

Diet and Attitude as Predictors to the Compliance on Medication Regimen among Hypertensive Unit Heads/Unit Managers

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ABSTRACT

Hypertension (HPN) is the elevation of arterial blood pressure with a systolic pressure of 140 mmHg or greater and a diastolic pressure of 90mmHg or more. The study aimed to determine the compliance on medication regimen among unit heads or unit managers. The study utilized the descriptive-correlational research design to determine the relationships between variables. The participants were the 46 Unit Heads/Unit Managers chosen by means of purposive sampling. Questionnaire was the main tool for data gathering. The data were analyzed using percentage distribution, weighted mean, standard deviation, Pearson Moment Correlation Coefficient, and Multiple Regression Analysis. The findings revealed that majority of the respondents had a monthly income of 16,000 (364 USD) to 20,000 (455 USD), have 4 to 6 children, chairpersons of a department in a government agency, and has antihypertensive medications for less than a year up to five years. Likewise, majority of the participants were diagnosed with Stage 2 HPN and currently taking two types of antihypertensive medications. Majority strongly agreed on the information about hypertension. Lifestyles regarding diet as well as attitude are predictors for compliance to antihypertensive medication.

Keywords— Health Education, diet, attitude, compliance, medication regimen, hypertensive, descriptive-correlational, Marawi City

INTRODUCTION

According to World Health Rankings, the hypertension death rate per 100,000 age standardized Estonia is ranked first at 73.73% and the Philippines ranked eleventh at 38.20% (World Health Organization, 2014). One of the most important modifiable risk factors for coronary heart disease, stroke, congestive heart failure, end-stage renal disease and peripheral vascular disease is hypertension (Smeltzer, Bare, Hinkle, Cheever, Townsend, & Gould, 2004). Health care professionals identify and treat patients with hypertension, they also promote a healthy lifestyle and preventive strategies to decrease the prevalence of hypertension in the general population. Hypertension is the fifth among the prime causes of morbidity and fifth among the leading causes of mortality in IPHO Lanao del Sur in the year 2002 (Social Watch Philippines, 2007).

The treatment of hypertension does not call for any heroic measure: regular checking of the blood pressure, a few painless changes in one's eating and living habits, and taking the prescribed medication every day. If hypertension is detected and treated on time, hypertension should not stop a person from his normal and productive life. All that is required are determination and close doctor-patient cooperation (Wolff, 2008). Patients with Hypertension (i-SEARCH) gained further insights into national and regional blood pressure control and antihypertensive pharmacotherapy prescribed in cardiology practice. A total of 22,282 patients with hypertension from 26 countries were enrolled in 2005-2006. A total of 18,652 patients were treated (mean age, 63.0 ± 11.4 years; 52.2% male; mean body mass index, 28.9 kg/m²). Mean systolic blood pressure was at 148.2 ± 19.8 mm Hg and diastolic blood pressure was at 86.7 ± 11.6 mm Hg. Blood pressure was controlled in 8.3% of diabetic and 25.3% of nondiabetic patients (21.2% overall) with particularly good control rates in North and Latin America (28.0% and 30.6%, respectively). A total of 31.2% of patients were treated with 1, 39.7% with 2, and 29.1% with ≥ 3 drugs. β -blockers were being used most frequently (47.9%), in both monotherapy and combination therapy despite low numbers of patients with respective compelling indications for their use. The present data illustrate the potential for an improvement of blood pressure treatment and control in daily cardiology practice (Bramlage *et al.*, 2010).

FRAMEWORK

The framework of the study was adopted from the Health Promotion Model by Nola J. Pender (Pender, Murdaugh, & Parsons, 2006). It states that man has the capacity for reflective self-awareness, including the assessment of his competencies. The man also seeks to regulate his behavior. It also states that health professionals are the important part of the interpersonal environment of individuals, and they may influence the individuals over time. This theory on health promotion is very relevant to the study as it gives focus on the health promoting behavior of a person which is to have a healthy diet, follow a regular medical consultation to his attending physician, and to comply with the prescribed antihypertensive maintenance medications to prevent health complications.

OBJECTIVES OF THE STUDY

The objective of this study is to determine the lifestyle of the hypertensive unit heads/managers of Marawi City as predictor to their compliance on medication regimen.

METHODOLOGY

The study utilized a descriptive-correlational research design to describe the independent variables such as the level of knowledge on hypertension, perception on the effects of medication and lifestyle of the respondents regarding diet, physical activity, and emotional aspect as well as the participant's attitude towards medical consultation. The study is conducted in Marawi City. Purposive sampling is used in obtaining the participants who are heads of units and diagnosed hypertensive with maintenance medications prescribed by their physicians. The study utilized a researcher-made questionnaire in data collection after a dry run/try out and yields 80% reliability. The 46 participants of the study were obtained after signing an informed consent. The statistical tools used in the study are frequency and percentage distribution to determine the respondents' profile, weighted mean and standard deviation to compute for various items on the independent and dependent variables. Pearson Product Moment Correlation Coefficient was also used to correlate the variables and Multiple Regression Analysis to determine whether the profile of the participants intervene on the relationship between the independent and dependent variables.

RESULTS AND DISCUSSION

The results of the study show that the respondents sometimes take their antihypertensive medication because of the following reasons: 1) they are very busy in their work, and 2) they have less knowledge on the effect of taking their medications regularly as mentioned by the respondents during the interview. It also means that the participants of the study take their medications only if it is available at home. According to Longmore, Wilkinson and Rajagopalan (2004), it is important to be committed to taking antihypertensive medication everyday as most people do not have symptoms from high blood pressure. If proper diet is being followed and accompanied with regular consultation or medical check-up, then compliance to medication will be achieved.

Table 1. Extent of Compliance to medication among hypertensive heads of units

Indicator	Mean	Standard Deviation	Qualitative Response
Taking of Anti-Hypertensive Medications Religiously	3.28	1.05	Sometimes

The respondents of the study sometimes eat proper diet. It is because they eat calories, eat more spicy foods and food high in carbohydrates and they eat more of the non-nutrient food group. Foods high in cholesterol will thicken the blood with fat, and forces the heart to work harder raising the blood pressure (American Heart Association, 2008). High blood pressure can cause damage to the heart as it forces the heart to work harder. A diet high in saturated fat, obesity and lack of exercise can put a person at risk. They all contribute to the increase in cholesterol and blood fats/lipids that clog or block coronary arteries (Hutchinson, 2003). It is also noted that respondents sometimes do physical activity. It is because they do not have regular exercise, they ride their vehicles in going to and from the office, and they usually spend their time in their desk most of the time. Another cause of hypertension is the lack of exercise, the occupation disorder of so many who spend their working life behind desks, factory benches, or the wheel of a car (Wolff, 2008). This implies that the respondents do not maintain a regular physical activity.

Generally, it appears that increased exercise level is associated with reducing blood pressure, increased levels of plasma high-density lipoprotein (HDL), and lower plasma value of cholesterol, triglyceride, and low-density lipoprotein (LDL) (Nowak & Handford, 2005).

Table 2. Relationship of Lifestyle in terms of Diet and their Compliance to Medication among Hypertensive Heads of Units

Lifestyle	R	Interpretation	To	Relationship	Tc	Result	Interpretation	Conclusion
Diet VS Compliance On Medication Medication	0.294	Moderate	2.063	>	2.017	Reject Ho factor for	Significant	Diet is a Compliance on

Table 3 Attitude towards Medical Consultation among Hypertensive Unit Heads/Unit Managers

Indicator	Weighted Mean	Standard Deviation	Qualitative Description
A visit to attending physician regularly	2.91	0.94	Sometimes

The heads of units involved in the study sometimes have clinic visit to their physicians which means that the heads of units visit or consult a doctor every after three months. Further, heads of units sometimes go for medical consultation due to the following reasons: hectic schedule, lack of consciousness on health, distance from where the doctors have their clinic, and long waiting before seeing the physician due to many clients.

The study revealed that there is a significant relationship between the respondent’s lifestyle regarding diet and the attitude towards medical consultation to the compliance on medication among heads of units. Fifteen studies showed an association between patients’ negative attitude towards therapy (e.g. depression, anxiety, fear or anger about the illness) and their compliance. There were studies reporting that children and adult treatment make them feel stigmatized or feel pressured because they are not as normal as their friends or classmates or officemates. Therefore, negative attitude towards therapy should be viewed as a strong predictor of poor compliance (Jin, Sklar, Oh & Li, 2008). Moreover, attitude towards medical consultation among Meranao individuals become nullified because of the reason that they have to wait for some hours before the physician can attend to their needs.

CONCLUSION

The unit heads/managers were diagnosed as hypertensive stage 2 hypertension with systolic pressure ranging from 160 to 179mm Hg and a diastolic pressure of 100-109 mm Hg. Majority of them did not follow the prescribed medication regimen due to the reason of taking the medication only if it is available. They occasionally made consultation to their physicians with an interval of three months. Diet as part of their lifestyle showed to be significant with their compliance to the medication regimen of the unit heads/managers. Majority (60.87 %) of the unit heads/managers found to be compliant on the treatment regimen prescribed by their physician as evidenced by following the prescribed diet, regular consultation and regular intake of the prescribed antihypertensive medicines.

TRANSLATIONAL RESEARCH

The findings of this study would serve as the basis in the formulation of a comprehensive health programs for the unit heads/managers in a form of health education through trainings and seminar that may include management of hypertension and promotion of a healthy lifestyle. The Dietary Approaches to Stop Hypertension (DASH), regular consultation/medical check-ups, and taking of antihypertensive maintenance medications have to be intensified worldwide.

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