## CHAPTER I

## INTRODUCTION

### 1.1 Background of the study

Medical Anthropology is a sub branch of anthropology that draws upon social, cultural, biological, and linguistic anthropology to better understand those factors which influence health and wellbeing. Medical anthropology directly related to human health. It is study different diseases in different community and culture, experience and distribution of illness the prevention and treatment of sickness, healing processes, the social relations of therapy management, and the cultural importance and utilization on medical systems. Hypertension is a health problem so medical anthropology study and describe it.

Hypertension has been defined various ways. The most authoritative organization in health, WHO has defined hypertension thus:

Hypertension, also known as high or raised blood pressure, is a condition in which the blood vessels have persistently raised pressure. Blood is carried from the heart to all parts of the body in the vessels. Each time the heart beats, it pumps blood into the vessels. Blood pressure is created by the force of blood pushing against the walls of blood vessels (arteries) as it is pumped by the heart (WHO, 2017).

Hypertension has become a significant problem in many developing countries experiencing epidemiological transition from communicable to non-communicable chronic diseases. The emergence of hypertension and other CVDs as a public health problem in these countries is strongly related to the aging of the populations, urbanization, and socioeconomic changes favoring sedentary habits, obesity, alcohol consumption, and salt intake, among others.

A cost-effective use of health services to control these emerging chronic diseases is particularly needed is developing countries because resources are limited and generally must be shared with the concurrent burden of persistent communicable diseases. High blood pressure is the most common risk factor
for heart attack and stroke Hypertension has been identified as an independent risk factor of cardiovascular system diseases and is the number one cause death all over the world. Hypertensions becoming a global epidemic in both young and adults (Park, 2016).

Hypertension has been identified as an independent risk factor of cardiovascular system diseases and is the number one cause death all over the world. Is the Hypertensions becoming a global epidemic in both young and adults (Akbari, 2016).

A descriptive study was conducted in South East Asian countries on their public health and education campaigns and surveillance, to increase awareness to hypertension and other cardiovascular influencing factors. However, prevention and control of hypertension is complex. The 2025 vision or goal of global cardiovascular organizations including the International Society of Hypertension aims in $25 \%$ reduction in the prevalence of hypertension and its related complications by the year 2025 in South East Asia and worldwide (Chia, 2016).

### 1.2 Statement of the problem

Health is a management part of human life. Healthy peoples has been given good contribution to theirs society and nation. Before decade, there were a lot of health problem but there was not systematic research in the hypertension. Hypertension is a major public health burden due to its causal association with cardiovascular disease morbidity, mortality, disability and economic costs. It is becoming an increasingly common health problem local level as well as worldwide due to greater longevity in many countries. Hypertension is important not only because of its increasing prevalence worldwide but also because it is a major modifiable risk factor for cardiovascular disease (CVD).

According to world health organization "Worldwide, hypertension is estimated to cause 7.5 million deaths, about $12.8 \%$ of the total of all deaths. This account for 57 million disability adjusted life years, the overall prevalence of raised blood pressure in adults aged 25 and over was around $40 \%$ in 2008. Africa region has the highest prevalence $46 \%$ whereas lowest is in American region consist of $35 \%$.(WHO, 2018)

Hypertension has become a significant problem in many developing countries experiencing epidemiological transition from communicable to non-communicable chronic diseases. The emergence of hypertension and other CVDs as a public health problem in these countries is strongly related to the aging of the populations, urbanization, and socioeconomic changes favoring sedentary habits, obesity, alcohol consumption, and salt intake, among others. All these activities are increasing the hypertension day to day in rural and urban area. So I am selected the hypertension topic in my study.

In sum, this study has centered around finding answers to the following research questions:
a. What is the current prevalence in study area?
b. What is the relationship between socio-cultural and hypertension disease?
c. What are the various values prevalent among people regarding self-care practices on hypertension?
d. How people have been practicing self-care practices in order to reduce the risk of hypertension?
e. What is the level of awareness among people regarding hypertension?

### 1.4 Objectives of the study

The general objective of this study is to assess the self-care practice and prevalence on hypertension among the adults in the Pokhara city. However the specific objectives of this study are as follows:
a. To investigate the prevalence of hypertension among adults people in Pokhara-27.
b. To examine the level of awareness on hypertension among respondents.
c. To explore self-care practice of respondents on hypertension.

### 1.5 Rationale of the study

Socioeconomic status in both urban and rural areas there no more difference. Similarly in Nepal various studies have shown that the prevalence of hypertensions in adult population is around $20 \%$ in urban population.

Hypertension is increasing day by day due to urbanization, globalization and industrialization. Even though many researchers have been conducted on hypertension people are still unaware about the preventive measure and prevalence is increasing
day by day. This study will provide baseline data to assist policy makers, new researcher and service providers in developing appropriate evidence based strategies to prevent hypertension. Understanding the extent of knowledge, attitude and practice of hypertension among the adult above 25 years is the significant issue for research.

### 1.5 Definition of the key terms

Poor knowledge: Respondent secured less than $50 \%$ of total secured.
Good knowledge: Respondent secured more than $50 \%$ of total secured.
Self-care practice: The precaution and measure adopted by the people to protect themselves from hypertension.

Total score on practice related question was 16 . Level of practice was determined as below:

Poor practice: Respondent secured less than $50 \%$ of total secured.
Good practice: Respondent secured more than $50 \%$ of total secured.
Hypertension: Those people under study who could have systolic blood pressure equal to or greater than 140 mm of Hg and/or diastolic blood pressure equal to or greater than 90 mm of Hg were considered as hypertensive.

Adult: The people above 30 years of age group
Knowledge: Aware of facts and information related to the hypertension.
Preventive practice: The precaution and measure adopted by the people to protect themselves from hypertension.

Prevalence: The number of who have a certain condition on hypertension at any given time.

### 1.6 Limitation of the study

Fundamentally, it is the academic study. It has been undertaken within the boundaries of limited time, budgets and others resources. It is the study of hypertension and respondents' prevalence and self-care practice on hypertension among the people in Pokhara-27. To make the study more feasible and to complete within a time, the scope of presents study was limited following respect.
a. This study is only hypertension prevalence and self-care practices.
b. This study was done in Pokhara - 27 , Kaski district.
c. This study is fulfillment of academic process.
d. The study was conducted within the limited time period and area.
e. There was lack of resources for our study.

### 1.7 Organization of the study

The whole study is divided into seven chapters. First chapter includes introduction, second chapter include literature review, third chapter includes research methods, fourth chapter explains social cultural background of respondents. Similarly, fifth chapter includes description analysis on hypertension; sixth chapter includes self care practices related to hypertension; seventh chapter includes summary, conclusion and recommendation and reference as well as annex.

## CHAPTER II

## LITERATURE REVIEW

Literature review is an essential part of all studies. It is way to discover what other research in area of our problem has been uncovered. It is way to avoid investigating problems that already been definitely answered. For example an anthropologist is interested to study the impact of human cultural programme on about the how to develop the cultural in society.

Scientific research most be based on past knowledge. The previous studies cannot be ignore because they provide the foundation to the present study .Literature review is basically a stock taking of available.

Literature in ones field of research, Review of literature is key step in research process. It gives depth knowledge about the problems. Reviewed of literature are taken from different source such as related journals, articles etc. Various related literature are reviewed and some brief descriptions of the literature are as follows:

### 2.1 Concept review

A model and related concepts are present for ethnographic and comparative research on medical systems as cultural systems. The major structural and functional aspects of the health care system model are briefly sketched. Clinical realities, explanatory model (EM) transactions in health care relationships, a distinction between A model and related concepts are present for ethnographic and comparative research on medical systems as cultural systems. The major structural and functional aspects of the health care system model are briefly sketched. Clinical realities, explanatory model (EM) transactions in health care

### 2.1.1 Self-care practice on hypertension

Hypertension is a chronic condition of concern due to its role in the causation of coronary heart disease, stroke, and other vascular complications. It is the commonest cardiovascular disorder posing a major public health challenge to population in socioeconomic and epidemiological transition.
"Globally, nearly one billion people have high blood pressure (hypertension); of these, two-thirds are in developing countries. Hypertension is one of the most important causes of premature death worldwide and the problem is growing; in 2025, an estimated 1.56 billion adults will be living with hypertension. Hypertension kills nearly 8 million people every year, worldwide and nearly 1.5 million people each year in the SEAR. Approximately one-third of the adult population in the SEAR has high blood pressure."(WHO 2018)

### 2.1.2 Prevalence on hypertension

Prevalence refers to the number of who have a certain condition on hypertension at any given time "Prevalence is a statistical concept referring to the number of cases of diseases that are present in a particular population at a given time" (https//www.medicinenet.com).

### 2.2 Theoretical review

A description survey was conducted in china on Feb 2017 showed that the overall prevalence of hypertension as $27.2 \%$. The basic characteristics of subjects with or without hypertension were included in this study. Hypertensive subjects tended to be older, drinkers, smokers, inactive physical exercisers, less education, members of lower family income, take higher salt and have a higher average (Wang L, 2017) .

This study was done in Pakistan where total, 226 subjects were sampled by the computer program from June to September, 2012. After excluding questionnaires missing essential data concerning drug adherence, BP readings and BP check-up. Most of the subjects ( $71.8 \%$ ) were $50-69$ years old. Among all subjects, $57.9 \%$ were males and $42.1 \%$ were females. The majority of subjects ( $77.5 \%$ ) were from rural areas, $29.7 \%$ had an education beyond high school level, $81.3 \%$ had a sedentary life, $19.1 \%$ were current smokers, and $17.2 \%$ were alcohol drinkers. The BP control rate was $24.4 \%$, and males had higher BP control (26.4\%) than females (21.6\%). of participants correctly identified normal SBP (76.6\%) and DBP (78.9\%) levels.(Ai L, 2016).

This survey was done in Philippines for age factor/risk people of Hypertension (HTN), where out of total of 3,730 adults, including 1,020 males and 2,710 females. Of these, blood pressure (BP) results were available on 986 males and 2,647 females
for a total of 3,633 adults. The male to female patient ratio approximated. The mean age of adult patients was 17.1 years. Analysis of the medical records from all clinic visits revealed that the overall prevalence of hypertension among adult patients

The analysis was conducted on a sample of 4629 participants of whom $72.18 \%$ lived in rural areas. The overall prevalence of hypertension in Burkina Faso was $18 \%$. In urban areas the prevalence was $24.81 \%$ and $15.37 \%$ in rural areas. Increased Body was $47 \%$. In 34 out of the 40 barangays more than $40 \%$ of patients has showed blood pressure readings consistent with a diagnosis of hypertension (Mobula LM, 2016).

A cross-sectional study was conduct where they have done. Survey involving face-toface interviews with taking a total of 1676 participants for finalanalysis. We found that the prevalence of hypertension was $17.6 \%$. The rates of hypertension awareness, treatment and control were $48.8 \%, 51.4 \%$ and $43.2 \%$ respectively. Only $6.8 \%$ hypertensive were found to be managed by community health centers. ( Yan X, Deng $X, 2017$ ).

A Cross sectional study was done in South Africa. Where 152 participants (23.1\%) with significantgender difference where Male sex, age <45years, higher level of education, single status, currentemployment, higher monthly income, current smoking,alcohol usage, absence of diabetes and non-obese weresignificantly associated with hypertensionunawareness. Who were aware of hypertension nearly about $91.7 \%$, were on antihypertensive medication and only 121participants ( $38.9 \%$ ) achieved the BP treatment target. (Owolabi EO, 2017)

This study was conducted forHeart rate on admission in patients was significantly different between survivors and patients with fatal outcome with usingMann Whitney U test with higher levels in patients with fatal outcome. Mean heart rate in these patients was 102 bpm , while 87, were the mean values of heart rate on admission in the survivors. According to the outcome, in the total sample, there was significant difference in the incidence of heart rate lower / greater or equal to 80 beats per minute journal of clinical and experimental medicine (Davidovic G, 2013).

Mass Index (BMI) and older age were consistently associated with higher odds of HBP in both residential areas. In addition, being of male sex, fat intake, and family history of HBP and low level of HDL cholesterol were significantly associated with increased odds of HBP in rural residents (Soubeiga JK, 2017).

A qualitative study was conducted to estimate of hypertension prevalence for age and urban/rural distributions (by ethnicity and sex) at the time of each survey indicate that from 1980 to 2011 there was a statistically significant increase ( P is less than 0.001) in that period.Hypertensionprevalence in Turkey and Indian men and women and in men and women overall both ethnicities combined.Increases in hypertension over three decades(Abdullah A, 2011).

A survey was counducted in Delhi.In this study show that prevalence of hypertension increased from $23.0 \%$ to $42.2 \%$ and $11.2 \%$ to $28.9 \%$ in urban and rural area of Delhi, respectively between the two surveys. The increase in prevalence was by $83 \%$ in urban and $158 \%$ in rural. The rise in prevalence was more in men with $94 \%$ and $73 \%$ in urban areas and $191 \%$ and $125 \%$ in rural areas in men and women, respectively. The age-specific prevalence of hypertension revealed an increase in prevalence at all ages except in the highest age group (55-64 years) of urban men and women. The rise in age-specific prevalence was highest in the youngest age group (35-44) with a rise in prevalence of $153 \%, 115 \% 239 \%$ and $336 \%$, respectively (Amrit G 2016).

A Survey was conducted in Australia among school Children Of 2238 eligible children aged 6 years 765 children were given parental permission to participate and 1 739 underwent examination ( $77.7 \%$ ). A positive parental history of hypertension was given for 160 children ( $9.2 \%$ ). Of these, $4.4 \% 4.6 \%$ and $2.9 \%$ of children had mother, father or both mother and father who were hypertensive, respectively. Children with a positive family history of hypertension compared with those with family history (Gopinath, 2012).

A cross-sectional survey was carried outsince February2009 - September 2010.Where sample was taken randomly stratified, sample of 4,941 pupils aged 10-18 years where the mean values of systolic blood pressure in boys in rural areas were higher in every age group in comparison with the boys in urban areas. However, the differences were statistically significant only in the groups of 12-year and 16-year-olds, as well as in the whole population. Diastolic blood pressure was significantly higher in all age groups among the studied boys in rural areas, except for the groups of 10-year and 18-year-olds (Krzywinska-Wiewiorowska, 2017).

Acohort study was conducted in France in cardiac centers of hospitals, including public and private hospitals, one of them 28 were teaching hospitals. This study was
taken 1394 patients. In 1327 of these, blood pressure was measured at hospital discharge and information about previous history and risk factors for cardiovascular disease was available. Of these 1327 patients, 58 were lost to follow up and 22 died from unknown Causes. Thus 1247 patients formed the basis of this report. At hospital discharge, 518 patients (41.5\%) were normotensive, 318 ( $25.5 \%$ ) had controlled hypertension, and 411 (32.9\%) had uncontrolled hypertension, of whom 276 (22.1\%) were uncontrolled on the basis of systolic (Amar, 2002).

### 2.3 Review of previous studies

A cross sectional shows that genetic evolution to identify genes affecting a trait, understand their origins, and to refine our ability to do genetic screening. The reframing of questions about path physiology and disease in an It has been hypothesized that genetic factors, as manifested by skin color, play an important role in the genesis of hypertension among Blacks. A community-based study was carried out in Charleston County, South Carolina to test this hypothesis. The results of a ten year follow-up study suggest that social class and age were more consistently associated with the incidence of hypertension and levels of blood pressure. The association of hypertension with skin color was minimal and substantially less than that of social class. The incidence rate of hypertension (-150 and Introduction It has been known for some time that within the United States the prevalence of hypertension was substantially lower in Whites than in Blacks although this differential has been more pronounced in studies'-4 reported from the Southeast. Only one U.S. community-based biracial incidence study has been reported to date, and it, consistent with the prevalence studies, indicated an approximately two times higher incidence rate of hypertension in Blacks than Whites. 5 Boyle not only confirmed a racial differential, but his cross-sectional study showed the first quantitative association with blood pressure (Robert, 2001).

A description study was conduct where they have done, Department of Epidemiology, School of Public Health, and University of North Carolina. This paper, submitted to the Journal in November 1976, was revised and accepted for publication January 24, 1977. 90 mm Hg ) was three to four times greater when the study participants were of low social class than when they had higher social class scores at the beginning of this study. In contrast, the incidence rate was only 1.5 times higher for dark, than for
lighter skinned men, and the rates were almost identical when social class was comparable. Similar results emerged when blood pressure was treated as a continuous variable; blood pressure levels and pressure changes over time were consistently and significantly ( $\mathrm{p}<.01$ ) higher in those Blacks categorized as low social class, controlling for skin color (Am, 2018).
. A cross-sectional study was conduct where they have done. During the past several decades, blood pressure has been considered in an evolutionary paradigm. In the present discussion, the current state of this work is summarized. The first portion addresses the question of how blood pressure, in general, and hypertension, in particular, fit into the concept of Darwinian selection. The latter portion provides insights into understanding and studying hypertension in the context of evolutionary genetics. Does Darwinian Selection Apply to Hypertension? Natural selection reflects the observation made by Charles Darwin that individuals within a breeding population vary in their morphology and behavior and that these features are heritable (Robert, 2001).

A cross-sectional study was conduct where they have done. Traditionally, most anthropologists have studied small-scale societies, or relatively Small groups of people within a wider society. They have usually aimed at a holistic view of a particular culture or community, including how its different aspects are connected with one another - to understand, as Mars 1 puts it, 'the articulation of family and kinship organization with grass-root political power and authority, the relation of these to religious beliefs and practices, and the place taken in all these affairs by the way goods and services are produced and distributed which has been affected on hypertension. Hypertension is a major community and society burden due to its causal association with cardiovascular disease morbidity, mortality, disability and economic costs. It is becoming an increasingly common health problem worldwide due to greater longevity in many countries. The rapid changes in lifestyles and migration from rural to urban regions is also influencing a concurrent increase in the risk of hypertension in many countries (Singh, 2017).

### 2.4 Conceptual frame work

A conceptual framweralseork is an analytical tools with several variations and contexts.It can be applied in different categorise of work where an overall picture is
needed. It is used to make conceptual distinctions and organnize idea. A study conceptual framework containts suffcient information to allow other investigator to adopt or repicable your methodology.

Independent variables

## Dependent variables

Socio demographic factors

- Age
- Sex
- Ethnicity
- Religion
- Education
- Income
- Occupation

Knowledge related factors

- Hypertension
- Causes
- Risk factor
- Sign /symptom

Preventive practice on risk factors

- Alcohol
- Body weight
- Smoking
- Physical activity
- Food habits


## IEC related factors

- Source of information
- Awareness campaign
- Training /seminar
- Informal/ formal education

Figure 2.1: Conceptual framework
The above conceptual framework shows relationship between independent variable and dependent variable. Main objective of study prevalence and self-care practices on hypertension is the dependent variable. Independent variable influences to dependent variable. Prevalence and self-care practices result is dependent up on the socio demographic factors (age, sex, ethnicity, education, occupation and income). Knowledge related factor (hypertension, causes, symptoms and risk factors) are determine awareness level of respondents.

## CHAPTER III

## RESEARCH METHODOLOGY

This chapter contains the brief explanation of research methods employed in study. The result of research depends on the careful selection appropriate research methods. Similarly, methodology is a systematic rules and procedure, which is based upon research. It is the science of method or rules of game. The research methodology used to collect the qualitative and quantitative data needed for the present study. Various research methods include such as research design nature and source of data, data collection techniques adopted to carry out this study are presented below.

### 3.1 Rationale for selection of research site

The main location of this study was Pokhara metropolitan-27, Kaski, district. In addition with this, population density is high and dynamic group of caste mix up in this community.

The main reason behind selecting this place as the study area is that most of the households Brahmin, Khatri and ethnicity, they were migrated from Lampung Passaging, Parbat Sadakharka and Syangja Sirubari. They are adapted new place and their cultures. Another reason for selection of this place as study area is familiar with place to observe the socio-economic cultural and educational dimensions as well as the impacts of adaptation. The research is hopeful on finding the true facts.

### 3.2 Research design

"Research design is the plan, structure and strategy of investigations conceived as to obtain answers to research questions and control variance". - F. N. Kelinger, 1973

The study design was description (Analytical). This study was carried out under the exploratory research and descriptive analysis and was used qualitative and quantitative method.

### 3.3 Sampling design

Sampling is a process of selecting a number of study units from a definite population. Sampling design is the process selecting a subset of observations for the proposed of drawing conclusions about that larger set of all possible observation.

I employed a convenience sampling method while selecting the respondents. The whole population of my study is the total number of adults aged between 25 and 60 who live in ward no 27 of Pokhara Municipality. I interviewed 384 respondents. I selected them on the basis of my convenience. Some of them were those whom I met the Health Post where I worked, in Women's Group meeting, Tea Shops, and in Ward Office.

### 3.4 Nature and sources of data

Primary data is used in this study. Primary data is collected from fieldwork using various methods, tools and techniques. The secondary data is taken from various studies such as books, published and unpublished documents from related literature and government documents from different libraries and institutes. Both qualitative and quantitative data are used in this study.

### 3.5 Data collection technique

Face-to-face in interview and blood pressure measurements for the prevalence, selfcare practice. The effectiveness and the efficiency of data depended on the choice of effective and efficient choice of the tools of data collection proper selection of data collection tools helps together the valid and reliable information. After approval of proposal, very simple and under set and able questions were both open and close in nature. Primary data for this study was collected through tools like observation, group discussion, interview, case studies and key information (Intellectual persons were many key persons in this study and questions were provided to them).

### 3.5.1 Interview schedule

The interview is conversation with a purpose and therefore is more than a more oral exchange of information.
"The interview is face to face interpersonal sole-situation in which one person, the interviewer, asks a person being interviewed the respondent, questions designed to obtain answer pertinent to the purpose of the research problem" (F. N Kerlinger).

Interview was taken by answer givers and key informants about the causes of prevalence of hypertension, self-care practice, smoking, alcohol consumption and physical exercises on the study area through organized questionnaires. It will provide to watch their facial expression, physical appearance and even the place. Interview
technique had used as a main method for the collection of primary data. The universe was unknown and household and the selected samples were 384 households.

### 3.6 Data processing and analysis

Data entry and analysis was done in statistical package for social science (SPSS). Data ware converted quantitative/qualitative from; percentage, pie chart and bar diagram were used for the demonstration of data.

Data analysis is most important aspects of any research project because information speaks nothing unless they are systematically reviewed, classified, organized and presented in tables, charts and graphs. The data collection was processed, edited presented by the use of Computer Software MS Excel and SPSS as well other necessary software according to the need of research. The qualitative data which are not quantifiable will be manually managed and such data will be descriptively analyzed.

All the collected data from the field works was analyzed to fulfill the objectives. In this research, some descriptive statistical tools such as calculation of percentage ratios were calculated. The collected data were presented with the help of tables.

## CHAPTER IV

## SCIO CULTURAL BACKGROUND OF RESPONDENTS

This chapter focuses on the hypertension analysis, interpretation and discussion of the data collected from the respondents. The study area is lies in Pokhara metropolitan27, in kaki district, Nepal. It has been place in second city of Nepal. Arghauchowk, Talc wok, Rithepane, Kumalgaun, Kharanefat and Archdale are the core place of the community. Archdale is the birth place of poet Shiroma Lekhanath Poudyal. Prthivi highway divided into two part in east west to the ward number 27. Study area is the naturally so nice. Generally, from overall site we can observe mountain pickup (Annapurna, Fishtail and Dhaulagiree), Ponds and Pokhara regional airport.

Social cultural background is study by the anthropologist. It is the understanding culture and society. Social cultural background is described whole social structure including gender, family type, religion, economic condition, occupation etc. Most anthropologists have studied small-scale societies, or relatively small groups of people within a wider society. They have usually aimed at a holistic view of a particular culture or community, including how its different aspects are connected with one another - to understand.

Family and kinship organization with grass-root political power and authority, the relation of these to religious beliefs and practices, and the place taken in all these affairs by the way goods and services are produced and distributed.

### 4.1 Respondents background

Demographics are characteristics of a population. Characteristics such as race, ethnicity, gender, age, education, profession, occupation, income level, and marital status, are all typical examples of demographics that are used in surveys. Mar 12, 2012. In this chapter provide the information of the social demographic.

### 4.1.1 Percentage distribution of respondent's by age

Different age group is provided the special information of respondents in particular time period. An age group is the people in a place or organization who were born during a particular period of time. Age grouped data were presented to the following table.

Table 4.1
Percentage distribution of respondent's by age

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Age-group | $25-35$ (years) | 83 | 21.61 |
|  | $35-45$ (years) | 200 | 52 |
|  | $45-50$ (years) | 76 | 19.91 |
|  | $50-60$ ( years) | 25 | 6.5 |
| Total | 384 | 100 |  |

Source: Field survey 2019
Above table shows most of the age group of 35-45 are with higher frequency among the other age group responders and are at higher percentage of Hypertension whereas age group above 50-60 are at lowest frequency and percentage of Hypertension because interview and blood pressure measurement had conducted more in public area where respondents participated in this age group.

In the simple term gender is the male female. It is the basic element for the social, cultural and human community. Gender identity is the personal sense of one's own gender. Gender identity can correlate with assigned sex at birth or can differ from it. All societies have a set of gender categories that can serve as the basis of the formation of a person's social identity in relation to other members of society.

Figure 4.1: Percentage Distribution of respondent's by gender


Source: Field survey 2019

Prichard showing male gender seems more prone to hypertension compared to female with higher frequency of male participation this shows female are still lagging behind in participation despite of low percentage of hypertension.

### 4.1.2 Percentage distribution of respondent's by family type

Anthropologists have mentioned about different types of families found in different cultures. Classification of families is generally done on the basis of organization (nuclear and join).

Table 4.2
Percentage distribution of respondent's by family type

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :---: | :---: | :---: | :---: |
| Family type | Single | 248 | 64.6 |
|  | Joint family | 136 | 35.4 |
| Total |  | 384 | 100 |

Source: Field survey 2019
Generally table 4.2 has been described about the family type. Single family majority percentage is high due to migrated people has become usually single. People they, I was visited in the public area in my research process.

### 4.2 Percentage distribution of respondent's by religion

Religion is a process of socialization. In other term, it is a social-cultural system of designated behaviors and practices, morals, worldviews, texts, sanctified places, prophecies, ethics, or organizations that relates humanity to supernatural, and spiritual elements. Religion directly or indirectly influence to human health.

## Table 4.3

Percentage distribution of respondent's by religion

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Religion | Hindu | 263 | 68.5 |
|  | Buddhist | 104 | 27 |
|  | Islam | 9 | 2.3 |
|  | Christian | 8 | 2 |
| Total |  | 384 | 100 |

Source: Field survey 2019

Table shows that majority respondents are of Hindu religion with higher percentage of HTN with lowest of Christian religion as Nepal comprise of huge number of Hinduism followers.

### 4.2.1 Percentage distribution of respondent's by ethnicity

An ethnic group or ethnicity is a category of people who identify with each other, usually on the basis of a presumed common genealogy or ancestry or on similarities such as common language or dialect, history, society, culture or nation.

Table 4.4
Percentage distribution of respondent's by ethnicity

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Ethnicity | Brahmin | 167 | 43.5 |
|  | Chhetri | 63 | 16.4 |
|  | Janajati | 112 | 29.2 |
|  | Dalit | 33 | 8.6 |
|  | Muslim | 9 | 2.3 |
| Total | 384 | 100 |  |

Source: Field survey 2019
Table showing ethnicity socio-demographic structure of Pokhara Lekhanath-27, on the basis of caste where large percentage i.e. $43.5 \%$ of participants were included from Brahmin, with least from Muslim community, shows lagging of so called lower caste community in public participation.

### 4.2.2 Percentage distribution of respondent's by education status

Education is also the process socialization and it is facilitating learning, to help to get knowledge, skills, values, beliefs, and habits. Educational methods include storytelling, discussion, teaching, training, and directed research

Table 4.5
Percentage distribution of respondent's by education status

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Education Status | Illiterate | 9 | 2.9 |
|  | Literature | 68 | 17.7 |
|  | Basic | 87 | 22.7 |
|  | Graduation | 109 | 28.4 |
|  | $>$ Graduation | 11 | 2.86 |
| Total | 384 | 100 |  |

Source: Field survey 2019
Education status of my study showed that most of the participants have above graduation $28.4 \%$ similarly $22.7 \%$ were basic education, $17.7 \%$ were informal education, and $2.9 \%$ Illiterate. Most respondent's education status has been seen poor which affected on their live hood process as well as health.

### 4.2.3 Percentage distribution of respondent's by occupation

Occupation is the basic process to the livelihood programme for the person or group. Generally, people engage themselves in such activities on a regular basis and are said to be engaged in their occupation. Thus, occupation means keeping oneself engaged or occupied in some gainful economic activity on a regular basis to earn one's livelihood. Occupation is the various type, which is the influence the human health.

## Table 4.6

Percentage distribution of respondent's by occupation

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Occupation | Business | 92 | 24 |
|  | Agriculture | 65 | 16.9 |
|  | Government | 50 | 13 |
|  | Non-government | 93 | 24.2 |
|  | Private | 57 | 14.8 |
|  | Foreign employer | 22 | 5.7 |
|  | Labor | 5 | 1.3 |
| Total | 384 | 100 |  |

Source: Field survey 2019

The occupation status of participants showed that majority had non-government services similarly participants with $24 \%$ were business is $24 \%$ participants who had agriculture were $16.9 \%$. Participants, government service were $13 \%$, similarly private services were $14.8 \%$, foreign employer was $5.7 \%$ and labor was $1.3 \%$. Income source is also affected on hypertension. If person have good income source his/her daily life style may be luxurious which is affected on hypertension.

### 4.2.4 Percentage distribution of respondent's by income sources

Source of income simply means where the money came from. For example if you have a job, the company you work for is the source of income. If you have investments or savings that earn interest, then the interest (the bank) is the source of the income.

Table 4.7
Percentage Distribution of respondent's by income sources

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Income source | Business | 92 | 24 |
|  | Agriculture | 65 | 16.9 |
|  | Government | 50 | 13 |
|  | Non-government | 93 | 24.2 |
|  | Private | 57 | 14.8 |
|  | Foreign employer | 22 | 5.7 |
|  | Labor | 5 | 1.3 |
| Total | 384 | 100 |  |

Source: Field survey 2019
The Income status of my participants shows that majority had non-government services similarly participants with business is $24.2 \%$ participants who had Business is $24 \%$. Participants who had government service is $13 \%$ similarly private services was $14.8 \%$ remittance is $5.7 \%$ and labor was $1.3 \%$.

### 4.2.5 Percentage Distribution of respondent's by marital status

Marital status is the distinct options that describe a person's relationship with a significant other. Married, single, divorced, and widowed are examples of such status and sometimes may be a source of discrimination

Table 4.8
Percentage distribution of respondent's by marital status

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :---: | :---: | :---: | :---: |
| Marital status | Married | 359 | 93.5 |
|  | Unmarried | 25 | 6.5 |
|  | Total |  | 384 | 100 |

Source Field Survey
The marital status of participants showed that majority had married (93.5) similarly participants with $6.5 \%$ were unmarried.

### 4.2.6 Percentage distribution of respondent's by annual income

Annual income is the amount of total income, which somebody earn in one fiscal year. Annual income includes everything from your yearly salary to bonuses, commissions, overtime, and tips earned.

Table 4.9
Percentage distribution of respondent's by annual income

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Annual income | Agriculture | 65 | 16.9 |
|  | Government | 50 | 13 |
|  | Business | 77 | 20 |
|  | Remittance | 21 | 5.6 |
|  | Non-government | 57 | 14.9 |
|  | Private | 98 | 25.6 |
| Total | 384 | 100 |  |

Source: Field survey 2019
The Income status of my participants shows that majority had Private services (25.6), similarly participants with business is $24 \%$ participants who had agriculture is $16.9 \%$. Participants who had government service are $13 \%$ similarly private services were $14.8 \%$ remittance is $5.7 \%$ and labor was $1.3 \%$.

## CHAPTER -FIVE

## KNOWLEDGE AND PRACTICES RELATED TO HYPERTENSION

This chapter provides the analysis of respondents' awareness regarding hypertension and various self-care practices practiced by the respondents in order to reduce the risk of hypertension. Self-care practice is precaution and measure adopted by the people to protect them from hypertension. Knowledge is aware of facts and information related to the hypertension. Preventive practice is the precaution and measure adopted by the people to protect them from hypertension.

### 5.1 Prevalence of hypertension

This Chapter is provided the prevalence of hypertension. Prevalence is the number of who have a certain condition on hypertension at any given time. Prevalence refer to the number of who have a certain condition on hypertension at any given time. Prevalence is a statistical concept referring to the number of cases of a disease that are present in a particular population at a given time.

### 5.1.1 Percentage distribution of respondent's BP measurement

Measurement is the assignment of a number to a characteristic of an object or event, which can be compared with other objects or events. The scope and application of measurement are dependent on the context and discipline.

Table 5.1
Percentage distribution of respondent's BP measurement

|  | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Blood pressure <br> measurement | BP Normal(120-80mmhg) | 275 | 71.6 |
|  | BP prehypertension <br> $(120 / 80 \mathrm{mmhg}-$ <br> $140 / 90 \mathrm{mmh})$ | 24 | 6.27 |
|  | Hypertension (>140- <br> $90 \mathrm{mmhg})$ | 85 | 22.1 |
|  | 384 | 100 |  |

Above table shows that majority $71.6 \%$ were normal blood pressure among participants. $22.1 \%$ were blood pressure high and $6.27 \%$ were prehypertension. Prevalence is show $22.1 \%$ percentage. Hypertension is greater in urban areas than in rural areas reflecting the acquisition of several risk factors, including sedentary lifestyles, consumption of fatty foods, obesity and smoking. It risk factors are also show influence to hypertension in my study. Hypertension is positively associated with higher socioeconomic status in both urban and rural areas. Similarly in Nepal various studies have shown that the prevalence of hypertensions in adult population is around $20 \%$ in urban population. The objective of this study was to assess the prevalence, self-care practice of hypertension among adults in the Pokhara-27, Kaski district. In this study is shows the 22.1 percentage hypertension of total respondents. Generally it is the high rate in the urban and rural area in Nepal.

### 5.2 Awareness/ knowledge on hypertension

Knowledge is a familiarity, awareness, or understanding of someone or something, such as facts, information, descriptions, or skills, which is acquired through experience or education by perceiving, discovering, or learning. Knowledge can refer to a theoretical or practical understanding of a subject.

### 5.2.1 Distribution of respondent's by understanding of the term HTN

Understanding is a psychological process regarding to an abstract or physical object, such as a person, situation, or message whereby one is able to think about it and use concepts to deal adequately with that object. Understanding is a relation between the knower and an object of understanding.

Table 5.2
Distribution of respondent's by understanding of the term HTN

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Understand the <br> term HTN | Yes | 317 | 82.6 |
|  | No | 67 | 17.4 |
| Total |  | 384 | 100 |

Source: Field survey 2019
The table above provides information about the respondent understands of the term hypertension (HTN). As the table reveals that majority i.e. 82.6 percent understand
the meaning of the term hypertension. Similarly, 17.4 percent of them replied that they didn't understand the term. Majority people of HTN term understanding has been leading to decrease, prevalence of HTN in the coming day.

### 5.2.2 Percentage Distribution of respondent's know of HTN

The aim of this study was to search the effect of knowledge about hypertension and socio-demographic characteristics on controlling high blood pressure levels among patients diagnosed with hypertension.

Table 5.3
Percentage Distribution of respondent's know of HTN

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :---: | :---: | :---: | :---: |
| Know of HTN | Yes | 317 | 82.6 |
|  | No | 67 | 17.4 |
| Total |  | 384 | 100 |

Source: Field survey 2019
The table shows that among those who knew about hypertension most $82.6 \%$ of the respondents said causes of hypertension. Similarly participants with $17.4 \%$ were unknown about the hypertension. Most respondents have known about the causes of hypertension. It has been indicated that hypertension prevalence rate has been down in the coming day

### 5.2.3 Percentage distribution of respondent's by causes of HTN

What was the cause of the hypertension? The reason or motive for some respondent's action.

Table 5.4
Percentage distribution of respondent's by causes of HTN

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Cause of HTN | Smoking | 186 | 48 |
|  | Body fat | 184 | 47.9 |
|  | Drinking alcohol | 178 | 46.4 |
|  | Spicy food | 109 | 28.4 |
|  | Less physical activity | $\mathbf{7 7}$ | 20 |
| Total | 384 | 100 |  |

Source: Field Survey 2019

Less than half $47.9 \%$ of participants tell that HTN is caused by fat, $46.4 \%$ alcohol, Smoking $48 \%$, spicy foods $28.4 \%$, and low physical activities $20 \%$.

### 5.2.4 Percentage distribution of respondent's by symptom of HTN.

Symptom of hypertension is designed to help understand of respondent idea about the hypertension.

Table 5.5
Percentage distribution of respondent's by symptom of HTN.

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Sign symptom <br> HTN | Headache | 256 | 66.7 |
|  | Dizziness | 210 | 54.7 |
|  | Vomiting | 15 | 30.5 |
| Total |  | 384 | 100 |

Source: Field survey 2019
The table shows that among those who knew about hypertension majority of the respondents said sign and symptoms of hypertension as severe headache, Majority $66.7 \%$ of the participants says headache was sign and symptoms of HTN. $54.7 \%$ was dizziness, followed by dizziness $54.7 \%$ said unconsciousness and $30.5 \%$ vomiting, body ache, vomiting.

### 5.2.5 Percentage distribution of respondents by associated diseases of HTN

Associated is the connected with something or another person. Here diseases influences to HTN

Table 5.6
Percentage distribution of respondents by associated diseases of HTN

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :---: | :---: | :---: | :---: |
| Associated disease <br> due to HTN | Yes | 251 | 66.7 |
|  | No | 133 | 34.6 |
| Total |  | 384 | 100 |

Source: Field survey 2019
Table 4.14 shows that majority $66.7 \%$ had good knowledge regarding hypertension associated diseases and $34.6 \%$ not aware about the hypertension associated diseases.

### 5.2.6 Percentage distribution of respondent's by Diseases due to HTN

Diseases due to hypertension is understand and find out respondents knowledge about the hypertension.

Table 5.7
Percentage distribution of respondent's by Diseases due to HTN

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Diseases due to of <br> HTN | Hyperthyroidism | 147 | 38.3 |
|  | Glumeronephraitis | 53 | 13.8 |
|  | Diabetes | 42 | 10.9 |
|  | Stress | 9 | 2.3 |
| Total | 384 | 100 |  |

Source: Field Survey 2019
The table shows that $38.3 \%$ of respondents are understanding that hyperthyroidism is associated with HTN. As well as $13.8 \%$ are associated with Glumeronephraitis similarly diabetes is $10.9 \%$ and stress is $2.3 \%$.

### 5.2.7 Percentage Distribution of respondent's by dietary habit

Dietary Habits are the habitual decisions of individuals or group of people regarding what foods they eat. Proper dietary choices require the consumption of vitamins, minerals, carbohydrates, proteins and fats. Dietary habits and choices play a significant role in human health.

Table 5.8
Percentage Distribution of respondent's by dietary habit

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Dietary habit | Vegetarian | 45 | 11.7 |
|  | Non vegetarian | 339 | 88.3 |
| Total |  | 384 | 100 |

Source: Field Survey 2019
Above table shows that majority $88.3 \%$ had non-vegetarian and $11.7 \%$ were vegetarian.

Table 5.9
Percentage Distribution of respondent's meat eaten habit by theirs awareness

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |  |  |  |  |
| :---: | :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Meat eating habit | Daily | 55 | 14.3 |  |  |  |  |
|  | Weekly | 138 | 35.9 |  |  |  |  |
|  | Twice a week | 74 | 19.2 |  |  |  |  |
|  | Some time | 72 | 18.7 |  |  |  |  |
| Total |  |  |  |  |  | 339 | 88.2 |

Source: Field survey 2019
The table shows that most weakly respondent's weakly meat eating percentage is $35 \%$, respectively, Daily meats with frequency of 55, Compared to largest numbers other respondent's frequency. This clears that daily meat eating respondents are at risk of hypertension compared to respondents who eat weekly, twice weekly or sometime.

Table 5.10
Percentage distribution of respondent's by diet time per day.

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |  |  |  |
| :---: | :--- | :---: | :---: | :---: | :---: | :---: |
| Diet time per day | One time a day | 0 | 0 |  |  |  |
|  | Two time a day | 156 | 40.6 |  |  |  |
|  | Three time a day | 202 | 52.6 |  |  |  |
|  | More than three | 26 | 6.77 |  |  |  |
| Total |  |  |  |  | 384 | 100 |

Source: Field survey 2019
Majority respondents $52.6 \%$ of participants says that three time a day, $40.6 \%$ were said that two time a day as well as $6.77 \%$ were said that more three time. Three time smokers are majority which behavior of respondents, to indicate risk behavior has been going on among the respondents.

## Table 5.11

## Percentage Distribution respondents by history relatives

Then two species broke off into separate lineages.

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :---: | :---: | :---: | :---: |
| Relative History of HTN | Yes | 44 | 10.7 |
|  | No | 340 | 89.3 |
| Total |  | 384 | 100 |

Source: Field survey 2019
The table shows that majority $89.3 \%$ is not relation, $10.7 \%$ were relative of hypertension. This table background show that majority of respondents no history of hypertension, this analysis data indicates that

## CHAPTER VI

## SELF CARE PRACTICES RELATED TO HYPERTENSION

### 6.1 Analysis of Hypertensions

Hypertension is a chronic condition of concern due to its role in the causation of coronary heart disease, stroke, and other vascular complications. It is the commonest cardiovascular disorder posing a major public health challenge to population in socioeconomic and epidemiological transition. Hypertension mean Systolic level 140 mmHg or higher and Diastolic level 90 mmHg or higher. It is one of the major risk factor for cardio vascular mortality, which accounts for $20-50 \%$ of all death Hypertension is supernatural power disease to the community people. The Cultural concept is emerging new on about HTN. Hypertension, also known as high or raised blood pressure, is a condition in which the blood vessels have persistently raised pressure. Blood is carried from the heart to all parts of the body in the vessels. Each time the heart beats, it pumps blood into the vessels. Blood pressure is created by the force of blood pushing against the walls of blood vessels (arteries) as it is pumped by the heart.

Hypertension is a major community and society burden due to its causal association with cardiovascular disease morbidity, mortality, disability and economic costs. It is becoming an increasingly common health problem worldwide due to greater longevity in many countries. The rapid changes in lifestyles and migration from rural to urban regions is also influencing a concurrent increase in the risk of hypertension in many countries and rural areas. Similarly in Nepal various studies have shown that the prevalence of hypertensions in adult population is around $20 \%$ in urban population. The objective of this study was to assess the knowledge, attitude and preventive practice of hypertension among adults in the Pokhara valley of Kaski district.

### 6.2 Self-care practiced on hypertension

Self-care practice is understand to preventive of hypertension.

### 6.2.1 Percentage Distribution of respondent's by use tobacco.

Tobacco smoking is the practice of smoking tobacco and inhaling tobacco smoke. A broader definition may include simply taking tobacco smoke into the mouth, and then releasing it, as is done by some with tobacco pipes and cigars.

## Table 6.1

## Percentage Distribution of respondent's by use tobacco

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Tobacco use <br> pattern | Yes | 26 | 6.8 |
|  | No | 358 | 93.2 |
| Total |  | 384 | 100 |

Source: Field survey 2019
The use tobacco status $6.8 \%$ of participants showed, majority of respondents (93.2\%) were not use tobacco. Formal, informal education, advertisement of radio, television and health worker advice help to aware in less use of tobacco. Stills 6.8 percentage are at risk of hypertension.

### 6.2.2 Percentage Distribution of respondent's by smoking use

The relationship between smoking and hypertension control is complex: Nicotine itself acts as both a stimulant and appetite suppressant and the act of smoking triggers behavior modification that prompts smokers to snack less. Smoking also might make food less tasty for some smokers.

Table 6.2
Percentage Distribution of respondent's by smoking use

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :---: | :---: | :---: | :---: |
| Use smoking | Yes | 126 | 32.8 |
|  | No | 258 | 67.2 |
| Total |  | 384 | 100 |

Source: Field survey 2019
The use of smoking of participants showed that majority $67.2 \%$ nonsmoker, respondents with $32.8 \%$ were smoked. Smoking Out of the total, 126 (32.8\%) participants were currently smoking. Half of the current smokers initiated smoking
before 17 years of age and $20 \%$ had been smoking continuously from the last 40 years. Almost all ( 57 of 60 ) smokers smoked manufactured (branded) cigarettes of an average of 10 sticks per day. Thirty-six ( $6.8 \%$ ) respondents were using smokeless tobacco.

Table 6.3
Percentage Distribution of respondent's by smoking stick per day

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Smoking stick per <br> day | $1-5$ stick per day | 77 | 20.1 |
|  | $6-10$ stick per day | 43 | 11 |
|  | $11-20$ stick per day | 1 | 0.3 |
|  | More than 20 stick | 1 | 0.3 |
|  | No smoking | 262 | 68.2 |
| Total | 384 | 100 |  |

Source: Field survey 2019
Majority respondents $68.2 \%$ were no smoking, $31.8 \%$ were cigarettes smoked on of them $20.1 \%$ were taken 1-5 stick cigarettes per day, 11-20 stick cigarettes were taken 0.35 respondents as well as more than 20 stick cigarettes were taken $0.3 \%$ respondents. Smoking Out of the total, 61 (17.6\%) participants were currently smoking.

### 6.2.3 Percentage distribution by use alcohol

Alcohol use disorder (which includes a level that's sometimes called alcoholism) is a pattern of alcohol use that involves problems controlling your drinking, being preoccupied with alcohol, continuing to use alcohol even when it causes problems, having to drink more to get the same effect, or having withdrawal.

Table 6.4
Percentage Distribution by use alcohol

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Use of alcohol | Yes | 82 | 21.4 |
|  | No | 302 | 78.6 |
|  | 384 | 100 |  |

Source: Field survey 2019

The alcohol use of participants showed that majority $78.6 \%$ were not use of alcohols similarly participants with $21.4 \%$ were used of alcohol. Data show that various majority people did not use the alcohol. So we can says that no danger of hypertension in study area.

Alcohol consumption over a quarter of the participants (21.4\%) had consumed alcohol at least once in past 30 days.

### 6.2.4 Percentage distribution of respondents by alcohol taking time per day

It is the habitual action on alcohol drinking hypertension. Which is helped to increases the hypertension.

Table 6.5
Percentage Distribution of respondents by alcohol taking time per day

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Alcohol taking <br> time per day | Daily | 26 | 6.8 |
|  | Weekly | 7 | 1.6 |
|  | Occasional | 49 | 12.8 |
|  | No alcohol drinking | 302 | 78.6 |
| Total | 384 | 100 |  |

Source: Field survey 2019
The alcohol taking time per day status of responded showed that majority $78.6 \%$ similarly participants with $6.8 \%$ were daily used, $1.6 \%$ weekly and $12.8 \%$ were occasional.

Table 6.6
Percentage Distribution by performed exercise

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Perform exercise | Yes | 127 | 33.1 |
|  | No | 257 | 66.9 |
|  | 384 | 100 |  |

Source: Field survey 2019

The perform exercise of participants showed $33.1 \%$, similarly participants with $66.9 \%$ were not perform exercises. Majority respondents are no perform exercises is high. It is show that risk behavior people are more. Still now hypertension his been increased chances more in this committee.

Majority $71.6 \%$ were normal blood pressure among participants. $22.1 \%$ were blood pressure high and $6.27 \%$ were prehypertension. Prevalence is show $22.1 \%$ percentage. Hypertension is greater in urban areas than in rural areas reflecting the acquisition of several risk factors, including sedentary lifestyles, consumption of fatty foods, obesity and smoking. It risk factors are also show influence to hypertension in my study. Hypertension is positively associated with higher socioeconomic status in both urban and rural areas. Similarly in Nepal various studies have shown that the prevalence of hypertensions in adult population is around $20 \%$ in urban population. The objective of this study was to assess the prevalence, self-care practice of hypertension among adults in the Pokhara-27, Kaski district. In this study is show the 22.1 percentage hypertension of total respondents. Generally it is the high rate in the urban and rural area in Nepal. As follows self-care practices has been show of the respondents.

- This study results shows that ( $33.1 \%$ ) of the respondent did the physical exercise among them ( $62.5 \%$ ) were male and (38.7\%) were female .Less than one fifth ( $32.8 \%$ ) practice on taking smoke among them ( $28.6 \%$ ) male and $(4.4 \%)$ female .More than one fifth ( $21.4 \%$ ) of the respondent had the habit of drinking alcohol among them (50.5\%) male and female (4.3\%).The main source of the information on hypertension was formal and informal education ( $20 \%$ ) and $80 \%$ others higher education, health workers.
- Majority non vegetarian $88.3 \%$ and $11.7 \%$ vegetarian were result showed on general food practices. Usually on food practice salty food, fatty food, Dairy product, fruits and crop item were used on theirs food practices.
- In this study result show that $6.8 \%$ tobacco, smoking $32.8 \%$ and alcohol use $21.4 \%$. This data is leading to risk behavior respondents
- Almost half ( $33 \%$ ) of the respondent did the physical exercise among them ( $62.5 \%$ ) were male and ( $38.7 \%$ ) were female.$L e s s$ than one fifth ( $32.1 \%$ ) practice on taking smoke among them (28.6\%) male and(4.4\%) female .More than one fifth ( $21.4 \%$ ) of the respondent had the habit of drinking alcohol among them ( $95.5 \%$ ) male and female ( $4.3 \%$ ).
- Almost half ( $26.6 \%$ ) of the respondent did the physical exercise morning walk among them $(62.5 \%)$ were male and $(38.7 \%)$ were female .Less than one fifth ( $6.8 \%$ ) practice on taking tobacco among them ( $70 \%$ ) male and $(30 \%)$ female. .Most $(88.3 \%)$ of the respondent had taken the nonvegetarian food practices among them male and female are equal participated. $17.7 \%$ respondents were vegetarian.

Table 6.7
Percentage Distribution respondents by history relatives

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :---: | :---: | :---: |
| Relative History of | Yes | 44 | 10.7 |
| HTN | No | 340 | 89.3 |
| Total | 384 | 100 |  |

Source: Field survey 2019
This table provides the information of past history of hypertension with in single family unit.

Non-communicable (Hypertension, Cancer, and Diabetes) diseases are pandemic worldwide and are major health challenges to global development. Despite the fact that medical science has made significant achievements in the twentieth century, it has been challenged by the burden of NCDs (Non-communicable) at present. Among the NCD Hypertension has been identified as a leading risk factor for mortality and ranked third as a cause of disability adjusted life years worldwide.

## CHAPTER VII

## SUMMARY, CONCLUSION AND RECOMMENDATION

This chapter the summaries the study and provides conclusion. Based on the finding some relevant suggestions are made. Summary of prevalence and self-care practices on hypertension. Draw the conclusion here relation between hypertension and selfcare practices.

### 7.1 Summary

A discretional study was among 384 adults in the Pokhara valley of Kaski district. The study period was from June to August 2019. Non probability convenient sampling technique was used to select sample. Formal written permission was obtained from the authorities prior to conduct and informed consent was obtained from the respondents prior to the data collection process. The pre testing of study was done in $5 \%$ of sample size in homogenous area. Data was obtained through face to face interview by using structured and semi-structured questionnaire. Data was analyzed using SPSS 20 version and MS excel. Hypertensions were higher in males when compared to females, an increasing trend was observed in both males and females with increasing age.

The study demonstrates that the level of knowledge and level of practice on hypertension is still low in people. Educational status of the respondent was significantly associated with the level of knowledge. Illiterate people did not had knowledge on hypertension as the educational status of the people increased level of knowledge also increased. Results show that the level of knowledge is significantly associated with the level of practice. People having good knowledge show good practice in their daily life. Out of total respondents, more than half of the respondent had positive attitude towards hypertension. Level of knowledge is significantly associated with the level of attitude. People having good knowledge had good attitude towards hypertension than the people having poor knowledge. Results show that Age and family type of the respondent did not have any association with level of practice. However, gender and educational background of respondent seemed to have an association with the level of practices. The practice of smoking, drinking alcohol and
physical exercise was found more in male as compared to female. Health personnel and mass media played the important role in providing knowledge to the people in terms of hypertension.. Hypertension is positively associated with higher socioeconomic status in both urban and rural areas. Similarly in Nepal various studies have shown that the prevalence of hypertensions in adult population is around $20 \%$ in urban population. $22.1 \%$ prevalence has been seen on this study. The objective of this study was to prevalence and self-care practice of hypertension among adults in the Pokhara city of Kaski district.

Most (52\%) of the respondents were aged between 35-45 years. Gender distribution of respondents showed that the majority ( $53.1 \%$ ) of participants were male and ( $46.9 \%$ ) male. Most of the respondent were married ( $93.5 \%$ ) and belongs to Nuclear family. Most ( $64.6 \%$ ) of respondent had service as occupation. In this study only ( $82.6 \%$ ) respondent had good knowledge the term of HTN, only (33.1\%) had good practice on perform exercise and most ( $32.8 \%$ ) of the respondent had positive attitude towards use smoking.. Almost half (33\%) of the respondent did the physical exercise among them ( $62.5 \%$ ) were male and ( $38.7 \%$ ) were female .Less than one fifth ( $32.1 \%$ ) practice on taking smoke among them ( $28.6 \%$ ) male and( $4.4 \%$ ) female .More than one fifth $(21.4 \%)$ of the respondent had the habit of drinking alcohol among them ( $95.5 \%$ ) male and female (4.3\%).

Almost half ( $26.6 \%$ ) of the respondent did the physical exercise morning walk among them ( $62.5 \%$ ) were male and (38.7\%) were female .Less than one fifth (6.8\%) practice on taking tobacco among them (70\%) male and(30\%) female. .Most (88.3\%) of the respondent had taken the non-vegetarian food practices among them male and female are equal participated. $17.7 \%$ respondents were vegetarian.

The level of knowledge is significantly associated with the level of practice. People having good knowledge show good practice in their daily life. Level of knowledge is significantly associated with the level of attitude. Results show that Age and family type of the respondent did not have any association with level of practice. However, gender and educational background of respondent seemed to have an association with the level of practices.

### 7.2 Major finding of the study

### 7.2.1 Knowledge/ Awareness

- The study demonstrates knowledge and self-care practice on hypertension is still low in people. The study demonstrates prevalence of hypertension is increasing among the people
- Educational status of the respondent was significantly associated with the level of awareness. Literate people number or percentage is very high in this study but knowledge awareness on hypertension is increasing.
- Results show that the level of knowledge is significantly associated with the level of practice. People having good knowledge show good practice in their daily life.
- Out of total respondents, more than half of the respondent had positive attitude towards hypertension.
- People having good knowledge had good attitude towards hypertension than the people having poor knowledge.
- Results show that Age and family type of the respondent did not have any association with level of practice.
- However, gender and educational background of respondent seemed to have an association with the level of practices.
- The study demonstrates that the level of knowledge and level of practice on hypertension is still low in people. Educational status of the respondent was significantly associated with the level of knowledge.
- Illiterate people did not had knowledge on hypertension as the educational status of the people increased level of knowledge also increased.
- Results show that the level of knowledge is significantly associated with the level of practice. People having good knowledge show good practice in their daily life. Out of total respondents, more than half of the respondent had positive attitude towards hypertension.
- Level of knowledge is significantly associated with the level of attitude. People having good knowledge had good attitude towards hypertension than the people having poor knowledge.
- Results show that Age and family type of the respondent did not have any association with level of practice. However, gender and educational background
of respondent seemed to have an association with the level of practices. The practice of smoking, drinking alcohol and physical exercise was found more in male as compared to female. Health personnel and mass media played the important role in providing knowledge to the people in terms of hypertension.


### 7.2.2 Self-care practice on hypertension

- This study results shows that (33.1\%) of the respondent did the physical exercise among them ( $62.5 \%$ ) were male and ( $38.7 \%$ ) were female .Less than one fifth ( $32.8 \%$ ) practice on taking smoke among them (28.6\%) male and $(4.4 \%)$ female. More than one fifth ( $21.4 \%$ ) of the respondent had the habit of drinking alcohol among them ( $50.5 \%$ ) male and female ( $4.3 \%$ ).The main source of the information on hypertension was formal and informal
- Education ( $20 \%$ ) and $80 \%$ others higher education, health workers.
- Majority non vegetarian $88.3 \%$ and $11.7 \%$ vegetarian were result showed on general food practices. Usually on food practice salty food, fatty food, Dairy product, fruits and crop item were used on their food practices.
- In this study result show that $6.8 \%$ tobacco, smoking $32.8 \%$ and alcohol use $21.4 \%$. This data is leading to risk behavior respondents.
- Almost half ( $33 \%$ ) of the respondent did the physical exercise among them ( $62.5 \%$ ) were male and ( $38.7 \%$ ) were female .Less than one fifth ( $32.1 \%$ ) practice on taking smoke among them ( $28.6 \%$ ) male and(4.4\%) female .More than one fifth ( $21.4 \%$ ) of the respondent had the habit of drinking alcohol among them ( $95.5 \%$ ) male and female ( $4.3 \%$ ).
- Almost half ( $26.6 \%$ ) of the respondent did the physical exercise morning walk among them ( $62.5 \%$ ) were male and (38.7\%) were female .Less than one fifth ( $6.8 \%$ ) practice on taking tobacco among them ( $70 \%$ ) male $\operatorname{and}(30 \%)$ female. .Most $(88.3 \%)$ of the respondent had taken the nonvegetarian food practices among them male and female are equal participated. $17.7 \%$ respondents were vegetarian.
- Results show that Age and family type of the respondent did not have any association with level of practice. However, gender and educational background of respondent seemed to have an association with the level of practices. Almost half ( $33.1 \%$ ) of the respondent did the physical exercise among them (62.5\%) were male and (38.7\%) were female.
- .Less than one fifth ( $32.1 \%$ ) practice on taking smoke among them ( $28.6 \%$ ) male and $(4.4 \%)$ female .More than one fifth $(21.4 \%)$ of the respondent had the habit of drinking alcohol among them (95.5\%) male and female (4.3\%).
- Almost half ( $26.6 \%$ ) of the respondent did the physical exercise morning walk among them ( $62.5 \%$ ) were male and ( $38.7 \%$ ) were female .Less than one fifth ( $6.8 \%$ ) practice on taking tobacco among them ( $70 \%$ ) male and(30\%) female. .Most ( $88.3 \%$ ) of the respondent had taken the nonvegetarian food practices among them male and female are equal participated. $17.7 \%$ respondents were vegetarian.


### 7.2.3 Prevalence on the study

Table 7.2.1
Percentage distribution of respondent's BP measurement

| Characteristics | Parameters | Frequency(n) | Percentage (\%) |
| :--- | :--- | :---: | :---: |
| Blood pressure <br> measurement | BP Normal(120-80mmhg) | 275 | 71.6 |
|  | BP prehypertension <br> $(120 / 80 \mathrm{mmh}-140 / 90 \mathrm{mmhg})$ | 24 | 6.27 |
|  | Hypertension (>140- <br> $90 \mathrm{mmhg})$ | 85 | 22.1 |
|  | 384 | 100 |  |

Source: Field survey 2019
Above table shows that majority $71.6 \%$ were normal blood pressure among participants $22.1 \%$ were blood pressure high and $6.27 \%$ were prehypertension. Prevalence is show $22.1 \%$ percentage. Hypertension is greater in urban areas than in rural areas reflecting the acquisition of several risk factors, including sedentary lifestyles, consumption of fatty foods, obesity and smoking. It risk factors are also show influence to hypertension in my study. Hypertension is positively associated with higher socioeconomic status in both urban and rural areas. Similarly in Nepal various studies have shown that the prevalence of hypertensions in adult population is around $20 \%$ in urban population. The objective of this study was to assess the prevalence, self-care practice of hypertension among adults in the Pokhara-27, Kaski district. In this study is show the 22.1 percentage hypertension of total respondents. Generally it is the high rate in the urban and rural area in Nepal.

In this section show that, Prevalence of Hypertension is $22.1 \%$. In this my study statistic shows that prevalence of hypertension is still high in urban rural area. Respondents factor/risk people of Hypertension (HTN) stills increasing. Where overall prevalence of hypertension among adult patients is increasing.

### 7.4 Conclusion

The objective of this study was to assess the prevalence and self-care practice on hypertension among adults in the Pokhara metropolitan-27 valley of Kaski district.

A descriptive study was among 384 adults in the Pokhara valley of Kaski district. The study period was from June to October 2019. Convenient sampling technique was used to select sample. Formal written permission was obtained from the authorities prior to conduct the study and informed consent was obtained from the respondents prior to the data collection process. The pre testing of study was done in $10 \%$ of sample size in homogenous area. Data was obtained through face to face interview by using structured and semi-structured questionnaire. Data was analyzed using SPSS 20 version and MS excel.

The study demonstrates that the level of knowledge and level of practice on hypertension is still low in people. Educational status of the respondent was significantly associated with the level of knowledge. Illiterate people did not had knowledge on hypertension as the educational status of the people increased level of knowledge also increased. Results show that the level of knowledge is significantly associated with the level of practice. People having good knowledge show good practice in their daily life. Out of total respondents, more than half of the respondent had positive attitude towards hypertension. Level of knowledge is significantly associated with the level of attitude. People having good knowledge had good attitude towards hypertension than the people having poor knowledge. Results show that Age and family type of the respondent did not have any association with level of practice. However, gender and educational background of respondent seemed to have an association with the level of practices. The practice of smoking, drinking alcohol and physical exercise was found more in male as compared to female. Health personnel and mass media played the important role in providing knowledge to the people in terms of hypertension.

The level of knowledge and level of practice on hypertension is still very low in people. Results show that the level of knowledge is significantly associated with the level of practice. People having good knowledge show good practice in their daily life. The level of knowledge and practice among adults is very poor. So, health programme and BCC should be conducted for raising awareness and for improving behavior of adults.

### 7.5. Recommendation

On the basis of findings it is recommended that;
i Health promotion programme should be conducted for raising awareness in time to time
ii. BCC should be conducted for improving behavior of person.
iii. There should be intervention programmers in the urban areas friendly by targeting population at risk.
iv. There should be conduct a large scale study in this issue

## REFERENCES

Akbari M, Moosazadeh M, Ghahramani S, Tabrizi R, Kolahdooz F, Asemi Z, et al. (2017). High prevalence of hypertension among Iranian adults : a systematic review and meta-analysis. Iran ,Terahan: Journal of hypertension. 35(6):115563.

Abdullah A, Othman S. (2011).The influence of self-owned home blood pressure monitoring (HBPM) on primary care patients with hypertension: a qualitative study. BMC family practice.12:143.

Ai L, Lan X, Wang L, Xu Y, Zhang B.(2016).Clinical study on the influence of phloroglucinol on plasma angiotensin II and D-Dimer index in patients with severe pregnancy-induced hypertension. Pakistan journal of pharmaceutical sciences 29(4 Suppl):1375-8.

Chang Y, Li Y, Guo X, Chen Y, Dai D, Sun Y.(2017).The Prevalence of Hypertension Accompanied by High Homocysteine and its Risk Factors in a Rural Population:International journal of environmental research and public health. 14(4).

Chia YC. Ssa 03-2 (2016).Prevalence and Predictors of Resistant Hypertension in Southeast Asia.Journal of hypertension. 2016;34 Suppl 1 - ISH 2016 Abstract Book:e4-e5.

Davidovic G, Iric-Cupic V, Milanov S. (2013).Associated influence of hypertension and heart rate greater than 80 beats per minute on mortality rate in patients with anterior wall STEMI.International journal of clinical and experimental medicine. 6(5):358-66. New York: American Heart Association, Inc.Retrived from http://hyper.ahajournals.org.

Dhungana RR, Pandey AR, Bist B, Suira Joshi, Devkota4 S.(2016).Prevalence and Associated Factors of Hypertension: Kathmandu, Nepal. International journal of hypertension, 10 .

Gopinath B, Hardy LL, Baur LA, Teber E, Mitchell P.(2012).Influence of parental history of hypertension on screen time and physical activity in young offspring. Journal of hypertension.30(2):336-41.

Katherine T. Mills, Joshua D. Bundy, Tanika N. Kelly, Jennifer E. Reed, Patricia M. Kearney, Kristi Reynolds, et al. (2016).Global Disparities of Hypertension Prevalence and Control.

Krzywinska-Wiewiorowska M, Stawinska-Witoszynska B, Krzyzaniak A, Kaczmarek M, Siwinska A. (2017) Environmental variation in the prevalence of hypertension in children and adolescents- is blood pressure higher in children and adolescents living in rural areas? Annals of agricultural and environmental medicine : AAEM. 24 (1):129-33.

Lu K, Chen J, Wang L, Wang C, Ding R, Wu S, et al. (2017).Association of Sleep Duration, Sleep Quality and Shift-Work Schedule in Relation to Hypertension Prevalence in Chinese Adult Males:International journal of environmental research and public health. 14 (2).

Li H, Yan X, Deng X, Yang L, Zhao S, Zou J, et al. (2017).A cross-sectional study of the prevalence, awareness, treatment and control of hypertension in Shenzhen, China.BMJ open.7(6):e015206.

Mobula LM, Fisher ML, Lau N, Estelle A, Wood T, Plyler W.(2016).Prevalence of Hypertension among Patients Attending Mobile Medical Clinics in the Philippines after Typhoon Haiyan. PLoS currents. 8.

Owolabi EO, Goon DT, Adeniyi OV, Seekoe E. (2017).Social epidemiology of hypertension in Buffalo City Metropolitan Municipality (BCMM): crosssectional study of determinants of prevalence, awareness, treatment and control among South African adults. BMJ open. 7(6):e014349.

Pandey, M.R. (1983). Prevalence of hypertension in an urban community of Nepal. Souvenir. Eleventh All Nepal Medical Conference, 1983; 1-15. Retrieved from:nesog.org.np/uploaded/.../Souvinor-Xth-International-Conference2011.pdf

Park K. (2018). Park's text book of Preventive and Social Medicine. Premnagar, Jabalpur, (India)482 00115.

Soubeiga JK, Millogo T, Bicaba BW, Doulougou B, Kouanda S.(2017).Prevalence and factors associated with hypertension in Burkina Faso: a countrywide cross-sectional study. BMC public health.17(1):64.

The himalayan times, (2017). Hypertenson a growing concern among youth. Kathmadandu: (3)

World Health Organization (2011).Hypertension fact sheet. Retrieved from: www.searo.who.int/.../non_communicable_diseases_hypertension_fs.pdf

## ANNEX I

## INFORMED CONSENT FORM

CODE NO
Namaste
I am student of master's degree of anthropology, two year, Tribhuwan university affiliated collage of Prithivi Narayana campus, Bhimkalipatan-1 Pokhra Kaski. This study is being conducted as the partial fulfillment of requirement of masters of anthropology. My research topic is "PREVALANCE ANDSELF CARE PRACTICES HYPERTENSION AMONG THE ADULTS IN POKHARA CITY" The purpose of this study is to find the prevalence and self-care practice of hypertension. For this, your information is very important. I would like to ask you a few questions about hypertension. I would be very grateful if you could spend few minutes to answer my questions. I will not put your name in the format. All the information you give will be kept strictly confidential. Your participation is voluntary and you are not obliged to any questions you don't want.

## Do I have your permission to continue?

Yes $\square$
$\square$

Serial No:
Date. $\qquad$

## "PREVALENCE and SELF-CARE PRACTICES HYPERTENSION AMONG THE ADULTS IN POKHARA CITY"

## QUESTIONNAIRE

## Form No:

Place of Interview:

## Date of Interview:

Ward No:

## Part I Socio-demographic related factors

1. Date of Birth of Respondent. $\qquad$
2. Gender
a) Male
b) Female
c) Third Sex
3. Type of Family
a) Single Family
b) Joint Family
c) Joint Family
4. Religion of Respondent
a) Hindu
b) Cristian
c) Islam
d) Buddhist
v) Others (Specific) $\qquad$

5 . Ethnicity
a) Brahmin
b) Chhetri
c) Ethnicity
d) Dalit
e) Muslim
6. Educational status
a) Illiterate
b) Informal education
c) Basic education
d) Graduation
e) > graduation
7. Occupation of Respondent?
a) Unemployment/House wife
b) Business
c) Agriculture
d) Government services
e) Private services
f) Remittance
g) Labor
8. Income Source of Family
a) Agriculture
b) Government Services
c) Private job
d) Business
e) Labor
f) Remittance
g) Non-government services
9. Marital Status
a) Married
b) Unmarried
c) Widow
d) Male widow
10. Annual Income
$\qquad$

## Part II Awareness self-care practice related factors.

11. Have you heard about the term hypertension?
a) Yes
b) No
12. Do you know causes of hypertension? [If no go to the question number 17]
a) Yes
b) No
13. What are the cause of HTN?
a) Body fat
b) Drinking alcohol
c) smoking
d) Spicy food
d) others (specific) $\qquad$
14. What are the signs/symptoms of hypertension?
a) Headache
b) Dizziness
c) vomiting
d) Others (specific) $\qquad$
15. Are there any associated disease along with hypertension?
a) Yes
b) No
16. If yes, what may be the disease?
a) Hyperthyroidism
b) Glumeronephraitis
c) Diabetics
d) others (specific) $\qquad$
17. What is your dietary habit?
a) Vegetarian
b) Non-vegetarian
c) Both types
18. If non-vegetarian, how often do you take the meat?
a) Daily
b) weekly
c) Twice a week
d) Sometimes
19. What type of food do you include?
a) Diary products
b) Fatty foods
c) Salty food
d) Fruits/ Salad
d) Others (specify) $\qquad$
20. How often do you include these foods in your diet per day?
a) One a day
b) Twice a day
c) Thrice a day
d) More than three
21. Do you ever use tobacco?
a) Yes
b) No
22. How long have you use tobacco?
23. Do you ever smoke?
a) Yes
b) No
24. If yes, how much stick do you used per day?
a) 1- 5 sticks per day
b) 6-10 sticks per day
c) 11-20 sticks
d) $<20$ sticks
25. Do you ever use alcohol?
a) Yes
b) No
26. If yes then, how often do you take alcohol?
a) Daily
b) weekly
c) Occasionally
27. Do you perform any form of exercise?
a) Yes
b) No
28. If yes then, what type of exercise do you do?
a) Morning walking
b) Running
c) Yoga
d) Jugging
e) Others (specify) $\qquad$
29. How often do you perform this exercise?
a) Daily
b) weekly
c) Occasionally
d) Rarely

## Part III Prevalence related factors

30. Blood pressure measurement
a) Systolic $\qquad$
b) Diastolic
31. Hypertension?
a) Yes
b) No
32. Is there any history of hypertension in family?
a) Yes
b) No
c) Do not know anything
33. If yes then, what is your relation?
a) Father
b) Mother

