^[13-14]Through the use of easy-to-understand language to communicate with patients, so that patients can more accurately grasp the disease-related knowledge, at the same time timely answer to the patient's questions, to deepen the patient's understanding, easy to master^[15]By comparing the quality of life score before and after intervention, the quality of life score after intervention was higher than that before intervention (P<0.05). From this, targeted health education for CKD patients will help to improve the quality of life of patients and promote their physical and mental health.

5. Conclusion

To sum up, improving the awareness rate of disease knowledge among CKD patients can help to shorten the hospitalization time, reduce the medical expenses, reduce the occurrence of adverse events, and improve the quality of life of patients effectively. It is beneficial to clinical application and promotion.

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