

HEALTH EDUCATION FOR HYPERTENSION MANAGEMENT: A PANACEA TO HEALTH PROMOTION

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Abstract

Health education for hypertension management being one of the life's greatest treasures has been discussed in this work. The discussion was based on symptoms of hypertension, diagnosing hypertension, management of hypertension and nutrition intervention for hypertension. Several factors associated with hypertension were mentioned in the work. Some health practices such as eating more high-fiber foods, less sugar, less salt, and less fat that would go a long way reducing the risk of developing heart disease were also discussed. It was discovered that physical activities, rest, relaxation, and sleep for hypertension management cannot be overemphasized.

Key words: Health, hypertension, management and health promotion

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Introduction

Health education is the part of health care that is concerned with promoting healthy behaviour (Briggs, 2010). Continuing, the author states that through health education, people understand and are aware of the behaviour that affects their health. Health education focuses in people's ways of life and behaviour.

Health education for hypertension management is one of life's greatest treasures. People are afflicted with all kinds of ailments, among which hypertension, stroke, cancer, diabetes and cirrhosis of the liver rank high (Ene, 2004). Being aware of the prevailing condition, the best option for avoiding or managing such situations should owe a lot to health education.

Throughout man's existence, man moves front and back on a healthy- illness continuum. Exposure to health education and behavioural patterns go a long way in determining where on the continuum man spends most of his life. Nutrition intervention and involvement in physical exercises in the management of hypertension cannot be overemphasized. Ellie and Sharon (2008) state that on daily bases and several times in a day, one makes food choices that influence one's health for better or worse. The authors continuing stated that each days choices may benefit or harm one's health only a little, but when these choices are repeated over the

years and decades, the rewards or consequences become significant. That being the case, paying close attention to good eating habits and physical exercise now can afford one health promotion later.

Hypertension, also referred to as high blood pressure, is a condition in which the arteries have persistently elevated blood pressure (Hypertension News on Twitter, 2013). The normal level for blood pressure according to hypertension news on twitter (2013) is below 120/80, where 120 represent the systolic measurement (Peak pressure in the arteries) and 80 represents the diastolic measurement (minimum pressure in the arteries). Continuing, the author states that blood pressure between 120/80 and 139/ 89 is called pre-hypertension (to denote increased risk of hypertension), and a blood pressure of 140/90 or above is considered hypertension. Hypertension may be classified as essential or secondary. Essential hypertension is the term for high blood pressure with unknown cause. Secondary hypertension is the term for high blood pressure with a known direct cause such as kidney disease, tumors, or birth control pills (Dale & Wayne, 1994). Whichever the cause falls under, health education for hypertension management is of great importance to health promotion.

Health education for hypertension management

Health education for hypertension management cannot be effective if the causes of hypertension are not outlined. Though the exact cause of hypertension is usually unknown, there are several factors that have been highly associated with the condition. These factors include: Smoking, obesity or being overweight, diabetes, sedentary lifestyle Lack of physical activity, high level of salt intake (sodium sensitivity) Insufficient calcium/potassium and magnesium consumption.

Other factor also include: Vitamin D deficiency, high levels of alcohol consumption, stress, ageing, medicines such as birth control pills, genetics and a family history of hypertension, chronic kidney disease, adrenal and thyroid problems or tumors. (www.medcia.newstoday.com/articles/,2013).

Symptoms of Hypertension

There is no guarantee according to recent findings (Hypertension News on Twitter, 2013) that a person with hypertension will present any symptoms of the condition. About 33% of people actually do not know that they have high blood pressure and this ignorance can last for years. It is then very advisable to undergo periodic blood pressure screenings even when no symptoms are present.

However, recent researches have shown that extremely high blood pressure may lead to some symptoms such as severe headache, fatigue or confusion, dizziness, nausea, problems with vision, chest pains, breathing problems, irregular heartbeat, blood in the urine ([www medical news](http://www.medicalnews.com), 2013).

Diagnosing hypertension

Hypertension should be diagnosed by a health professional who measures blood pressure with a device called a sphygmomanometer the device with the arm cuff, dial, pump, and valve. The systolic and diastolic numbers will be recorded and compared to a chart of values. If the pressure is greater than 140/90, the individual would be considered to be hypertensive.

A high blood pressure measurement may be spurious as a result of stress at the time of the examination. In order to perform a more thorough diagnosis ([www medical news](http://www.medicalnews.com), 2013) states that physicians usually a physical examination and ask for the medical history of the individual concerned as well as the family. Doctors will need to know if the individual concerned has any of the risk factors for hypertension, such as smoking, high cholesterol, or diabetes.

If, hypertension is queried, tests such as electrocardiograms (EKG) and

echocardiograms will be used in order to measure electrical activity, of the heart and to assess the physical structure of the heart. Additional, blood tests will also be required to identify possible causes of secondary hypertension and to measure renal function, electrolyte level, sugar level and cholesterol levels (www medical news, 2013).

Management of hypertension

The main goal of management of hypertension is to lower blood pressure to less than 140/90- or even lower in some groups such as people with diabetes, and people with chronic kidney disease. Managing hypertension is important for reducing the risk of stroke, heart attack and heart failure. High blood pressure may be managed medically, by changing life style factors, or a combination of the two. According to www.med.News today; (2013), important life style changes include losing weight, quitting smoking, .eating a healthy diet, reducing sodium intake, exercising regularly and limiting alcohol consumption. If blood pressure is successfully lowered, it is wise to have frequent checkups and to take preventive measures to avoid relapse of hypertension. Management of hypertension can also be carried out under the following sub headings:

i. Nutrition intervention for hypertension management

A recent- research finding (news room.Heart.org./news/2013) opines that a cup of Beetroot juice each day can reduce blood pressure in hypertensive patients. The researcher started off with examining what the impact of consuming nitrates might be on laboratory rats and confirmed his findings with 15 volunteer humans, all with hypertension. It was discovered that a cup of beetroot juice daily lowered 10 mm Hg for 24 hours.

The following 17 Nigeria foods can help burn fat off the body for hypertension management.(news room, heart org/news/ 2013).

There are foods that can help you burn fat off your body. These include: plantain (Green), lemon (Zap some of it in water to drink daily),red and green pepper, water melon (juicy), ginger, beans, soya beans , grapes, nuts (cashew, peanuts & walnuts) contain omega 3 healthy fat. Others also include : mush rooms, sea foods (e.g. sardine, crabs, crayfish crustaceans), olive oil, onion and garlic, wheat and oat based food (wheat bread, wheat meal, quake oats), bananas, African mango, Brown or ofada rice(healthier than white rice) (naija weightloss.com/17, 2013).

When one improves on one's dietary health, this would lead to reducing the risk of developing heart diseases. Dale and Wayne (1994) state that it is very likely that you can improve your dietary health and reduce the risk of developing heart disease and cancer by implementing the following practices, eat more high-fiber foods, eat less sugar, use less salt, and eat less fat.

For high fiber food, one can eat such foods as dried beans, peas, "okpa" "odudu" "azama" (Igbo names for local beans). More often, other high-fiber foods which include yam, vegetables, corn and garri can also be eaten in their adequate quantities. Vegetables such as fluted pumpkin, "okazi", "orah" and "Anara leaves" can also be used in combination with the high fiber food. "Anara" leaves and cucumber can be eaten raw in place of drinking fruit juice. Eat also whole fruits such as mangoes, oranges, avocado pear and sour soup fruits. Food and Nutrition Board (1989) also opined that in order to make healthful food choices, nutrition intervention for hypertension management should include, eating more fiber food.

In eating less sugar, hypertension nutrition management requires that the individual should avoid regular soft drinks, avoid eating table sugar, honey, syrup, jam, jelly, candy sweet rolls, fruit canned in syrup, regular gelation desserts, cake with icing, pie, or other sweets (Dale & Wayne, 1994).

Concerning use of less salt the author continuing, the hypertensive should reduce the amount of salt used in cooking, try not to salt one's food at the table, eat fewer high-salt foods such as canned soups, ham, sauerkraut, hot dogs, pickles and foods that taste salty. Eat fewer convenience and fast foods.

As for eating less fat in managing hypertension, the individual should eat smaller servings of meat, eat fish and poultry more often. Choose lean cuts. Prepare all meats by roasting, baking, or boiling. Trim off all fat. Remove skin from poultry, avoid fried foods. Avoid adding fat when cooking. Eat fewer high-fat foods such as cold cuts, bacon sausage, hot dogs, butter, margarine, nuts, salad dressing, lard and solid shortening. Drink skim or low fat milk. Eat less ice cream, cheese, sour cream, cream, whole milk, and other high-fat dairy products (Guthrie, 1989).
Physical activities for hypertension management

Physical activities for hypertension management should concentrate on cardio-respiratory fitness. For people of all ages, cardio-respiratory conditioning can be achieved through many activities. As long as the activity places sufficient demand on the heart and lungs, improved fitness is possible. Cardio respiratory efficiency involves the heart, the lungs and the blood vessels. All organs of the body depend so much upon the

efficiency of the cardio-respiratory organs for existence (Dale & Wayne, 1994).

Exercise such as running, jogging, walking, skipping, swimming, cycling etc. contribute to fitness of the cardio-respiratory system. Many people think that any kind of physical activity will produce cardio-respiratory fitness which is very essential for hypertension management. For instance Dale & Wayne (1994) state that golf, bowling, hunting, fishing, and archery are considered to be forms of exercise. However, these activities would generally fail to produce positive changes in your cardio-respiratory and overall muscular fitness, they may enhance your health, be enjoyable, and produce some fatigue after lengthy participation, but they do not meet the fitness standards recently established by the American College of sports medicine (ACSM), the nation's premier professional organization of exercise physiologists and sports physicians.

For cardio-respiratory efficiency the following exercises could be done: Road walk and jogging - 30 minutes to 1 hour walk daily is very good for hypertension management. Each time we undertake walk, the leg muscles contract, they squeeze the large veins of the legs, which force the blood back to the heart and help keep circulation at an effective rate (Ene, 2009). During road walk there is improvement not only on the leg muscles but also the pumping action of the heart. While

walking, head should be up, shoulders back and swing the arms naturally (Ene, 2009).

Running on the spot-can be used in developing cardio-respiratory efficiency if done for at least about five minutes or more. Jump on the spot-with both feet leaving the floor at the same time and landing on the ball of the feet. Trunk bending exercise-stand with your legs apart, turn trunk forward and backwards, then to both sides alternatively. Hip rotation exercise - stand with feet slightly apart, move your hip from side to side, then forward and backwards, then in circular form. Bench step at your pace - stand erect in front of a low bench or a staircase place the right foot and stand erect on the bench or step. Lower right foot to the ground and lower left foot as well, and stand erect. Repeat the exercise at least five times. Cycling- use ordinary bicycle and ride round preferably in an open field than the main road in order to avoid traffic accidents. All these should be done on an individual's pace to avoid competition (Ene, 2009).

Rest, Relaxation, and Sleep

Rest is what we do to let stress subside. Rest at the end of a day, and at the end of a week, help in management of hypertension. It helps the individual to calm down (Goldbergs, 1993). Doing funny things we enjoy in our leisure time compensates us for the stress we experience at work, bringing some balance

back into life. This is particularly important especially in managing hypertension. A good way of getting rest according to Mandler (1993) and reducing long-term stress is to take up an enjoyable, non-rushed sport or hobby. If you spend all your working day competing, then can be very pleasant to be completely non-competitive for some of your free time. Slow physical activities such as sailing or walking are good for this, as are others where there is little or no pressure for performance. Reading novels, watching television, or socializing can also be very restful.

Vacations are particularly important especially in hypertension management. An individual needs to take these vacations. Where possible, take two weeks off rather than just one week. A common observation that people make is that they really do not start to relax properly until the end of their first week of vacation. In hypertension management, one should make sure one takes one's vacations and that one uses them to relax. Also make sure one gets enough good quality rest during the week, so that one can keep on enjoying life to its fullest.

Sleep.

On average, people need around eight hours sleep a night (although this can vary between three hours and eleven hours, depending on the person and his or her age (Steptoe, 1997).

If we are regularly short of sleep, or concentration and our effectiveness suffer and our energy levels decline. This diminishes our effectiveness in our job, and can therefore increase stress thereby increasing one's blood pressure. As one's concentration wanes, one starts to make mistakes. As one's energy declines, one becomes less proactive in what one does reducing one's control over events. This means that a situation that is already difficult and stressful can become worse, needing even more sacrifice to bring it back under control (Taylor, 1999). Make sure you get enough sleep. If you have become used to being tired all the time, you will be amazed by how sharp, and energetic etc you will feel once you start sleeping normally.

Tips:

When one is stressed and anxious, one can often find it difficult to get to sleep, as thoughts keep on whizzing through one's head, stopping one from relaxing enough to fall asleep. If you find this case make sure that you stop doing mentally demanding work several hours before going to bed. Give your brain time to calm down before you try to sleep. Try reading a calming, undemanding book for a few minutes, again to relax your body, tire your eyes and help yourself to forget about the things that are worrying you. Write persistent thoughts and worries down in a note book and then put them out of your mind.

Review the note book in the morning and take action if appropriate. Keep the same bed time. Let your body and mind get used to a predictable routine. Cut back on caffeine and alcohol. Some people find that they sleep badly if they drink coffee or cola after 4pm, others find that if they drink alcohol to excess, they wake up in the middle of the night and cannot get back to sleep (Csikszentihalyi, 1991).

Conclusion.

The study revealed that health education can effectively be used to manage hypertension. It was also discovered that there is the possibility of a hypertensive patient not manifesting any symptom. That is why hypertension is also branded, 'A silent Killer'. Based on this fact, the study emphasized the need for regular blood pressure checkups.

Nutrition intervention was also revealed as an essential tool in managing hypertension. The study emphasized that eating food that can help burn fat off the body would go a long way helping in the management of hypertension. The study also revealed that mild physical exercises, rest, relaxation and sleep were relevant instruments for managing stress thereby managing hypertension. It therefore became imperative that health education for hypertension management can best be achieved through being exposed to

information relevant to hypertension management and its prevention.

Recommendations.

1. Consume at least five servings of fruits and vegetables each day for hypertension management.
2. Consume not more than six grammes of salt each day.
3. Maintain 30 to 60 minutes of brisk physical activities all days of the week.
4. Have a regular blood pressure check up.

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