

ELEMENTS OF (SELF) CARE IN CHRONIC PATIENTS WITH HEART CONDITIONS – A QUALITATIVE ANALYSIS

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Abstract

In the context of chronic disease, self-care or self-management represents a term used in the field of education for health and associated to programs for health promotion and for patient education (Cojocaru and Popa 2013). The idea of program implies, among others, formalizing and/or standardizing the activities.

In the conditions of chronic disease, the self-care of health status can also be achieved in the absence of self-management programs, and it may represent: (1) a set of non-formal actions that the patient initiates following his/her own method, (2) a set of formal actions that the patient initiates upon the physician's recommendation or (3) a combination between the two situations. In this context, the outcome of (self)-care is influenced by a series of factors.

The purpose of this study is to identify the formal and non-formal elements specific to self-care, which may represent premises for the creation of self-management programs to support the persons diagnosed with chronic heart diseases. To this end, we conducted 13 interviews with patients with chronic heart diseases within the clinic of the "Dr. C.I. Parhon" Clinic Hospital in Iași.

Key words: self-care, chronic patient, elements of care, self-management, chronic disease

Résumé

Dans le contexte des maladies chroniques, l'auto-soin ou l'autogestion représente un terme utilisé dans le domaine de l'éducation pour la santé et il est associé avec des programmes pour promouvoir la santé et pour l'éducation des adultes (Cojocaru et Popa 2013). L'idée d'un programme suppose, entre autres, la formalisation et/ou la standardisation des activités.

Dans les conditions d'une maladie chronique, l'auto-soin de la santé peut être appliqué dans l'absence des programmes d'autogestion et il peut être représenté par: (1) un ensemble d'actions non-formelles que le patient initie d'après ses propres méthodes, (2) un ensemble d'actions formelles que le patient initie à la recommandation du médecin ou (3) une

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combinaison entre les deux situations. Dans ce contexte, le résultat de l'(auto)-soin est influencé par une série de facteurs.

Le but de cette étude est d'identifier les éléments formels et non-formels spécifiques à l'auto-soin, qui peuvent représenter des prémisses pour la création des programmes d'autogestion pour soutenir les personnes diagnostiquées avec des maladies cardiaques chroniques. Dans ce but, nous avons pris 13 interviews à des patients avec des maladies cardiaques chroniques, dans la clinique de l'Hôpital Clinique « Dr. C.I. Parhon » de Iași.

Mots-clés: auto-soin, patient chronique, éléments du soin, autogestion, maladie chronique

Rezumat

Autoîngrijirea sau self-managementul în contextul bolii cronice reprezintă un termen utilizat în domeniul educației pentru sănătate și asociat programelor de promovare a sănătății și de educare a pacienților (Cojocaru și Popa 2013). Ideea de program presupune, printre altele, formalizarea sau/și standardizarea activităților.

Autoîngrijirea stării de sănătate, în condițiile bolii cronice se poate face și în absența programelor de self-management, și poate reprezenta: (1) un set de acțiuni non-formale pe care pacientul le inițiază după o metodă proprie, (2) un set de acțiuni formale pe care pacientul le inițiază la recomandarea medicului sau (3) o combinație între primele două situații. În acest context, rezultatul (auto)îngrijirii este influențat de o serie de factori.

Scopul acestui studiu este să identificăm care sunt elementele formale și non-formale specifice autoîngrijirii, care să reprezinte premise pentru realizarea programelor de self-management în sprijinul persoanelor diagnosticate cu boli cronice cardiace. Pentru aceasta am realizat 13 interviuri cu pacienți cronici cardiaci din clinica Spitalului Clinic „Dr. C.I. Parhon” din Iași.

Cuvinte cheie: autoîngrijire, pacient cronic, elemente ale îngrijirii, self-managent, boală cronică

1. Introduction

In the context of chronic disease, self-care or self-management represents a positive initiative of the patient's for preventing the deterioration of health status by adopting changes in the lifestyle (Bodenheimer 2005; Wagner *et. al.* 2005). The term self-care is used mainly in the context of acute illness and it represents the patient's actions for the identification and implementation of remedies or treatments in case of minor conditions for improving the functionality of routine activities specific to daily life (Sandu *et al.* 2013). In the context of chronic disease, self-care or self-management represents a term used in the field of education for health and associated to programs for health promotion and for patient education (Cojocaru and Popa 2013). Understandably, we cannot posit that, in the absence of self-management programs, patients do not initiate actions to improve their health status. The idea of program implies, among others, formalizing and/or standardizing the activities. In the absence of self-management programs, self-care may represent: (1) a set of non-formal actions that the patient initiates following his/her

own method, (2) a set of formal actions that the patient initiates upon the physician's recommendation or (3) a combination between the two situations. In this context, the outcome of (self)-care is influenced by a series of factors. The analysis of the situations presented in (1) and (2) represents the purpose of this study. In this sense, we aim at pinpointing the formal and non-formal elements specific to self-care, which may represent premises for the creation of self-management programs to support the persons diagnosed with chronic heart diseases.

The idea of self-management derives from the Chronic Care Model philosophy (Bodenheimer 2005), which represents a change in the way of approaching chronic condition, on one hand, and an alternative to the biomedical perspective, on the other. Within the biomedical model, the physician-patient relationship comprises an uneven balance of power and of medical decision, and the outcome of self-care – at least from the patient's perspective – depends on his/her degree of compliance. The patient is responsible only in this direction. The CCM philosophy proposes a major change of perspective, which results in the patient's transformation from compliant into *informed and activated patient*. Furthermore, the physician-patient relationship is re-balanced in the area of power and of decision, implicitly. The physician and the patient become partners in the care process. The prevalence of chronic diseases (WHO 2002; 2010) and the implicit consequences imposed the adjustment of the physician-patient relationship to the new conditions, by altering the roles of the participants to the act of care. The Chronic Care Model integrates the most important differences between acute and chronic disease: (1) chronic disease is incurable and it must be monitored constantly for effective management; (2) treatment efficacy depends on the permanent involvement of the patient in various medical practices/actions; (3) the patient knows best the consequences of the disease and the effect of treatments, and he/she must apply the knowledge within disease management; (4) the treatment can become more effective if the patient and the physician share information during the healthcare process (Holman and Lorig 2004).

In this context, it is very important to understand the patient's areas of competence and the factors that may influence performance and the outcome of self-care. In other words, should all patients benefit from the same degree of freedom and action in the management of chronic condition? The self-management of chronic condition represents a set of actions that the patient must master to a lesser or greater extent in order to prevent the deterioration of his/her health status. In order to live a better life, persons with chronic disease would need to: (1) improve their overall knowledge of their condition, (2) follow a structured treatment plan agreed with the health provider, (3) actively share in decision making about their health care, (4) monitor and manage signs and symptoms of their condition, (5) manage the impact of their condition on the physical, emotional, and social aspects of their lives, (6) adopt behaviours that promote healthy lifestyles (Harvey 2011).

Lorig *et al.* (1996) identify 12 self-management tasks (Wilson 2001) common to all chronic conditions: 1. Recognizing and monitoring symptoms and factors that trigger symptoms; 2. Using medication correctly; 3. Managing acute episodes and emergencies; 4. Maintaining nutrition and diet; 5. Maintaining adequate exercise; 6. Giving up smoking; 7. Using stress reduction techniques; 8. Interacting effectively with healthcare providers; 9. Using community resources; 10. Adapting/adjusting to work conditions and to functions specific to other social roles; 11. Managing relations with significant others; 12. Managing negative reactions and psychological responses to illness.

Self-management is involved when patients are able to keep under control their health status through the aforementioned actions, and the outcome of self-care is closely connected to the way in which patients manage to perform in this direction. Moreover, in this context, the increase in effectiveness is related to the existence of learning situations within standardized initiatives or programs. In the lack of such self-care programs, it is influenced by a series of economic, social, psychological, etc factors. The outcome of self-care is influenced by the nature of the condition and the resources that patients manage to mobilize for such an initiative.

The patient's experience in the (self)-management of the disease is built in formal or informal situations. Zola (1981) argues that, while some patients come to the physician upon the first symptoms, most patients seek the physician's help when the disease becomes chronic. This means that, if patients already went through a rather long period struggling with the disease, they managed to identify ways and to find resources for their disease management. It is relevant whether these habits are in agreement with the specific recommendations for the treatment of the disease because they reflect the patient's lifestyle (Lupu, Rădoi and Cojocaru 2014).

The focal point of this model is productive interactions between informed activated patients and prepared proactive practice teams (Epping-Jordan *et al.* 2004). The model underlines the role of communication in the physician-patient relationship (Ionescu 2014). The patient cannot assume the medical decision unless informed, whereas the physician cannot formulate recommendations unless he manages to understand the patient's experience (Rădoi and Lupu 2014). Lack of information is one of the most important sources of patient passivity and incorrect information may lead the patient to a dangerous path.

2. Method

The method used in this study results from a grounded-theory type of approach (Strauss and Corbin 1990; Creswell 2007) and it involves the application of a semi-structured interview guide to 13 patients within the clinic of the "Dr. C.I. Parhon" Clinic Hospital in Iași. In this sense, we elaborated an interview guide that pinpoints the patients' experience in situations specific to self-management

situations. The interview guide was designed in such a way as to identify the elements of patient's (self)-care and the factors that influence care and self-care in various phases of the process. We also elaborated informed consent papers that were analyzed and approved by the Ethics Committee of the “Grigore T. Popa” University of Medicine and Pharmacy Iași. After obtaining the approval from the Committee, an application was made to the secretariat of the cardiology clinic of the “Dr. C.I. Parhon” Clinic Hospital in Iași for approving the patient's participation to the study. A discussion was organized with the general manager and with the medical director of the clinic for further clarifications and the approval was obtained for conducting the study in the clinic. In the study, we included only the patients who come to the specialist for periodical check-ups. The selection of patients was done with the help of the specialist and of the nurse within the private practice. The observation charts of patients were analyzed. The patients who accepted to be part of our research were presented the purpose and objectives of the research and they were invited to read and sign the informed consent forms. The interviews were recorded and transcribed verbatim. During the discussions with the patients, we approached the topics within the data collection instrument, as well as new topics:

- disease onset / medical history: patients were required to describe the circumstances of their visit to the doctor and to detail their medical history and other illnesses;

- communication with the physician (diagnostic, indications), information sources: the patients within our research were asked to describe the meeting/meetings with their family physician and with specialists and to provide details on the duration of meetings, the diagnostic, the treatment and the physician's recommendations. In addition, we insisted upon the information sources accessed by patients in various situations;

- self-care methods: patients detailed their way of following the treatment and the physician's recommendations and whether they also access other treatments specific to alternative and/or complementary medicine;

- the relation with family / friends, etc: they were asked to describe their relation with family / friends in the context of the disease, with a focus on the modifications produced within these relations. They were then asked to provide details on the way in which the disease affected their work or social relations.

- management of crises and management of stress: patients described a crisis and the way in which they solved the issue.

Among other themes approached with the patients, we mention as follows: attitude toward the disease, plans for the future, assuming responsibility for their health status, social comparison with the other patients.

The socio-demographic characteristics of research participants are featured in *Table 1*.

Table 1. Socio-demographic characteristics of research participants

No.	Patient code	Sex	Age	Residence	Studies	Diagnostic
1	R1	f	66	u	10 g.	high blood pressure
2	R2	f	47	u	10 g.	cardiac insufficiency / mitral valve prolapse / aortic disease / permanent atrial fibrillation / left bundle branch block / atrial septal aneurysm/ mechanical valve
3	R3	f	67	u	11 g.	effort angina / cervicoartrosis with associated vertiginous syndrome / rheumatic mitral valve disease / first degree mitral insufficiency
4	R4	f	53	r	10 g.	high blood pressure / chronic venous insufficiency / autoimmune thyroiditis
5	R5	f	62	u	8 g.	effort angina / metabolic syndrome
6	R6	f	54	r	10 g.	mitral valve / atrial fibrillation / non-operated bleeding uterine fibroid / secondary anaemia / chronic anticoagulation
7	R7	f	65	u	col.	heart rhythm disorder/ hepatitis C
8	R8	m	66	u	col.	stent / ischemic cardiomyopathy, liver diseases
9	R9	m	57	r	v.s.	dyslipidemic syndrome / second-degree obesity / hepatic steatosis (chronic toxic hepatitis)
10	R10	m	39	r	h.s.	toxic dilated cardiomyopathy / chronic cardiac insufficiency
11	R11	f	53	u	col.	ischemic cardiomyopathy / psoriasis
12	R12	f	42	u	col.	high blood pressure / uterine fibroid with associated iron deficiency anaemia
13	R13	m	57	u	v.s.	left ventricular insufficiency / effort angina / atrial flutter / hepatic haemangioma

Legend: R-patient code, f-female, m-male, u-urban, r-rural, 10 g. -10 grades, col.-college, h.s.- high-school, v.s.-vocational school.

3. Data analysis and findings

After transcribing the interviews, we analyzed the data using the QSR-NVIVO 9 program. The analysis process required the codification of the text and the outlining of certain categories that express the elements and stages of (self)-care and the context in which it is influenced by a series of social, economic or psychological factors. In the case of patients diagnosed with chronic heart conditions, (self)-care involves the following elements: crisis management, information, interaction with the physician, treatment, methods specific to alternative and/or complementary medicine, management of the stress induced by disease and management of symptoms. To these elements of (self) care, it is worth adding situations that express patients' attitude toward the disease, family involvement in the healthcare process, identification of the situations when patients represent the source of the disease through their behaviour and assumed decisions (this category was named PSD – the patient as source of the disease) and comparing one's own situations to the one of other patients (social comparison). In *Table 2*, we present a detailed scheme of the healthcare reference points and elements, derived from patients' reports.

3.1. Crisis management

The crisis situations described by research subjects refer to disease onset, to acute episodes after the onset of chronic disease, to events related to medical history. In case of most patients, the disease had a sudden onset, and the symptoms began either when doing their daily chores or while executing work-specific activities.

R6 (54/F/r/10 g.): The ambulance took me from home. In the countryside, we beat the bean pods with sticks! ...I fell down, I passed out ..., my husband got scared and he called the ambulance, and it came and they took me on a gurney all the way to Spiridon, to Cardiology.

R13 (57/M/u/v.s.): Well, let me tell you how I worked. I was on a night shift. I got sick right there, at my workplace. It was warm, it was fine, and all of the sudden, around 3 AM, I felt I was passing out. I ran out of air. And as I saw I had no air, I went out, then in, then out again. I used some water to wash [my face] ...

In only one case, the disease was discovered during a routine check-up. At the moment of the onset, most research subjects did not pay enough attention to the episode: they failed to understand or they ignored the gravity of the disease. Their reports on crisis situations show that the patients failed to adopt a preventive behaviour concerning their health status.

R8 (66/M/u/col.): It's been a while. I only went [to see a doctor] after 5 or 6 crises! That is, around 2 or 3 weeks.

A.L.: Can you tell me why?

Table 2. Elements of (self) care

<i>Crisis</i>	
<ul style="list-style-type: none"> - Disease onset - Medical history 	
<i>Information and sources of information</i>	
<ul style="list-style-type: none"> - Information from healthcare providers (family physician, specialist, nurses) - Information from other sources (family, friends, media, the Internet) 	
<i>Interaction with healthcare providers</i>	
<ul style="list-style-type: none"> - Determining and communicating the diagnostic - Determining and explaining the treatment - Visit to the doctor for emergencies - Visit to the doctor in the context of regular check-ups - Experiences specific to hospitalizations 	
<i>Treatment</i>	
<ul style="list-style-type: none"> - Medication upon the physician's recommendation <ul style="list-style-type: none"> Adherence Proadherence strategies Nonadherence (causes) Lack of financial resources Presence of side effects Lack of information The patient forgets to take the medication The patient does not assess correctly the gravity of the disease Temporary disappearance of symptoms Incompatibility with medication specific to other conditions Limited access to medical services 	
<ul style="list-style-type: none"> - Self-medication <ul style="list-style-type: none"> Adjustment of dosage 	
<ul style="list-style-type: none"> - Diet <ul style="list-style-type: none"> Diet upon the physician's recommendation Nonadherence to diet (causes) Lack of financial resources Lack of information The patient does not assess correctly the gravity of the disease Temporary disappearance of symptoms Sociocultural situations (holidays) Family culinary habits Diet upon the patient's initiative 	
<ul style="list-style-type: none"> - Change in lifestyle <ul style="list-style-type: none"> Change in lifestyle upon the physician's recommendation Change in lifestyle upon the patient's initiative Nonadherence to change in lifestyle (causes) Lack of information The patient does not assess correctly the gravity of the disease Temporary disappearance of symptoms Work environment and conditions Existence of social and family obligations 	
<i>Complementary and/or alternative medicine</i>	<i>Natural treatments</i>
<i>Stress management</i>	
<i>Daily management of symptoms</i>	
<i>Family involvement in the healthcare process</i>	

R8 (66/M/u/col.): Why?! I thought it was something that would pass and after a minute or two I was fine again ... during a crisis, I became all sweaty and my sternum area really hurt. And I said to myself it would pass and when I saw that it kept coming back ... every 4 or 5 days ... they did not happen daily. I decided to go and see what was going on only afterwards.

In addition, in many cases, though the patients understood the gravity of their disease, they decided to ignore it and to postpone decisions related to treatment because of their family or work obligations. Irrespective of their instruction level, age or residence, all patients regret postponing the examination and neglecting their health status. Another cause of crisis situations was the patients' decision to interrupt the treatment, from reasons such as the temporary disappearance of symptoms, ignorance, lack of financial means or of access to medical services.

3.2. Information and sources of information

Information on health status or the effects of the disease represent a decisive element in the evolution of the disease and in the effectiveness of any treatment. Patients may access two main sources of information: healthcare providers and alternative sources. Patients receive information on their health status from healthcare providers in the following situations: upon the onset of the disease during routine check-ups, when they are admitted to the hospital or when they pay an emergency visit to the physician. In both situations, the time factor – that expresses the duration of the visit – has a decisive effect. In this sense, there is a difference between patients in terms of understanding the information received from a physician. Because of the limited time allotted to a consult, patients fail to understand all the information transmitted by the physician. The information that the patient receives in these situations refers to the diagnostic, to the possible evolution of the disease and to treatment details. By the context, patients receive information from the family physician, the specialist or the nurses. In this sense, there are significant differences by instruction level, age and residence of the patients. Rural patients with low level of education fail to understand details concerning their diagnostic, the effects and evolution scenarios of the disease. Hence, patients indicated that they needed more information in this sense. There are, however, cases when patients refuse to receive and understand more information, by motivating that it would cause them more stress or that they found sufficient the information on the medication and the treatment details.

The other sources of information available to patients refer to family, friends, the media or pharmacies. Urban patients with high education level often use scientific papers where they find details on the disease, on its evolution, on medication and on adverse effects of drugs, on the compatibility of medication in case of multiple conditions. Patients who fit this profile assess the information received from their family physician by initiating discussions with other physicians and/ or by consulting medical papers within scientific journals or over the Internet.

R7 (65/F/u/col.): *I started reading, and I asked some acquaintances to help me [find books] ... I am not from Iași, but they recommended me certain works. I started, first of all, with anatomy and physiology! Then, Internet has helped, too. There are many studies published in this field ...*

R12 (42/F/u/col.): *There is a lot of information on the Internet, including in what concerns the... how do I put it?! ... the diagnostic, or else ... They also present symptoms ...*

A.L.: *What are you searching for on the Internet? Can you describe the process to me?*

R11 (53/F/u/col.): *The disease ... Yes! I search, first, the causes, then the possible effects, how it evolves in time, the drugs... what I may take. I try and see if it can be treated only with plants and stuff. Not that I'm a big fan! But I do believe that nature has a word to say! No synthetics! The, after accumulating a minimum amount of knowledge ... considering this is not my field ... to each his own, you know ... So! I make a call, to understand better ... I only try to understand as well as possible what the physician is going to tell me So then I make the call: What is going on? Am I ok? Is it going to kill me? No? Well, if not, it is good! I will keep torturing you [with my calls]! That's good!*

The need for information was not acutely claimed by rural male patients with low and average education level; they only tried to respect the information and recommendations received from the physician. Female patients – irrespective of their age, education level of residence – use intensely both sources of information. Pharmacy personnel represent another important source of information. Except for rural male patients with low education level, who stated that they ignored partially or totally any other information but the one from healthcare providers, all patients use intensely the pharmacy as source of information. Patients that have a long-term relationship with their family physician assess the information received from alternative sources during their meetings with the physician.

3.3. Interaction with the healthcare providers

From the patients' reports, the interaction with healthcare providers occurs in the following situations: visit to the family physician for consults or for obtaining a referral to the specialist, visit to the specialist, emergency hospitalization, hospitalization upon the physician's recommendation. The content of the interaction with healthcare providers refers to consults for determining the diagnostic and the treatment, lab works, regular check-ups, healthcare under various forms. Hence, the content of the interaction with healthcare providers refers to communication and action situations. When interaction refers to a communication situation, as previously shown, patients fail to understand all the information communicated by the physician; the reasons of this dysfunction are the patient's level of understanding, a too short consult or a too specialized language of the physician for the patient's level of understanding. If the treatment for the disease is surgical intervention, in all situations (irrespective of the socio-demographic profile), patients reported that they had accepted the intervention because the physician had managed to persuade them it was necessary.

R2 (47/F/u/10 g.): *Yes, yes. It was then that I took the decision and it was necessary to have the surgery, so I decided... I decided to have the surgery done. That is how I got to surgery! With the help... with the help of the physician... he... he... looked for me and he tried to explain me everything in detail.*

R8 (66/M/u/col.): *... however, the physician opened my eyes, really! Had I no listened to the physician, things may have been different now! Yes, the physician was the main factor that determined me ... so to speak, because he told me very sharply: if you do not listen to me and you do not lower your cholesterol by that much, you are out of chances!*

In addition, all patients in this situation appreciated the quality of services received and, especially, the human quality of healthcare providers. When the content of the interaction refers to communication situations and it did not involve surgery, but only setting and communicating the diagnostic, regular consults, consults for acute crises and/ or treatment, rural patients reported diverse dysfunctional situations: lack of access to the physician, faulty communication with them, physician's incompetence. In the cases of emergency hospitalizations, subjects reported conflicting situations between patients and healthcare providers concerning wrong diagnostic, faulty communication, misunderstanding the information and lack of availability of healthcare providers, conflicting relations with the nurses, incompetence of healthcare providers.

3.4. Treatment

From the perspective of healthcare providers, treatment involves a set of actions recommended by the physician and it refers to correct drug administration, maintaining an adequate diet (sometimes accompanied by effort prohibition) and implementing changes in the lifestyle. In case of the research subjects, irrespective of the socio-demographic profile, treatment is identified only with administration of medication recommended by the physician. Though the physician recommends a change in the diet or the lifestyle, patients fail to make the association. In terms of drug administration, research subjects are adherent or nonadherent. Most patients (irrespective of the socio-demographic profile) stated that they had forgotten, repeatedly, to take their medication. In this sense, proadherence strategies were indicated by the physician by stating the dangers resulting from failing to take the medication or to respect the correct dosage of the treatment. Some patients received a medication organizer for their drugs and clear instructions for use. From this standpoint, the most adherent patients are older patients. Other proadherence strategies refer to placing the medication in a very visible spot, setting a phone alarm, buying another set of drug for the times the patient leaves the house or involving the family members in drug administration.

R7 (65/F/u/col.): *If I left home without my meds (I have to take some 18, 20 pills a day at this point), then ... well ... I would become very concerned, I would panic and so on! So then, very simple! I always carry a set of meds in my handbag and there is another set at home!*

A.L.: *Has it ever occurred to you to have a set of meds, but to forget to take the pills?*

R3 (67/F/u/11 g.): *Oh, yes! Sometimes an entire week!*

A.L.: *And how do you control your pill intake?*

R3 (67/F/u/11 g.): *Well, my physician writes a scheme on a piece of paper. I put it right where I keep my meds. When I wake up in the morning, I see it and I remember to take the pills.*

R10 (39/M/r/h.s.): *I got used to it by now. At first I would set an alarm and I knew it was time to take the meds! But now it has become automatic ... I don't need to set an alarm anymore, I just know it.*

Most patients learn about the effects of medication by reading the leaflet, by discussing with the physician or the pharmacist or by consulting diverse articles on the Internet. These actions are motivated by the presence of multiple conditions, in case of most patients. Patients reported that they found incompatibilities between the drugs for one condition and the drugs for other associated conditions. This represents another cause of nonadherence to medication. Urban patients with a college degree tried to solve this situation either by discussing with the physician for changing the medication, or by adjusting the doses themselves.

R8 (66/M/u/col.): *I was, in a way, my own physician!*

A.L.: *Can you explain?*

R8 (66/M/u/col.): *I saw that it didn't work... I felt that the treatment ... was not quite right ... so I reduced it to half of the dosage. I have been very well ever since! I mean, I did observe the treatment for the stent. I did exactly what the physician said and ... well, for other heart conditions, I monitored my blood pressure daily, every morning and every evening, actually ...*

A.L.: *You do that yourself?*

R8 (66/M/u/col.): *Myself, yes! Because I have a simple device for it. No problem at all! And ... I figured out the idea. For instance, the drug for [high] blood pressure ... I read the leaflet ... and I stopped taking it! I saw that the blood pressure did not exceed 12 and a half/8, so I figured there was no point of taking them; even my physician said that, well ... there was a time when my BP was 10/6. That is when I stopped taking the BP meds. That is why I am saying I took this decision without informing the physician! Moreover, I stopped using other meds, too ... I say I was my personal physician because one drug had ... how do I put it, bad side effects on the liver and the muscles ... my muscles and my arms hurt ... so I stopped [taking it]! And I replaced it with natural pills.*

Rural patients who pointed out the presence of side effects and who wished to change the treatment asked the physician for solutions to this problem. Other causes of nonadherence to medication, reported by patients, were lack of financial possibilities, temporary disappearance of symptoms and limited access to medical services. These three causes are specific to rural patients with low education level.

R6 (54/F/r/10 g.): *Just last Tuesday I was discharged...from this very hospital and I had nobody to do my antibiotic injections. I cannot go to just about anybody for antibiotic injections because it has to be in the vein!*

A.L.: *You say the antibiotic must be inserted in the vein...*

R6 (54/F/r/10 g.): *Well, yes! Yes! It was necessary to have my antibiotic, so I told my physician not to prescribe injections because I had no one to make those! In my village, there is absolutely nobody to do it! As I told you, there are 12 km from my village to the health centre... so, I had nobody...*

R2 (47/F/u/10 g.): *No ... no, no, no! I'll tell you the truth, sometimes I took my treatments, some others, I just didn't!*

A.L.: *Why didn't you take it sometimes?*

R2 (47/F/u/10 g.): *I didn't because..., to tell you frankly, I didn't feel the need to take it. I didn't think it was important! What was goin' on with my disease, what was goin' to happen.*

A.L.: *You did not consider it serious? Or you simply did not think it was serious?*

R2 (47/F/u/10 g.): *No! I did not think! I did not believe it to be so serious ... that I would end up like I did!*

A.L.: *so, you actually took the pills when you felt worse or ...?*

R2 (47/F/u/10 g.): *Yes, yes, yes, when I felt worse, it's when I took the pills.*

Another phenomenon encountered in all research subjects is self-medication. Patients reported taking meds without recommendation from the physician in order to compensate for diverse symptoms that they associate with minor conditions (a cold, pains of various types and intensities). Patients who take meds this way do not associate their action with the treatment recommended by the physician.

In terms of diet, it was recommended by the physician in all cases and for all diseases. However, there were also situations when the patient took the initiative of dieting. This was reported by urban patients with a college degree, and diet was associated with a healthy lifestyle. Nonadherence to diet was reported by rural and urban patients (especially male) with low level of education. The main causes of nonadherence to diet are lack of financial possibilities, lack of information, incorrect assessment of family reunions), culinary habits of the family.

A.L.: *Are you on a diet?*

R2 (47/F/u/10 g.): *Ohhh! No salt. I mean low amounts of salt. Not really without salt. Just less salt.*

A.L.: *I understand. And on holidays, do you eat traditional foods?*

R2 (47/F/u/10 g.): *Weeel, like now, for instance. For example, now, this year, we had a pig, so we cut the pig and we made various foods, we used pork for all types of foods. And this, well... this worsened my ... well... I did not feel well! I felt my heart beat faster, I had trouble breathing, uhhh ... I knew it. I knew pork is not good at all for me.*

A.L.: *But you just could not break the tradition?!*

R2 (47/F/u/10 g.): *Yes! Exactly. An my family, everybody in the house eats pork and...for me to cook something else.... to have something else made ... I had no means. With my pension of 330 lei a month, I believe I ... my husband works only occasionally... No. I have no means for a proper diet for my health, in general!*

The physician's recommendations concerning the diet are accompanied, in all cases, by prohibition of physical effort. All patients ignored these recommendations: in this sense, compliance resulted from poor physical state, not from a

desire to observe the recommendation. In addition, patients – especially rural patients – do not include household chores in the category of activities requiring effort. Patients within this category do not observe the recommendations of the physician concerning prohibition of physical effort, by motivating that it is impossible to respect it due to family obligations and to agriculture-specific tasks to accomplish throughout the year.

In most cases, recommendations regarding medication and diet were accompanied by recommendations to change the lifestyle. These recommendations include giving up on alcohol and smoking, changing the workplace and giving up on activities requiring sustained physical effort. Patients who went through surgeries gave up on their job, but not on household chores that require effort. They reported that they did not do any intense physical activities for a period following the surgery, but that they resumed these activities once they felt an improvement in their health status. Other causes of nonadherence to changing the lifestyle are as follows: lack of information, incorrect assessment of disease gravity, negligence, family and/ or social obligations, work environment and conditions.

3.5. Complementary and alternative medicine

Research subjects described situations when they completed the treatment recommended by the physician with methods specific to complementary and/or alternative medicine. For patients, complementary and alternative medicine means natural treatment and, in some cases, adopting a healthy lifestyle. Natural treatment refers to several situations: pills or teas that patients buy from pharmacies, herbal teas and other herb-based products purchased from other sources (local market, their own garden and friends), visits to persons with no medical qualification who treat diverse conditions (healers). Patients' actions in this direction are often conducted without consulting the physician.

R3 (67/F/u/11 g.): *I found a man in Constanța, who ... I have to get to him, but he is very expensive. The treatment is about 1,000 lei.*

A.L.: *What does he do?*

R3 (67/F/u/11 g.): *Oh, weeeel! Everything ... he deals with the insides. He does it all!*

A.L.: *And what kind of treatment? What does this treatment include?*

R3 (67/F/u/11 g.): *Oh ... numerous plants! With numerous plants! Uhh ... he treated a physician from Bucharest. Other physician told him she was dying and she should simply take her treatment for as long as she could. And she heard of this man. And she went to him ... and while they were talking, he asked the same things he always does, you know, for I spoke to him too, and I also say him talk on TV. And he also gave her a cup of tea to drink and at a certain point she said: I feel a sting here, and there, it burns here [the person from Constanța]: well, it stings and burns where the tea gets and works, those are the areas touched by the disease.*

A.L.: *Hmm.*

R3 (67/F/u/11 g.): *She says he gave her a treatment and that she got well ... the woman.*

In some situations, the physicians recommended teas and other herbal products as treatment auxiliaries, but they absolutely did not approve the replacement of the prescribed treatment. The information sources accessed by patients for natural treatments are the media (publications, various TV channels, the Internet), family, other patients, friends and co-workers. In some situations, after consulting these sources, patients discussed with the physician their intention of starting using a certain product. Rural female patients do not buy teas or other herbal products from pharmacies, because they prefer their own products. Patients know information about plants and their use from the elderly in the family. Urban patients learn such information from similar sources, but they prefer to purchase such products from pharmacies. Male patients, irrespective of age, education level or residence, do not feel the need to learn about natural treatments and they take such products only upon the recommendation of family members. Urban patients with a college degree associate natural treatments with bio products or least processed products.

3.6. Daily management of symptoms and stress management

Most patients – especially the older ones who have had a long experience with the disease – learnt to recognize and to anticipate when the disease would alter their normal body functioning. They built their own strategies to cope with crisis situations, by taking into account – within their daily activities – the possible alteration of their physical status, either due to medication, or to the interdiction of making effort. However, there are also enough situations when these strategies are designed to cheat. For instance, either some patients do not wish to or they cannot observe the recommendations of the physician concerning medication and diet. Holidays and family reunions are some of the situations when certain patients do not respect (partially or totally) the recommendations of the physician, though they are aware of the consequences of their actions.

The reports of research participants show that stress, in the context of the disease, can be both a cause and an effect. The most frequent situations when stress represents an effect of the disease refer to the uncertainty state experienced by patients regarding the evolution of the disease. In this sense, patients are more likely concerned with them becoming a burden for the other members of the family, than with the possibility of a tragic end. For patients who have had a long experience with the disease, stress became an element of normalcy, because it practically accompanied every episode of the deterioration in the general state of the patient. Patients with low education level (especially rural patients) report a permanent state of stress generated by the impossibility of mobilizing the financial resources necessary for healthcare.

Stress represents one of the causes of the disease when it refers to work conditions, nature or family relations, responsibility of supporting the other family members, presence of financial debts to banks.

In all cases, the physicians also recommend to patients to avoid stress. In some cases, the physicians recommended to patients to consult a psychologist or a psychiatrist for obtaining a treatment. These situations refer to patients diagnosed with toxic dilated cardiomyopathy, who continue to consume alcohol occasionally. Urban patients with high education level were the most receptive to the recommendations of the physician and they initiated actions specific to stress management. These actions refer to outdoor walks, trips with friends, watching theatre shows, self-suggestions, ignoring stimuli entailing stressful situations (mainly traffic-related), rest, etc. Patients with low education level avoid stressful situations by focusing their attention on household chores or, in case of the elderly, by spending quality time with their grandchildren.

3.7. Family involvement in the healthcare process

The family members of research participants were involved in all cases. The most common forms of help are moral and emotional support, financial support, medication management, information, substitution in case of works requiring sustained physical effort. In the families where the ill person is male, the spouse gets involved intensely in the healthcare process, by monitoring the medication intake, by determining and controlling the diet and activities, by providing information and offering emotional support. In the families of older persons with low education level within the rural setting, the young generation is the one providing support. In this case, the most frequent forms of support are financial support for purchasing the medication, information, help in household chores and emotional support.

4. Conclusions

(Self)-care of chronic condition is conducted starting from a mixed strategy. On one hand, patients take into account the recommendations of the physician; however, on the other, the healthcare process is based on a personal plan. The design of a self-care plan is based on a series of elements such as specific information on chronic condition and the patient's capacity of understanding it, experience in living with the disease, effects of the disease upon the patient's general state and the capacity of managing the symptoms of the disease, interactions between patient and healthcare providers and diverse institutions within the medical system. The design of a self-care plan is also based on quality of the relation between patients and healthcare providers, access to medical services and quality of services, resources of the patient for healthcare, the patient's capacity and will of implementing changes in their lifestyles, family involvement (Soitu 2014) in the healthcare and the patient's attitude toward the disease.

Patients' decisions within the healthcare process are based on information specific to the chronic condition and on the patients' capacity of understating and operating with this information. In this sense, the information need of patients is justified and influenced by system-specific factors (for instance, average duration of discussions with the family physician), by factors specific to chronic conditions (nature and complexity of the disease) and/ or by personal factors (understanding capacity and attitude toward the disease). Though the patient may have a proactive attitude, he/she may take a wrong path if he/she bases the actions on wrong ideas, or if he/she fails to understand the specifics of the chronic condition. Healthcare providers provide the necessary information to patients, but they do not assess the patients' capacity of understanding and the actions entailed by such lack of understanding. In this sense, the efficacy of healthcare depends on patients' compliance, mostly in case of patients with low education level. Patients with high education level are more autonomous in creating and managing treatment plans, and the main characteristics that ensure the efficacy of actions are caution and the desire of discussing with the physician.

In the opinion of patients, the essential element of (self)-care is the treatment. Patients do not see treatment as a set of integrated actions that includes correct drug administration, observance of a proper diet, avoiding sustained physical effort and implementing changes in their lifestyle. Patients adhere to treatment components in a differentiated and incoherent manner. Adherence to treatment components is influenced by social, economic, psychological factors or by factors specific to chronic conditions. Treatment efficacy depends on the coherence of the actions conducted by patients all aforementioned directions.

Family involvement in healthcare influences the quality and outcomes of the process. The availability of family members of becoming involved represents a key element in accomplishing the therapeutic partnership between patient, physician and family. This partnership is necessary for effectively orienting the effort and resources for preventing situations when – beyond good intentions – the care no longer has the effect of increase in life quality for the patient. In this sense, the physician is the one who has to coordinate all actions within the therapeutic partnership. In addition, within this partnership, it is possible to develop actions specific to preventive behaviour. The specific elements and factors that influence preventive behaviour within the aforementioned partnership represent the subject of a future research.

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