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KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN AND RURAL COMMUNITY OF KAMRUP DISTRICT, ASSAM

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ABSTRACT

Background -Tobacco use in children and adolescents is reaching pandemic levels. The World Bank has reported that nearly 82,000–99,000 children and adolescents all over the world begin smoking every day. About half of them would continue to smoke to adulthood and half of the adult smokers are expected to die prematurely due to smoking related diseases. If current smoking trends continue, tobacco will kill nearly 250 million of today's children. Tobacco addiction of a large number of adults has been initiated during the adolescence. The study was conducted to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam. The objectives were to assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected urban and rural community, to compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community, the study also attempted to determine to find out the association between knowledge on ill effects of tobacco uses among adolescence with selected sociodemographic variables i.e., Age, Gender, Education, Religion, Father'seducation, Mothers education, Father's occupation, Mother's occupation and Family income.

Materials and Methods -A Quantitative Research Approach and Evaluative Comparative Research Designwas adopted for the study. The study was conducted at in village Nizarapar, Singimari and Milanagar under Panikhaiti MPHC for rural area and Odalbakra, Sree Nagar and Lalganesh Colony of Odalbakara MPHC for Urban areas. The investigator uses Multistage Simple Random Sampling Technique to select 290 samples 145 from urban and 145 from rural (adolescence of 12-19 years). Structured interview knowledge questionnair method was use to collect the data.

Result-The study revealed that the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. Findings showed that in urban mean knowledge score was 12.27 ± 2.752 and in rural mean knowledge score 16.01 ± 1.734 with means difference of 3.74. The mean difference between urban and rural knowledge score was tested using unpaired 't' test with obtained (t=13.83) was statistically not significant at $p<0.05$ level of significance. The results infer that there is significant difference in Knowledge on ill effects of tobacco uses among adolescence in Selected Rural and Urban Areas of Kamrup District, Assam.

Conclusion-Most of the adolescence in rural and urban have a moderately adequate knowledge on ill effect of tobacco uses. Significant association was found in only in terms of age, educational status and religion in rural community and Age, Education and Fathers education in urban community.

CHAPTER-I
INTRODUCTION

"Cigarette is classy way to commit suicide"

-Kurl Vonnegut.

Tobacco is a green, leafy plant that is grown in warm countries. After it is picked, it is dried, ground up and used in different ways. It can be smoked in a cigarette, pipe or cigar. It can be chewed (called smokeless tobacco or chewing tobacco) or sniffed throughthenose(calledsnuff).Humanbeingshavebeenusingtobaccosince600 A.D. In India, it was introduced by the Portuguese. Earlier, tobacco was generally smoked using different types of pipes or as cigars or consumed orally (smokeless tobacco). Smokeless tobacco (SLT) is available in many forms in India and is widely used by all social groups. There is a wide variety of morbidity and mortality related to Smokeless tobacco (SLT) use, but Smokeless tobacco (SLT) has not yet received the attention it deserves as a public health problem. In India, betel quid chewing, mishri, khaini, gutka, snuff and as an ingredient of pan masala are widely used by all social groups. Betel quid is a combination of betel leaf, areca nut, slaked lime, tobacco, catechu and condiments according to individual preferences. Khaini consists of roasted tobacco flakes mixed with slaked lime. This mixture is prepared by the user keeping the ingredients on the left palm and rubbing it with the right thumb. The prepared pinch is kept in the lower labial or buccal sulcus. Its use is common in eastern India. Mawa is a mixture of areca nut, tobacco and slaked lime and is chewed. Its use is common in rural areas of Gujarat province. It is quite popular among the young population of ages 15-19. Snuff is a black-brown powder obtained from tobacco through roasting and pulverization. Snuff is used via nasal insufflations and is popular in eastern parts of the country. It is also applied on the gum by finger (this practice is usually initiated as a dentifrice) in the Western India, where it is known as bajar and mishri. Gutka is a manufactured smokeless tobacco product (MSTP), a mixture of areca nut, tobacco and some condiments, marketed indifferent flavors in colorful pouches. Pan Masala is a betel quid mixture, which contains areca nut and some condiments, but may or may not contain tobacco. [(1)]

BACKGROUND OF THE STUDY

Adolescence is the phase of transition between childhood and adulthood, from ages 10 to 19. It is a unique stage of human development and an important time for laying the foundations of good health. Adolescents experience rapid physical, cognitive and psychosocial growth. This affects how they feel, think, make decisions, and interact with the world around them. [(2)]

Despite being thought of as a healthy stage of life, there is significant death, illness and injury in the adolescent years. Much of this is preventable or treatable. During this phase, adolescents establish patterns of behaviour for instance, related to diet, physical activity, substance use, and sexual activity that can protect their health and the health of others around them, or put their health at risk now and in thefuture.
(2)

To grow and develop in good health, adolescents need information, including age- appropriate comprehensive sexuality education, opportunities to develop life skills, health services that are acceptable,

equitable, appropriate and effective, and safe and supportive environments. They also need opportunities to meaningfully participate in the design and delivery of interventions to improve and maintain their health. Expanding such opportunities is key to responding to adolescent's specific needs and rights. (2)

However, it's a responsibility, most adolescents don't consider while in the process of growing up how they are in charge of creating habits of living that will determine much of how they will probably behave when they step off into independence. And one of the greatest causes of concern among adolescent is tobacco addiction. Most adolescent are aware that tobacco use is a leading cause of death. However, this doesn't stop them from trying tobacco products. Trying tobacco just one time puts them at risk for addiction to nicotine.(3)

Adolescents are the most vulnerable population to initiate tobacco use. It is now well established that most of the adult users of tobacco start tobacco use in childhood or adolescence. There has been a perceptible fall in smoking in the developed countries after realization of harmful effects of tobacco. The tobacco companies are now aggressively targeting their advertising strategies in the developing countries like India. Adolescents often get attracted to tobacco products because of such propaganda. There has been a rapid increase in trade and use of smokeless tobacco products in recent years in the country, which is a matter of serious concern to the health planners. It is important to understand various factors that influence and encourage young teenagers to start smoking or to use other tobacco products.(4)

Tobacco use in children and adolescents is reaching pandemic levels. The World Bank has reported that nearly 82,000–99,000 children and adolescents all over the world begin smoking every day. About half of them would continue to smoke to adulthood and half of the adult smokers are expected to die prematurely due to smoking related diseases. If current smoking trends continue, tobacco will kill nearly 250 million of today's children. India is the second most populated country in the world. It is a secular country but the Hindus form the majority. Hinduism traditionally advocates abstinence from all intoxicants. Even then, India is the third largest producer and consumer of tobacco in the world. The country has a long history of tobacco use. Tobacco is used in a variety of ways in India, its use has unfortunately been well recognized among the adolescents. Tobacco addiction of a large number of adults has been initiated during the adolescence. [4] Tobacco is mainly produced in the states of Gujarat and Andhra Pradesh in India, where the weather is suitable for the crop. Tobacco consumed in any form poses health risks and complications and affects a large population of passive smokers. The highly addictive alkaloids present in tobacco make it hard to quit. Despite these health issues, the tobacco industry is flourishing due to its economic importance.(49)

NEED OF STUDY

The tobacco epidemic is one of the biggest public health threats the world has ever faced, killing more than 8 million people a year, including around 1.2 million deaths from exposure to second-hand smoke. All forms of tobacco are harmful, and there is no safe level of exposure to tobacco. Cigarette smoking is the most common form of tobacco use worldwide. Other tobacco products include water-pipe tobacco, various smokeless tobacco products, cigars, cigarillos, roll-your-own tobacco, pipe tobacco, bidis and kreteks cigarette. (5)

Over 80% of the 1.3 billion tobacco users worldwide live in low- and middle- income countries, where the burden of tobacco-related illness and death is heaviest. Tobacco use contributes to poverty by diverting household spending from basic needs such as food and shelter to tobacco. The economic costs of tobacco use are substantial and include significant health care costs for treating the diseases caused by tobacco use as well as the lost human capital that results from tobacco-attributable morbidity and mortality.(5)

The tobacco use situation in India is complex owing to the availability of various forms of tobacco. Also, adolescence and early adulthood, i.e., 15 to 24 years, are considered to be the most susceptible phase of life for initiation of tobacco use in India. Based on available evidence, it is estimated that 5% to 25% of Indian

adolescents currently use or have ever used tobacco. Even though smokeless tobacco is used less commonly, high rates of its use have been reported in India among adolescents aged 13 to 15 years (15% of boys and 5% of girls). [6]

Tobacco use is a major risk factor for many chronic diseases, including Non- communicable diseases (NCDs) like ischemic heart diseases, cancers, diabetes, chronic respiratory diseases, diseases affecting the liver and lungs. Smoking is a major risk factor for infection like pneumonia, Heart attacks, Strokes, Chronic Obstruction Pulmonary disease (COPD) (including emphysema and chronic bronchitis) and multiple cancer (particularly lung cancer, cancer of the larynx and mouth bladder cancer, and pancreatic cancer). It also causes peripheral arterialdiseaseandhighbloodpressurearetheleadingcausesofdeathgloballyand

associated with tobacco use. It is one of the major causes of death and disease in India and accounts for nearly 1.35 million deaths every year. India is also the third largest consumer and producer of tobacco. A variety of tobacco products are available at very low prices in the country. The most prevalent form of tobacco use in India is smokeless tobacco and commonly used products are khaini, gutkha, betel quid with tobacco and zarda. Smoking forms of tobacco used are bidi, cigarette and hookah.[7]

According to WHO statistics for 2010 in India, NCDs are estimated to account for 53% of all deaths are due to cardiovascular diseases and diabetes are the most common causes of deaths in India. This huge burden of NCDs can be attributed to increasing use of tobacco. Tobacco is a major risk factor for a number of diseases affecting all age groups. WHO data shows that tobacco uses kill nearly six million people in a year. Around five million of those deaths are the result of direct tobacco use while more than 600,000 are the result of non-smokers being exposed to second- hand smoke. One person dies every six seconds due to tobacco. Up to half of current users will eventually die of a tobacco-related disease. The situation is equally bad in India with estimate number of tobacco users being 274.9 million where 163.7 million users of only smokeless tobacco, 68.9 million only smokers and 42.3 million users of both smoking and smokeless tobacco as per Global Adult Tobacco Survey India (GATS). It means around 35% of adults (47.9% males and 20.3% females) in India use tobacco in some form or the other. Use of smokeless tobacco is more prevalent in India (21%). [7]

Nearly 50 per cent of all adults in Assam are tobacco users, according to a survey. Around 48.2 per cent of all adults in Assam, of whom 62.9 per cent are men and 32.9 per cent women, either consume smoke tobacco or use smokeless tobacco. GAST- India provides an ample opportunity to study the tobacco use behaviour in the form of smoking, smokeless tobacco and dual use of tobacco among adults in India. According to the GATS- reports tobacco is also a part of the socio-cultural milieu in Assam and use of smokeless tobacco is very high in this state. In Assam about 33% adults use smokeless tobacco. Paan (betel quid) with tobacco is the most common andtraditionalformofusingchewabletobacco.Thepresentstudyrevealsthatthere is significant association between use of smokeless tobacco and age, gender, occupation, education qualification of the respondents. There is an urgent need to take effective steps, especially on launching community awareness programs for the school children and public to educate them about the consequences of tobacco use, and on assessing their effectiveness in curbing the problem. Tobacco control policies in India should adopt a targeted, population-based approach to control and reduce tobacco consumption in the country. Health warning on use of smokeless tobacco products packages need to be stronger and clear to ensure that the message is effectively conveyed to the target population.[1]

However, tobacco consumption has been reduced significantly in the country. Despite this, it is still used by 267 million people, and as society liberalizes morewomen are taking up smoking. A series of legal precautions and warnings came into effect at the turn of the millennium. It started with banning advertising of tobacco and alcohol use, followed by mandatory pictorial warnings on products. A Supreme Court judgment in 2001 banned smoking in public spaces in the country, and a series of governmental anti-tobacco advertisements followed this message. Public spaces and restaurants have designated areas for smoking. The

ban on the sale, manufacture, distribution, and storage of gutka and all its variants was implemented in May 2013 and consequent notifications have enforced a strict ban on all smokeless tobacco products. The number of legal cigarettes has decreased while the illegal cigarettetrade has increased dramatically due to high cigarette taxes and strict tobacco control laws like India's 85 percent pictorial warning on tobacco productpacks.[49]

This study is being conducted keeping in view the alarming rates of use of tobacco among the adolescents. Despites vigorous efforts from the government to curb this menace, the number of tobacco users among young adults are not reducing, leading to various healths related problems. These later lead to serious health issues like cancer which in turn affects the economic status of their respective family members as well. That is why the researcher thinks that there is need of this study and the researcher further aims to assess the knowledge of these young adults regarding ill effects of tobacco consumption with a view to create awareness among them.

THE STATEMENT OF PROBLEM

"A comparative study to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam".

SPECIFIC OBJECTIVES

Objectives of the study formulated are:

1. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected urban community of KamrupDistrict,Assam.
2. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected rural community of KamrupDistrict,Assam.
3. To compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of KamrupDistrict,Assam.
4. To find out the association between knowledge on ill effects of tobacco uses among adolescence with selected socio-demographic variables in selected urban community of KamrupDistrict,Assam.
5. To find out the association between knowledge on ill effects of tobacco uses among adolescence with selected socio-demographic variables in selected rural community of KamrupDistrict,Assam.

OPERATIONAL DEFINITIONS

Assess

According to oxford dictionary it means- to evaluate the nature or quality. [9] n this study, it means to assess the level of knowledge on ill effects of tobacco uses among adolescence of selected urban and rural community of Kamrup District, Assam.

Knowledge

According to oxford English dictionary knowledge means the information, understanding, and skills that you gain through education or experience or the state of knowing about a particular fact or situation.[40]

In this study, it refers to the correct response of participants regarding ill effect of tobacco which will be elicited by using knowledge questioner

Ill effects of tobacco

According to oxford English dictionary ill effect of tobacco means, a detrimental or harmful effect of tobacco [9]

In this study, it refers to the condition and disease that can be caused by tobacco i.e., cancer, cardio vascular disease, COPD.

Tobacco

A plant with leaves that have high levels of the addictive chemical nicotine. After harvesting, tobacco leaves are cured, aged, and processed in various ways. The resulting products may be smoked (in cigarettes, cigars, and pipes), applied to the gums (as dipping and chewing tobacco), or inhaled (as snuff). (11)

In this study the tobacco refers to chewing tobacco, betel quid with tobacco, all the types pan masala, cigarette, bidis.

Adolescent

According to WHO**,** Adolescence is the phase of life between childhood and adulthood, from ages 10 to 19. (11)

In this study adolescent selected from the age 12 to 19 years in selected urban and rural community of Kamrup District, Assam.

HYPOTHESES

A hypothesis is a testable statement about the relationship between two or more variables or a proposed explanation for some observed phenomenon. (42)

H_1: There is significant difference in the level of knowledge on ill effect of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam at 0.05 level of significant.

H_2**:** There is significant association between knowledge of adolescents on ill effects of tobacco uses with selected socio-demographic variables in urban community of Kamrup District, Assam at 0.05 level of significant.

ASSUMPTIONS

Assumptions are principles those are accepted as being true based on logic or reasons, but without proof or verification. (41)

The assumptions of the study are:

- Adolescence of selected urban and rural community may have some knowledge regarding ill effect of tobaccouses.
- Adolescence are the best mediators to transfer the knowledge toothers.

DELIMITATION

Delimitation are the boundaries that the researcher sets in a research study, deciding what to include and what to exclude. They help to narrow down the study and make it more manageable and relevant to research goal. (44)

This study is delimitated to the adolescence age 12 to 19 years in selected urban and rural community of Kamrup District, Assam.

CONCEPTUAL FRAMEWORK

Conceptual framework is a set of general concepts and propositions that provide perspective on the major concepts of met paradigm such as person, health and well- being and environment. A conceptual framework is a tool researchers use to guide their enquiry; it is a set of ideas used to structure the research, a sort of map that may include the research question, the literature review, methods and data analysis from the literature reviewed several ideas and information was collected (Burns N and Grove K.S 2008). [8]

The conceptual framework chosen for the study is based on "Health Belief Model" the health belief model was developed initially by Rosenstock (1988) and further by Janz and Becker (1988). This model attempt to explain and identify the knowledge and practice of regarding management of common illness among adolescence.[39]

A person's motivation to undertake a health behaviour can be divided into three categories:

i) Individualperception

ii) Modifyingfactors

iii) Likelihood ofaction

Individual Perception

Individual perception is the first component of this model which includes perceived susceptibility/seriousness of illness.

Perceived Susceptibility refers to a person's subjective perception of the risk of acquiring an illness or disease. It is one of the most powerful perceptions in promoting people to adopt healthier behaviour. In this study person susceptibility to ill effects of tobacco uses due to inadequate knowledge on ill effect of tobacco.

Modifying Factors

The second component of the model consist of modifying factors such as demographic variable, perceive treat of illness and cues of action. According to the model modifying factors are those that modify person's perception.

- **Demographicvariables**

In this study demographic variables are Age, Gender, Education, Religion, Father Education, Mother Education, Father's occupation, Mother's occupation and Family monthly income.

- **Perceivethreat**

This perception refers to belief of a person about whether or not a disease poses real treat to him/her. perceive threat of a disease is affected by modifying factors. This factor can influence both perception and the corresponding cues necessary to start action. In this study perceived threat may be due to unhealthy lifestyle which leads to threatening condition like, cancer, coronary heart disease, chronic obstructive pulmonary disease, diabetes, andhypertension.

- **Cues ofaction**

Cues to action are the stimulus needed to trigger the decision-making process to accept a recommended health action. The intensity of cues needed to prompt action varies between person by perceive susceptibility, seriousness, benefit, and barrier. In this study cues of action such as Awareness on ill effects of tobacco, Health care professionals, Mass media campaigns.

Likelihood of Action

The third component of this present study is likely hood of action is the perceived benefits minus perceived Barriers.

Perceived benefits refer to person's perception of the effectiveness of various action available to reduce the threat of illness or disease (or to cure illness or disease). In this study person's perceived benefit through good knowledge, engage in good activities and good company (friends)

Perceived Barriers refers to person's feelings on the obstacle to performing a recommended health action. In this study perceived barrier of action such as Lack of self-control, Lack of knowledge on ill effects of tobacco uses.

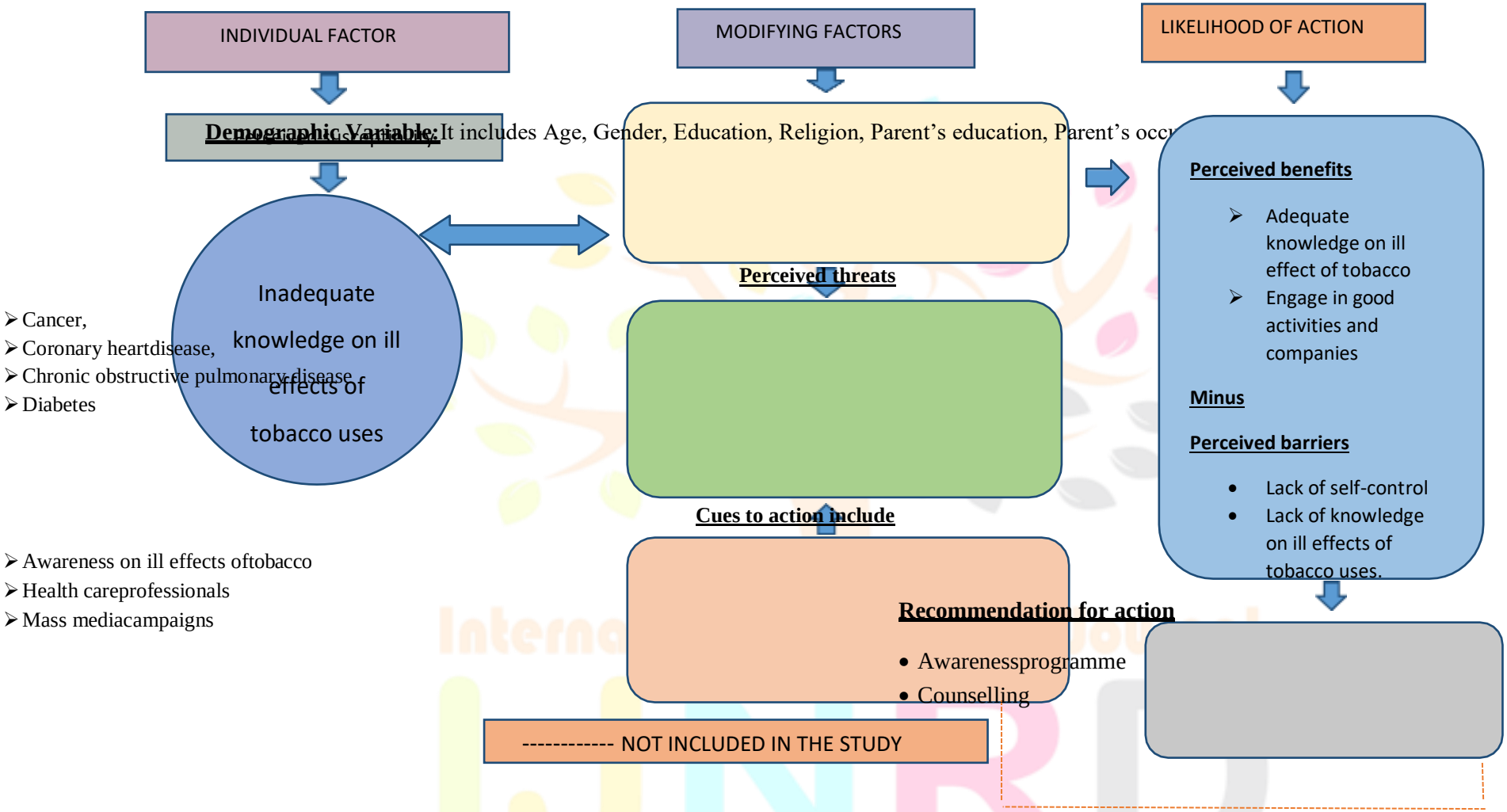

FIGURE 1: CONCEPTUAL FRAMEWORK BASED ON HEALTH BELIEF MODEL (ROSENSTOCK & JANZ AND BECKER 1988

SUMMARY

This chapter dealt with the background of the study, need of the study, the statement of problem, specific objectives, operational definitions, hypotheses, assumptions, delimitation and conceptual framework.

CHAPTER-II

REVIEW OF LITERATURE

A literature review is an evaluation report of information found in the literature related to selected area of study. The review describes, summarizes, evaluates and clarifies this literature. It gives a theoretical base for the research and help to determine the nature of research (Queensland University, 1999). [12] The role of literature review is to formulate and clarify the research problem, to ascertain what is already known in relation to problem of interest, for developing a broad conceptual context, facilitate cumulating knowledge for interpreting the result of the study.

Review of literature has been presented under the following heading:

I. Review of literature related to ill effect of tobacco uses among adolescence.
II. Review of literature related to knowledge of ill effect of tobacco uses amongadolescence.
III. Review of literature related to comparison of ill effect of tobacco uses amongadolescence.

I: Review of literature related to ill effect of tobacco uses among adolescence.

Dar AA, Garla BK, Dakli RJ, Khan M, Das M, Sharma S. (2021) conducted a study on Knowledge and perception toward tobacco use among selected colleges of Jodhpur city, Rajasthan, India. Cross-sectional descriptive research was conducted. 145 students from five Jodhpur city colleges are participating in the study. According to the findings shows that 100 (68.96%) of the subjects knew the original form of tobacco and 11.7% of the subjects were poor in their knowledge about tobacco, its ill-effects, and de-addictions. They also had a passing familiarity with the negative effects and relapse of cigarette usage. Hence the study revealed that students had a generally good view towards smoking when it came to attitude. There was no relationship between a student's attitude and area of residence, however there was a strong correlation between knowledge level and tobacco use. [13]

Kumar VR, Vasant W, Abhay G, Pramita M, PrajapatiK. (2019) conducted a study on prevalence of tobacco consumption among adolescents from rural area of Wardha District, Maharastra, India. It was a community-based cross-sectional study carried out in eight villages in the Wardha district and funded by the department of community medicine's Community Health Care programme. 485 teenagers between the ages of 10 and 19 participated in the study through home visits utilising a pre- made, pre-tested questionnaire. The finding shows that Prevalence of tobacco use (all forms), smokeless tobacco uses and smoking in rural adolescents were 20.82%, 20.41%, and 2.68%, respectively. Prevalence of tobacco use in boys (30.29%) was more than girls (4.49%). Higher Prevalence was found in late adolescent period. Bidi was commonly used form of smoke tobacco while Kharra was the preferred smokeless tobacco. Almost all smokers were male but few exceptions were there. Hence the study revealed that the prevalence of tobacco use among rural adolescents was very high (20.82%) as compared to national prevalence of 14.6% according to the global youth tobacco survey India 2009.[14]

Pokhrel B, (2019) conducted a study on Tobacco Use and its Effects Among Adolescent in Secondary Schools. In this study Quantitative data and a descriptive research design was used. Both primary and

secondary data were used for the study's purposes. The school was selected by purposive sampling method and 165 respondents were selected by using simple random sampling method and questionnaire was used as a tool for the collection of data. A questionnaire was employed as a tool for data collection, and the school was chosen using the purposive sampling approach. 165 respondents were chosen using the simple random sample method. The finding shows that among the respondents, 35.2 percent were past used and 25.9 percent respondents used for paan masala, pan parag and gutkha, 25.9 percents followed by cigarette. Then, adolescents reported that at least 47.5 percent respondent's father used tobacco. About 44.2 percent respondent's friend used tobacco. Specially 35.6 percent were used paan masala, pan parag and gutkha 46.6 percents used cigarette. Then, 19 percent were used tobacco in school compound.

39.7 percent respondents save their pocket money for buying any forms of tobacco. Similarly, 85.5 percent respondents were known about the effect of tobacco use. 100% adolescents have knowledge on the effect of tobacco in health. Hence the study revealed that the use of tobacco among adolescents was significantly associated with tobacco use habit of family members and friends, their exposure to pro-tobacco advertisement and environmental tobacco smoke.(15)

Sun J, Xi B, Ma C, Zhao M, Bovet P (2012-2019) conducted a study on prevalence of E-Cigarette Use and its associated factors among youths aged 12 to 16 years in 68 countries and territories, a global youth tobacco survey. They examined data from the 2019 National Youth Tobacco Survey in the United States and the population-based cross-sectional Global Youth Tobacco Survey conducted in 67 countries between 2012 and 2019 on 485746 young people between the ages of 12 and 16. The use of electronic cigarettes within the last 30 days was defined as using them on 1 or more days during that time. The result shows that the global prevalence of past-30-day e-cigarette use among youths was 9.2%, ranging from 1.9% in Kazakhstan to 33.2% in Guam. Maternal smoking (adjusted odds ratio [AOR] = 1.40;95%confidenceinterval[CI]=1.29,1.52),paternalsmoking(AOR=1.13; 95%CI=1.07,1.19),second-handsmokeexposure(AOR=1.74;95%CI=1.64,

1.84), youth cigarette smoking (AOR = 7.18; 95% CI = 6.84, 7.54), and youth other tobacco use (AOR = 3.88; 95% CI = 3.62, 4.15) were positively associated with e- cigarette use. Hence the study revealed that E-cigarette use was MODERATELY ADEQUATEly frequent among youths aged 12 to 16 years globally. (16)

Chuanwei M, Bo X, Zilin L, Han W, Min Z, Yajun L, Pascal B (1999-2018) conducted a study on prevalence and patterns of tobacco use among teenagers aged 13 to 15 worldwide. They used the most recent Global Youth Tobacco Surveys data on adolescents aged 13-15 years from 143 countries or territories that had done at least one survey between Jan 1, 2010, and Dec 31, 2018, to assess the recent prevalence of tobacco use and data from 140 countries that had done two or more surveys between Jan 1, 1999, and Dec 31, 2018, to assess the trends in the prevalence oftobaccouse530234adolescentswereincludedfromthe143countriesthathad

done at least one survey between 2010 and 2018. The finding shows that the most recent global prevalence of cigarette smoking was 11.3% (95% CI 10.3-12·3) in boys and 6.1% (5·6-6·6) in girls, based on cigarette smoking on at least 1 day during the past 30 days, 6.0% (5.5-6·6) and 2·6% (2.4-2.9) based on smoking on at least 3 days, and 4·2% (3.8-4.6) and 1.6% (1.4-1.8) based on smoking on at least 6 days. The most recent prevalence of the use of tobacco products other than cigarettes (e.g., chewing tobacco, snuff, dip, cigars, cigarillos, pipe, and electronic cigarettes) on at least 1 day during the past 30 days was 11.2% (9.9-12.6) in boys and 7.0% (6.4-7.7) in girls. The most recent prevalence of any tobacco use on at least 1 day during the past 30 days was 17·9% (16.1-19.6) in boys and 11.5% (10.5-12.4) in girls. The prevalence of cigarette smoking on at least 1 day during the past 30 days decreased between the first and last surveys in 80 (57.1%) of 140 countries, was unchanged in 39 countries (27.9%), and increased in 21 countries (15.0%). However, the prevalence of the use of tobacco products other than cigarettes was unchanged or increased in 81 (59.1%) of 137 countries.(17)

Grover S, Anand T, Kishore J, Tripathy JP, Sinha DN, (2016-2017) conducted a study "Global Adult Tobacco Survey-2 Evidence on Youth Smoking in India." In this research The data came from a cross-sectional GATS-2 survey conducted in India utilising a multistage, geographically stratified cluster sampling procedure (analysed using SPSSv17.0). An investigation of the potential relationship between tobacco usage and sociodemographic variables was conducted using bivariate analysis. To find out how strongly these variables are linked to cigarette usage, multivariable logistic regression analysis was used. The findings indicate that there were 13 329 respondents, aged 15 to 24, with 44.9% men and 55.1% women. 11.9% of all respondents reported using cigarettes. There were 10.9% and 5% of those who used smokeless tobacco respectively. Hence The overall tobacco usage of 11.9% among young people in the age group of 15 to 24 years is a matter of concern. The study identified several sociodemographic factors significantly associated with tobacco use, implying the need for designing interventions considering social vulnerabilities of youth.[18]

Ibrahim A, Mathew SB, Arekal SS, Kundapur R (2016) conducted a study to Assess the Awareness of Ill Effects of Tobacco among Adolescents and Young Adults of Mangalore, India**.** In this study, Community based cross-sectional study conducted in different schools and colleges of Mangalore. Universal sampling in the colleges were done for students, the total sample was 487. Finding shows that according to the study 78.23% said that they were aware of effects of smoking on health among them 39.83% and 14.78% thought it would lead to lung disease and heart disease respectively. And 7.8% of the smokers were aware that smoking leads to cancer. But 3.08%, 16.83% said that it would lead to diabetes & impotence respectively. Rest of the students said that smoking leads to infections and psychological effects.70.63 % of the students planned to be a non-smoker in future. Hence the study reveals that, 78.23%ofthestudysamplewasawareofharmfuleffectsoftobaccouseonhealth.
[19]

Xi B, Liang Y,Liu Y, Yan Y, Zhao M, Ma C, Bovet P. (2016) Conducted research on tobacco use and exposure to second-hand smoke in young adolescents aged 12 to 15 years, data from 68 low- and middle-income countries was taken. They used data from the Global School-based Student Health Survey (2006–2013) and the China Global Tobacco Youth Survey (2013), two school-based surveys of young adolescents (ages 12–15) that evaluate health behaviours using an anonymous, standardised questionnaire. The research findings indicate that current tobacco use was 13.6 percent, with rates ranging from 28% in Tajikistan to 44.7% in Samoa. Boys were more likely to smoke than girls were in the majority of countries, 55.9% of people worldwide reported having been exposed to second-hand smoke, with rates ranging from 16.4% in Tajikistan to 85.4% in Indonesia. Young adolescents who reported their parents' tobacco use were more likely to use tobacco themselves (odds ratio: 2.06, 95% CI: 1.93-2.19 for maternal use and 1.29, 1.23-1.35 for father use). However, the use of tobacco by early adolescents was similarly influenced by exposure to second-hand smoke.[20]

Gupta V, Yadav K, Anand K. (2010) conducted a study on Patterns of Tobacco Use across Rural, Urban, and Urban-Slum Populations in a North Indian Community. In this study, they used multistage sampling from urban, urban-slum, and rural with sample size of 250. The findings indicate that in urban slums, the daily bidi smoking rate was double that of urban males (17.8%), and it was quadruple that of rural areas (44.6%). The average age at which young smokers (15–34 years old) started smoking was 19.0 years in urban regions, 19.1 years in urban slum areas, and 18.7 years in rural areas. For daily smokers in the 55- to 64-year-old age range, the mean age of initiation was higher in older age groups (25.7 years in urban, 23.1 years in urban- slum, and 23.8 years in rural men), indicating a decline in the age of initiation across the board. When comparing 55 to 64-year-old rural men and women, the proportion of smokers climbed steadily with age, peaking at 71.8% for males and 42.7% for women. The age group of respondents who smoked the most cigarettes every day was 45 to 64, whereas the age group of respondents who used smokeless tobacco the most every day was 25 to 34. [21]

Sargent JD, Beach ML, Dalton MA, Mott LA, Tickle JJ, Ahrens MB at.el (2001) conducted a study on effect of tobacco use in films on trying smoking adolescents in New Hampshire and Vermont, United states. In this study cross sectional survey of 4919 schoolchildren aged 9-15 years and assessment of occurrence of smoking in 601 films. Sample was randomly selected middle schools in Vermont and New Hampshire, USA. The findings show that there were 5 instances of smoking on average (interquartile range: 1–12) in the movies. The average adolescent has seen 17 of the 50 films mentioned. Median exposure to smoking in films ranged substantially between 49 and 152 instances. The likelihood of ever trying to smoke rose with increasing categories of exposure, from 4.9% among students who saw 0 to 50 instances of smoking to 13.7%, 22.1%, and 31.3% for 101 to 105 instances, respectively. Hence in conclusion there was a strong, direct, and independent association between seeing tobacco use in films and trying cigarettes, a finding that supports the hypothesis that smoking in films has a role in the initiation of smoking in adolescents.(22)

Devi WC, Dutta A (2020) conducted a study to assess the knowledge and attitude regarding tobacco consumption among adolescents in selected schools of Guwahati, Assam with a view to develop an information booklet. In this study they adopted a descriptive research design, 304 samples were recruited using consecutive, non- probability sampling technique. The finding reveals of the study revealed that 54.60% of participants belong to 14-15year, 54.90% were male, 78.3% was from nuclear family, 45.3% father's educational status was graduate and above, 28.3% family monthly income is between 10,001-20,000, 66.1% family members does not take any tobacco product, 7.9% consumed sikhar, 61.8% source of information was mass media. 77.3% have Moderately Adequate Knowledge regarding tobacco consumption. 53.6% have unfavourable attitude regarding tobacco consumption. There was significant association between knowledge and demographic variables like Age, Types of family, Father's educational status, Monthly Income and Source of information at 0.05 level of significant. There is no significant association between attitude and demographic variables. There is co- relation between knowledge and attitude regarding tobacco consumption among adolescent, (t-value= 0.259, p-value=0.000) at 0.05 level of significant. Hence the study concludes with increase in knowledge, favorable attitude towards tobacco will be decrease or higher the knowledge level higher the unfavorable attitude regarding tobacco consumption.(48)

II: Review of literature related to knowledge of ill effect of tobacco uses among adolescence.

Vadhel U, Reddy A, K Doss J.J, (2021) Conducted a study to evaluate the effectiveness of structured teaching program on smoking hazards in terms of knowledge among adolescent boys in selected colleges at Rajkot. One group pre-test, post-test, quantitative research design was used in this study. The study was carried out in a few Rajkot colleges. An overall 60-person sample was chosen via non- probability convenient selection from colleges in the Rajkot area. The findings demonstrate that inferential statistical analysis was used to analyses the data that were collected. The effectiveness of a systematic training programme on the understanding of smoking dangers among adolescent boys was assessed using a T test. the impact of STP on boys' knowledge of the risks associated with smoking The mean difference between the pre-test and post-test means is 6.59, the pre-test standard deviation was 4.10, and the post-test standard deviation was 3.05. At the 0.05 level of significance, the 't' value is 11.57 with a degree of freedom of 59 (P=2.00), which is extremely significant.(23)

Chavan S. Seema, Charanraj KR (2020) Conducted a study on Prevalence, knowledge, and attitude towards smokeless tobacco use in adolescents of selected colleges at Dakshina Kannada District, Karnataka, India. Cross-sectional descriptive survey methodology was employed in this study. A total of 2,122 teenagers were chosen at random from 40 P.U. universities utilising disproportionate stratified random sampling and multistage cluster sampling. With a reliability of 0.85 and 0.83, respectively, a self-administered questionnaire that had been pretested and validated was employed. Analysis was performed using SPSS 23. According to the findings, 7% of teenagers used smokeless tobacco. When asked if they used smokeless tobacco, 83% said they did, 13% said it was risky, and 3.9% said it was unhealthy. 1% of teenagers had outstanding understanding of smokeless tobacco usage and its effects, 61.7% had good knowledge, 36% had sufficient knowledge, and 1.5% had poor knowledge. Adolescents' attitudes towards

using smokeless tobacco were positive in 53.4% of cases.[24]

Thakur N, Sharma R (2020) Conducted a study to assess the knowledge regarding the ill effects of smoking among adolescent in selected school, Jalandhar, Panjab. A descriptive exploratory design and analysis and interpretation of data done by using descriptive statistics, with sample size of 100 teenagers from the N.C. Model School area of Jalandhar, Punjab selected by using Non Probability purposive sampling technique. According to the study's findings, the majority of teenagers, or 72 (72%) have average understanding of the negative effects of smoking, while 25 (25%) have bad knowledge and 3 (%) have strong knowledge. Average knowledge score ranges from 9 to 16, low knowledge ranges from 0 to 8, and strong knowledge ranges from 17 to 25. Hence the study's presumption that teenagers are aware of the negative effects of smoking.[25]

Malik P (2020) conducted a study to assess the effectiveness of planned teaching program on knowledge regarding ill effects of smoking among adolescent boys of village Dankaur, greater Noida, UP. An evaluator approach was adopted by the researcher to evaluate the effectiveness of structured teaching programme on knowledge regarding ill effects of cigarette smoking and its prevention among adolescent boys. Pre-experimental one group pre-test post-test was used. The findings show that majority of the samples in this study, 60 (69%) were between the ages of 18 and 19. The study's key finding was that 43 out of 100 teenagers, or 43%, had low levels of understanding. Regarding the remaining 57% (57), adolescents' knowledge levels ranged from mediocre to good. According to the aforementioned data, just half of the 39 samples had adequate knowledge. Hence the study effective ($p<0.05$) to improve the level of knowledge regarding ill effects of cigarette smoking and its prevention among adolescent boys.[26]

Sangha S. Achoibam, Malandia B, Rema H, Mor K, Aier P. Alem (2019) Conducted a study on knowledge and practice on tobacco use in school student in Nagaland. An exploratory research design was used in this study. The study was carried out in a city in Nagaland's selected schools. A sample of 335 was selected by using enumerative sampling technique. The class IX and X kids were the target demographic. According to the findings, 57.2% of students actually used tobacco, and 62.25% of students had general knowledge of tobacco. A statistically significant difference between the knowledge and practise was discovered (P 0.05). The relationship between practise and gender (P 0.05) as well as the type of schools with knowledge (P 0.05) was statistically significant. Hence this study unequivocally shows the necessity for primary prevention of tobacco intake/use as a crucial component of health education for schoolchildren to help the pupils comprehend the negative effects of nicotine and therefore abstain from using it.[27]

Vankhuma C, Basu S, Sharma N, Kumar S (2019) conducted a study on tobacco use patterns and tobacco related awareness in medical students of Delhi. In this study they used a cross-sectional study among male undergraduate medical (M.B.B.S) students at a premier medical college. A total sample of 302 students. The findings indicate that 9.3% of medical student's smoke cigarettes or other tobacco products. There were 203 (67.2%) pupils who were under the age of 20. The students' increased tobacco use with age and professional year suggests that they first started smoking during their time in college. Additionally, compared to students living with their families, students staying in hostels used tobacco much more often ($p = 0.004$). 94 (31.1%) students didn't know that smoking causes lung cancer, and 159 (52.6%) students didn't think it was a risk factor for coronary heart disease. A total of 205 students (67.9%) knew that India has a tobacco control law in effect, and 258 (85.4%) knew that smoking was prohibited in public areas. Hence this study reveals that tobacco usage and the gaps in awareness of its harmful effects among medical students represent a major health concern.[28]

Htin Aung MN, Eiko Y, Min Htet K, Moe K, Joshua AR, Nobuyuki H (2019) conducted a study on knowledge, attitude, and usage pattern of tobacco among high school students in Nay Pyi Taw, Myanmar. A Cross-sectional study was conducted in this study; this study included 300 high school students in Grade 10 and 11. They used a multi-stage sampling method and the response rate was 100%. The result shows that 104 (34.7%) of the 300 students were smokers, while 85 (28.3%) used smokeless tobacco. The average age at which people started using cigarettes was 14 years. Even though the majority of students were aware of

tobacco's negative consequences, only 25% were aware of the Tobacco Product Law. Friends were the most common source of tobacco, while male family members were the primary smokers in households. Therefore, this study indicated that the high school students knew about the ill effects of tobacco, but not about the Tobacco Product Law. Schools need to educate students and teachers about tobacco and the Tobacco Product Law and the enforcement of the law is also needed[29]

Alexander P. C. (2017) A Study to Evaluate the Effectiveness of Structured Teaching Programme on Knowledge Regarding Hazards of Tobacco among Adolescent Boys of Tallarevu Village, Kakinada. A Quantitative Research approach, Pre experimental, one group pre and posttest design was used for this study. Data was collected from 100 Adolescent boys of selected village. Purposive sampling was used for selecting the samples. The investigator developed Structured Teaching Programme with regard to the Hazards of Tobacco. Structured knowledge questionnaire was used for data collection. Finding shows that in post-test 92% study participantshadadequateknowledgeand8%hadModeratelyAdequateKnowledge.

The overall analysis of knowledge that the pre-test mean is 1.8 and that of post-test is

21.91. The calculated 't' value is 87.595, which is higher than the table 't' value 3.39 at 99 df with 0.0001 level of significance. There was extremely significant difference between pre-test and post-test levels of knowledge among adolescent boys regarding hazards of tobacco. Hence it concludes that boys had adequate knowledge after structured teaching programme on hazards of tobacco. Nursing personnel can educate and counsel students and general population to change their attitude regarding tobacco consumption and help them to stop consuming tobacco.[30]

Sabnis R, Sahu K, Thakur D, Surana S, Mazhar H, Pandey S (2016) Conducted a study on the gap between urban and rural areas in adolescents' tobacco use and understanding of oral cancer in Chhattisgarh. Cross-sectional study was conducted among 12 and 15-year-old and urban and rural school going children. A comprehensive, previously tested, closed-ended questionnaire was used during face- to-face interviews with the study's sample size of 1000 youngsters. The prevalence of tobacco use was 48.8%, according to the results. Tobacco use was primarily a male activity. The knowledge and attitude of schoolchildren in urban regions were superior to those of schoolchildren in rural areas, and more urban schoolchildren smoked cigarettes. Children in rural areas consumed more smokeless tobacco than children in urban areas. Hence the study concludes the Prevalence of tobacco consumption among school children remains high with a wide disparity among urban and rural children.[31]

III: Review of literature related to comparison of ill effect of tobacco uses amongadolescence.

Verma K, Sharma A, Anupama K. (2021) Conducted a comparative study to assess knowledge regarding tobacco use and its ill effects among school children of district Sirmour Himachal Pradesh. In this study 164 sample sizes were taken through convenient sampling technique. The results showed that boys and girls had different pre-test scores; for example, 56% of boys had excellent pre-test knowledge scores compared to 49% of girls, while 51% of girls and 39% of boys had good scores, and 5% of boys had mediocre scores. According to post-test results, 43.1% of girls had outstanding knowledge, 27.5% had good knowledge, and 4.6% hadaverage

knowledge, whereas 53.2% of boys had excellent knowledge, 16.5% had good knowledge, and 5.5% had average level of knowledge. Boys throughout their adolescence were found to have a significantly significant t value of 4.264. In conclusion this study provides insight into the factors to consider while planning adolescent anti-smoking programs in this and similar settings. [32]

Jeffrin M, Tendolkar VD, Meshram K, Bhirange S. (2021) conducted a comparative study on Awareness of adverse effects of tobacco consumption in rural and urban children of central India. Students in classes from third through tenth grade (ages 8 to 16) participated in the survey, which was performed at schools located in the districts of central India. A total of 806 pupils were included in this study as part of the sample, 380 of them attended rural schools and 426 attended urban ones. The prevalence of tobacco use has

been determined in both urban and rural areas, with rural areas having a higher prevalence of 5.5%. The age at which tobacco use started in rural areas was 10 years old, whereas in urban areas, it started in the teen i.e. From 12 years old. Additionally, whereas smokeless tobacco was favoured in urban areas, smoke tobacco was preferred in rural ones. While parents in urban regions were oblivious of habit, 3.9% of parents in rural areas were aware of both their own and their children's habits. Hence, this study concludes There is more prevalence of tobacco consumption in rural school going children than urban school going children. Urban and rural area children were aware of hazardous effect of tobacco but still consumption is more in children from rural area.(33)

Baishya C. Achyut, Ojah J, Barman J. Pankaj, Sharma S (2019) conducted a comperative study on tobacco use and its correlates among adolescent boys in Kamrup (metro) and Kamrup (rural) District of Assam. In this study cross sectional study was carried out for a period of 5 months. A total of 300 adolescent boys form each district. According to the findings, 26.3% of adolescent males in Kamrup (M) district and 24.6% of adolescent boys in Kamrup (R) district smoke. 42 (14%) and 57 (19%) participants in the Kamrup (M) district use tobacco products, respectively. 6.7% of all respondents use tobacco products, including cigarettes and smokeless tobacco. 48 (16%) people in the Kamrup (R) district smoke, compared to 42 (14%), who use smokeless tobacco. 5.3% of all respondents use smokeless tobaccoproducts

in addition to cigarettes. In both Kamrup(M) and Kamrup(R) district, the most popular smokeless products are cigarettes and gutkha. Hence the study concludes the most important factors affecting smokeless tobacco use by adolescents in Assam are easy availability of these products, promotion and advertisements by manufacturers.
(34)

Rajeshwari S, Nawaz A, Sathyanarayana P, (2017) Conducted a study on A comparative study on tobacco use among school boys in single sex and co-education school in Bengaluru. In this study A comparative study was conducted in two randomly selected high schools in the urban field practice area of the medical institution; one of it being boys only (single-sex) and another co-education (co-ed) school. All the students studying in 8th, 9th and 10th standard were included in the study. The result show that A total of 467 boys participated in the study. Over all prevalence of tobacco use was 21.8% from both the schools. Tobacco use was found to be more in boys' school 68 (25.7%) when compared to co-education school (16.8%). Prevalence of smoking was found to be 38 (14.4%) and 17 (8.4%) in the two schools, this difference was found to be statistically significant with $\chi 2=4.59$, $p=0.032$.(35)

SUMMARY

This chapter dealt with the review of literatures. In this study the review of literature has been presented under following heading- review of literature related to ill effect of tobacco uses among adolescence, review of literature related to knowledge of ill effect of tobacco uses among adolescence, review of literature related to comparison of ill effect of tobacco uses among adolescence.

CHAPTER III
RESEARCH METHODOLOGY

Research methodology organizes all the components of the study in a way that is most likely to lead and valid answers to the sub-problems that have been posed. Research methodology simply refers to the practical "how of any given piece of research. More specifically, it is about how a researcher systematically designs a study to endure valid and reliable results that address the research aims and objectives. (12)

This chapter deals with the various steps taken by the researcher to conductthe study. This includes: research approach, research design, schematic design, settingof the study, population, sample, sampling technique, criteria for sample selection, variable, development and description of the tools, validity and reliability of the

tool, pilot study, ethical consideration, procedure for data collection, and plan for data analysis.

RESEARCH APPROACH

Research approach indicates the procedure for conducting the study. The present study aims to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. Hence, the quantitative research approach is considered as appropriate for the study.

RESEARCH DESIGN

Research design is the researcher's overall plan for answering the research questions or testing the research hypothesis. [12] Keeping in view the objective of the study, an Evaluative Comparative Research Design was adopted to assess and compare the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. The design was developed to examine the variablesinasituationthathasalreadyoccurred.Noattemptwasmadetocontrol or manipulate the situation.

RESEARCH SETTING

According to Polit and Beck, setting is the physical location and condition takes place in a study. It is important to select and appreciate setting where the study will be feasible in terms of cooperation of the members, transportation facilities, availability of the subject from whom data will be collected. Research setting are the specific areas from where the data are collected.[36]

The study was conducted in villages namely- Nizarapar, Singimari, and Milanagar of panikhaiti MPHC under Sonapur for rural community and Odalbakra, Sree Nagar and Lalganesh colonies of Odalbakara MPHC under Dhirenpara zone, for urbancommunity.

There are 12 Health facilities under Sonapur. These are, Chandrapur PHC, Digaru SD, Dimoria SD, Hahara MPHC, Hatibagara MPHC, Kamarpur MPHC, Khetrid, Maloibari MPHC, Nortap MPHC, Panikhaiti MPHC, Sonapur PHC and Tamulikuchi SD. Further, there are 4 Health facilities under Dhirenpara zone namely Fatasil UHC, Krishnanagar UHC, Odalbakra MPHC and Serabhati UHC. (Appendix-F)

Panikhaiti MPHC is located in Panikhaiti Village in Chandrapur Tehsil in Kamrup, District, Assam. According to 2011 census, the local language of Panikhaiti is Assamese. Total population is 3817 and number of houses are 752. Female Population is 48.8%. Village literacy rate is 66.0% and the Female Literacy rate is 29.2%. [47] There are total 11 number of villages namely, Thakurkuchi, Digarumukh, Bhagdara, Nulghuli, Milan Nagar, Cha Bagicha, Aranyanagar, Singimari, Akasinagar, Nizarapar and Chemical under Panikhaiti MPHC.

Odalbakara MPHC is located in Odalbakara, KahiliparaKamrup, District, Assam, with a population 48819. The male and female populations are 25307 and 23512 respectively. The size of the area is about 13.42 Square Kilometre. [46]

There are total 15 number of colonies namely, Sreebrumi, Jyolisree, Adagudem, Hrimbapur, Odalbakara, Kailashpur, Vivekanand, Sasanghat, Sree Nagar, Rolling Mill, Lalganesh, Bank colony, Golsinda Nagar, Hill view road, Sankar Nagar.

POPULATION

Population refers to the entire aggregation of cases that meets the designated criteria (PolitHungler PB 1999) (37)

In this study population includes all the adolescence.

Target Population-The target population refers to entire population in which a researcher is interested and which he or she would like to generalized the study result (Polit, D.F & Beck, C.T:2008) (36)

In current study, target populations were the adolescence of Kamrup District, Assam.

Accessible Population- The accessible population will be comprised of samples from the target population that are accessible to research as study participants (Polit, D.F & Beck, C.T:2008) (36)

The accessible population of the study was 12-19 years' adolescence residing in Urban and Rural Area of KamrupDistric, Assam.

TABLE 1.1

SELECTION OF DESIRED SAMPLE SIZE FROM SELECTED VILLAGES IN RURAL AREA.

Health care center	Village	Total adolescence	Proportionate number
Panikhaiti MPHC	1.Nizarapar	73	46
	2.Singimari	85	54
	3.Milan Nagar	72	45
Total	3	230	145

TABLE1.2

SELECTION OF DESIRED SAMPLE SIZE FROM SELECTED VILLAGES IN URBAN AREA.

Health care center	Village	Total adolescence	Proportionate number
Odalbakara MPHC	1.Odalbakara	75	47
	2.Sreenagar	80	50
	3.Lalganaesh	77	48
Total	3	232	145

SAMPLE AND SAMPLE SIZE

Sample refers to subset of a population that is selected to participate in a study. It is a portion of a population that represents the entire population.

In this study, samples are adolescence residing in selected rural and urban area of Kamrup District, Assam. The sample consists of 290 adolescences 145 in rural and 145 in urban. The sample size was determined using calculator.net sample size calculator. Population size of 203 and 232 was taken for rural and urban respectively with 5 percent margin of error, 95 percent confidence level and population proportion of 50percent.

SAMPLING TECHNIQUE

Sampling technique define the process of selecting a representative segment of population under study. (S.K Sharma,2018) [24]

In this study, researcher selected Probability Sampling Technique and under that researcher selected Multistage Simple Random Sampling Technique to select the samples.

*Stage-I***:** Out of six Sub-district namely- Capital zone, Dhirenpara Zone, East Zone, Sonapur, West Zone and others in Kamrup District, Assam only two Sub- district namely sonapur and Dhirenpara Zone were selected conveniently. The investigator considers Sonapur zone for rural population and Dhirenpara zone for urbanpopulation.

Stage-II: There are 12 health facilities under Sonapur. These are Chandrapur PHC, Digaru SD, Dimoria SD, Hahara MPHC, Hatibagara MPHC, Kamarpur MPHC, Khetrid, Maloibari MPHC, Nortap MPHC, Panikhaiti MPHC, Sonapur PHC and Tamulikuchi SD. Out of which only Panikhaiti MPHC was selected randomly for the rural population in the presentstudy.

Further there are 4 health facilities under Dhirenpara Zone namely Odalbakara MPHC, Fatasil UHC, Krishnanagar UHC, and Serabhati UHC. Out of which namely Odalbakara MPHC was selected randomly for the urban pollution in the present study.

Stage-III: There are total 11 no. of villages namely Thakurkuchi, Digarumukh, Bhagdara, Nulghuli, Milannagar, Cha Bagicha, Aranyanagar, Singimari, Akasinagar, Nizarapar, Chemical under Panikhaiti MPHC out of which Singimari, Milannagar and Nizarapar were selectedrandomly.
Similarly, there are 15 colonies namely Sreebrumi, JyoliSree, Adagudem, Hrimbapur, Odalbakara, Kailashpur, Vivekanands, sasanght, Sreenagar, Rolling Mill, Lalganesh, Bank colony, Golsinda Nagar, Hill view road, Sankar Nagar. Out of which Odalbakar, sreenagar and Lalganesh were selected randomly for the present study.
Stage IV: The subjects i.e., Adolescence whom so ever fulfils the study criteria were selected with the help of records and registers maintain by the ASHA.

SAMPLING CRITERIA

Inclusion Criteria

- The study includes adolescence who are residing in selected community of Kamrup District,Assam.
- Adolescence who were available on the day of datacollection.

Exclusion Criteria

- Adolescence who were not willing to participate in the researchstudy.

VARIABLE

A variable is any property, characteristic, number, or a quantity that increases or decreases over time or can take on different values (as opposed to constants, such as n, that do not vary) in different situation. [43]

Socio-demographic Variable:

In this study Socio-demographic Variable it includes Age, Gender, Education, Religion, Father's education, Mother's education, Father's occupation, Mother's occupation and Family income.

Research Variable:

In this study, the research variable is knowledge on ill effect of tobacco uses among adolescence.

TOOLS AND TECHINIQUE

Development of the tool

A research instrument is a device used to measure the concept of the interest in a research project that a researcher uses to collect data. Based on the objectives of the study, tools were developed in order to generate data. The following steps are followed for the development of the tools of the study.

- An extensive review of literature
- Discussion with guide and experts
- Construction of tool
- Content validity
- Pretesting and reliability of tool

Description of the tool

Based on the problem statement, objectives and operational definitions of the study, the tool was developed to gather the data the tool for collecting data was a Structured Interview Questionnaire consisting of two sections A and, section B.

Section-I: Demographic Performa

Demographic variables of a research study are those which researcher makes an attempt to study the sample characteristic and present them in research findings.
A Structured Interview Questionnaire was prepared to collect background information regarding demographic variables which includes Age, Gender, Education, Religion, Father's education, Mother's education, Father's occupation, Mother's occupation and family income.

Section-II: Structured Interview Questionnaire

Structured Interview Questionnaire on knowledge regarding ill effects of tobacco uses, among adolescence of selected urban and rural community of Kamrup District, Assam.
The tool consists of 24 question related to ill effects of tobacco uses among adolescence. In each question there are four responses. The answer will be interpreted by the researcher. For each correct answer is given a score of 1 (one). And the wrong answer given a score of (0). The knowledge was interpreted as-

Range:

(Mean - Standard deviation) = Inadequate Knowledge

(Mean ± Standard deviation) = Moderately Adequate Knowledge
(Mean + Standard deviation) = Adequate Knowledge

VALIDITY OF THE TOOL

Validity of an instrument refers to the degree to which an instrument measures what if is supposed to measure.

To determine content validity Section-A demographic profile and Section B- Structured Interview Questionnaire to assess the level of knowledge on ill effects of tobacco uses among adolescence was given to nine experts. Among them one from department of Child Health Nursing, three were from department of Medical Surgical Nursing, four were from department of Community Health Nursing and one PhysicianfromdepartmentofCommunityMedicine.(Appendix-C_2)Basedontheir

expertise and interest in the problem the experts are requested to give their opinion and verify the item for

relevancy, accuracy and appropriateness. The tools were modified and prepared as per suggestions and advice by the expert. Finally, with 100 percent agreement from all the experts, approved items were accepted for the current study.

Translation of tool

The final draft of the English version of the tool was translated into Assamese and then re- translated into English. Both the English and Assamese version of the tool was validated by Language expert. Thus, both the English and Assamese version of the tool was considered to be appropriate and effective to be used for the purpose of data collection. (Appendix E_2)

RELIABILITY OF THE TOOL

The reliability of an instrument is the degree of consistency and accuracy with which an instrument measures the attributes for which it is designed to measure.

In order to establish reliability of the tool, the technique called Karl Pearson's split half method was used and the calculate **'r'** is found to be **0.94** which indicate that the tool was reliable and statisticallysignificant.

PILOT STUDY

A pilot study is referred to a small scale preliminary try-out of the method to be used in an actually large study which acquires the researcher with problems that can be corrected in proportion for the large research study is done to provide the researcher with an opportunity to try out the procedures, methods and tools of data collection. In other words, the pilot study is miniature trial run of the methodology planned for the major research study which facilitates to improve the methodology of the study, can assess the feasibility of the study and may identify the problems that may be faced by the researcher in actual large research study.

Pilot study was conducted prior to main study by the researcher for the following objectives:

a)To find out the feasibility of the researchstudy.

b) To assess the availability of studysubjects.

c)To ensure the appropriateness of method and procedure of datacollection.

d) To estimate the actual time and potential problems the researcher may encounter during the actual large researchstudy.

e)To plan for the data analysis and interpretation of the final large research study.

 After formal permission was obtained from the Joint Director of Health Services, Kamrup Metropolitan district, Satpukhuri, Uzanbazar, Guwahati-1, Assam pilot study was conducted on 08-12-2022 to 12-12-2022 in rural and 13-12-2022 to 14-12-2022*(Apendix-B_2)*

 21 sample from urban and 21 sample from rural were selected by multistage random sampling technique. Purpose of the study was explained and confidentiality of the responses wasassured.

 Informed written consent was taken from the participants, followed by using Structured Interview Questionnaire to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community.

The major finding of the pilot study was summarized as follows:

The pilot study was conducted under Dhirenpara zone for urban and under Sonapur for rural. The overall findings of calculated knowledge level regarding ill effects of tobacco uses among adolescence in selected rural and urban community shows that, majority of them have Moderately Adequate Knowledge about ill

effects of tobacco uses i.e. 48% followed by 29% having Inadequate knowledge and 23% having Adequate knowledge, whereas in urban it shows that, 33% Inadequate knowledge, 42.8% Moderately Adequate Knowledge and 23.8% adequate knowledge.

Compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. Findings showed that in urban mean knowledge score was 11.8 ± 4.27and in rural mean knowledge score 10.33 ± 2.6 with means difference of 1.47. The mean difference between urban and rural knowledge score was tested using unpaired t test with obtained t=1.36 was statistically not significant at $p<0.05$ level of significance.

The association between knowledge on ill effects of tobacco uses among adolescence and selected socio-demographic variable in selected rural and urban, which was tested by using chi-square test. Result showed that age significant association at $p<0.05$ level with knowledge but demographic variable such as gender, educational level, father's education, mother's education, father's occupation, mother's occupation, religion, and family income were not significant at $p<0.05$ level. Whereas in urban result showed that age and religion was found significant association at $p<0.05$ level with knowledge but demographic variable such as gender, educational level, father's education, mother's education, father's occupation, mother's occupation and family income monthly were not significant at $p<0.05$ level with knowledge on ill effects of tobacco uses among adolescence in selected rural community.

ETHICAL CONSIDERATIONS

- The study was conducted after obtaining ethical approval from Institutional Ethical Committee of PEWS group of Institutions, Guwahati-26, Assam.*(Appendix-A_1)*
- Permission was taken from the Joint Director of Health Services, Kamrup Metropolitan district, Satpukhuri, Uzanbazar, Guwahati-1 Assam. *(Appendix- B_2)*
- Inform written and verbal consent was obtained from the adolescence age 18- 20 years and inform written and verbal consent was taken from parents of age 13-17 years of selected urban and rural community or study participants. *(Appendix-H)*
- Confidentiality was maintained during datacollection.

DATA COLLECTION PROCEDURE

Data are observable and measurable fact that provide information about the phenomenon of the study. The most important to conducting research is to collect appropriate information, which provides necessary data to answer the questions raised in the study objectives of the study. Based on the objectives of the study, tool wasutilized.

- After formal permission was obtained from the Joint Director of Health Services, study was conducted from 03-05-2023 to 27-05-2023 in Rural and Urban area of Kamrup District, Assam. (Apendix-B_2)
- 145 samples from urban and 145 sample from rural were selected by Multistage Simple Random Sampling technique. The subjects Adolescence were selected study criteria were selected with the help of records and registers maintain by the ASHA. Purpose of the study was explained and confidentiality of the responses wasassured.
- Inform written and verbal consent was obtained from the adolescence age 18- 20 years and inform written and verbal consent was taken from parents of age 13-17 years followed by using structured interview questionnaire to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. (AppendixH)
- Interview method was used for datacollection.

PLAN FOR DATA ANALYSIS

The collected data will be plan and analyze in the form of descriptive and inferential statistics.

Descriptive statistics:

- Frequency and percentage distribution was used to analyse the demographic variables.
- Frequency and percentage distribution mean and standard deviation was used to assess the level of knowledge of regarding ill effect of tobacco among adolescence of selected urban and rural community of Kamrup District, Assam.

Inferential statistics:

- Chi square and unpaired ‘t’ test was used to find out the association between knowledge of adolescents on ill effects of tobacco uses and selected sociodemographicvariables.

A comparative study to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District,

RESEARCH APPROACH: Quantitative Research approach

RESEARCH DESIGN: Evaluative Comparative Research Design

SETTING OF THE STUDY: The study was conducted in villages namely- Nizarapar, Singimari, and Milanagar of Panikhaiti MPHC under Sonapur for rural community and Odalbakra, Sree Nagar and Lalganesh colonies of Odalbakara MPHC under Dhirenpara zone, for urban community.

POPULATION: All the adolescence

TARGET POPULATION: Adolescence of Kamrup, District Assam.

ACCESSIBLE POPULATION: The accessible population of the study was 12-19 year of adolescence under Urban and Rural Area of KamrupDistric, Assam. (Nizarapar, Singimari, and Milanagar of Panikhaiti MPHC under Sonapur for rural community and Odalbakra, Sree Nagar and Lalganesh colonies of Odalbakara MPHC under Dhirenpara

SAMPLE SIZE: The sample for the study is 145 for urban and 145 for rural

SAMPLING TECHNIQUE: Multistage Simple Random Sampling Technique

VARIABLE

Demographic Variables: It includes Age, Gender, Education, Religion, Father's education, Mother's education, father's occupation, Mother's occupation and Family income.

DESCRIPTION OF THE TOOL: SECTION A: Demographic Variables

SECTION B: Structured Interview Knowledge Questionnaire

PLAN FOR DATA ANALAYSIS: Descriptive and Inferential Statistics

FINDINGS AND RESULT

FIGURE 1.2: SCHEMATIC REPRESENTATION OF THE STUDY

SUMMARY

This chapter dealt with the methodology of the study. It included research approach, research design, research setting, population, sample and sample size, sampling technique, sampling criteria (inclusion and exclusion criteria), variables, tools and technique, validity of the tool, reliability of the tool, pilot study, ethical consideration, data collection procedure, plan for data analysis and schematic representation of research methodology.

CHAPTER IV
ANALYSIS ANDINTERPRITATION

Analysis involves a number of closely related operations which are performed with the purpose of summarizing the collected data and organizing the data in such a manner that they answer the research question [37]. The purpose is to identify, transform, support decision making and bring a conclusion to a research. Another significant part of the research is the interpretation of the data which is taken from the analysis of the data and makes inference and drawsconclusion.

This chapter represented the analysis and interpretation of data collected from the adolescence to assess the level of knowledge on ill effects of tobacco uses.

Analysis of the data for the present study was based on the objectives and hypotheses by using descriptive and inferential statistics.

Specific objectives

1. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected urban community of KamrupDistrict,Assam.
2. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected rural community of KamrupDistrict,Assam.
3. To compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of KamrupDistrict,Assam.
4. To find out the association between knowledge on ill effects of tobacco uses among adolescence with selected sociodemographic variables in selected urban community of KamrupDistrict,Assam.
5. To find out the association between knowledge on ill effects of tobacco uses among adolescence with selected sociodemographic variables in selected rural community of KamrupDistrict,Assam.

The hypotheses of the study

H_1**:** There is a significant difference in level of knowledge on ill effect of tobacco uses among the adolescence in selected Rural and Urban community of Kamrup District, Assam, at 0.05 level of significant.

H_2**:** There is a significant association between knowledge of adolescents on ill effects of tobacco uses with selected sociodemographic variables in Rural and Urban community of Kamrup District, Assam, at 0.05 level of significant.

ORGANISATION AND PRESENTATION OF DATA

In order to show the findings of the present study, the obtained data were organized, tabulated, interpreted and presented under the following headings:

Section-I: Frequency and Percentage distribution of demographic variable of adolescence in selected Rural and Urban community of Kamrup District, Assam.

Section-II: Knowledge on ill effect of tobacco uses among the adolescence in selected Rural and Urban community of Kamrup District, Assam.

Section-III: Compare the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam.

Section-IV: Association between level of knowledge on ill effects of tobacco uses among adolescence and selected sociodemographic variables in selected Rural and Urban community of Kamrup District, Assam.

Section–I: Frequency and percentage distribution of demographic variable of adolescence in selected Rural and Urban community of Kamrup District, Assam.

This section described the sample characteristics of the adolescence in selected rural and urban community. A total of urban 145 and rural 145 adolescences were included in the study. The sample characteristics were described in terms of demographic variables including Age, Gender, Education, Religion, Father's education, Mother's education, Father's occupation, Mother's occupation and family income. Demographic variables were summarizing in term of frequency and percentage distribution. Findings were presented in table no. 1.3 to 1.11 and figure 3.1 to 3.10

TABLE 1.3

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR AGE.

n=290

(Rural=145) (Urban=145)

AGEINYEARS	RURAL		URBAN	
	FREQUENCY (f)	PERCENTAGE (%)	FREQUENCY (f)	PERCENTAGE (%)
12-14	31	21.4	101	69.7
15-17	48	33.1	44	30.3
18-19	66	45.5	----	----
Total	145	100	145	100

Table1.3 Show that majority of the adolescence, 66(45.5%) were under 18-19 age group followed by 48(33.1%) of them were under the age group of 15-17 years and rest i.e., 31(21.4%) were under the age group of 12-14 years in rural community, whereas in urban community majority of the adolescence were under 12-14 age group i.e., 101(69.7%) followed by 44(30.3%) were of 15-17 age group and none of them were under age group 18-19years.

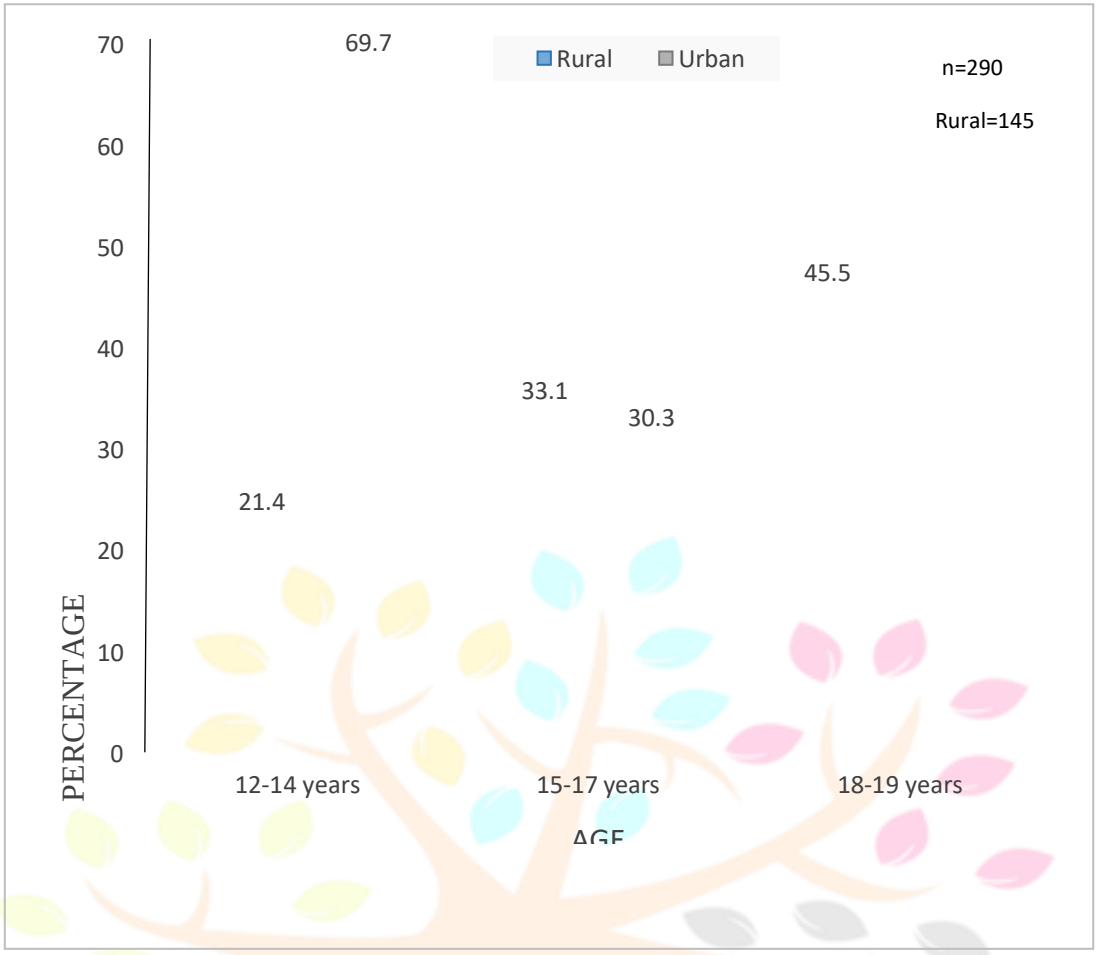

FIGURE 3.1

BAR DIAGRAM DEPICTING THE PERCENTAGE DISTRIBUTION ACCORDING TO THEIR AGE OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY

TABLE 1.4

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR GENDER.

n=290

(Rural=145) (Urban=145)

GENDER	RURAL		URBAN	
	FREQUENCY (f)	PERCENTAGE (%)	FREQUENCY (f)	PERCENTAGE (%)
Male	68	46.9	52	35.9
Female	77	53.1	93	64.1
Transgender	---	---	---	---
Total	145	100	145	100

Table1.4. Shows that majority of the adolescence were female i.e., 77(53.1%), followed by 68(46.9%) of them were male and none of them were transgender in rural community whereas in urban majority of the adolescence were female i.e., 93(64.1%), followed by 52(35.9%) of the total sample size were male and none of them were

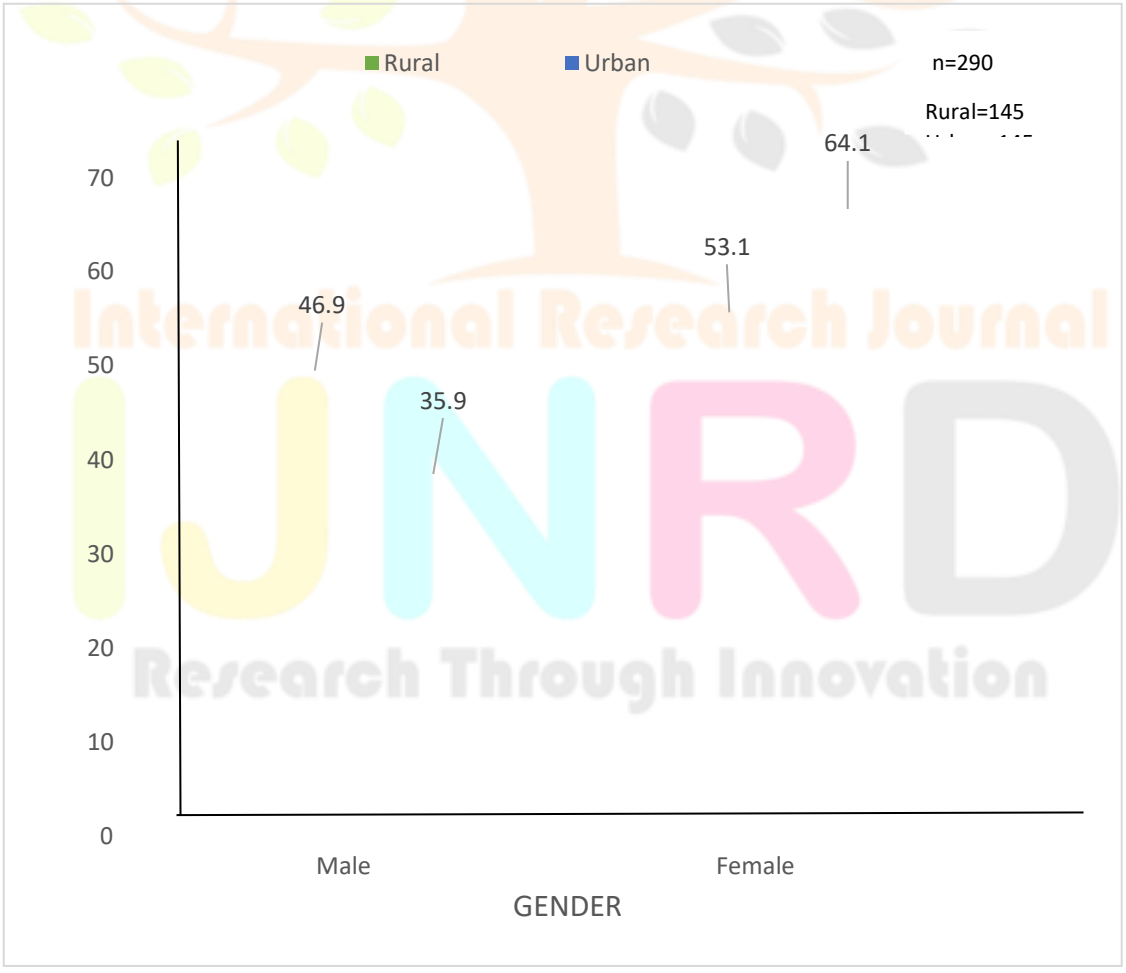

FIGURE 3.2

CYLINDRICAL DIAGRAM DEPICTING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR GENDER OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY

TABLE 1.5

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR EDUCATIONAL STATUS.

n=290

(Rural=145) (Urban=145)

EDUCATION	RURAL		URBAN	
	FREQUENCY (f)	PERCENTAGE (%)	FREQUENCY (f)	PERCENTAGE (%)
Class VI –VIII	44	30.3	85	58.6
Class IX - XII	101	69.7	60	41.4
Total	145	100	145	100

Table 1.5 Shows that majority of the adolescence, education level was IX-XII i.e., 101(69.7%) and followed by 44(30.3%) of the adolescence educational level was VI- VIII in rural community, whereas in urban community of them i.e., 85(58%) their education level was VI-VIII, followed by 60(41.4%) were IX-XII.

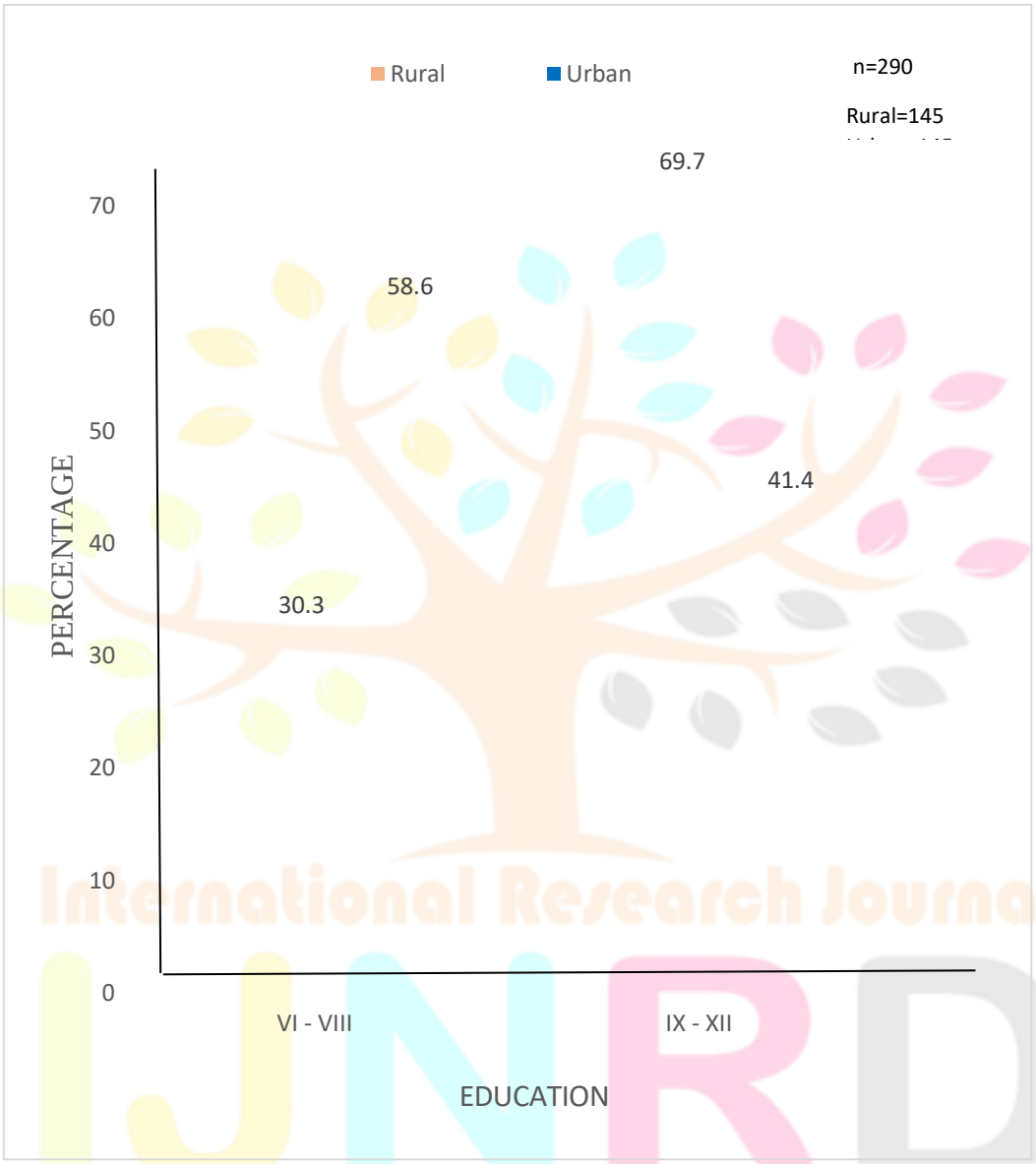

FIGURE 3.3

PYRAMID DIAGRAM DEPICTING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR EDUCATION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY

TABLE 1.6

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR RELIGION.

n=290

(Rural=145) (Urban=145)

RELIGION	RURAL		URBAN	
	FREQUENCY (f)	PERCENTAGE (%)	FREQUENCY (f)	PERCENTAGE (%)
Hindu	42	29	52	35.9
Islam	-- --		93	64.1
Christian	103	71	-- --	
Total	145	100	145	100

Table 1.6. Shows that majority of the adolescence belong to Christian i.e.,103(71%), and followed by Hindu i.e., 42(29%) and none of them were Islam in rural whereas in urban community majority were Islam i.e.,93(64.1%), followed by Hindu i.e., 52(35.9%) and none of them wereChristian.

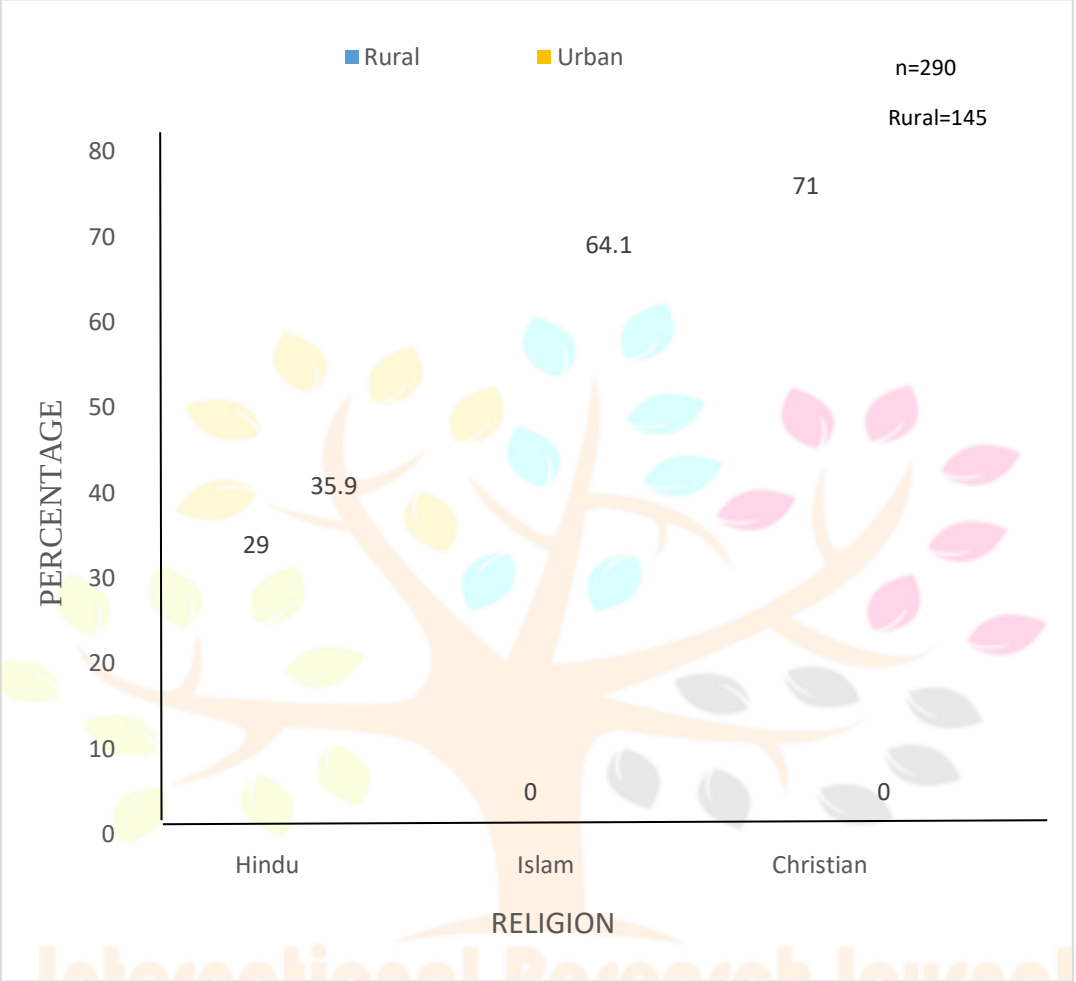

FIGURE 3.4

CONE DIAGRAM DEPICTING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR RELIGION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY

TABLE 1.7

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR FATHER'S EDUCATIONAL LEVEL.

n=290

(Rural=145) (Urban=145)

FATHERS	RURAL		URBAN	
EDUCATIONAL LEVEL	**FREQUENCY (f)**	**PERCENTAGE (%)**	**FREQUENCY (f)**	**PERCENTAGE (%)**
Profession or honours	---	---	---	---
Graduation	---	---	---	---
Intermediate or diploma	---	---	5	3.4
High school certificate	57	39.3	81	55.9
Middle school certificate	88	60.7	59	40.7
Primary school certificate	---	---	---	---
Illiterate	---	---	---	---
Total	145	100	145	100

Table 1.7. Shows that majority of the adolescence father's education were Middle school certificate i.e., 88(60.7%) followed by High school certificate i.e., 57(39.3%) and none of them were profession or honours, graduation, intermediate or diploma, primary school certificate and illiterate, whereas in urban majority were High school certificate 81(55.9) followed by Middle school certificate 59(40.7%), and least Intermediate or Diploma with 5(3.4%) none of them were profession or honours, graduation, primary school certificate and illiterate.

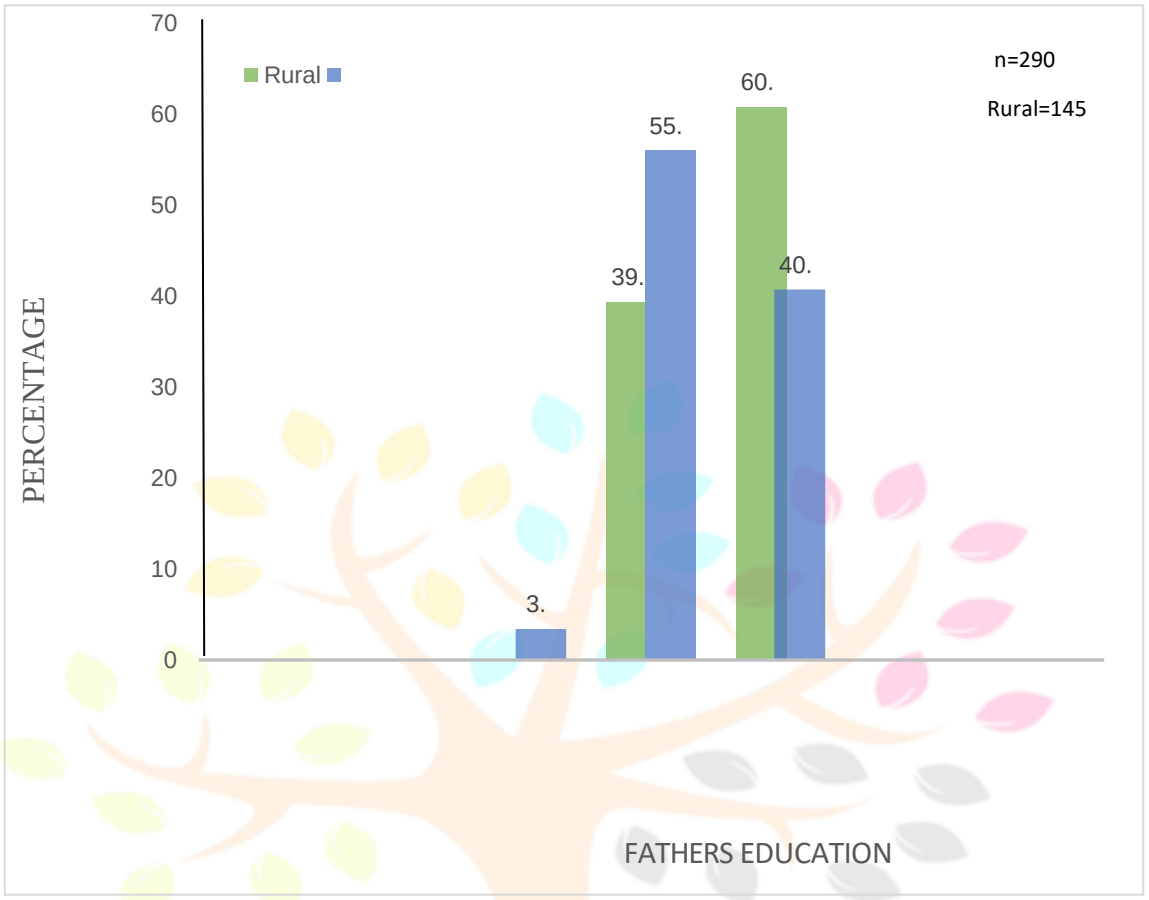

FIGURE 3.5

BAR DIAGRAM SHOWING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR FATHERS EDUCATIONAL LEVEL OF ADOLESCENCE IN SELECTED RURAL AND URBANCOMMUNITY.

TABLE 1.8

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR MOTHER'S EDUCATIONAL LEVEL.

n=290

(Rural=145) (Urban=145)

	RURAL		URBAN	
MOTHERS EDUCATIONAL LEVEL	**FREQUENCY (f)**	**PERCENTAGE (%)**	**FREQUENCY (f)**	**PERCENTAGE (%)**
Profession or honours	---	---	---	---
Graduation	---	---	---	---
Intermediate or diploma	---	---	---	---
High school certificate	13	9	96	66.2
Middle school certificate	24	16.6	13	9
Primary school certificate	51	35.2	36	24.8
Illiterate	57	39.2	---	---
Total	145	100	145	100

Table1.8. Shows that majority of the adolescences mother's educational level were Illiterate i.e., 57(39.2%), followed by 51(35.2%) were Primary school certificate, 24(16.6%) were Middle school certificate, least 13(9%) were High school certificate and none of them were profession or honours, graduation, intermediate or diploma, whereas in urban majority i.e., 96(66.2%) were High school certificate followed by 36(24.8%) were Primary school certificate and least 13(9%) were Middle school certificate and none of them were profession or honours, graduation, intermediate or diploma, illiterate.

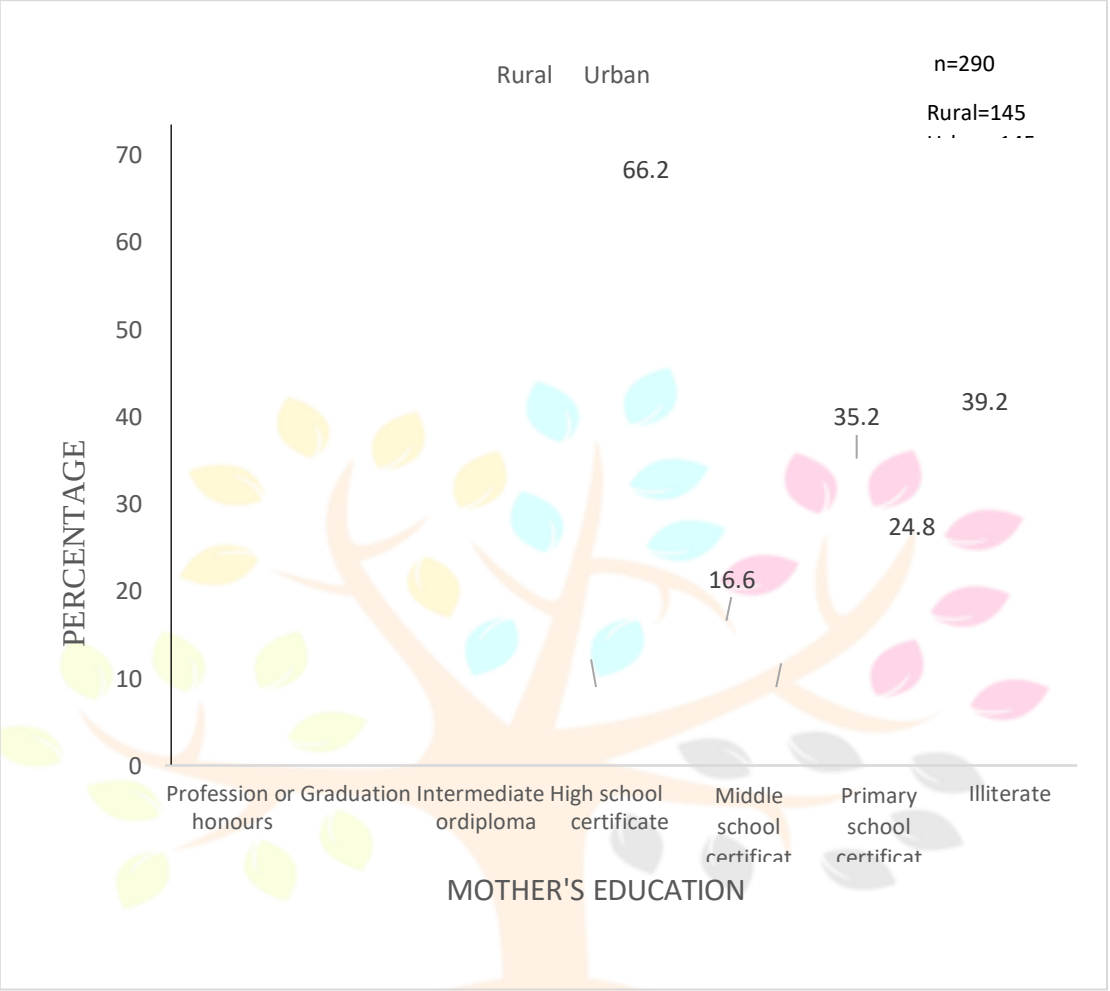

FIGURE 3.6

BAR DIAGRAM SHOWING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR MOTHER'S EDUCATIONAL LEVEL OF ADOLESCENCE IN SELECTED RURAL AND URBANCOMMUNITY.

TABLE 1.9

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR FATHERS OCCUPATIONAL STATUS.

n=290

(Rural=145) (Urban=145)

FATHERS OCCUPATIONAL STATUS	RURAL		URBAN	
	FREQUENCY (f)	PERCENTAGE (%)	FREQUENCY (f)	PERCENTAGE (%)
Legislator, senior officials management	---	---	---	---
Skilled workers, shop and market salesworkers	54	37.3	140	96.5
Professionals	---	---	5	3.5
Skilled agriculture & fishery workers	65	44.8	---	---
Unemployed	26	17.9	----	---
Total	145	100	145	100

Table 1.9 Shows that majority of the adolescence father's occupation status were skilled agriculture & fishery workers i.e., 65(44.8%) and rest 54(37.3%) were Skilled workers, shop and market sales workers and none of them were Legislator, senior officials management, Professionals, whereas in urban majority of the father's occupations were Skilled workers, shop and market sales workers i.e., 140(96.5%) rest of them were professionals i.e., 5(3.5%) and none of them were Legislator, senior officials management, Skilled agriculture & fishery workers andunemployed.

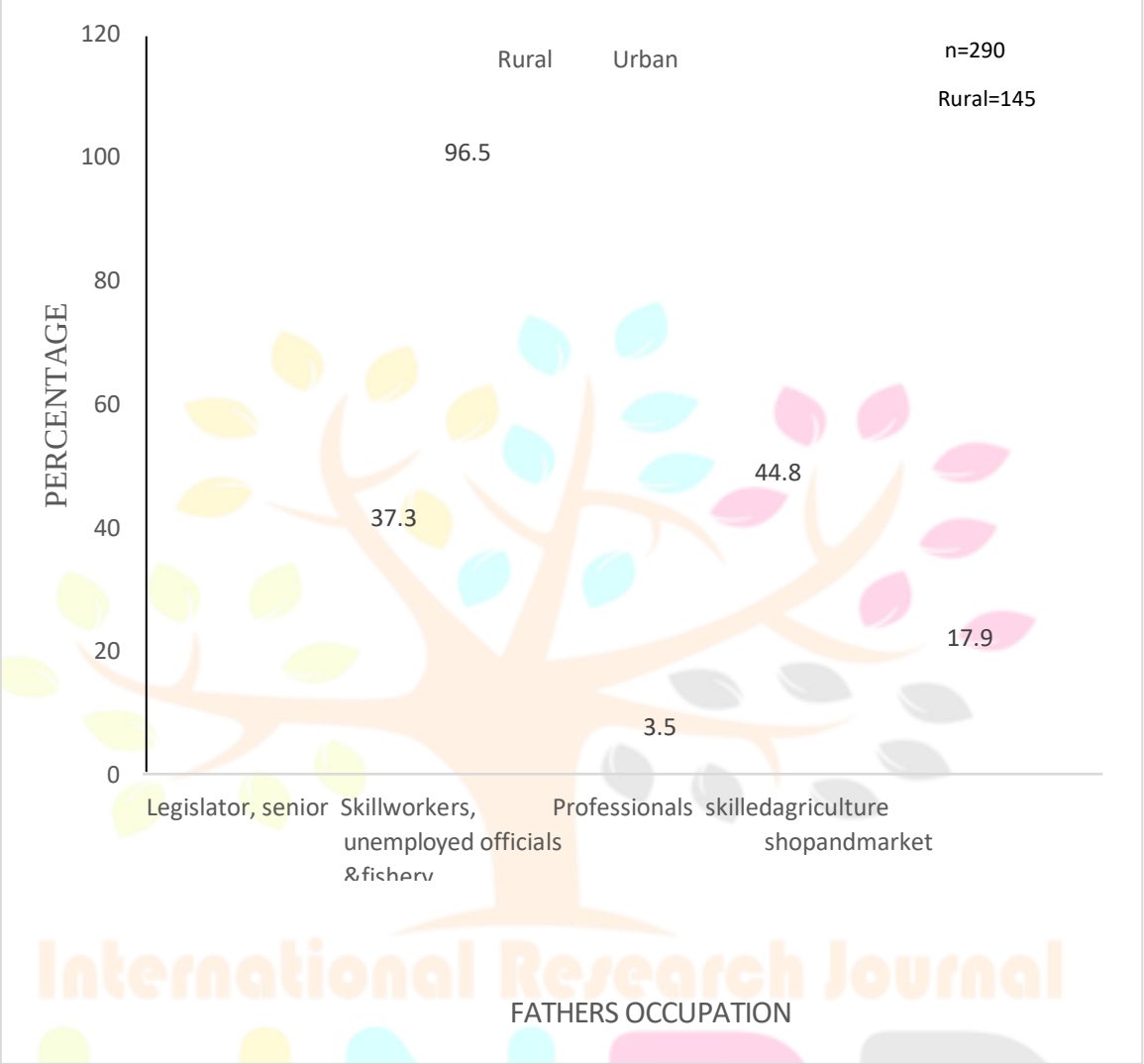

FIGURE 3.7

BAR DIAGRAM SHOWING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR FATHERS OCCUPATIONAL STATUS OF ADOLESCENCE IN SELECTED RURAL AND URBANCOMMUNITY.

TABLE 1.10

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR MOTHER'S OCCUPATIONAL STATUS.

n=290

(Rural=145) (Urban=145)

MOTHERS OCCUPATIONAL STATUS	RURAL		URBAN	
	FREQUENCY (f)	PERCENTAGE (%)	FREQUENCY (f)	PERCENTAGE (%)
Legislator, senior officials management	---	---	---	---
Skilled workers, shop and market sales workers	14	9.7	53	36.6
Professionals	---	---	---	--
Skilled agriculture & fishery workers	78	53.8	---	---
Unemployed	53	36.6	92	63.4
Total	145	100	145	100

Table 1.10 Shows that majority i.e., 78(53.8%) were Skilled agriculture & fishery workers, followed by i.e., 53(36.6) were unemployed and least i.e., 14(9.7%) were Skilled workers, shop and market sales workers with and none of them were legislator senior official's management, professional, whereas in urban community majority i.e., 92(63.4%) were unemployed followed by i.e., 53(36.6%) were skilled workers, shop and market sales workers and none of them were legislator senior official's management, professional and skilled agriculture &fisheryworkers.

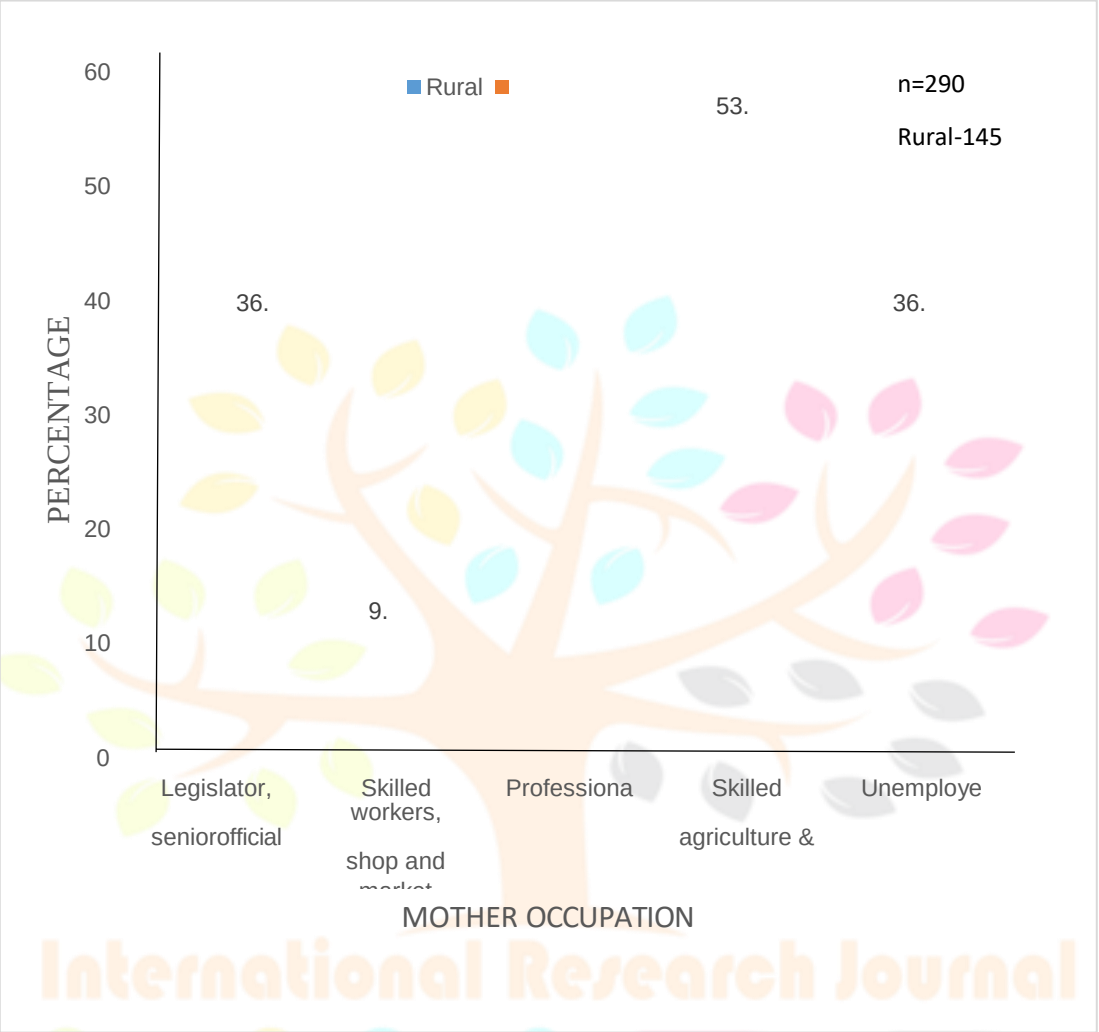

FIGURE 3.8

THE BAR SHOWING PERCENTAGE DISTRIBUTION OF MOTHERS OCCUPATIONAL STATUS OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY.

TABLE 1.11

FREQUENCY AND PERCENTAGE DISTRIBUTION OF ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY ACCORDING TO THEIR FAMILY MONTHLY INCOME.

n=290
(Rural=145) (Urban=145)

FAMILY MONTHLY INCOME		RURAL		URBAN	
		FREQUENCY(f)	PERCENTAGE(f)	FREQUENCY(f)	PERCENTAGE(f)
Rs ≥184,376	PERCENTAGE	---	---	---	---
Rs 92,191-184,370		---	---	---	---
Rs 68,967-92,185		---	---	---	---
Rs 46,095-68,961		---	---	---	---
Rs 27,654-46,089		---	---	53	36.6
Rs 9232-27648		25	17.2	25	17.2
Rs 9226		92	63	67	46.2
Total		145	100	145	100

Table1.11. Shows that majority of the monthly family income of the adolescence i.e., 92(63%) comes under Rs. 9226 and the rest 25(17.2%) monthly family income comes under Rs. 9232-27648, whereas in urban community, majority family income per month i.e., 67(46.2%) comes under Rs. 9226, followed by 53(36.6%) comes under Rs 27,654-46089 and the rest 25(17.2%) comes under Rs. 9232-27648.

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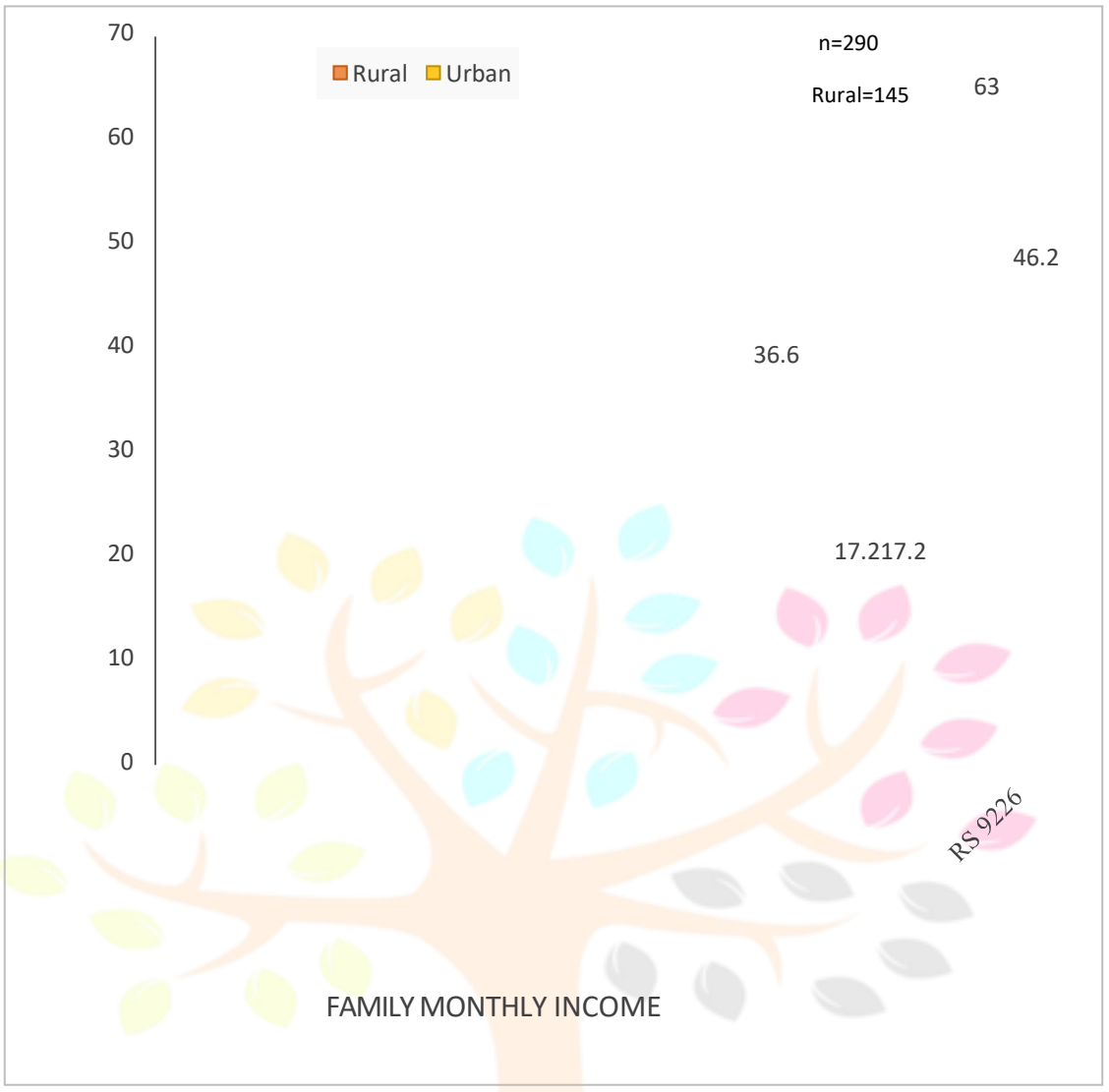

FIGURE 3.9

BAR DIAGRAM SHOWING PERCENTAGE DISTRIBUTION ACCORDING TO THEIR FAMILY MONTHLY INCOME OF ADOLESCENCE IN SELECTED RURAL AND URBANCOMMUNITY

SECTION II: Knowledge on ill effect of tobacco uses among the adolescence in selected Rural and Urban community of Kamrup District, Assam.

This section dealt with the assessment of frequency and percentage distribution of knowledge on ill effect of tobacco uses among the adolescence in selected rural and urban community.

The knowledge regarding ill effects of tobacco uses among adolescence were assessed through a Structured interview questionnaire. The overall knowledge level of adolescence was computed in term of frequency and percentage and level of knowledge were categorized i.e., Inadequate knowledge, Moderately Adequate Knowledge, Adequate knowledge. The findings are presented table no.2.1

TABLE 2.1

FREQUENCY AND PERCENTAGE DISTRIBUTION OF LEVEL OF KNOWLEDGE ON ILL EFFECT OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY

n=290

(Rural=145)
(Urban=145)

	RURAL		URBAN	
LEVEL OF KNOWLEDGE	**FREQUENCY (f)**	**PERCENTAGE (%)**	**FREQUENCY (f)**	**PERCENTAGE (%)**
Inadequate knowledge (Rural range ≤9) (Urban range ≤14)	16	11	25	17.2
Moderately adequate (Rural range 10-14) (Urban range 15-16)	115	79.3	84	57.9
Adequate knowledge (Rural range ≥15) (Urban range ≥17)	14	9.7	36	24.8
Total	145	100	145	100

Table 2.1 Depicts that majority 115(79.3%) of participants had Moderately AdequateKnowledge followed by 16(11%) had inadequate knowledge and 14(9.7%) hadadequate knowledge, whereas in urban majority i.e., 84(57.9%) of participants hadModerately adequate knowledge, 36(24.8%) had adequate knowledge and 25(17.2%)had inadequate knowledge.

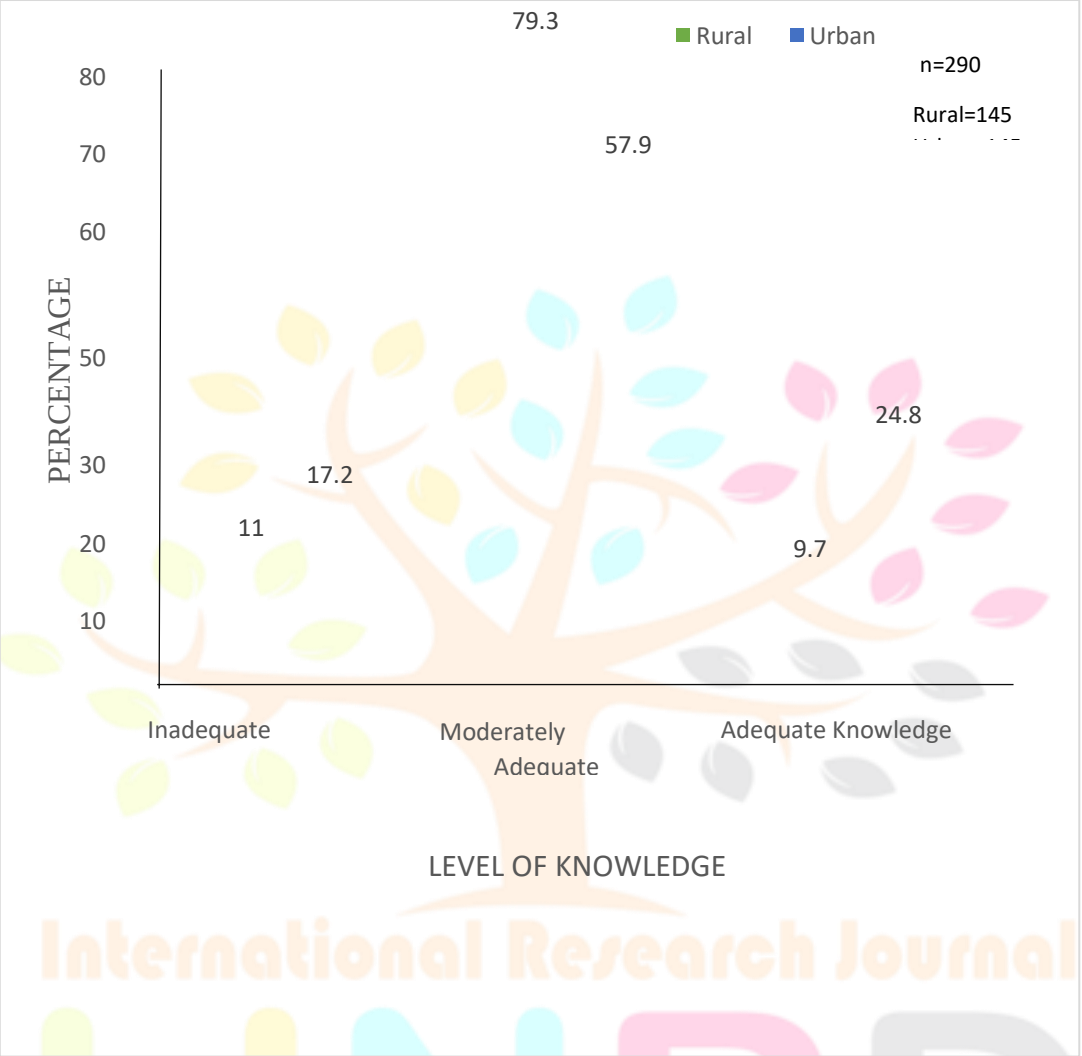

FIGURE 3.10

BAR DIAGRAM SHOWING PERCENTAGE DISTRIBUTION OF LEVEL OF KNOWLEDGE ON ILL EFFECT OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL AND URBAN COMMUNITY

SECTION III: Compare the level of knowledge of adolescence on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam.

This section presents the findings on the comparison the level of knowledge of adolescence on ill effects of tobacco uses among adolescence in selected urban and rural community.

The null hypothesis Ho_1 was formulated against the stated research hypothesis H_1.

Ho_1: There is no significant difference in the level of knowledge on ill effect of tobacco uses among adolescents in selected urban and rural community of Kamrup District, Assam, at 0.05 level of significant.

The unpaired 't' test was computed to find the difference in Knowledge on ill effect of tobacco uses among adolescents between Rural and Urban Areas and the findings are shown in the Table 3.1.

TABLE 3.1

COMPARISON OF KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN AND RURAL COMMUNITY.

n=290

Rural-145

LEVEL OF KNOWLEDGE	MEAN	SD	MEAN DIFFERENCE	tTEST VALUE	df	*'p'* VALUE	REMARK
Rural	12.27	2.752					
Urban	16.01	1.734	3.74	13.83	288	0.001	S

***p*<0.05 level ofsignificance**

Table 3.1 Depicts the comparison of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. Finding shows that knowledgescore of adolescence in urban community was 16.01±1.734 and rural communityknowledge score was 12.27±2.752 with mean difference of 3.74. The meandifference of knowledge score between urban and rural area was tested usingunpaired t-test with obtained t=13.83 at df=288 was statistically significant at *p*<0.05level ofsignificance.

The investigator found that there was a significant difference in knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. Hence, the null hypothesis H_{01} is rejected and research hypothesis H_1 is accepted.

SECTION – IV: Association between level of knowledge on ill effects of tobacco uses among adolescence and selected sociodemographic variables in selected rural and urban community of Kamrup District, Assam.

This section dealt with the association between level of knowledge on ill effects of tobacco uses among adolescence and selected socio-demographic variables using Chi-square (χ^2) test.

The null hypothesis H_{02} was formulated against the stated research hypothesis H_2.

H_{02}**:** There is no significant association between knowledge of adolescents on ill effects of tobacco uses with selected socio-demographic variables in urban community of Kamrup District, Assam, at 0.05 level of significant.

Chi-square (χ^2) was computed to find the significant association between level of knowledge on ill effects of tobacco uses among adolescence and selected socio- demographic variables. The findings were presented in Tables no. 4.1 to 4.18

TABLE 4.1

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR AGE.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
AGE	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	*'p'* VALUE	REMARK
12-14	9	21	1					
15-17	5	38	5	15.49	4	9.49	0.003	S
18-19	2	56	8					
Total	16	115	14					

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.1 depicts the association between knowledge on ill effects of tobacco uses with their age in rural community which was tested by using chi square test. The χ^2 value for df (4) was found to be 15.49 with corresponding *p*-value= 0.003. The calculated value for χ^2 was greater than the tabulated value at 0.05 level of significance (i.e., 9.49). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has Significant association at 0.05 level of significance.

TABLE 4.2

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR GENDER.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
GENDER	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	*'p'* VALUE	Remark
Male	8	54	6					
Female	8	61	8	0.154	2	5.99	0.926	NS
Transgender	---	---	---					

Total	16	115	14	

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.2 depicts the association between knowledge on ill effects of tobacco uses with their gender in rural community which was tested by using chi square test. The χ^2 value for df (2) was found to be 0.154 with corresponding *p*-value= 0.926. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.3

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR EDUCATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							REMARK
EDUCATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	
VI-VIII	9	34	1					
IX-XII	7	81	13	8.679	2	5.99	0.013	S
Total	16	115	14					

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.3 depicts the association between knowledge on ill effects of tobacco uses with their education in rural community which was tested by using chi square test. The χ^2 value for df (2) was found to be 8.679 with corresponding*p*-value= 0.013. The calculated value for χ^2 was greater than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has Significant association at 0.05 level of significance.

TABLE 4.4

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR RELIGION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							REMARK
RELIGION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'P' VALUE	
Hindu	8	33	1					
Islam	---	---	---	6.685	2	5.99	0.035	S
Christian	8	82	13					

Others	---	---	---					
Total	16	115	14					

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.4 depicts the association between knowledge on ill effects of tobacco uses with their religion in rural community which was tested by using chi square test. The χ^2 value for df (2) was found to be 6.685 with corresponding *p*-value= 0.035. The calculated value for χ^2 was greater than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has Significant association at 0.05 level of significance.

TABLE 4.5

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH FATHER'S EDUCATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							REMAR K
FATHER'S EDUCATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	
Profession	---	---	---					
Graduate	---	---	---					
Intermediate	---	---	---					
High school	9	71	8	0.259	2	5.99	0.878	NS
Middle school	7	44	6					
Primary school	---	---	---					
Illiterate	---	---	---					
Total	16	115	14					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.5 depicts the association between knowledge on ill effects of tobacco uses with their father's education in rural community which was tested by using chi square test. The χ^2 value for df (2) was found to be 0.2592 with corresponding *p*-value= 0.879. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.6

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR MOTHER'S EDUCATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							REMARK
MOTHER'S EDUCATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	*'p'* VALUE	
Profession	---	---	---					
Graduate	---	---	---					
Intermediate	---	---	---					
High school	1	10	2					
Middle school	4	18	2	1.525	6	12.59	0.958	NS
Primary school	5	41	5					
Illiterate	6	46	5					
Total	16	115	14					

***p*<0.05 levelof significance** **NS-Nonsignificant**

The data presented in the table 4.6 depicts the association between knowledge on ill effects of tobacco uses with their mother's education in rural community which was tested by using chi square test. The χ^2 value for df (6) was found to be 1.525 with corresponding *p*-value= 0.958. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 12.59). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.7

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH FATHER'S OCCUPATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							REMARK
FATHERS OCCUPATION	ADEQUATE	MODERATEY ADEQUATE	INADEQUATE	χ^2	df	TABULATE VALUE	*'p'* VALUE	
Legislator senior office. Management	---	---	---					

Professionals	---	---	---					
Skilled workers & shops & market sales	2	11	2	1.026	6	12.59	0.985	NS
Skilled agriculture & fishery	11	83	10					
Unemployed	3	21	2					
Total	16	115	14					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.7 depicts the association between knowledge on ill effects of tobacco uses with their father's occupation in rural community which was tested by using chi square test. The χ^2 value for df (6) was found to be 1.026 with corresponding *p*-value= 0.985. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 12.59). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.8

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR MOTHER'S OCCUPATION

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
MOTHERS OCCUPATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATE VALUE	'p' VALUE	REMARK
Legislator senior officeal Management	---	---	---					
Professionals	---	---	---					
Skilled workers & shops & market sales	1	11	2	0.927	4	9.49	0.921	NS
Skilled agriculture & fishery	10	61	7					
Unemployed	5	43	5					
total	16	115	14					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.8 depicts the association between knowledge on ill effects of tobacco uses with their mother occupation in rural community which was tested by using chi square test. The χ^2 value for df (4) was found to be 0.927 with corresponding *p*-value= 0.921. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 9.49). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.9

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED RURAL COMMUNITY WITH THEIR FAMILY INCOME.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
FAMILY INCOME/MONTHLY	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	*'p'* VALUE	REMARK
Rs ≥ 84,376	---	---	---					
Rs 92,191-184,370	---	---	---					
Rs 68967-92185	---	---	---					
Rs 46095-68961	---	---	---	4.37	6	28.87	0.958	NS
Rs 27654-46089	---	---	---					
Rs 9232-27648	9	59	2					
Rs ≤9226	7	56	12					
Total	16	115	14					

***p*<0.05 levelof significance NS-Non-Significance**

The data presented in the table 4.9 depicts the association between knowledge on ill effects of tobacco uses with their family monthly income in rural community whichwastestedbyusingchisquaretest.The χ^2valuefordf(6)wasfoundtobe 4.37 with corresponding *p*-value= 0.958. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 28.87). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.10

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR AGE.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
AGE	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
12-14	23	59	19	10.77	2	5.99	0.004	S
15-17	2	25	17					
18-19	---	---	---					
Total	25	84	36					

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.10 depicts the association between knowledge on ill effects of tobacco uses with their age in urban community which was tested by using chi square test. The χ^2 value for df (2) was found to be 10.77 with corresponding *p*- value= 0.004. The calculated value for χ^2 was greater than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge onilleffectsoftobaccouseswithageofadolescencehasSignificantassociationat 0.05 level ofsignificance.

TABLE 4.11

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR GENDER.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
GENDER	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
Male	7	32	13	0.855	2	5.99	0.65	NS
Female	18	52	23					
Transgender	---	---	---					
Total	25	84	36					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.11 depicts the association between knowledge on ill effects of tobacco uses with their gender in urban community which was tested by using chi square test. The χ^2 value for df (2) was found to be 0.855 with corresponding *p*-value= 0.652. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on

ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.12

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR EDUCATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
EDUCATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
VI-VIII	19	50	16					
IX-XII	6	34	20	6.124	2	5.99	0.46	S
Total	25	84	36					

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.12 depicts the association between knowledge on ill effects of tobacco uses with their education in urban community which was tested by using chi square test. The χ^2 value for df (2) was found to be 6.124 with corresponding *p*-value= 0.46. The calculated value for χ^2 was greater than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has Significant association at 0.05 level of significance.

ABLE 4.13

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR RELIGION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
RELIGION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	*p* VALUE	REMARK
Hindu	11	28	13					
Islam	---	---	---	0.954	2	5.99	0.621	NS
Christian	14	56	23					
Others	---	---	---					
Total	25	84	36					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.13 depicts the association between knowledge on ill effects of tobacco uses with their religion in urban community which was tested by using chi square test. The χ^2 value for df (2) was found to be 0.954 with corresponding *p*-value= 0.621. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level of significance.

TABLE 4.14

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR FATHER'S EDUCATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
FATHER'S EDUCATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
Profession	---	---	---					
Graduate	---	---	---					
Intermediate	0	4	1					
High school	21	47	13					
Middle school	4	33	22	14.82	4	9.49	0.004	S
Primary school	---	---	---					
Illiterate	---	---	---					
Total	25	84	36					

***p*<0.05 levelof significance S-Significant**

The data presented in the table 4.14 depicts the association between knowledge on ill effects of tobacco uses with their father's education in urban community which was tested by using chi square test. The χ^2 value for df (4) was found to be 14.82 with corresponding *p*-value= 0.004. The calculated value for χ^2 was greater than the tabulated value at 0.05 level of significance (i.e., 9.49). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has Significant association at 0.05 level ofsignificance.

TABLE 4.15

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR MOTHER'S EDUCATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE	

MOTHER'S EDUCATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
Profession	---	---	---					
Graduate	---	---	---					
Intermediate	---	---	---					
High school	19	55	22					
Middle school	2	7	4	1.732	4	9.49	0.785	NS
Primary school	4	22	4					
Illiterate	---	---	---					
Total	25	84	36					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.15 depicts the association between knowledge on ill effects of tobacco uses with their mother's education in urban community which was tested by using chi square test. The χ^2 value for df (4) was found to be 1.732 with corresponding *p*-value= 0.785. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 9.49). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level ofsignificance.

TABLE 4.16
ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH FATHER'S OCCUPATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
FATHERS OCCUPATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
Legislator senior office. Management	---	---	---					
Professionals	1	2	2					
Skilled workers & shops & market sales	24	82	34	0.0254	4	9.49	0.685	NS
Skilled agriculture & fishery	---	---	---					
Unemployed	---	---	---					
Total	25	84	36					

***p*<0.05 levelof significance N S-NotSignificant**

The data presented in the table 4.16 depicts the association between knowledge on ill effects of tobacco uses with their father's occupation in urban community which was tested by using chi square test. The χ^2 value for df (4) was found to be 0.0254 with corresponding *p*-value= 0.685. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 9.49). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level ofsignificance.

ABLE 4.17

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR MOTHER'S OCCUPATION.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
MOTHERS OCCUPATION	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATE VALUE	'p' VALUE	REMARK
Legislator senior official Management	---	---	---					
Professionals	---	---	---					
Skilled workers & shopes& market sales	13	28	12	3.109	2	5.99	0.211	NS
Skilled agriculture & fishery	---	---	---					
Unemployed	12	56	24					
Total	25	84	36					

***p*<0.05 levelof significance NS-Nonsignificant**

The data presented in the table 4.19. depicts the association between knowledge on ill effects of tobacco uses with their mother's occupation in urban community which was tested by using chi square test. The χ^2 value for df (2) was found to be 3.109 with corresponding *p*-value= 0.211. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 5.99). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level ofsignificance.

TABLE 4.18

ASSOCIATION BETWEEN KNOWLEDGE ON ILL EFFECTS OF TOBACCO USES AMONG ADOLESCENCE IN SELECTED URBAN COMMUNITY WITH THEIR MONTHLY FAMILY INCOME.

n=145

DEMOGRAPHIC VARIABLES	LEVEL OF KNOWLEDGE							
FAMILY INCOME/MONTHLY	ADEQUATE	MODERATELY ADEQUATE	INADEQUATE	χ^2	df	TABULATED VALUE	'p' VALUE	REMARK
Rs ≥ 84,376	---	---	---					
Rs 92,191-184,370	---	---	---					
Rs 68967-92185	---	---	---					
Rs 46095-68961	---	---	---	3.474		9.49	0.482	NS
Rs 27654-46089	13	28	12		4			
Rs 9232-27648	4	14	7					
Rs ≤9226	8	42	17					
Total	25	84	36					

***p*<0.05 levelof significance** **NS-Nonsignificant**

The data presented in the table 4.20 depicts the association between knowledge on ill effects of tobacco uses with their family monthly income in urban community which was tested by using chi square test. The χ^2 value for df (4) was found to be 3.474 with corresponding *p*-value= 0.482. The calculated value for χ^2 was smaller than the tabulated value at 0.05 level of significance (i.e., 9.49). Thus, the findings indicated the level of knowledge on ill effects of tobacco uses with age of adolescence has no Significant association at 0.05 level ofsignificance.

Overall statistical significant association were found in regard to Age (χ^2 value-15.49 and *'p'* value= 0.003), Education (χ^2-value – 8.679 and *'p'* value= 0.013) and Religion (χ^2-value – 6.685 and *'p'* value= 5.99) the rest of the socio- demographic variables like Gender, Father's Educational status, Mother's Education, Father's Occupation, Mother's occupation and Family Monthly income were found to be statistically not significant in rural and in urban statistical significant association were found in regard to Age (χ^2 value-10.77 and *'p'* value= 0.004), Educational status (χ^2 -value – 6.124 and *'p'* value= 0.46) and Father education (χ^2 value-14.82 and *'p'* value= 0.004) the rest of the socio- demographic variables like Gender, Religion, Mother's Education, Father's Occupation, Mother's occupation and Family Monthly income were found to be statistically not significant. Hence, the null hypothesis, H_{02}, is rejected and research hypothesis H_2 is accepted only in terms of age, educational status and religion in rural community and Age, Education and Fathers education in urban community. Irrespective of their residence Age and Education is found statically significant in both rural and urban community.

UMMARY

This chapter dealt with the analysis and interpretation of findings of the study. The data gathered were summarized and presented by using descriptive and inferential statistics. The analysis was organized and presented under various sections like finding related to frequency and percentage distribution of demographic variables of adolescence of urban and rural community, findings relate to frequency and percentage distribution of demographic variable of adolescence in selected rural and urban community, findings related to frequency and percentage distribution of level of knowledge on ill effect of tobacco uses among the adolescence in selected urban community, findings relate to compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community, findings related to association between knowledge on ill effects of tobacco uses among adolescence and selected socio-demographic variables in selected urban and ruralcommunity.

CHAPTER-V

SUMMARY, FINDINGS, DISCUSSION, CONCLUSION AND RECOMMENDATIONS

This chapter deals with summary, findings, discussion, conclusion, of the study and recommendation for the future research study.

SUMMARY OF THE STUDY

The present study was Evaluative Comparative Research Design in nature and it's aimed at studying to compare and to assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam.

The objectives of the study were

1. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected urban community of KamrupDistrict,Assam.
2. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected rural community of KamrupDistrict,Assam.
3. To compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of KamrupDistrict,Assam.
4. To find out the association between knowledge on ill effects of tobacco uses among adolescence and selected sociodemographic variables in selected urban community of KamrupDistrict,Assam.
5. To find out the association between knowledge on ill effects of tobacco uses among adolescence and selected sociodemographic variables in selected rural community of KamrupDistrict,Assam.

Hypotheses

H_1: There is significant difference in the level of knowledge regarding ill effect of tobacco uses among adolescents in selected urban and rural community of Kamrup District, Assam, at 0.05 level of significant.

$_2$**:** There is significant association between knowledge of adolescents on ill effects of tobacco uses and selected sociodemographic variables in urban community of Kamrup District, Assam, at 0.05 level of significant.

The conceptual framework used for the study based on "Health Belief Model". The major component of "Health Belief Model" includes: individual perception, modifying factors and likelihood of action were included in the presentstudy.

A review of literature was done under the following headings.

I. Review of literature related to ill effect of tobacco uses among adolescence.
II. Review of literature related to knowledge of ill effect of tobacco uses amongadolescence.
III. Review of literature related to comparison of ill effect of tobacco uses amongadolescence.

The Descriptive Research Approach was adopted for the present study.

The population comprised of all the adolescence 12-19 years who are residing in Nizarapar, Singimari, and Milanagar of Panikhaiti MPHC under Sonapur for rural community and Odalbakra, Sree Nagar and Lalganesh colony of Odalbakara MPHC under Dhirenpara zone for Urban community. The tool for collecting data was a structured interview questionnaire consisting of two: Section A (demographic proforma), Section- B (structured interview knowledge questionnaire on knowledge on ill effects of tobacco uses).

Content validity of tool was done by consulting certificate 11 experts who were willing to validate given suggestions to improve the tool. Reliability was tested for structured interview knowledge questionnaire by Karl Pearson's split half reliability method which was found to be found to be 0.94 which indicate that the tool was reliable and statistically significant.

The obtained data were organized, analysed, tabulated, interpreted and entered into the master sheet. The interpretation and analysis of the data for the study was based on the objectives and hypothesis by using descriptive and inferentialstatistics.

Major findings of the study:

The major findings of the study were as follows:

Findings related to demography variables of mother of under-six children.

- Majority of the adolescence, 66(45.5%) were under 18-19 age group followed by 48(33.1%) of them were under the age group of 15-17 years and rest i.e., 31(21.4%) were under the age group of 12-14 years in rural community, whereas in urban community majority of the adolescence were under 12-14 age group i.e., 101(69.7%) followed by 44(30.3%) were of 15-17 age group and none of them were under age group 18-19years.
- Majority of the adolescence were female i.e., 77(53.1%), followed by 68(46.9%) of them were male and none of them were transgender in rural community whereas in urban majority of the adolescence were female i.e., 93(64.1%), followed by 52(35.9%) of the total sample size were male and none of them were transgender in urbancommunity.
- Regarding education that majority of the adolescence, education level was IX-XII i.e., 101(69.7%) and followed by 44(30.3%) of the adolescence educational level was VI-VIII in rural community, whereas in urban community of them i.e., 85(58%) their education level was VI-VIII, followed by 60(41.4%) wereIX-XII.
- Majority of the adolescence belong to Christian i.e.,103(71%), and followed by Hindu i.e., 42(29%) and none

of them were Islam in rural whereas in urban community majority were Islam i.e.,93(64.1%), followed by Hindu i.e., 52(35.9%) and none of them wereChristian.

- Majority of the adolescence father's education were Middle school certificate i.e., 88(60.7%) followed by High school certificate i.e., 57(39.3%) and none of them were profession or honours, graduation, intermediate or diploma, primary school certificate and illiterate, whereas in urban majority were High schoolcertificate81(55.9)followedbyMiddleschoolcertificate59(40.7%),

nd least Intermediate or Diploma with 5(3.4%) none of them were profession or honours, graduation, primary school certificate andilliterate.

- Majority of the adolescences mother's educational level were Illiterate i.e., 57(39.2%), followed by 51(35.2%) were Primary school certificate, 24(16.6%) were Middle school certificate, least 13(9%) were High school certificate and none of them were profession or honours, graduation, intermediate or diploma, whereas in urban majority i.e., 96(66.2%) were High school certificate followed by 36(24.8%) were Primary school certificate and least 13(9%) were Middle school certificate and none of them were profession or honours, graduation, intermediate or diploma,illiterate.
- Regarding father's majority of the adolescence father's occupation status were skilled agriculture & fishery workers i.e., 65(44.8%) and rest 54(37.3%) were Skilled workers, shop and market sales workers and none of them were Legislator, senior officials management, Professionals, whereas in urban majority of the father's occupations were Skilled workers, shop and market sales workers i.e., 140(96.5%) rest of them were professionals i.e., 5(3.5%) and none of them were Legislator, senior officials management, Skilled agriculture & fishery workers andunemployed.
- Regarding mother's occupation, majority i.e., 78(53.8%) were Skilled agriculture & fishery workers, followed by i.e., 53(36.6) were unemployed and least i.e., 14(9.7%) were Skilled workers, shop and market sales workers with and none of them were legislator senior official's management, professional, whereas in urban community majority i.e., 92(63.4%) were unemployed followed by i.e., 53(36.6%) were skilled workers, shop and market sales workers and none of them were legislator senior official's management, professional and skilled agriculture &fisheryworkers.
- It shows that majority of the monthly family income of the adolescence i.e., 92(63%) comes under Rs. 9226 and the rest 25(17.2%) monthly family income comes under Rs. 9232-27648, whereas in urban community, majority family income per month i.e., 67(46.2%) comes under Rs. 9226, followed by 53(36.6%) comes under Rs 27,654-46089 and the rest 25(17.2%) comes under Rs.9232-27648.

indings related to assess the level of knowledge on ill effect of tobacco uses among adolescence in selected rural community

In present study, out of 145 participants, majority 115(79.3%) of participants hadmoderately adequately adequate knowledge, 16(11%) had inadequate knowledge and14(9.7%) had adequate knowledge.

Findings related to assess the level of knowledge on ill effect of tobacco uses among adolescence in selected urban community

In present study, out of 145 participants, majority 84(57.9%) of participants hadmoderately adequately knowledge, 36(24.8%) had adequate knowledge and25(17.2%) had inadequate knowledge.

Findings related to compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community

In this present study compare the knowledge on ill effects of tobacco uses among adolescence. Finding shows that knowledge score of adolescence in urbancommunity was 16.01±1.734 and rural community knowledge score was12.27±2.752 with mean difference of 3.74. The mean difference of knowledge scorebetween urban

and rural area was tested using unpaired t test with obtained t=13.83at df=288 was statistically significant at p<0.05 level ofsignificance.

Findings related to association between knowledge on ill effects of tobacco uses among adolescence with selected socio-demographic variables in selected rural and urban community

Overall statistical significant association were found in regard to Age ($\square^2$ value-15.49 and *'p'* value= 0.003), Education ($\square^2$-value – 8.679 and *'p'* value= 0.013) and Religion ($\square^2$-value – 6.685 and *'p'* value= 5.99) the rest of the socio- demographic variables like Gender, Father's Educational status, Mother's Education, Father's Occupation, Mother's occupation and Family Monthly income were found to be statistically not significant in rural and in urban statistical significant association were found in regard to Age ($\square^2$ value-10.77 and *'p'* value= 0.004), Educational status ($\square^2$ -value – 6.124 and *'p'* value= 0.46) and Father education ($\square^2$ value-14.82 and *'p'* value= 0.004) the rest of the socio- demographic variables like Gender, Religion, Mother's Education, Father's Occupation, Mother's occupation and Family Monthly income were found to be statistically not significant. Hence, the null hypothesis, H_{02}, is rejected and research hypothesis H_2 is accepted only in terms of age, educational status and religion in rural community and Age, Education and Fathers education in urban community. Irrespective of their residence Age and Education is found statically significant in both rural and urban community.

DISCUSSION

The findings of the study were compared and contrasted with those of the similar studies conducted in India as well as western settings. The present study was conducted on "A comparative study to assess the level of knowledge on ill effect of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam".

The findings of the study were compared and contrasted with those of other similar studies. The findings of the study have been discussed under the following headings:

Section I: Discussion on basis of demographic variables of research study. Section II: Discussion on the basis of the objectives of research study.

Section I: Discussion on basis of demographic variables of research study.

- The present study was consisted of 145 in rural and 145 in urban area of adolescence.
- The adolescence belongs to age group of 12-19years.
- Majority of the adolescence is under 18-19 age group 66(45.5%), 31(21.4%) are in the age group of 12-14 years and 48(33.1%) are in the age group of 15- 17 years in rural, whereas in urban 101(69.7%) age group of 12-14 years, 44(30.3%) are 15-17 age group.
- Majority of the adolescence were 77(53.1%) of them are female and 68(46.9%) are male in rural areas whereas 52(35.9%) of the total sample size were males and 93(64.1%) were females in urbanareas.
- Regarding educational status majority of the adolescence were 101(69.7%) of adolescence educational level is IX-XII and 44(30.3%) of the adolescence education level is VI-VIII, whereas educational level of adolescence 85(58%) is VI-VIII, and educational level of adolescence 60(41.4%) IX-XII inurban.
- Majority of the adolescences were belonging to Christian 103(71%), and Hindu 42(29%) in rural whereas in urban majority are Islam 93(64.1%), and Hindu with52(35.9%).
- The data finding shows that fathers education majority of the adolescence fathers were Middle school certificate 88(60.7%), High school certificate 57(39.3%), whereas in urban High school certificate 81(55.9),

Middle school certificate 59(40.7%), and Intermediate or Diploma5(3.4%).

- The finding shows that fathers education majority of the adolescence mothers were that High school certificate 13(9%), Middle school certificate 24(16.6%), Primary school certificate 51(35.2%), Illiterate 57(39.2%) whereas in urban High school certificate 96(66.2%), Middle school certificate 13(9%), Primary school certificate36(24.8%).
- Regarding father's occupation, majority of the adolescence father's occupation status were skilled agriculture & fishery workers i.e., 65(44.8%) and rest 54(37.3%) were Skilled workers, shop and market sales workers and none of them were Legislator, senior officials management, Professionals, whereas in urban majority of the father's occupations were Skilled workers, shop and market sales workers i.e., 140(96.5%) rest of them were professionals i.e., 5(3.5%) and none of them were Legislator, senior officials management, Skilled agriculture & fishery workers andunemployed.
- Regarding mother's occupation, majority i.e., 78(53.8%) are Skilled agriculture & fishery workers, Skilled workers, shop and market sales workers 14(9.7%) and unemployed with 53(36.6), whereas in urban community majority i.e., 92(63.4%) is unemployed and skilled workers, shop and market sales workers 53(36.6%).
- that majority of the monthly family income of the adolescence i.e., 92(63%) comes under Rs. 9226 and the rest 25(17.2%) monthly family income comes under Rs. 9232-27648, whereas in urban community, majority family income per month i.e., 67(46.2%) comes under Rs. 9226, followed by 53(36.6%) comes under Rs 27,654-46089 and the rest 25(17.2%) comes under Rs. 9232- 27648.

The study findings were also supported by a study conducted by **Malik P (2020)** reveals that majority of subjects (57%, 34) belong to the age group of 16–17 years, 87% (52) were from urban, 58% (35) of the mothers were illiterate, 42% (25) of the fathers were literate, 95% (57) of the mothers were homemaker, 48% (29) fathers were labors, 63% (38) hailed from nuclear family system, and 87% (52) of the subjects had an income of <1000.

Section II: Discussion on the basis of the objectives of research study.

1. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected urban community of KamrupDistrict,Assam.

It has been observed from the present study the level of knowledge on ill effect of tobacco uses among adolescence in selected urban community. Results revealed that majority 84(57.9%) of participants had moderatelyadequate knowledge, 36(24.8%) had adequate knowledge and 25(17.2%) hadinadequate knowledge.

In contrast, a study was conducted by **Jeffrin M, Tendolkar V. D, Meshram K, Bhirange S. (2021)** all the urban school- going children are aware of harmful effects of tobacco consumption 100% (P = 0.00012).

2. To assess the level of knowledge on ill effect of tobacco uses among the adolescence in selected rural community of KamrupDistrict,Assam.

It's been observed from the present study the level of knowledge on ill effect of tobacco uses among adolescence in selected rural community. Results revealed that majority 115(79.3%) of participants had ModeratelyAdequate Knowledge, 16(11%) had inadequate knowledge and 14(9.7%)had adequateknowledge.

In contrast, a study was by conducted by **Jeffrin M, Tendolkar V. D, Meshram K, Bhirange S. (2021)** About 96.6% (p = 0.00012) of rural

school-going children are aware of harmful effects of tobacco consumption while 3.4% (p = 0.00012) rural school-going children were unaware of its harmful effects of tobacco.

3. To compare the knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of KamrupDistrict,Assam.

It has been observed from the present study the comparison of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community. Findings showed that urban mean knowledge score

was16.01±1.734 and rural mean knowledge score 12.27±2.752 with meandifference of 3.74. The mean difference between urban and rural knowledgescore was tested using unpaired t test with obtained (t=13.83) at df=288 wasstatistically significant at $p<0.05$ level of significance.

In contrast, a study was conducted by **Jeffrin M, Tendolkar V. D, Meshram K, Bhirange S. (2021)** About 96.6% (P = 0.00012) of rural school-going children are aware of harmful effects of tobacco consumption while 3.4% (P = 0.00012) rural school-going children were unaware of its harmful effects. Urban school-going children are aware of harmful effects of tobacco consumption. The fact that awareness and perception of the people in rural areas regarding hazardous effect of tobacco are significantly less than their urbancounterparts.

4. To find out the association between knowledge on ill effects of tobacco uses among adolescence with selected socio-demographic variables in selected rural community of KamrupDistrict,Assam.

The association between knowledge on ill effects of tobacco uses among adolescence and selected socio-demographic variables in selected rural communitywhich was tested by using chi square test. Result revealed thatage, education and religion were found statistically significant at $p<0.05$ but gender, father's education, mother's education, father's occupation, mother's occupation and family income were statistically non-significant at $p<0.05$ level with knowledge on ill effects of tobacco uses among adolescence in selected rural community.

5. To find out the association between knowledge on ill effects of tobacco uses among adolescence with selected socio-demographic variables in selected rural community of KamrupDistrict,Assam.

The association between knowledge on ill effects of tobacco uses among adolescence and selected socio-demographic variables in selected urban community which was tested by using chi square test. Result revealed thatage, education and father's education were found statistically significant at$p<0.05$ but gender, religion, mother's education, father's occupation, mother's occupation and family income were statistically non-significant at $p<0.05$ level with knowledge on ill effects of tobacco uses among adolescence in selected urbancommunity.

LIMITATION

The questionnaire was structured interview knowledge questionnaire. Hence the response was limited.

CONCLUSION

The tobacco use situation in India is complex owing to the availability of various forms of tobacco. Also, adolescence and early adulthood, i.e., 15 to 24 years, are considered to be the most susceptible phase of life for initiation of tobacco use in India. Tobacco use is a major risk factor for many chronic diseases, including Non-communicable diseases (NCDs) like ischemic heart diseases, cancers, diabetes, chronic respiratory diseases, diseases affecting the liver and lungs. Smoking is a major risk factor for infections like Pneumonia, Heart Attacks, Strokes, Chorionic Obstructive Pulmonary Disease (COPD) (including emphysema and chronic bronchitis) and multiple cancer (particularly lung cancer, cancers of the larynx and mouth, bladder cancer and pancreatic cancer. It also causes peripheral arterialdiseaseand high blood pressure are the leading causes of death globally and associated with tobacco use. The study was undertaken to comparative and assess the level of knowledge on ill effects of tobacco uses among adolescence in selected urban and rural community of Kamrup District, Assam. The study was adopted Evaluative Comparative Design. Probability Multistage RandomSampling

Technique was use to select the population. Structured Interview Knowledge Questionnaire was use to analysed the data. In findings most of the adolescence in rural and urban has a moderately adequately adequate knowledge on ill effect of tobacco uses. Significant association was found in only in terms of Age, Educational

status and Religion in rural community and Age, Education and Father's education in urbancommunity.

NURSING IMPLICATIONS

The findings of the study have several implications in nursing in the following field. It can be discussed of four areas namely Nursing practice, nursing administration, Nursing education and Nursing research.

Nursing practice

Several implications can be drawn from the present study for nursing practice. Nursing role covers the promotive, preventive curative and rehabilitative aspect of care. Since, education is one of the powerful tools for imparting knowledge and understanding and health teaching being a part of nursing practice, it should be planned systematically and should be based on the need of the target population to enhance knowledge on ill effects of tobacco uses. The findings of the study will help the nurses to develop in depth knowledge about ill effects of tobacco uses. Nurses should discourage the use of tobacco by giving awareness of ill effects of tobacco uses.

Nursing administration

Nurse as an administrator plays an important role in education the professional and in policy making. The nurse administrator can take initiative to conduct in- service training for additional knowledge on ill effect of tobacco uses. Nursing administrator can organize and implementing public awareness campaigns aimed at creating awareness regarding ill effects of tobacco.

Nursing education

The role of professor nurse emphasizes on educating the community people and improves the health of adolescence are unaware of knowledge regarding ill effects of tobacco uses. Nurse educators need to be equipped with adequate knowledge regarding ill effects of tobacco. Nursing students should receive adequate knowledge about ill effects of tobacco. Workshops, conferences, seminars can be conducted on various aspects of Health programmes among the students and nursing personnel for improvement in knowledge.

Nursing research

Nursing research is to be done on ill effects of tobacco uses to create awareness regarding ill effects of tobacco uses. The findings of study which would help to expand scientific body of professional knowledge upon which further researches can be conducted. The researchers are requested to disseminate the findings of research through conferences, seminars and nursing journals.

RECOMMENDATION

Recommendation for future study

- A similar study can be on large sample where finding can begeneralized.
- A similar study can be conducted both in adult andadolescence.
- A similar study can be conducted in school andcolleges.

- A comparative study can be conducted on uses of tobacco among adolescence in urban and ruralarea.

SUMMARY

This chapter dealt with the summary of the research study, implication of the study in different areas of nursing education, nursing practice, nursing administration and nursing research, conclusion of the study, limitation and recommendation of the researchstudy

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