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PEOPLE LIVING WITH UNCONTROLLED HYPERTENSION: ADHERENCE AND BELIEFS IN THE MEDICAL TREATMENT

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ABSTRACT

The aim was to identify the beliefs emitted by uncontrolled hypertensive individuals related to adherence to prescribed drug therapy. A cross-sectional study was performed with 122 hypertensive patients admitted to a 24-hour Emergency Service, both genders, aged over 18 years, with pressure values greater than or equal to 140x90 mmHg, from June to July 2017. The variables surveyed were: sociodemographic data, adherence score measured by the Morisk Green scale and treatment-related beliefs, identified according to the Theory of Rational Action (TRA) constructs. The majority of the patients were female (65.6%), white skin color (59%), married (49.2%), retired (45.1%) and with low schooling 6.35 (\pm 5.42) years of study. Regarding adherence to treatment, most of the time it was low (56.6%). In relation to the salient behavioral beliefs, emitted by the advantages of adhering to treatment, we found: control the pressure (31.1%), improve health (22.1%), have no disease (14.8%) and none described advantage (13.1%); disadvantages: none (67.2%), dependence (19.7%), cost (2.5%), cough and side effects (1.6%) each. Among the salient normative beliefs related to the positive social referents were: children (48.4%), wife (22%), none (13.9%), husband (12.3%) and siblings %, and the negative ones, none (86.1%), religion (1.6%) and uncle, church friends and mother (0.8%) each. There was a low adherence to the treatment, although they mentioned no disadvantage and no one interfered negatively in the treatment. Thus, we suggest a study that seeks to evaluate the behavioral intention of these uncontrolled hypertensive patients to adhere to the treatment drugs for hypertension.

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INTRODUCTION

Increased Blood Pressure (\geq 140x90mmHg) caused 9.4 million deaths and 7% of disabilities worldwide in 2010. When uncontrolled, Systemic Arterial Hypertension (SAH) causes stroke, acute myocardial infarction (AMI), Heart Failure (HF), dementia, renal failure and blindness. Many modifiable factors contribute to the high prevalence rates of SAH, one of them is the inadequate access to health services (WHO, 2015), which

also is a contributor to non-adherence to treatment, especially medication (Barreto, 2015; Ribeiro, 2015; Vieira, 2014; Oliveira, 2013; Giroto, 2013; Pucci, 2012 and Carvalho, 2012). Among the ways to treat and control blood pressure levels, thus avoiding complications, we highlight the drug treatment, which consists of taking oral drugs (tablets), among them diuretics, angiotensin converting enzyme inhibitors and receptor blockers of angiotensin II, in combination or not; with

the aim of reducing morbidity and mortality due to Cardiovascular Diseases (CVD) (Malachias, 2016). In order to control blood pressure values and consequently the reduction of health problems, it is important that adherence to the pharmacological treatment, which corresponds to the agreement between the medical prescription and the patient's own conduct (Leite, 2003 and Cavallari, 2002). Admission of hypertensive patients to emergency and health emergency units with uncontrolled blood pressure levels is frequent (Vancini-Campanharo, 2015), many of them related to non-adherence to drug treatment. The admissions of women, white, married, retired and with low schooling are prevalent (Vancini-Campanharo, 2015). In this sense, the identification of non-adherence to antihypertensive treatment, as well as the factors related to this condition, may allow the elaboration of an intervention plan, with a view to increasing adherence to treatment, reducing the complications caused by hypertension and number of hospitalizations and admissions in the emergency and emergency services, which may reduce health system expenditures (Vancini-Campanharo, 2015). In addition to knowing factors that lead to non-adherence to treatment, understanding the beliefs that these hypertensives present in relation to what is prescribed is important to identify the behavioral intention of the patients in relation to their follow-up, enabling the elaboration and application of targeted strategies, which encourage and motivate the treatment.

In this sense, social psychology proposes theoretical models interested in studying the behavioral intentions of individuals with the scope of explaining human behaviors. Among the theoretical models, the Theory of Rational Action, widely used to understand health behaviors and to develop interventions, stands out (Jeon, 2006). The theory seeks to show the relationship between beliefs (behavioral and normative), attitudes, intentions and behaviors. According to theory, the attitude of the individual is determined by their beliefs about the attributes of performing behavior (behavioral beliefs - advantages and disadvantages), weighted by evaluations of these results or attributes. On the other hand, normative beliefs understand the opinions of referents (important people) who approve or disapprove of behavior, weighted by their motivation to fulfill certain action according to the belief of the referent (Fishbein, 2015). Thus, behavioral and normative belief are linked to behavioral intention and behavior, through attitude and subjective norm. In this sense, it is shown the relevance of studying the beliefs of uncontrolled hypertensive patients in relation to drug treatment, in light of the Theory of Rational Action, once these beliefs are known, targeted interventions can be elaborated in order to reduce the patient index hypertensive patients with increased blood pressure levels in the emergency and emergency departments. This study was pioneering in Brazil, addressing the beliefs of people living with uncontrolled hypertension in relation to the treatment for SAH based on the constructs of the Theory of Rational Action, and proposed the following objective: to identify the beliefs emitted by uncontrolled hypertensive individuals related to adherence to prescribed drug therapy.

MATERIALS AND METHODS

This was a quantitative, descriptive and cross-sectional study, developed at a 24-hour Emergency Unit (UPA 24h) in the city of Campina Grande, Paraíba, from June to July 2017. The study included hypertensive patients with BP values > 140/90 (uncontrolled) who were admitted to the screening area and

who met the following criteria: patients older than 18 years, of both genders, with a previous diagnosis of hypertension arterial hypertension; in use of medication for BP control for at least six months, presenting BP $\geq 140 \times 90$ mmHg and with right arm brachial circumference of 22-32 cm. After admission of the subjects in the screening, those with BP $\geq 140 \times 90$ mmHg, in the routine measurement of the service, were accused of the diagnosis of SAH, and in the case of affirmation, they were invited to participate in the study.

With the subsequent explanation of the objectives of the research and signing of the free and informed consent term. To confirm the value of BP and to frame the subjects in the research, the researchers, after this first approach, performed a new BP measure. For this procedure, an inelastic tape measure was used to verify the BP and to fit those subjects to the available cuff 22-32 cm, and the measurements were performed according to the recommendations of the 7th Arterial Hypertension Guideline, with an onometricoscillometric sphygmomanometer, model Hem-7200. In order to raise the hypertensive beliefs about drug treatment for hypertension, a direct form was applied, composed of four open questions addressing the subject's beliefs about the drug treatment in use, based on the two constructs of the Theory of Rational Action (behavioral beliefs and normative beliefs).

Behavioral beliefs were raised by asking the following questions: What are the advantages of adhering to the prescription drug treatment for high blood pressure? And, What are the disadvantages of adhering to the prescription drug treatment for high blood pressure? These questions aimed to characterize the patient's attitudes, identifying the attributes related by the patient to their treatment (behavioral belief). Already in the survey of normative beliefs, the following questions were asked: which people, important to you, who consider that you should adhere to the prescription drug treatment for hypertension; and which people, important to you, consider that you should not adhere to the prescription drug treatment for high blood pressure. These questions dealt with the subjective norms of the patient, identifying their groups of references, normative beliefs and motivation to agree with these groups. For the analysis of the data, we considered the beliefs most emitted by the subjects, with a minimum frequency of five times and presenting a proportion greater than 75% of the total beliefs, considered by the theory as salient modal beliefs (Moutinho, 2010). Afterwards, the adherence to the drug treatment was investigated by applying the *Morisky Medication Adherence Scale 8-item scale* (MMAS-8), a validated scale for Brazil (Oliveira-Filho, 2014 and Oliveira-Filho, 2012), and the most used in studies evaluating adherence to pharmacological treatment for hypertension in adults, in which the maximum score is 8 points, which indicates high adherence; of 6-7 points average adherence and 0-5 points low adherence to drug treatment for hypertension. After the data collection, the data were inserted in a spreadsheet and later submitted to descriptive statistical analysis through the statistical program SPSS version 21.0, and the results presented descriptively and in tables. The research was authorized by the Ethics and Research Committee of the University Hospital Alcides Carneiro, IRB number: 2.065.089 and carried out in accordance with the ethical assumptions of Resolution 466/12 of the National Health Council / Ministry of Health.

RESULTS

The sample consisted of 122 subjects, of whom 80 (65, 6%) were female. The mean age of the subjects was 61.25 (\pm 14.48) years. Regarding skin color, 72 (59%) declared themselves white, 99 (81.1%), married 60 (49.2%) were accompanied and had a mean educational level of 6.35 (\pm 5.42) years of studies. Retired occupation / 55 (45.1%) prevailed and the average family income was 1.1 (\pm 0.93) minimum wages. The study confirmed that the sample of hypertensive subjects presented blood pressure levels \geq 140/90 mmHg, with mean systolic blood pressure (SBP) 169.3 (\pm 20.24) mmHg with a variation of 140-223 mmHg, and Diastolic Blood Pressure (BDP) 97.53 (\pm 16.49) mmHg and variation of 69-163 mmHg. In the present study, a direct correlation between blood pressure levels and adherence to drug treatment, measured by MMAS-8, was found in 69 (56.6%), mean adherence 35 (28, 7%) and high adhesion 18 (14.5%) of the hypertensives of the sample. Considering behavioral beliefs about adherence to oral antihypertensives, fifteen analytical subcategories emerged. Seven representing advantages related to the behavior of adhering to oral antihypertensive agents (Table 1).

Table 1. Positive behavioral beliefs related to adherence to drug treatment for hypertension (oral antihypertensive drugs) and treatment adherence scores. n = 122. Campina Grande, PB, Brasil. 2017

Behavioral Beliefs	N (%)*	Score
<i>What are the advantages of adhering to the prescription drug treatment for high blood pressure?</i>		
#Control the pressure	38(31,1)	4,7
#To improve health	27(22,1)	4,8
# To have no disease	18(14,8)	5,5
No advantage	16(13,1)	4,5
# Do not feel bad	11(9,0)	5,0
Doctor prescribed	07(5,7)	5,1
# Low pressure	06(4,9)	5,8

*number of beliefs exceeds the number of subjects, since some subjects reported more than one advantage in using oral antihypertensives to control hypertension.

Among the advantages, considered salient modalities for this sample, according to the TAR constructs, six were highlighted: controlling the pressure, improving health, not having disease, not feeling bad, the doctor passed and lowering the pressure. No advantage was also reported by 16 (13.1%) hypertensive patients. Some speeches, referring to the advantages in adhering to treatment medications were more salient, among those interviewed, such as: *Control, help in health. Even without a cure, there is control* (Subject 90); *To improve health* (subject 117); *To avoid stroke and infarction* (Subject 100); *So far nothing has happened, I did not see the result of the medication* (subject 103). Although they had several advantages in adhering to antihypertensive treatment, two analytical subcategories emerged, representing the disadvantages of performing the treatment (Table 2).

Table 2. Negative behavioral beliefs related to adherence to drug treatment for hypertension (oral antihypertensive drugs) and treatment adherence scores. n=122.Campina Grande, PB, Brazil. 2017

Behavioral Beliefs	n(*)*	Score
<i>In your opinion, what are the disadvantages of adhering to prescribed medication for high blood pressure?</i>		
None	82(67,2)	5,2
Dependency	24(19,7)	3,8

*number of beliefs exceeds the number of subjects, since some subjects reported more than one disadvantage in using oral antihypertensive drugs to control hypertension.

The following excerpts reveal the negative behavioral beliefs most often referred to by the sample, demonstrating drug dependence: *"The nuisance of having to take every day, you feel attached to that thing ..."* (Subject 62) as the most prevalent. It was also observed that "no disadvantage" was the most cited criterion 82 (67.2%), explicit by the speech: *"None, because it is cheap and I get it in the primary care unit"* (Subject 64). Regarding the normative beliefs, which were issued when identifying the important people that could interfere in the treatment, the participants identified 6 groups of positive social referents.

Table 3. Positive normative beliefs related to the behavior of adhering to drug treatment for hypertension (oral antihypertensive drugs). n = 122.Campina Grande, PB, Brazil. 2017

Normative Beliefs	n(*)*	Score
<i>In your opinion, which people, important to you, consider that you should adhere to the prescription drug treatment for high blood pressure?</i>		
Children	59(48,4)	5,1
Wife	18(22,0)	5,0
Nobody	17(13,9)	4,8
Husband	15(12,3)	4,6
Brothers	08(6,6)	5,7
Mom	08(6,6)	3,6

*number of beliefs exceeds the number of subjects, since some subjects reported more than a positive referent in making oral antihypertensive drugs to control hypertension.

Among the positive references that encourage hypertension respondents to adhere to the prescribed treatment, the most salient speeches stand out: *"My son, he gets angry when I do not take"* (Subject 1); *"No one tells me, I take it myself"* (Subject 66); *"My husband, he warns me not to forget"* (Subject 28).

A high incidence of speech was observed, indicating that no one interfered negatively in the treatment 105 (86.1%), demonstrating that people important for these hypertensives did not negatively interfere with treatment or did not influence them in relation to follow-up. Although most of the subjects reported that *there was no disadvantage* in performing treatment 82 (67.2%) and that *no one* interfered negatively in performing treatment 105 (86.1%), a high rate of nonadherence to treatment was found in this sample hypertension, which can be further analyzed in the discussions that follow.

DISCUSSION

The profile of the patients served in this study is similar to studies performed in different regions of the country (Vancini-Campanharo, 2015 and Santos, 2013), with predominance of white skin women, married, retired and with low schooling. As for the age group of hypertensives attended, the elderly predominated, corroborating with the authors (Vancini-Campanharo, 2015 and Santos, 2013), and comparing studies that identified a larger proportion of adult patients (Jesus, 2016 and Lacerda, 2010). The high incidence of hypertensive elderly people in the emergency services may be related to the absence of early diagnosis and appropriate treatment in adulthood, resulting in the complications of uncontrolled SAH, and with an increase in life expectancy, causes more elderly people to seek more health services in search of a better quality of life. The mean SBP and DBP of this study was higher than those found in the study (Vancini-Campanharo, 2015), but resembled those found by Jesus *et al* (Jesus, 2016).

This data can be justified by the fact that the patients admitted to the Vancini-Campanharo study were approached 24 hours after admission to the service, making it possible to adjust these pressure levels by administering medications during this period; in this study and in Jesus' study, BP measurement was performed immediately after screening, even before the client received any drug to decrease blood pressure values. Regarding adherence to the prescribed treatment, a study (Vancini-Campanharo, 2015) Identified a proportion (56%) of hypertensive patients presenting moderate adherence to treatment, which converges to the proportion of low adherence (56.6%) in this group study. Adherence to drug therapy for hypertension is considered a challenge for health professionals accompanying hypertensive patients. With the advancement of age, the absence of specific symptoms, the time of diagnosis and treatment, associated to the number of medications taken daily, and the difficulties of senility, the elderly may feel discouraged to continue following the prescription, which may be justified by the low adherence to pharmacological treatment for this sample.

In this sense, we sought to identify the beliefs that these subjects present in relation to the medical prescription follow-up, through their subjectivity and their beliefs in the treatment, since there are beliefs that affect individuals in order to present different degrees of adherence to the behavior studied, among them: the personal beliefs about a certain behavior, the advantages and disadvantages of assuming it, and the perceived social pressure to act in a certain way towards it (Cavalcanti, 2007). In relation to the behavioral beliefs, are those that refer to the degree that the person evaluates as favorable or unfavorable a behavior in question, since normative beliefs refer to influence that important people present in agreeing or disagreeing on the performance of the behavior (Fishbein, 2015). The salient modal beliefs, selected for discussion in this study, are those that were most often emitted by a large number of participants (Moutinho, 2010). In this discussion the modal beliefs (five most frequently emitted) with a proportion greater than 75% of the beliefs emitted. In the meantime, the advantages in adhering to the prescribed drug treatment were: control pressure, to improve, not to have disease, not feel bad, the doctor passed and lower the pressure. The most commonly reported disadvantage was dependence. On the other hand, the salient modal normative beliefs were the positive ones: children, wife, husband, brother and mother; and in the negative ones, it called attention to nobody to influence in the follow-up of the treatment.

The responses *controlling the pressure and lowering the pressure* as advantages diverge from the findings of the degree of adherence to drug treatment (score 4.7 and 5.8, respectively), which most had low adherence and uncontrolled blood pressure ($\geq 140 \times 90$ mmHg) at screening admission. This finding infers that even the patients, most of whom are aware of the objective of the drug treatment, have a low adherence because they remain with their blood pressure values uncontrolled. This may have occurred due to low educational level and sedentary lifestyle, associated to partial knowledge about the disease and its complications. The reported benefit *to improve* (score 4.8) shows the belief in the drug treatment for hypertension in the perspective of curing the disease, since most of the time hypertension has asymptomatic follow-up. This belief may influence the low adherence to the treatment, since the hypertensive ones start to take teas and juice instead of the prescription drugs, because as

the years of diagnosis and treatment time pass, there is the perception that there are no effects visible or the cure of SAH only with the taking of the prescribed tablets, leaving them to take, opting for tea or juice, in the presence of symptoms. A study by Gama and Mussi (Gama, 2012) found that the majority of hypertensive participants did not seem to understand their illness as being of a chronic nature because they had no understanding about the time of treatment and believed that in the first five years of diagnosis there would be a cure. As a study developed by Lokita (Lokita, 2013), hypertensive patients believed that drug therapy, combined with the action of healers and the use of teas and juices, would potentiate the cure of hypertension, and in the perception of hypertension, traditional medicine is more accessible and effective than the pharmacological, especially in relation to the side effects, the disadvantage of the drug therapy also referred to in this study, thus justifying the low adherence to the drug treatment for SAH. As health professionals, especially in the Northeast region of Brazil, it is our duty to know this hypertensive population under pharmacological treatment, as well as their beliefs in empiricism, which is still present in the region, reflecting with this population on the beneficial effects of the prescribed therapy, as well as discuss with them about the traditional medicine adopted by the hypertensive, who has the belief that this is better than prescribed, showing the benefits and harms of this association. Another advantage reported more frequently was *not to have disease* (score 5.5), thus showing the fear of complications associated with hypertension, because in this category, AMI and stroke were cited. This aspect may favor the adoption of positive behaviors in relation to care with the disease (Péres, 2003). However, despite referring to the knowledge about the complications of SAH, adherence to treatment was still low for these respondents, thus demonstrating that only having knowledge about a certain subject is not enough to change health behavior.

Therefore, strategies that motivate and motivate these hypertensive individuals to reflect on the behavior of adherence to drug treatment for hypertension are imperative for this sample, aiming to change behavior in relation to adherence to the prescribed treatment, minimizing the occurrence of health problems, patients. The study (Jeon, 2006) which carried out phone-based interventions, addressing aspects related to the behavioral and normative beliefs of hypertensive subjects, was able to increase the adherence to drug treatment for hypertension by 13%, showing the magnitude of motivating strategies and directed the beliefs of individuals on adherence to pharmacological treatment. According to a widely published review (Winter, 2016), there is enormous potential for the use of enabling interventions in technologies to improve modifiable health behaviors associated with CVD, including adherence to drug therapy for hypertension. To optimize these interventions, these should be based on integrated behavior change theories that incorporate a variety of evidence-based health behavior change techniques.

The belief *do not feel bad* (score 5.0) shows a concern with the quality of life, since when it is impaired it will influence all of its life process, especially the work, but even the hypertensive referring to this belief, the Adherence score is low, a possible reason is the lack of associability of adherence with other factors, such as the prevention of inappropriate habits, which results in the improvement of the quality of life as presented in the study (Marin, 2016). Regarding the answer, *the doctor*

prescribed (score 5.1), demonstrates an obligation both in adherence to treatment and in consultations in basic units, usually for users, health professionals are holders of knowledge, their guidelines must be obeyed, many nor questions to know the medications, their advantages and adverse effects. This situation results in a passivity of the users in the health care, even being the protagonists, end up submissive (Chaves, 2018 and Reiners, 2009). It is important that service professionals assist in this change of role, which will result in qualified listening and consequently an improvement in health care. Among individuals who reported *no benefit* (score 4.5) 16 (13.1%), this finding may be associated with the characteristic of asymptatology offered by the pathology, causing the hypertensive person to not see particular benefits in taking the antihypertensive medications³⁰, thus contributing to the low adherence to the pharmacological treatment found, since the adherence to the therapeutic regimen is greater for those who present frequent or severe symptoms, which impairs the quality of life. When mentioning any advantages in adhering to the treatment, it is observed the absence of intention that positively influences the behavior, since it does not find an advantage in adhering to the drug therapy, it facilitates the abandonment of the treatment. Thus, professionals should be aware of this type of belief, since this is the starting point for the attitude of performing health behavior that will minimize the complications of CVDs. *The dependence* was described in less frequency, but it is observed that it is a relevant disadvantage and corroborates with the finding of the TMAAS (score 3,8), demonstrating the nonconformity due to having to take the medicine every day. The minority listed cost as a disadvantage, this is due to the fact that most of the medications used are distributed free of charge by SUS and the Home Health Program of the municipality of Campina Grande, which takes the medication in the residence. Behavioral beliefs regarding the disadvantages in adhering to drug treatment predominantly reported *none* (score 5.2) disadvantage in response. This fact also confronts the low degree of adherence, because if there is no disadvantage, it should be a factor that influences the intention to generate behavior in adhering fully to drug treatment. Although the perception of disadvantage in adhering to the treatment does not necessarily imply the coherence and effectiveness of the action, the belief is in itself a strong predictor of behavior (Pires, 2008). The subjective norms refer to the person's perception of the social pressure exerted on the subject in order to encourage or not to perform the behavior. In order to identify normative beliefs that generate subjective norms, we evaluated the variables that indicated which people were important to them, who considered that they should adhere to the prescribed medication treatment.

It was verified that the most frequent positive subjective norm and respective adherence scores: *children* (5.1), *wife* (5.0), *none* (4.8) and *husband* (4.6). It is important to highlight that the health professional should consider the social referents in strategies that motivate the hypertensive patient to adhere to the treatment and propose interventions that consider these, considering that those who reported these referentials presented the highest compliance scores. Among the most frequent positive social referents, we draw attention to the referring *no one* (4,8). We observed in this response a lack of motivation or self-care regarding the treatment of hypertension, a fact that may be related to psychological factors not addressed in this study, but which directly interfere with adherence to treatment, observed in the score presented by

those who said "no one" as a positive reference. A study that applied an educational strategy based on beliefs, attitudes, subjective norms and perceived control, concluded that educational programs are useful and necessary to improve adherence behavior to medication treatment for hypertension. The authors believe that subjective norms may influence the self-monitoring behavior of drug treatment for hypertension, and strategies involving family members, relatives or friends that have a positive influence on patients may strongly affect the self-care of these patients in relation to prescribed drug therapy, especially for the female gender (Baghianimoghadam, 2010). Finally, with respect to negative social referents, *no one* was identified (score 4,8) as the most cited and with a score identical to that assumed as a positive referential. Negative normative beliefs were not evidenced, as a relevant factor in adherence to the drug treatment in this study, considering that the great majority has no important person that negatively influences adherence. However, those subjects who presented better scores regarding the treatment, referred *the partner* (score 8.0), *religion* (7.5) and *friends of the church* (7.0) as the referents that negatively influence the treatment. This finding is important in the sense that educational strategies that promote adherence to treatment are taken to places other than the walls of health institutions. As beliefs, which many people still associate with religiosity, and as quoted by some subjects, religion is interfering negatively in the treatment, the health professional's view, for educational actions that motivate adherence to the treatment, are directed to religious communities, was an important finding of this study.

This study presented the limitation in not addressing the facilitating or hindering factors in adhering to drug treatment, constructs of the Theory of Action planned, an expansion of Theory of Rational Action, such as Control Beliefs. Since a study by Barreto *et al.* (Barreto, 2015), in which the knowledge about hypertension associated with non-adherence to pharmacotherapy was verified, it was found that those hypertensive individuals who had little knowledge about the disease were more likely to not adhere to the drug treatment, thus, knowledge about the disease and treatment a difficulty in adherence to treatment. Another aspect of great relevance that is found in different studies on adherence to drug treatment, and that makes treatment difficult, concerns access to medicines. Because no subject mentioned this finding, even without asking them the factors that hinder adherence, it can infer that the non-taking of the drugs is not related to access to them. In Campina Grande, the municipality provides the medicines directly in the homes, besides the popular pharmacy being very accessible to these users, reason why, it is believed, that the low adhesion can not be related to the lack of access to the drugs.

Conclusion

Most of the subjects presented low adherence to the treatment, thus, most of the participants are not assuming nor actively participating in their treatment. On the other hand, no one reported a disadvantage regarding treatment and there were no negative interferences. In view of the result, it is evident that the diagnosis of hypertension and a therapeutic regimen are not enough, it is necessary to understand the causes that make it impossible for the medication adherence so that health professionals can act on these factors, avoiding future complications. Therefore, we suggest studies that seek to evaluate the behavioral intention of these uncontrolled

hypertensive individuals to adhere to the drug treatment for hypertension.

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