



## Ways for people on hemodialysis to deal with stressors: a literature review

*Modos de enfrentamento dos estressores de pessoas em tratamento hemodialítico: revisão integrativa da literatura*

*Modos de enfrentamento de los estresores de personas en tratamiento hemodialítico: revisión integrativa de la literatura*

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### ABSTRACT

An integrative literature review was performed with the purpose to synthesize the contribution brought by research on the ways that people on hemodialysis deal with the treatment. Through a bibliographic review, 12 articles were identified, which composed the study sample. The results point out that problem-focused coping are the most used and that depression was positively correlated with the forms of emotion-focused coping for people on hemodialysis. The identification of the forms of dealing with the treatment is valuable information to plan treatments individually so as to control the stressors inherent to the disease and to hemodialysis, thus supporting the patient toward a better adaptation to the therapeutic regimen.

**Keywords:** Adaptation, psychological; Renal dialysis; Renal insufficiency, chronic; Research

### RESUMO

Foi realizada uma revisão integrativa da literatura com o objetivo de sintetizar a contribuição das pesquisas realizadas sobre os modos de enfrentamento das pessoas em tratamento hemodialítico. Através do levantamento bibliográfico foram identificados 12 artigos que compuseram a amostra do estudo. Os resultados apontam que os modos de enfrentamento focados no problema são mais utilizados e que a depressão se correlacionou positivamente com os modos de enfrentamento focados na emoção para pessoas em tratamento hemodialítico. A identificação dos modos de enfrentamento é informação valiosa para planejar o tratamento individualizado que proporcione controle dos estressores inerentes a doença e ao tratamento hemodialítico, subsidiando melhor adaptação do paciente ao regime terapêutico.

**Descritores:** Adaptação psicológica; Diálise renal/psicologia; Insuficiência renal crônica; Pesquisa

### RESUMEN

Fue realizada una revisión integrativa de la literatura con el objetivo de sintetizar la contribución de las investigaciones llevadas a cabo en relación a los modos de enfrentamiento de las personas en tratamiento hemodialítico. El levantamiento bibliográfico permitió la identificación de 12 artículos que conformaron la muestra del estudio. Los resultados señalaron que los modos de enfrentamiento centrados en el problema son más utilizados y que la depresión se correlacionó positivamente con los modos de enfrentamiento enfocados en la emoción para personas en tratamiento hemodialítico. La identificación de los modos de enfrentamiento constituye información valiosa para planificar el tratamiento individualizado que proporcione control de los estresores inherentes a la enfermedad y al tratamiento hemodialítico, favoreciendo una mejor adaptación del paciente al régimen terapéutico.

**Descriptores:** Adaptación psicológica; Diálisis renal/psicología; Insuficiencia renal crónica; Investigación

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## INTRODUCTION

The concept of stress is complex and was introduced in biological sciences in the 1930s by the Austrian physiologist Hans Selye. Stress is a state manifested by a specific syndrome, consisting of unspecific changes produced in a biological system. It can be divided in three phases: alarm (recognizing the stressor), adaptation (repair of the physical damage caused by the stressor), and exhaustion (overload, if maintained in the stressful situation)<sup>(1)</sup>.

Stress has been approached in psychology, emphasizing the stressors, which are situations that require adaptation, and originate out of the organism like a demand of something or someone, internal like self-expectations, or, yet, situations that irritate, scare, excite, confuse, or even those that cause extreme happiness<sup>(2)</sup>.

Among the stressors, the chronic health conditions, besides being stressful situation, they are sources of various stressors, including treatment regimen, changes in lifestyle, physical energy, and personal appearance. The stressors are dealt with according to the meaning that they have to those involved, and the health of the people with a chronic disease depends on the result from that coping process<sup>(3)</sup>.

In the theory of stress and coping, it is estimated that the latter reduces the effects of the former and contributes with the adaptive process. Coping is defined based on the individual's assessment of the stressor, and this depends on the relation between the individuals and the environment<sup>(2)</sup>.

The coping process has two important functions: regulate one's emotional responses to the stressful events, which is emotion-focused coping; and control or change the problem that caused the distress (negative stress), which is problem-focused coping<sup>(4)</sup>. Ferraz<sup>(5)</sup> refers to the effectiveness of the coping patterns affirming that is a threat is resolved, the coping strategy will be used again in similar situations, and this will be the effective coping. If the threatening situation is not effectively managed, the ineffective coping can result in a crisis that, unresolved, can cause a physiological and psychological unbalance<sup>(6)</sup>.

Patients with chronic renal insufficiency (CRI), which is a chronic non-transmissible disease, experience intense emotional stress, caused by the changes in their lives. Studies addressing stress and the forms of coping used by people on hemodialysis state that the most reported stressors are the restriction of foods and beverages, muscle cramps, uncertainties about the future, interferences at work, changes in the family structure, the fear of staying alone, and sleep disorders<sup>(7)</sup>.

According to the Brazilian Nephrology Society, there are 64.306 people with CRT on hemodialysis in the country<sup>(8)</sup>. This high number implies there is a need to identify how these people deal with stress, which could favor their adaption to the disease and treatment. To

research the contribution of the studies about the ways that people on hemodialysis cope with stress, the authors chose to use the method of integrative literature review. This strategy is used to identify the existing evidence, basing health care practice on the different specialties<sup>(9)</sup>.

The integrative review is one of the instruments of the "Evidence-based Practice", which is defined as the care guided by research results, consensus from specialists, or a combination of both. This approach contributes with the decision-making process in health care to people on hemodialysis, considering the types of coping they use<sup>(10)</sup>.

## OBJECTIVES

### General:

To synthesize the contribution of the studies about the forms of coping used by the people on hemodialysis.

### Specific:

- To perform a survey of the scientific publication about the forms of coping used by people on hemodialysis;
- To identify the types of studies, methodological procedures used, and the consistency with the objectives;
- Perform a descriptive analysis of the results of the produced studies.

## METHODS

The process of elaborating the integrative review should follow six stages: select the hypotheses or questions for the review; select the studies that will compose the review sample; define the primary research characteristics that compose the review sample; analyze the findings of the articles included in the review; interpret the results; and report the review, providing a critical examination of the findings<sup>(11)</sup>.

In this integrative review, the following stages were followed: establishing the hypotheses and review objectives; establishing the inclusion criteria for articles; definition of the information to be extracted from the selected studies; selection of the articles; result analysis; discussion of the findings, and presentation of the review.

The guiding question of this integrative review was: What knowledge has been produced, from the performed studies, about the ways that people on hemodialysis deal with the treatment?

The identification of the study object in national and international publications was performed using online databases.

The study included all the articles about forms of coping in people on hemodialysis available in the national

and international literature, from January 1<sup>st</sup> 1980 to April 30<sup>th</sup> 2007, and indexed in National Library of Medicine (Pubmed) Cumulative Index to Nursing and Allied Health Literature (CINAHL), and Literatura Latino-Americana de Ciências da Saúde (Lilacs).

However, for the appropriate refining of the research, a sample was established, according to the following inclusion criteria:

- Articles in Portuguese, English, or Spanish with abstracts available in the abovementioned databases from January 1<sup>st</sup> 1980 to April 30<sup>th</sup> 2007;
- Articles indexed by the mesh/desc terms: diálise renal/ renal dialysis/ adaptação psicológica/ psychological adaptation/ coping/ hemodialysis;
- Articles that addressed the theme forms of coping associated with the stress in hemodialysis in any ambit, in an adult population (18 years or more);
- Articles that used some methodological criterion.

The strategies used to locate the articles were adapted to each database, according to their access specificities, guided by the question and the inclusion criteria. During the selection, some articles were excluded after reading the abstracts, as they did not fit the proposed inclusion criteria. Other were selected and then excluded after reading the full text, also because they were not in agreement with the previously established criteria. The mesh/decs descriptors used for the search on Pubmed and Lilacs databases were diálise renal; renal dialysis; adaptação psicológica and psychological adaptation. The terms coping and hemodialysis were used for searches on CINAHL, since the mesh/decs descriptors were still in the adaptation stage in this database.

The computerized search was initiated in the Lilacs database. For the term diálise renal, 1327 articles were located; with the terms diálise renal and adaptação psicológica, one article was found and later excluded because it did not address the coping patterns and did not have a methodological criteria.

In Pubmed, 2718 articles were located using the term renal dialysis. When the term psychological adaptation was added, 64 articles were identified; after evaluating the abstracts, it was found that 14 articles met the criteria, and after reading the full texts, eight articles were selected to compose the final sample.

On CINAHL, which has free access, controlled by IP (allowed in universities), through the website [www.capes.gov.br](http://www.capes.gov.br), using the term hemodialysis, 369 indexed articles were found. With the terms hemodialysis and coping, eight articles were identified. After evaluating the abstracts, six articles met the criteria, and after reading the full-texts, five were included in the final sample of this review. One article was indexed in the two studied databases. Therefore, the sample consisted of 12 articles extracted from CINAHL and Pubmed.

To collect the data from the articles included in the integrative review, an instrument was created based on the review protocol by Polit, Beck, and Hungler<sup>(12)</sup>, and the original terms in English citation and interventions were replaced by the Portuguese words procedimentos metodológicos (methodological procedures) and conclusões/considerações finais (conclusions/final considerations). The data collection instrument was subjected to apparent and content validation by three experienced referees, and all their suggestions were complied with. The instrument contains the following data: study title, year, authors, serial of publication, type of analysis used in the study (qualitative, quantitative, or both), study outline, keywords, place where the study was developed, article objectives, studied variables, studied subjects, findings, and the study's conclusion/final considerations.

The data were analyzed, according to its contents, through descriptive statistics and regarding the relation between the data and the object of each study.

After the reading, the articles and instruments were fixated, organized in a folder, and categorized numerically by year of publication.

Data analysis and the synthesis of the articles were done using Chart addressing the following aspects: study title, author, serial, year of publication, objectives, methodology, type of study, outline, variables, place of study, subjects, results, and conclusion.

## RESULTS

In the present integrative review, 12 articles met the previously established inclusion criteria and were thus analyzed. Of the selected studies, 30% were produced in the USA, 30% in Japan, 10% in Australia, 10% in England, and 10% in Scandinavia. This shows that developed countries are more concerned with this issue. No studies performed in Brazil, addressing the proposed theme, were found.

Only one of the articles was developed in a hospital. The others were performed in a multicentre fashion, in satellite nephrology units.

Chart 1, below, shows a general view of the analyzed articles.

Among the 12 articles presented, eight were written by nurses and the others by physicians<sup>(7,13-23)</sup>.

Regarding the type of serial, eight were published in nursing serials, of which one article was published in a nephrology nursing journal, one in a behavior medicine journal, one in a psychosomatic research journal, one in a care sciences journal, and one article was published in an occupational health journal.

The studied population in the selected articles totals 1584 subjects who met the inclusion criteria proposed in the studies. However, not every article specified their inclusion criteria.

**Chart 1** - Identification of the articles and analysis, according to the outline, objectives, methodological procedures and results.

Title	Author (s) and objectives	Studied population	Study outline	Methodology	Results
1. Stress identification and coping patterns in patients on hemodialysis	Baldree SK, Murphy SP, Powers MJ (7) - to develop and test an instrument to assess the incidence of stress in patients; - to determine the commonly used coping patterns; - to select the treatment associated with stress; - To explore the relationships between the treatment and the stressors and the coping patterns of patients on hemodialysis.	38 patients on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Instrument construction and validation. Data collection using forms. Data analysis was performed through descriptive statistics and by performing the tests chi-square and T-test.	The restriction of liquids was the major stressor reported. The mean psychosocial stressors (56.1) were greater than that of physiological stressors (15.2). No correlations were found between stressors and sociodemographic characteristics (gender, age, marital status, or education); No correlations were found between program time and stressors, but patients with 13 to 36 and those with more than 48 months of treatment on dialysis reported more stressors than those with less than 12 months.
2. Stressors, coping mechanisms and quality of life among dialysis patients in Australia	LOK P.(13)  To investigate the Quality of Life (QL) of patients on dialysis (hemodialysis and continuous ambulatory peritoneal dialysis -CAPD) and compare the relations between the different stressors and coping patterns.	8 patients on CAPD and 56 on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Data collection using forms. Analysis of internal consistency of the instruments was calculated using Cronbach's $\alpha$ , and correlation coefficients were calculated between the variables, besides the descriptive statistical analysis.	Psychosocial stressors were the most commonly reported by the patients on HD and CAPD. The coping patterns mostly used by patients on HD were: problem-focused having an objective view of the problem, accept the situation as it is, try to keep control over the situation; emotion-focused change things, expect the best, become disappointed; The coping patterns that CAPD patients most used were: problem-focused - try to keep control over the situation, have an objective view of the problem. Emotion-focused - change things, expect the best, assign meaning to the problem, pray
3. Psychosocial adjustment of males on three types of dialysis	Courts NF, Boyette BG.(14)  Study anxiety, depression, and psychosocial adjustment to the disease in patients on the three forms of dialysis (hemodialysis at home, hemodialysis at dialysis services, and CAPD) and identify the perception of the stressors by patients on hemodialysis at home and at dialysis centers.	5 patients on CAPD, 5 on home dialysis, and 5 on hemodialysis at specialized services	Non-experimental, comparative, descriptive, prospective, quantitative	A semi-structured interview was performed with the selected patients about demographic data, in addition to the data collection through forms. The analysis was performed using ANOVA.	Patients on HD at home presented the lowest scores for anxiety and patients on CAPD had the highest; High scores for depression were found in patients on HD at the services, and the best means for depression were found in patients on HD at home; Patients on HD at services identified a much greater number of stressors than those on HD at home.
4. Coping strategies and quality of life among patients on hemodialysis and continuous ambulatory peritoneal dialysis	Lindqvist R, Carlsson M, Sjöden PO. (15) To study the relationships between the perception of the effectiveness of coping patterns and quality of life, comparing the results in patients on hemodialysis in the present study with the results of patients on CAPD from a previous study, performed by the same authors the year before.	30 patients on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Data collection using forms. Results analysis and comparison with another study. The analysis was based on descriptive statistics, T-test, and calculating Pearson's correlation coefficient.	The least used style, which was also considered the least effective, was affective coping; Compared to women, men from both groups presented higher scores for coping associated to the physical aspects of the disease; high scores of the quality of life scale were seen for the satisfaction in family and conjugal life in both groups; Sexual function had low scores in both samples, however, it was better in the CAPD group; Women had low scores associated to general health; For the group on HD, evasive coping strategies showed negative correlation with efficiency in managing the disease (psychological, social, and existential); Patients on HD experienced better physical health and patients on CAPD better emotional health.

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Title	Author (s) and objectives	Studied population	Study outline	Methodology	Results
5. Stressors and coping methods among chronic hemodialysis patients in Hong Kong	Mok E, Tam B. (16) To study the stressors and coping parameters of Chinese patients in Hong Kong and compare the results with that of other countries. - The dialysis time affects the coping parameters.	50 patients on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Data collection through forms. Analysis was based on descriptive statistics, Pearson's correlation coefficient and ANOVA.	The mean score for psychological stressors was greater than for physiological stressors; The most reported stressors were: restriction to drinking liquids; changes or restriction in eating habits; pruritus, fatigue, financial factor; Problem-focused coping was used more often than emotion-focused coping; There was no significant association between the type of stressor and the type of coping, therefore there was no association between the HD time and problem-focused coping. There was no significant association between the types of stressors and characteristics like gender, age, marital status, education, occupation, and HD time. Only individuals with more than 55 years of age had more physical stressors than those with less than 55 years.
6. Stressors, coping and depression in hemodialysis patients	Welch JL, Austin JK.(17) To evaluate the relationships between the treatment of the stressors, coping parameters, and depression.	103 patients on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Data collection using forms. The patients were interviewed twice within three months. The internal consistency of the instruments was calculated by Cronbach $\alpha$ and the analysis was based on descriptive statistics, Person correlation coefficient and chi-square test.	Problem-focused coping was the most used parameter; Psychosocial stressors were associated with problem-focused coping, social support, and denial; Denial, as coping, was predictive of depression symptoms; Psychosocial stressors were predictive of depression symptoms; Denial was closely associated with psychosocial stressors and depression.
7. Interactions among a stressor, self-efficacy, coping with stress, depression, and anxiety in maintenance hemodialysis patients.	Takaki J, Nishi T, Shimoyama H, Inada T, Matsuyama N, Kumano H, Kuboki T.(18) To study the possible interactions between the effects of stress, health control, and coping parameters on depression and anxiety in hemodialysis patients.	453 hemodialysis patients	Non-experimental, descriptive, prospective, quantitative	Data collection using forms, besides the guiding question about the stressor pruritus : How was your pruritus last month? In the analysis, Person correlation coefficients and multivariate analysis were calculated.	Of the patients, 65.9% reached low scores in the depression scale while 12.4% reached high scores. In the anxiety scale, 83% had low scores and 42% had high scores; Depression was positively correlated with emotion-focused coping; Pruritus was negatively correlated with health control; Anxiety was positively correlated with emotion-focused coping.
8. Effects of an adaptation training program for patients with end-stage renal disease	Tsay SL, Lee YC, Lee YC. (19) To evaluate the effectiveness of a training program for providing care to patients with CTRI, improving their coping toward stress.	57 hemodialysis patients	Experimental, controlled, prospective, quantitative	Data collection using forms. Selection of one treatment group and one control group. The analysis used co variation analysis and hypotheses test.	The most reported stressors were the restriction of time and place of work, followed by restriction of liquid intake, difficulties with transportation, impaired body functions, time of HD, limited physical activity; In the group that was trained, the perception of stress reduced significantly after the test; In the control group, the stressor scores did not change; The scores for depression also reduced in the trained group whereas, in the control group, the scores increased; The scores for general quality of life increased for the trained group in the post-test but did not change in the control group.
9. Possible Interactive Effects of Demographic Factors in Stress Coping Mechanisms on Depression and Anxiety in Maintenance Hemodialysis Patients	Takaki J, Nishi T, Shimoyama H, Inada T, Matsuyama N, Kumano H, Kuboki T. (20) Identify the possible interactive effect of age, gender, hemodialysis time income and education levels, stress, and coping parameters on depression and anxiety in hemodialysis patients.	416 patients on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Data collection using forms. The analysis was performed using multiple regression analysis.	Depression was positively correlated with age and emotion-focused coping; Depression was not associated with income and task-focused coping and denials; Anxiety was positively associated with female gender and emotion-focused coping; Anxiety was not associated with age and education; People with high level education were less depressed the more they used task-focused coping; People on HD for a long period and those with high income were less depressed and anxious the less they used emotion-focused coping; Older people and with low income were less depressed the more they used denial as their coping strategy.

Continuity ...

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Title	Author (s) and objectives	Studied population	Study outline	Methodology	Results
10. Preparing for hemodialysis: patient stressors and responses	Harwood L, Locking-Cusolito H, Spittal J, Wilson B, White S. (21) Explore specific stressors of patients with CRI who are about to start hemodialysis.	11 hemodialysis patients who had been instructed	Non-experimental, descriptive, prospective, qualitative	Patients with CRI and their families received a formal instruction program. Semi-structured interview. The analysis is based on the protocol by Polit and Hungler (1991), which consists in grouping common themes.	Four categories were identified: Physical stressors; stressors associated to disease, treatment, and the clinic; emotional answers; learning, preparation and acceptance: identified the need to learn about dialysis; Sorrows and displeasures: dissatisfaction with the care they received from care providers and their unhappiness regarding their own care.
11. The relationship between coping with stress and employment in patients receiving maintenance hemodialysis	Takaki J, Yano E. (22) Verify if the hemodialysis patients present emotion-focused coping, negatively associated with occupation of problem-focused coping, positively associated with occupation	317 hemodialysis patients	Non-experimental, descriptive, prospective, quantitative	Data collection using forms. The analysis was performed through chi-square test, Student's T test or Welch's test, Mann-Whitney, Fisher's and multiple regression logistics.	Emotion-focused coping did not present a positive correlation with occupation for either gender. Problem-focused coping presented positive correlation for both genders. Physical function presents a positive association with occupation for men; Gastrointestinal diseases have a positive association with occupation in women.
12. Support and coping of male hemodialysis-dependent patients	Cormier-Draigle M, Stewart M. (23) To describe coping strategies in adult men on hemodialysis and their association with stressors; Describe the social support received; Describe the association of social support with the coping strategies	30 men on hemodialysis	Non-experimental, descriptive, prospective, quantitative	Data collection using forms. The analysis was performed through the determination of correlation coefficients, T test and ANOVA.	There was no significance between the type of stressor and the type of coping; the sample reached high scores for perceived social support; there is positive association between positive reevaluation and reciprocity (as an interpersonal relation)

Of the articles used in this review, seven were developed after the year 2000, four were published in the 1990s, and one in the 1980s.

Regarding the variables addressed in the studies, ten directly studied the coping parameters of people on hemodialysis, associated to the stress due to treatment. In two studies, the authors did not study coping parameters directly, rather the stressors associated with hemodialysis, the occurrence of anxiety and depression, and measured the subjects' health-related quality of life and adjustment to the diseases.

Regarding the methodology used in the evaluated articles, it is observed that 91.7%, that is, all articles using a quantitative method used preexisting questionnaires to measure the studied variables.

Among the ten articles that studied the variable "coping parameters", nine used preexisting scales for their measurement. Four used the "Jolowiec Coping Scale" by Jolowiec & Powers (1981), three used the "Coping Inventory for Stressful Situations", one used the "Coping Strategy Indicator", and one used the "Ways of Coping" questionnaire. None of these questionnaires is specific for people on hemodialysis.

The "Hemodialysis Stressor Scale" (1982) was used in 50.0% of the studies selected to identify the physiological and psychological stressors associated with hemodialysis.

As to the objectives of the analyzed articles, five aimed to identify the coping parameters associated with the hemodialysis stressors, and seven sought to establish relationships between coping parameters and other studied variables, like depression, anxiety, quality of life, or some particular stressor.

Among the selected articles, six studies had goals with a clear description and attainable through the proposed methodology. In these studies, the results were coherent with the objectives and the methodological procedure used. Among the articles that presented incoherent objectives: the objectives were not totally achieved in one article; another study presented an objective biased by the comparison made to a study performed the year before; in one study, the objectives could not be achieved through the methodology used; and in one of the studies, the objectives were not clearly described.

The results of the analyzed articles showed that, in three papers, the problem-focused coping parameters were mentioned more often. Depression was positively correlated with emotion-focused coping, through the statistical treatment made, in three studies.

The other two studies, which were compared among patients on hemodialysis and those on peritoneal dialysis, better described the emotional health experienced by the patients that are on the second treatment.

The psychosocial stressors were the most frequently

mentioned, and although the mean for differences between proportional scores was calculated in the studies and demonstrated that there were no significant differences, it is important to stress that 50.0% of the studies used the Hemodialysis Stressor Scale, and that 23 of the 29 items in the scale were classified as psychosocial stressors. However, the classification between psychosocial and physiological stressors might not be clearly defined.

In one of the studies, the emotion-focused coping parameters demonstrated a positive association with work. People who worked were less depressed than people who did not. Furthermore, working women were less anxious.

In four of the analyzed articles, the authors refer to implication of knowing the coping parameters on the practice of nursing in nephrology, including: following the changes that take place after beginning hemodialysis as a transforming agent of the reality; in performing training sessions and guidance that contribute with a better patient adaptation to the treatment; in directing the patient toward using coping strategies that solve problems, besides developing research on the coping parameters and stress associated with hemodialysis.

## DISCUSSION

The great interest that nurses have on the coping process adopted by people on hemodialysis is due to their participation in the process, especially in guiding and looking after the patient regarding problem-focused coping.

Since the early 1990a, the number of patients on dialysis has increased considerably. This fact may have contributed with the attention given to improving the quality of life of people on hemodialysis<sup>(8)</sup>.

As to the type of research design used by the assessed studies, ten articles are non-experimental, descriptive, prospective; and eleven used quantitative analysis. It is important to develop experimental studies that associate coping parameters with clinical practice, thus, proving the importance of coping in the health-disease process<sup>(24)</sup>.

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None of the articles used a specific instrument for CRI patients on hemodialysis. Specific instruments should be designed, including in Brazil, to measure the coping parameters of people on hemodialysis due to the specificity of this therapy.

A positive relationship was found between the emotion-focused coping and the occupation of people on hemodialysis. In this regard, the literature describes that people who work have better social support, which is associated with lower morbidity and mortality rates, as it contributes with patient compliance to treatment<sup>(25)</sup>.

The knowledge regarding the relationships about the coping parameters used by people on hemodialysis, associated to the identification of the coping parameters used by specific patient groups (ex: adult, elderly, etc) are essential to effectively redirect patients in the coping process.

## CONCLUSIONS

Although few articles addressing the proposed theme were found, it is observed that most studies were performed in developed countries and since the 1990s, when the concern about people's health conditions increased. It can be affirmed that population aging and the increase in the survival rate of people with chronic disease with chronic disease, which first occurred in those countries, create the need to think about the chronic characteristic of the disease.

The studied subjects' preference in using the problem-focused coping parameters demonstrated a difficulty that these patients experience to deal with the changes in their feelings, which is evidenced in the studies that affirm there is a positive relationship between emotion-focused coping and depression.

It is considered that the objectives of the present study have been achieved and that the identification of the coping parameters is valuable information when planning individualized treatment for these patients, providing care, capacitating the multidisciplinary team, and, consequently, obtaining a better adequacy of these patients to the treatment.

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