

# EFFICACY OF GARLIC THERAPY AMONG HYPERTENSIVE PATIENTS.

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## Introduction

Hypertension is one of the most frequent health problems found in people. More than 10 million people have high blood pressure, yet few people know it since they are uninformed of their condition. Researchers in India discovered that approximately 25% of adults in cities and 10% of persons in rural regions have hypertension. According to estimates, the overall incidence of hypertension in India is 66 million. Based on the findings of a recent survey done by the Association of Physicians of India, the incidence of hypertension in urban regions in India was found to be 37% higher than in rural areas (with an average incidence of 9%). (Agarwal-2001). About 20% of the population in India has hypertension, making it the biggest silent killer in the country. Approximately, nearly all of the instances fall into the category of essential hypertension, and then you're simply left with 10 percent that is secondary hypertension. The treatment of patients with hypertension and the avoidance of problems owing to hypertension necessitate dietary adjustment. Eating a healthier diet and making lifestyle changes can help regulate blood pressure. the occurrences of hypertension throughout the world (Association of Physicians in India 2001). Nurses are a vital contributor to the health care industry and are well-situated to locate, evaluate, and understand the medical needs of their patients. Additionally, they provide follow-up services to keep their hypertension under control. Predictive health services can aid in a variety of settings in the detection and management of risk factors of hypertension.

## Methodology

To obtain more information about comparable studies, the investigator researched other relevant studies. This study laid the groundwork for using methodologies, conceptual frameworks, and tools. As an interim study for the present research, a literature review was completed under themes like those mentioned, which included papers about hypertension and its management, papers about garlic and health, and papers about the effect of garlic on hypertension. This study employed a conceptual framework that was based on the CIPP model. This model was utilized by the investigator to investigate the change in blood pressure between before and after administering garlic. For the study, the research approach was evaluative in nature. Quasi-experimental research design was selected for the investigation in question. A structured interview/observation schedule was followed for data collection. It was both practical and reliable. A pilot study was done at selected hospitals in Lucknow, Uttar Pradesh, in order to recruit participants. Patients who had high blood pressure and were hypertensive were included in the study. The feasibility of the investigation was confirmed.

The main study was carried out in a number of hospitals throughout the month of October in the OPD. Using quota sampling, 40 patients who had high blood pressure (20 in the experimental group and 20 in the control group) were randomly selected from the pool of those who fulfilled the sample selection criteria. Prior permission was requested and granted, and all study participants were informed and provided with the required individual consent after explanation of the goal of the study. Complete confidentiality was provided. Before and after garlic administration, blood pressure was measured in the experimental group. Before and after the test, no treatment was used in the control group. Pre- and post-test days separated the two samples by 21 days. Inferential and descriptive statistics were used to examine the acquired data in SPSS (Version 10) utilizing SPSS (Version 10) packages.

## Findings

75 percent of the experimental hypertension patients were in the age bracket of 51-65 years, and 70 percent were females. 14(70 percent ) of the experimental hypertensive patients were married. physically and psychologically difficult". were nuclear family members, 19 were non-vegetarian diet followers, and 18 had illnesses for over five years It is noted that 12(60%) of the population consumed drugs daily. 85%, had afternoon naps, and were inactive the rest of the day (85 percent ). Similar to the majority of people with hypertension in the control group, the majority were 65 years of age, 40 percent were female, and 50 percent were male. About 75 percent of people in the control group had high school diplomas. While 11(55 percent) found their profession to be both

physically and mentally demanding, 7(35 percent) found theirs to be outside of nuclear family, and 19(95 percent) reported having non-vegetarian dietary habits. went fewer than eight hours per night (75 percent ). In the experimental group, comparisons were made between systolic and diastolic blood pressure before and after garlic ingestion in hypertension individuals. hypertensive patients who were administered garlic experienced a substantial drop in their mean systolic blood pressure by 7.179 points ( $P = 0.001$ ). In the experimental group, there was a substantial decrease in mean diastolic blood pressure, from 98.27 mmHg to 84.77 mmHg ( $P = 0.001$ ). To compare the mean difference in blood pressure in hypertensive patients who are part of the experimental group with the mean difference in blood pressure in patients who are in the control group. In the experimental group, the mean difference in systolic blood pressure among hypertension patients was much higher than in the control group, and this difference was statistically significant ( $t = 2.982$ ,  $P = 0.005$ ). Among hypertensive patients in the experimental group, the mean difference in diastolic blood pressure was substantially greater than the control group,  $t = 2.867$  ( $P = 0.007$ ).

To research the relationship between mean blood pressure difference and certain parameters in patients with hypertension participating in an experimental group.  $T(2.699, 0.036; A=Work, T=Outdoor Activity, T=Exercise, and T=Length of Illness)$ : Significant connection between sex, with  $r=-0.272$ ; A=Work, with  $r=-0.144$ ; kind of work, with  $r=-0.356$ ; duration of illness, with  $r=-5.110$ ; exercise, with  $r=3.371$ .

*f* While no correlation was found between age, occupation, family type, regularity of medication taking, hours of sleep, and hypertension severity, the study did discover a large variability in systolic blood pressure among hypertensive patients.

*f* A high correlation was found between job status and the number of family members: associates had 2.936 times the number of relatives than the general population ( $P=0.026$ ), and hypertension patients had 2.679 times the diastolic blood pressure of the general population ( $p=0.037$ ). *f* There was no statistically significant association between age, sex, nature of employment, duration of sickness, regularity of taking medications, sleeping hours, and mean difference in diastolic blood pressure.

## CONCLUSION

Nurse can also teach patients to consume more garlic, which is effective for reducing blood pressure in those with hypertension. as well as the nature of the work, the duration of illness, and the level of physical activity are connected with lowering blood pressure. For each exercise, the client should be urged to relax while doing it to help with the strength-building process.

## Bibliography

1. Banerjee .S.K.,and Maulik S.K.,(2002), "Effect of garlic on cardiovascular disorder", Journal of nutrition, Vol 1,pp 4-5
2. Borek. C., (2006), "Garlic reduces dementia and heart-disease", Journal of nutrition, Vol;136 pp810-812.
3. Colin.(2001).Fighting Heart Disease and Stroke. American Heart Association, Vol.3,pp 305.
4. Dhawan and Jain. S., (2005), "Garlic supplementation prevents oxidative DNA damage in essential hypertension" Journal of Molecular and Cellular Biochemistry vol;275(1-2), pp. 85-94.
5. Duda. G., et. Al., (2008), "Effect of short term garlic supplementation on lipid metabolism and antioxidant status in hypertensive adult", pharmacological Report vol ;2 pp 163-170.
6. Ellen Tattleman. M .D.,(2003), "Health Effects of garlic", Journal of the American Academy of Family Physician's , Vol 72 no;1.
7. James p and Meschino ,D,C (2002) "Reducing High Blood Pressure with natural therapies", Journal of massage Today. Vol..02,issue 02

8. Kyugas. H and Laddenprea .T., (1999) “Compliance of Patient with Hypertension and Associated Factors”, Journal of Advanced Nursing 29(4), 832-839
9. Mikung, et.al., (2003) “long term effect of vitamin c supplementation on blood pressure”, Journal of American Heart Association .
10. Miller et al (2002), “Effect of anti-oxidant vitamin supplementation on traditional cardio-vascular risk factors”, Journal of current hypertension Reports .  
Number-1, pp 27-30.

