

**PREVALENCE AND PATTERNS OF PSYCHO ACTIVE SUBSTANCE USE
AMONG SENIOR SECONDARY SCHOOL STUDENTS IN DALA LOCAL
GOVERNMENT AREA OF KANO STATE, NIGERIA**

BY

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CERTIFICATION

I Mahfuz Muhammad Haddad PG/ MSC/10/54693, certify that this dissertation is an original work carried out by me, and that this work or part of it has not been submitted to the university or any other institution for the award of degree.

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Date

DEDICATION

This dissertation is dedicated to all parents whose children abuse drugs and also to the entire staff of Aminu Kano teaching Hospital Kano also to my Supervisor and all lecturers in the Department of Nursing Sciences UNEC.

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ABSTRACT

The study was designed to determine prevalence and patterns of Psychoactive Substance use among Senior Secondary School Students in Dala Local Government Area (LGA), Kano State Nigeria. The study adopted a cross sectional descriptive survey design. Simple random sampling procedure was used to select two Secondary Schools out of the ten Government Senior Secondary School in Dala LGA, of Kano State. Both Schools have a combined population of 2293 students made up 1202 boys and 1096 girls. The two Schools sample were Government Secondary School Kurna Asabe for boys and Government Senior Secondary School Kuka bulukiya for girls. The instrument for Data collection was a WHO Youth Drug Survey (WHODYDSQ) adapted questionnaire. The reliability of the instrument was established using a test re-test and computed using Pearson Moment Correlation. Coefficient of 0.82 was obtained. Data generated was subjected to descriptive statistics and analysed using Chi-square. The prevalence of psychoactive substance use among Government Senior Secondary School in Dala LGA, of Kano State shows that majority (91.1%) of the respondents have been using psychoactive substances. The commonest substances used were kola nut (87.4%), tobacco (15%) and cannabis (5.5%). more than half of the users of each of the substances take it occasionally, using them on one to five days in a month except kolanut taken on twenty or more days in a month. They include male (52.9%), female (47.1%). Majority (68.1%) of the respondents were between 18-20 years. Most of the respondents who use psychoactive substances were introduced by their friends (60.6%), family (27.6%) and by nobody (5.7%). Most (27.9%) first use kolanut at the age less than 10 years, alcoholic beverages at the age of 11-12years (25.6%) while others like tobacco, cannabis at 19-and above years (38.3%). Major reasons for using psychoactive substance include to be sociable (25.4%) and for enjoyment (24.4%). There was significant difference ($p < 0.05$) between Males and females in psychoactive substance use. The pattern of use is dependent on the type of psychoactive substances ($p < 0.05$). Also the psychoactive substances use based on lifetime use is dependent on the age at first use ($p < 0.05$). In conclusion the prevalence of substance abuse among Senior Secondary School students is high as such Government, Parents and Teachers needs to joint hands and address the problems.

CHAPTER ONE

INTRODUCTION

Background to the Study

Psychoactive Substance use and dependence cause a significant burden to the individuals and societies throughout the world. The World Health Report (2010) indicated that 8.9% of the total burden of disease comes from the use of psychoactive substances. The report showed that tobacco accounted for 4.1%, alcohol 4%, and illicit drugs 0.8% of the burden of disease in 2010. Much of the burden attributable to substance use and dependence is the result of a wide variety of health and social problems. Data from the (World Health Organization, 2011) show large-scale seizures of cocaine, heroin, cannabis and amphetamine-type stimulants in different parts of the world. Availability of cocaine, heroin and cannabis depends on the level of cultivation in source countries and on the success or failure of trafficking organizations. However, even with increased levels of law enforcement activities, there always seems to be enough available to users. According to (UNODC, 2011) estimates show that about 200 million people make illicit use of one type of illicit substance or another.

Psychoactive substance use is a social problem that has spread and increased rapidly in educational institutions especially among secondary school students (Neeraja, 2011). This social problem is considered an issue of serious concern as it adversely affects the lives and performance of students involved as well as the harmonious functioning of the entire structure of the society. Use of psychoactive drugs and other associated problems are inimical to the survival and effective functioning of human societies. A significant number of untimely deaths and

accidents have been linked to the activities of persons under the influence of one psychoactive drug or the other (Shelly, 2010).

Drug abuse is viewed by different authorities in various forms. Neeraja (2011) defined substance abuse as the dependence on a drug or other chemical substances leading to the effect that are detrimental to the individual's physical and mental health or the welfare of others. According to Smelzer, Bare, Hinkle, and Cheever (2008) substance abuse is a maladaptive pattern of drug use that causes physical and emotional harm with the potential for disruption of daily life. From these definitions, it can be deduced that substance abuse is the misuse of one or more drugs which could be prescribed by a health practitioner with the intention to alter the way one feels, thinks or behaves and it is associated with consequences which include physical and emotional harm to the person.

The African Symposium (2010) viewed substance abuse as the improper use or application of drugs by a person without proper knowledge of the drugs and without due prescription from a qualified medical practitioner. This definition focuses on psychoactive drugs. All drugs can be abused to an extent that it turns into addiction when the drug user is unable to stop the use of the drugs despite the harmful effects on the user's social, personal and economic lives. The problem of substance abuse is so grave that though it was originally conceived as the problem of a 'select few' it has extended beyond the usual characteristics of abusers being males, adults and urban based people, to now include females, youngsters and rural dwellers (Rocha, 2009). These abusers erroneously believe that drugs enhance their performance, put them in good mood etc. The accompanying problems of this act constitute a major threat to the well-being of the society (Ajala, 2009).

The youths in Nigeria like many countries of the world are increasingly developing addiction to psychoactive substances. The National Drug Law Enforcement Agency (NDLEA, 2011) collected drugs use and abuse data from schools, records of patients admitted at mental health institutions for drug problems and interview of persons arrested for drug offences. The result showed that youths constitute the high risk group for drug trafficking and abuse. Friends and school mates account for about 90% of the source of influence of the use and abuse of various psychoactive substances. In Nigeria, alcohol and cigarette are legal substances but, the two have been discovered to cause physical damage to human bodies. It has been reported that smoking tobacco causes 90.0% of lung cancer, 30.0% of all cancers, and 80.0% of other chronic lung diseases (Sale 2008). Apart from these health implications, according to Stephen (2010), alcohol and cigarette are said to be "gateway drugs" to other more potent psychoactive drugs like marijuana, heroin and cocaine.

The future of any community, society, state or nation is tied to the character of the adolescent in that particular place, area or locality. It is also said that "The youth are the leaders of tomorrow". Therefore responsible youth in the society indicates responsible and brighter future of that society and also the reverse is the case.

In our society people are known to have had problems that had made them to adopt various measures to cope with such problems and live successfully within the confines of societal normative values. While some people take solace in lawful ways others resort to unlawful and unhealthy measures such as the use of drugs or psychoactive substances to the extent of abusing them, hence resulting in addiction. According to Edum (2006) the adolescent in our society are

not left out in this, as they are either influenced by peer group while others do so because of the easy availability of the abused substances, others also watch on television and films and some read in books and so try to experiment to experience the effects. The effects of specific psychoactive substance vary depending on their mechanism of action, the amount consumed and the history of the user among other factors.

An ugly fact that is with us in the recent time is road traffic accident related to psychoactive substance use as well as increased crime rate in Nigeria, though a number of measures are put in place to check this menace. This includes the establishment of the National Drug Law Enforcement Agency (NDLEA) through Degree 48 of 1989 and 33 of 1990. However, in spite of these measures people especially the adolescents continue to use psychoactive drugs illicitly with its attendant problems.

Kano state is the most populated state in Northern Nigeria (NPC, 2006). The use of psychoactive Substance in this state is the order of the day, evidence by increase in crimes of different nature, failure at examination, abandoning school and poor performance in all aspects of life etc.

Dala local government is the largest, most populated local government Area of Kano State. One myth about the youth and adolescents in Dala local government is drug and substance use evidently shown by increase in crime, abandoning and inconsistencies in school, as well as failure in examination. These reasons encouraged and motivated the desire to investigate the prevalence and pattern of psychoactive substance use among the senior government secondary

school students of the largest local government area in the middle of Kano City, Dala Local Government Area of Kano State, Nigeria.

Statement of the Problem

Substance use is not a strange phenomenon; the global, regional and national dimension of it are documented. It is in recognition of the complexity of the problem that 26th June of every year has been declared as the International Day Against Abuse and illicit trafficking by United Nations. In its June, 2003 report, the United Nations Children and Education Fund (UNICEF) stated that the problem of HIV/AIDS is inextricably connected to a range of problems, among which is drug abuse among children and young people. Similarly, the United Nations Office on Drugs and Crime (UNODC) pointed out that drug abuse among ñarea boysò in Nigeria has been reported as the cause of delinquent behaviours and crime.

The World Health Organization (WHO, 2010) believes that young people are more vulnerable to suffering physical, emotional and social harm from their own or other people's drug use. It also identifies strong links between the high rate of drinking, violent sexual behaviour, traffic and other accidents and drug use. In relation to tobacco, World Health Organization also estimates that about 250 million children and adolescents who live in developing countries like Nigeria are likely to be killed by tobacco (Stephen, 2010).

The United Nations office on Drug and Crime (UNODC) partly attributes the prevalence of drug use in Nigeria to street hawking of drugs and pharmaceutical preparation. The prevalence rate of adolescent's substance and drug abuse in our society poses a great concern to health care

providers as some end up as addicts. This is quite substantial in Kano state. According to NDLEA (2010) reports, Kano State is the highest in terms of people arrested with the case of drug trafficking and suspected drug addicts (638 arrested suspects) followed by Katsina (411) and Rivers (347) etc.

According to NDLEA (2010) most of the people arrested in Kano state for drug addicts and trafficking are from Dala local government and neighboring communities and majority constitutes secondary school drop outs. Therefore based on the foregoing reasons, the researcher deemed it necessary to determine the prevalence and patterns of psychoactive substance use among the senior secondary school students in Dala LGA, Kano State Nigeria.

Purpose of the Study

The main purpose of the study is to determine the prevalence and pattern of psychoactive substance use among Government senior secondary school students in Dala LGA of Kano State, Nigeria.

Objectives.

The Specific Objectives are to

1. Identify the characteristics of students who use identified substances
2. Establish the prevalence of substance use among the senior secondary school students in Dala Local Government.
3. Identify the patterns of substance use among the senior secondary students.
4. Identify the substances commonly used by the Senior Secondary students
5. Identify the sources of influence of drug use among secondary school Students

6. Determine the age of onset of substance use among secondary school student
7. Identify the reasons why senior secondary school students use drugs

Research Questions

1. What are the characteristics of students who abuse drugs?
2. What is the prevalence rate of psychoactive substance use among the senior secondary school students in Dala Local Government, Kano State?
3. What are the patterns of substance use among senior secondary school students?
4. What are the substances commonly used by the senior secondary school students?
5. What are the sources of influence of drug use among senior secondary school in Dala?
6. What is the age of onset of substance use among secondary school student in Dala local government?
7. What are the reasons senior secondary school students used drugs?

Hypothesis

1. There is no significant difference between Male and Female in secondary school in drug abuse.
2. There is no significant difference in pattern of drug abuse in days per month based on Psychoactive Substances
3. There is no significant relationship of respondents age range at the first use based on life time use of psychoactive

Significance of the Study

The present study will reveal the prevalence, pattern, types and sources of psychoactive substances used by secondary school children. It will also reveal the characteristics of the students who use drugs and the problems students encounter as a result of drug use. These findings are essential as they will help in understanding the overall social, academic and drug problems of the students and youth in Kano state.

This finding would be useful to the parents, teachers, police and the drug law enforcement agency (NDLEA) as well as other bodies concerned with checking drug abuse problems in Dala LGA of Kano state and Nigeria at large. The findings will provide a source of reference for intervention programmes in Kano state.

It is also hoped that the findings of this study will be useful for social monitoring and alerting people to the signs of Substance use so as to enable early diagnosis and treatment of affected persons. It will also assist in planning of preventive strategies for substance use in our secondary schools across the country.

The finding of this study will be useful to future researchers on the topic, as they will build on the strength and limitations of the study. And the finding of the study may spur them to form anti-psychoactive substance use clubs and associations. The activities of these groups can reach the wider society and will assist in curbing the menace of substance abuse in Dala LGA, Kano State and the country at large. The present study will no doubt, spur interest for further studies.

Scope of the Study

The scope of this study is delimited to on Government Senior Secondary School Students in Dala LGA of Kano State. The study will be delimited to prevalence and pattern of psychoactive substance use among Government Senior secondary school student in Dala LGA, Kano state.

Operational Definition of Terms

- Psychoactive Substance: This refers to any substance which may be a drug or not but has the property of altering the mood in form of stimulation or distortion of perception.
- Psychoactive substance use refers to the use of any substance which may be drugs or not that has the property of altering the mood in form of stimulation or distortion of perception
- Drug Abuse- refers to the illegal or excessive drug use; deliberate use of an illegal drug or of too much of a prescribed drugs
- Prevalence of psychoactive substance use: refers to the proportion of a population found to have used a psychoactive substance or drugs.
- Pattern of psychoactive substance use: Is the process addicts use which include Modes of Taking, frequencies and Style of psychoactive substance abuse etc
- Source of influence: Those factors that introduce student to the drugs or substance use e.g peer group, family etc.
- Secondary school students: Are students in the second phase of secondary education of 6-3-3-4 education system in Nigeria who finishes primary school.
- Senior Secondary School Students refers to the students in SSI, SSII and SSIII of secondary school education system in Nigeria.
- Non Medical drug use this is improper or illegal use of drugs or taking it in excessive doses without any medical reasons.

CHAPTER TWO

LITERATURE REVIEW

Introduction

This chapter presents review of literature in the following areas, conceptual review, theoretical review and empirical studies of Adolescent, specific psychoactive substances and problems associated with their use.

Conceptual Review

Certain Concepts would be reviewed such as psychoactive substance, causes of abuse, effect of abuse on individual and community at large, treatment modalities and law and policy of drug abuse in Nigeria.

Concept of Psychoactive Substance

Throughout history many cultures have found ways to alter consciousness through the ingestion of substances. In current professional practice, psychoactive substances known as psychotropic drugs have been developed to treat patients with severe mental illness. Psychoactive substances exert their effects by modifying biochemical or physiological processes in the brain. The message system of nerve cells, or neurons, relies on both electrical and chemical transmissions. Neurons rarely touch each other; the microscopic gap between one neuron and the next, called the synapse, is bridged by chemicals called neuroregulators, or neurotransmitters.

According to Psychology Dictionary (2002) psychoactive drugs are chemical substances that affect the brain functioning, causing changes in behavior, mood and consciousness. Psychoactive

drugs are chemical substances that alter mood, behavior, perception, or mental functioning. Psychoactive drugs act by altering neurotransmitter function. The drugs can be divided into six major pharmacological classes based on their desired behavioral or psychological effect: alcohol, sedative-hypnotics, narcotic analgesics, stimulant-euphorants, hallucinogens, and psychotropic agents.

A psychoactive drug, psychopharmaceutical, or psychotropic is a chemical substance that crosses the blood-brain barrier and acts primarily upon the central nervous system where it affects brain function, resulting in alterations in perception, mood, consciousness, cognition, and behaviour. These substances may be used recreationally, to purposefully alter one's consciousness, or as entheogens, for ritual, spiritual, and/or shamanic purposes, as a tool for studying or augmenting the mind. Many psychoactive drugs have therapeutic utility, e.g., as anesthetics, analgesics, or for the treatment of psychiatric disorders. Psychoactive substances often bring about subjective changes in consciousness and mood that the user may find pleasant (e.g. euphoria) or advantageous (e.g. increased alertness) and are thus reinforcing. Thus, many psychoactive substances are abused, that is used excessively, despite health risks or negative consequences with sustained use of some of the substances

Alcohol has always been the most widely used psychoactive substance. In most countries it is the only psychoactive drug legally available without prescription. Pleasant relaxation is commonly the desired effect, but intoxication impairs judgment and motor performance. When used chronically, alcohol can be toxic to liver and brain cells and can be physiologically addicting, producing dangerous withdrawal syndromes (Berger and Philip, 2009)

Sedative-hypnotics, such as the barbiturates and diazepam (widely known under the brand name Valium), include brain depressants, which are used medically to help people sleep (sleeping pills), and antianxiety agents, which are used to calm people without inducing sleep. Sedative-hypnotics are used illegally to produce relaxation, tranquility, and euphoria. Overdoses of sedative-hypnotics can be fatal; all can be physiologically addicting, and some can cause a life-threatening withdrawal syndrome. Narcotic analgesics—opiate (Opium) such as morphine and heroin—are prescribed to produce analgesia. Because the relief of pain is one of the primary tasks of medical treatment, opiates have been among the most important and valuable drugs in medicine. Illegal use of narcotic analgesics involves injecting these substances, particularly heroin, into the veins to produce euphoria. Opiates are physiologically addicting and can produce a quite unpleasant withdrawal syndrome.

Stimulant such as amphetamines and methylphenidates, are prescribed by physicians to treat children diagnosed with attention-deficit hyperactivity disorder and individuals with narcolepsy. Although amphetamines stimulate adults, they have a paradoxically calming effect on certain children who have short attention spans and are hyperactive. Cocaine is used medically as a local anaesthetic. Amphetamines and cocaine are used illegally to produce alertness and euphoria, to prevent drowsiness, and to improve performance in physical and mental tasks such as athletic events and college examinations.

Hallucinogens—psychedelic drugs such as LSD (Lysergic Acid Diethylamide), mescaline, and PCP (Phencyclidine) have little medical use. They are taken illegally to alter perception and

thinking patterns. Marijuana is a weak hallucinogen that may be medically useful in suppressing the nausea caused by cancer treatments and possibly in reducing eye pressure in certain severe glaucomas.

Psychotropic drugs have been in use since the early 1950s. Antipsychotic drugs decrease the symptoms of schizophrenia, allowing many schizophrenic patients to leave the hospital and re-join community life. Antidepressant drugs help the majority of patients with severe depression recover from their disorder. Lithium salts eliminate or diminish the episodes of mania and depression experienced by manic-depressive patients (Berger and Philips 2009)

Specific psychoactive substances

Cannabis derivatives

Cannabis (marijuana)

The natural source of marijuana is the Indian hemp plant (*Cannabis Sativa*). However, any part of the plant or its extract may be referred to as marijuana (Osayande, 2011). Marijuana and hashish are cannabis derivatives (Agwogie, 2010). Alternative names for marijuana include pot, tea, weed, grass, acapulco gold, reefer, ganja, shit, among others, which vary with social group and geographic location. Osayande (2010), explains that the producing countries for cannabis and hashish are Belize, Colombia, Costa Rica, Guatemala, Panama, Paraguay, United States, some African countries (particularly Nigeria and Ghana).

The psychoactive agent is concentrated in the resin of the cannabis sativa plant. Hashish, or hash, resin is from the flowering tops and is very potent. Marijuana is much less potent,

consisting mainly of leaves and fine stems. The active constituent responsible for the effect has been identified as delta-9-tetrahydrocannabinols (THC) and can be detected in the body for up to six weeks (Martin, 2010). Marijuana also contains more than 400 other chemicals (National Institute on Drug Abuse, 1998).

Hashish and Marijuana are taken either orally or by smoke inhalation from cigarettes or from a pipe. The effect is more rapid with inhalation and it usually lasts a few hours. With repeated use, more of the drug is needed to produce the same effects (Maduako and Aguwa, 2002). The sedative effects of cannabis use are well established, with users typically reporting mental slowness, tiredness, anxiety and paranoia as well as relaxation and euphoria (Parrot, Morinan, Moss and Scholey, 2004).

The acute effects on cognition and performance limited to periods of intoxication have been well documented. In addition, long-term effects of cannabis use leads to subtle and selective impairments of specific higher cognitive functions (Solowij, 1998). Cannabis usually causes the user to become talkative, relaxed and drowsy, and may induce cannabis psychosis (Department Health, 2003). In the light of the above, a possible impact on safety seems likely. Study in France (Laumon, Gadegbeku, Martin and Biecheler, 2005) shows that cannabis impairs driving skills. Berghaus, Sheer and Schmidt (1995) says behavioural and cognitive skills related to driving (motorcycle) performance were impaired in a dose-dependent fashion with increasing THC blood levels. In short, drugged driving is a dangerous activity that put us all at risk.

According to Hutchinson (1992), THC is stored in the fatty tissues, in the brain, and in the organs of the reproductive system. Physical dependence, exhibited by withdrawal symptoms

does not occur. The agent (THC) is metabolized in the liver. Death associated with the use of cannabis derivatives has not been reported. It has been found useful in decreasing the nausea and vomiting that is often associated with chemotherapy; in reducing dangerously high intraocular pressures in glaucoma, and in treating asthma, epilepsy and hypertension (Black and Matassarini-Jacobs, 1993; Laurence, Bennett and Brown, 1998).

Stimulants

Stimulants (also referred to as psychostimulants) are psychoactive drugs which induce temporary improvements in either mental or physical functions or both. Examples of these kinds of effects may include enhanced alertness, wakefulness, and locomotion, among others. Due to their effects typically having an "up" quality to them, stimulants are also occasionally referred to as "uppers". Depressants or "downers", which decrease mental and or physical function, are in stark contrast to stimulants and are considered to be their functional opposites. Stimulants are widely used throughout the world as prescription medicines and as illicit substances of recreational use or abuse. Amphetamines and cocaine are the main drugs that belong to this group which increase mental activity (Maduako and Aguwa, 2002). Another stimulant not often mentioned in drug use literature is caffeine (Black and Matassarini-Jacobs, 1993) which is found in coffee, tea and Cola (Mireku, 2002). These drugs by their actions increase restlessness and improve physical performance. Cocaine is produced from the leaves of the coca shrub (*Erythroxylon coca*). It is grown mainly in South America especially Bolivia, Colombia, Ecuador and Peru. Nigeria does not produce cocaine, but Nigerians travel to South American Countries from where they purchase the drug (Akagbosu, 1995).

The leaves, containing the active ingredient, cocaine have been habitually chewed for their mind stimulation (at this reduced dosage) for over 400 years. Cocaine is processed into an odourless, white, fluffy, fine crystalline powder, similar to snow in appearance. Consequently, on the criminal market it is commonly referred to as "Snow" (Emenike and Ogbonna, 1995). Other cocaine slang names include coke, crack and rock (Mireku, 2002).

Cocaine is classified as a narcotic drug for legal purposes due its stimulating effects on the Central Nervous System (CNS). Its effects include increased pulse rate, elevated blood pressure, accelerated respiration and pupil's dilation. In addition, arousal and wakefulness reactions are stimulated, in addition to increase in body temperature, sleeplessness and loss of appetite. The individual under the influence is talkative, active and feels euphoric (Emenike and Ogbonna, 1995; Laurence et al. 1998). With increased absorption, hallucinations are produced, the individual becomes confused. A quick depression ("Let down") takes place following the period of stimulation. This stage is characterized by stupor, sleep or coma and if dosage is lethal, death due to breathing difficulties (Mireku, 2002).

Coca leaves may be swallowed or chewed. Cocaine can also be made into powder and is either mainlined or snorted (inhaled, Sniffed) through a straw or a piece of paper (Black and Matassarini-Jacobs, 1993). Emenike and Ogbonna (1995) emphasized that cocaine is usually taken by "sniffing" it into the nostrils, rarely by hypodermic injection. The authors further observe that cocaine use can cause brain seizures, stroke, cocaine psychosis, "Coke bugs" (a sensation of imaginary insects crawling over the skin), profound personality changes, impaired thinking and depression.

According to Maduako and Aguwa (2002) cocaine, most often, is not used alone, other drugs like morphine may be added. Another drug often combined with cocaine is heroin, the mixture called a 'speed ball' (Emenike and Ogbonna, 1995). Black and Matassarini-Jacobs (1993) and Laurence et al. (1998) note another method of cocaine use as free-basing. Cocaine paste, a crude extract of the coca leaves, contain the alkaloid free-base. The hot gases from a pipe or burning cigarette vaporize free base and allow its inhalation. An increasingly popular method of cocaine use is smoking concentrated cocaine, crack in cigarettes, or glass water pipes. The duration of action of cocaine is so short that the user has to take it repeatedly to sustain the mood elevation (Maduako and Aguwa, 2002).

Dextroamphetamine, amphetamine and methamphetamine are some examples of amphetamine derivatives. The slang terms used for amphetamines include pep pills, speed, uppers and meth (Mireku, 2002). Some people swallow 'meth' pills or inject the compound into a muscle ('skin pop') or vein ('mainline') to get a quick euphoric 'flash' or 'rush'. With continued injections the users stay awake for days and eat very little, until their bodies become completely exhausted ('strung out'). Then the worst part of a 'speed trip' comes, the withdrawal ('crashing') from the effects of the drugs. Heavy users stop their injections, slip between coma and sleep for days, then awaken and start their injections again. Often criminals to increase their 'nerves' (Emenike and Ogbonna, 1995) rely upon the stimulating effect of amphetamine. Amphetamines elevate the mood, decrease fatigue and reduce appetite. Such effects as euphoria are responsible for their wide use. Doctors prescribe amphetamine for weight reduction as appetite suppressant, while long distant drivers (including motor- cycle riders) and students may use them to keep awake

(Maduako and Aguwa, 2002). Perhaps the greatest danger to the majority of people from amphetamines is the effect they have on motorcycle riders.

The duration of action of amphetamine if taken orally is longer (Black and Matassarini-Jacobs, 1993). However, users of amphetamines usually resort to the intravenous route of administration (Maduoka and Aguwa, 2002). The major difference between the amphetamines and cocaine is the duration of action (Black and Matassarini-Jacobs, 1993; Laurence et al. 1998). On the other hand, caffeine, which is found in coffee, tea and cola (Mireku, 2002), belong to the same group with cocaine and amphetamines. The slang names used for caffeine include enerjets; keep alert, keeping going, molie, valentine, overtime and stay wake (Karch, 2002). Explaining, Erforth (1994) says caffeine antagonizes receptors of the neuroinhibitor, adenosine, resulting in a failure to suppress release of several excitatory neurotransmitters. The process could explain the effects of caffeine on alertness, sleep and anxiety, as well as caffeine dependence. Amphetamines are a group of phenylethylamine stimulants such as amphetamine and methamphetamine. Amphetamine increases the levels of norepinephrine and dopamine in the brain via reuptake inhibition; however, the more important mechanism by which amphetamines cause stimulation is through the direct release of these catecholamines from storage vesicles in cells. Amphetamines are known to cause elevated mood and euphoria as well as rebound depression and anxiety. (Knapp 1952) Amphetamines are often used for their therapeutic effects; physicians occasionally prescribe amphetamines to treat major depression, where subjects do not respond well to traditional SSRI medications, and numerous studies have demonstrated the effectiveness of drugs. Due to their availability and fast-acting effects, amphetamines are prime candidates for abuse.

Depressants

Barbiturates

A depressant, or central depressant, is a drug or endogenous compound that lowers or depresses arousal levels and reduces excitability. (Zeglek, 2009) Depressants are also occasionally referred to as "downers" as they lower the level of arousal when taken. Stimulants or "uppers" increase mental and or physical function are the functional opposites of depressants.

Depressants are widely used throughout the world as prescription medicines and as illicit substances. When these are used, effects often include ataxia, anxiolysis, pain relief, sedation or somnolence, and cognitive/memory impairment, as well as in some instances euphoria, dissociation, muscle relaxation, lowered blood pressure or heart rate, respiratory depression, and anticonvulsant effects, and even complete anesthesia or death at high doses. Depressants exert their effects through a number of different pharmacological mechanisms, the most prominent of which include facilitation of GABA (γ -Aminobutyric acid) is the chief inhibitory neurotransmitter in the mammalian central nervous system. It plays a role in regulating neuronal excitability throughout the nervous system. In humans, GABA is also directly responsible for the regulation of muscle tone. Although chemically it is an amino acid, GABA is rarely referred to as such in the scientific or medical communities, because the term "amino acid," used without a qualifier, conventionally refers to the alpha amino acids, which GABA is not, nor is it ever incorporated into a protein.) or opioid activity, and inhibition of glutamatergic or catecholaminergic activity .

Several drugs belong to this category. The drugs include the hypnotic-sedative e.g. phenobarbitone, amobarbitone, alcohol and minor tranquilizers e.g. chlordiazepoxide (librium), diazepam (valium). The chemistry of these drugs may differ but they all have similar pharmacologic effects. Generally, they slow down the central nervous system (CNS) resulting in the relaxation of tension and allay anxiety (Maduako and Aguwa, 2002).

Barbiturates were first produced in 1864 by combining urea (an animal waste product) with malonic acid (derived from an acid in apples). The compound obtained, a new synthetic was named "barbituric acid". Since then chemists have produced a great variety of derivatives of barbituric acid, such as barbital (veronal) and phenobarbital (luminal). On the illegal market, barbiturate drugs are known as "goofy balls", "Downers", "sleeping pill", "barbs", "blockbusters", or by their colours- blues, rainbows, pink ladies, red devils, yellow jackets (Emenike and Ogbonna, 1995; Laurence et al. 1998).

As a result of their similar pharmacological effects, they are interchangeable; develop tolerance, physical dependence and withdrawal syndrome. They may be used in combination to increase the desired effects. Both on chronic or toxic level, barbiturates depress motor output resulting in motor in- coordination such as ataxia and nystagmus in the user (Karch, 2005). Such persons have problems in performing tasks that require thinking and judgement and they are prone to accidents.

Alcohol and barbiturates have the most frightening and dangerous withdrawal syndrome among all drugs that cause dependence. Anxiety, insomnia, weakness and disorientation characterize withdrawal syndrome. They may progress to delusions, visual hallucination and convulsion

(Maduako and Aguwa, 2002). Emenike and Ogbonna (1995) observe that barbiturates are the most versatile of all CNS depressant drugs. They seem to be the second most popular suicide poison (carbon monoxide from auto exhaust is first). Actually, some of these deaths, though self-inflicted, are not suicides but accidents. Accidental deaths may occur after a person has taken a moderate dose to go to sleep, but then in an excited, half-asleep and confused condition due to the effects of the dose, takes another dose- a lethal one.

According to Maduako and Aguwa (2002) the two main determining factors in the use and misuse of alcohol and other CNS depressants are the dosage consumed and the duration of intake. Very large dosage may cause intoxication of the agent used e.g. for suicide purpose. Acute intoxication may not occur with regular small dosage but the individual may develop tolerance, which may eventually lead to dependence. Barbiturates are usually taken orally (users terms "dropped"). Users dissolve the compound and inject the drug hypodermically. Sometimes they are "dropped" with alcohol and sometimes with Benzedrine or Dexedrine (amphetamines), CNS stimulants, to overcome the depressing effects of the barbiturates and to increase their antagonistic actions (Emenike and Ogbonna, 1995).

This practice of combining stimulant drug with depressant drug is dangerous and often results in death. The practice is wide spread among our young people. Emenike and Ogbonna. (1995) warns that young people who are the most common users of amphetamines, who often use them together with barbiturates or alcohol for "kicks". The author says such use is dangerous; it can cause death or lead to impulse acts of poor judgement and to accidents.

Alcohol, a socially sanctioned and readily available substance, is also far less innocuous than is widely believed (Prime Minister's strategy unit, 2004). Alcohol has a strong association with scores of problems, including accidents (motorcycle accidents), domestic violence, depression, sexual assault and infection (Kenny, 2005). The death toll exacted by alcohol is especially heavy among young people, it is, in fact the leading cause of death. Thus, contrary to the generally accepted ideas, the majority of alcohol related deaths are of drunk drivers themselves (Awake!, 2005).

Ethanol or ethyl alcohol, the chemical compound present in most alcoholic drinks, is neurotoxin—that is, a substance that can damage or destroy the nervous system (Awake!, 2005). Nevertheless, Emenike and Ogbonna (1995) stresses that alcohol in small quantities usually stimulates people to be relaxed and socially responsive. However, alcohol is a depressant, a person who has drunk alcohol exhibits attitudes usually repressed. Typically, he/she becomes disoriented, confused and drives a motorcycle or performs other physical activities erratically. Moreover, benefits from alcohol use seem to involve drinking small amounts spread throughout the week. Rather than the total amount all at once on a night out. But unfortunately, there is no minimal dose which has ever been established, below which there are no risks (Awake, 2005). The scores of problems related to alcohol are by no means exhaustive.

Alcohol can be produced naturally by fermentation of fruits, grains or vegetables. It can also be made synthetically; beers, wines, whiskies, schnapps, rums and gins are all types of alcoholic beverages (Mireku, 2002).

According to Mireku (2002) the body takes about one hour to burn the alcohol in one standard (or average) drink. One standard (or average) drink is equal to: 360ml (or 12 oz) of beer 5% alcohol or 150ml (or 5 oz) of wine 12% alcohol or 45ml (or 1.5 oz) of whisky 40% alcohol. Kenny (2005) stresses that people are still confused about units of alcohol. The author observes that only one in four people know what a unit is, and just one in ten check their consumption in units. However, the old weekly limit of 21 units for men and 14 for women was changed to daily limits, three to four units for men and two to three for women, largely to stop people saving their units for a weekend binge. Therefore, a binge is defined as drinking over twice the daily limit.

Mireku (2002) notes that a standard (or average) drink is a volume of an alcoholic beverage containing 18 millilitres (ml) for 0.6 oz of absolute (100%) alcohol. Unfortunately, alcohol is not controlled in the same way as other psychoactive drugs. Emenike and Ogbonna (1995) affirms that alcohol is generally socially accepted and there are no enforced legal controls in Nigeria as at now, unless the user endangers his/her life, the lives of others or offends society.

Tobacco

Native Americans who believed tobacco had medicinal powers used it for religious and ceremonial purposes and its mind-altering effects. Tobacco use spread to Europe where it became popular for its supposed curative powers after the American Indians (Mireku, 2002) have introduced it to Christopher Columbus and his crew. Shuttleworth (2005) observes that most of those who smoke tobacco are young, single, less educated and isolated, and often they don't see any reason to give up. But since 1964, when the surgeon General first published the landmark report on the health risks of smoking, tobacco use among adults has decreased dramatically, from

approximately 40 per cent in 1965 to 25 percent in 1999 (Hanson, 1999). The author notes that teen smoking accounts for 85 per cent to 90 per cent of new smokers. Most of the smokers are addicted before age 20 years. Ruppert (1999) regrettably notes that unknown to many smokers are the 4,000-plus chemical they are exposed to each time they light up. Despite the dangers inherent, it was not until the 1950s governments declare tobacco smoking a health hazard (Mireku, 2002).

Tobacco products, including cigarettes, cigars, chewing tobacco and snuff, are prepared from the leaves of *Nicotiana tabacum*. The nicotine (highly addictive stimulant) and tar that are found in these leaves are very harmful to health. Equally harmful are the other gases like hydrogen cyanide, nitrous oxides and carbon monoxide which are formed and released when cigarettes are smoked (Mireku, 2002). Often, these carcinogenic chemicals (hydrocyanic acid, carbon monoxide, etc) and radioactive compounds, such as polonium are present in tobacco (Ford, 1994).

Shuttleworth (2005) emphasizes that smoking is implicated in more than 20 lethal conditions. It also increases the risk of more than 50 other conditions and results in 364,000 hospital admissions each year in England alone.

Nicotine in the tobacco increases the heart rate, narrows the passages in the blood vessels, and increases the risk of heart disease, hypertension and stroke. These effects occur whether the tobacco is smoked or chewed. Depending on route of the tobacco consumption, tar coats the linings of either respiratory tract or the digestive tract. Tar paralyses and destroys the cilia found

in the lungs and is responsible for causing lung cancer and emphysema. Lest we forget, tar stains the teeth and reduces one's ability to taste and smell. A pregnant woman who smokes is likely to have growth of her fetus retarded or experience a spontaneous abortion. The babies of smokers suffer from higher rates of low birth weight and infection or even death (Awake, 2005).

Regular smokers experience less appetite, have less physical stamina because of inefficient oxygen exchange and risks of ulcers because of increases in the amount of hydrochloric acid secretion in the stomach (Mireku, 2002). Non-smokers suffer from the effects of second-hand smoke (Shuttleworth, 2005). This is because, the smoker inhales 30 percent of smoke produced, and the remaining smoke permeates the air. This side-stream smoke can cause some of the same ill effects in people around the smoker.

There are various reasons why people smoke. Some claim that the habit is both stimulating and relaxing. Others smoke for oral gratification. While others claim that smoking help them to concentrate (Mireku, 2002). Young people smoke because of peer pressure in order to "belong" and not appear "different". Others smoke to imitate their parents or other adults they admire (Shuttleworth, 2005).

Glossy advertisements in magazines or billboards, in newspapers, on television and other media sway many teenagers. They erroneously believe smoking will make them successful and sophisticated in life. What the advertisement does not tell or show is the dangers associated with tobacco use and nicotine addiction (Mireku, 2002).

Hallucinogens and Psychedelics

Hallucinogens are drugs that alter sensory and perceptual experiences. They elevate the user's mood (Department of Health, 2003). A variety of natural and synthetic drugs belongs to this category. They include lysergic acid diethylamide (LSD) - called acid, phencyclidine (PCP) - called hog, angel dust, crystal, rocket fuel or peace pill, dimethyltryptamine (DMT), Mescaline and psilocybin. LSD, PCP and DMT are synthetic or semi-synthetic drugs. Mescaline, also called Mesc, buttons or cactus, is made from peyote cactus while psilocybin also known as magic mushroom is derived from the psilocybin mushroom. The natural hallucinogens have been used in religious ceremonies throughout history (Mireku, 2002).

The euphoric state of hallucinogens may include alteration in time and space, hallucinations, illusions and delusions. The mental effects may be quite variable even in the same person at various occasions. They produce effects that one would observe in manic-depressive psychoses and schizophrenia. Hallucinogens have the characteristics of dependence and tolerance and cross-tolerance to each other (Maduako and Aguwa, 2002). There is little physiological arousal or Sedation (DH, 2003).

The effects vary greatly according to the dosage, the personality of the user and condition under which the drug is administered. The major effects are marked visual alteration, objects are perceived with different meanings, tremors and increase in blood pressure. LSD causes "flashback" days or months after the administration of the last dose (Mireku, 2002). This can be extremely frightening as they may occur unexpected when a person is executing a crucial skill such as riding a motorcycle.

Opiates

Opium is narcotic drug derived from the dried juice of the opium poppy (*papaver Somniferum*). This poppy plant, opium, contains about 18 alkaloids. They include raw opium, morphine, codeine and heroin (also known as Big H, H, horse, junk or Smack). The best known of these alkaloids, morphine (named after Morpheus the Greek god of sleep), was extracted by a German scientist in 1806. Morphine was refined into heroin. Heroin is several times more addictive than morphine (Mireku, 2002).

According to Maduagwu and Alemika (1995), Asia is the main producer of opium. The Golden Triangle countries of South-East Asia- Thailand, Laos and Burma, as well as the Golden Crescent nations of South-West Asia-Pakistan, Iran and Afghanistan, are the principal producers of opium or poppies used for the production of narcotics. Nigeria cultivated neither opium poppy nor produces heroin. However, Nigerians go to the source countries and bring back to the consumer countries (Akagbosu, 1995).

The properties of opiates include the reduction of sensitivity to pain and anxiety. The drugs act to depress the CNS. It is possible to develop tolerance and dependence if they are taken repeatedly. Contrary to common belief, opiates interfere minimally with mental and physical functioning. This alters, however, if opiates are taken in large doses, frequently or in addition to other drugs such as other depressants (DH, 2003).

Morphine had been most popular but because heroin acts faster and more potent than morphine, majority of the addicts use heroin. Generally administered subcutaneous (ñskin poppingò) or

intravenous (ñShotting upò or ñmain liningò).The amount of drug taken (ñhitò) may produce profuse sweating, nausea, vomiting, lethargy and sedation. Others include euphoria, analgesia, inner satisfaction, aggression and sexual drives (Maduako and Aguwa, 2002). Individuals who use heroin stands the risk of contracting viral hepatitis, HIV/AIDS, tetanus, etc from the use of unsterile needle or poisoning from the substance used to dilute the heroin. Pregnant women who use heroin face the possibility of having still birth, abortion, heart disease (Mireku, 2002).

Deliriants/inhalants

These volatile chemical substances evaporate quite easily. They include solvents, aerosols; paint thinner, nail polish, petrol, glue, gum, correction fluid, anesthetics (halothane and nitrous oxide ñ laughing gas) and other chemicals.

Inhalants produce psychoactive (mind-altering) effects by depressing the CNS. In many cases the psychoactive effects of these substances last for only a few minutes. But they are capable of claiming the life of the user, consequent to CNS depression or suffocation. The physiological effects of inhalants include sneezing, coughing, nausea and tiredness. Long-term use of inhalants may damage the liver, kidneys and the bone marrow. Damage to the CNS can affect the mental and physical capabilities of the user (Mireku, 2002).

Anabolic steroids

These are synthetic versions of the testosterone hormone. It is naturally occurring in both males and females. Anabolic steroids produce masculine traits and stimulate the building of body tissue. Anabolic steroids stimulate the CNS making the individual energetic and less tired.

Adolescent boys wanting to look muscular and grow up faster often believe that these drugs will make them bigger, stronger and more attractive to the opposite sex. Unfortunately, this is not true as anabolic steroids cause premature closure of the growth plates of the long bones in the adolescent. Thus stunting normal growth and limiting height (Mireku, 2002). Use of anabolic steroids has harmful effects on hepatobiliary, reproductive, cardiovascular and endocrine systems. Psychiatric morbidity encountered by users of anabolic steroids includes mood disorders with irritability (Madden, 1995).

Concept of Psychoactive Substance Use

Substance abuse, also known as drug abuse, is a patterned use of a substance (drug) in which the user consumes the substance in amounts or with methods neither approved nor supervised by medical professionals. Substance/drug abuse is not limited to mood-altering or psycho-active drugs. If an activity is performed using the objects against the rules and policies of the matter (as in steroids for performance enhancement in sports), it is also called substance abuse. Therefore, mood-altering and psychoactive substances are not the only types of drugs abused. Using illicit drugs i narcotics, stimulants, depressants (sedatives), hallucinogens, cannabis, even glues and paints, are also considered to be classified as substance abuse. Ksir, Oakley Ray; Charles (2002) Substance abuse often includes problems with impulse control and impulsive behaviour. According to Goel and Anand (2011) Substance abuse may start in childhood or adolescence. Abuse prevention efforts in schools and community setting now focus on schools age groups. Also pointed out that friends and family may be among the first to recognise the signs of substance abuse. Early recognition increases chances for successful treatment. Signs to watch for

include the following; giving up past activities such as sports, homework or hanging out with new friends and declining grades in school.

Drugs abuse as defined by WHO (2010) has to be a persistent or sporadic excessive use of a drug and that use of drug is inconsistent with or unrelated to acceptable medical practice. With this definition, it shows that any drug can be abused. Drug abuse itself is not an illness but it may usually lead to an illness.

According to DSM 1V Substance abuse is a purposeful use of substance for at least one month of a drug that results in adverse effects to oneself or others. This diagnosis can only be used for someone who has never been diagnosed as dependent. Substance dependence occurs when the use of the drug is no longer under control and continues despite adverse effects (APA 1994).

Substance abuse is a pattern of behaviour in which people rely on drug excessively and regularly, bringing damage to their relationships, functioning poorly at work or putting themselves or others in danger (Ronald 2004)

Shelly (2009) defined substance abuse as the dependence on a drug or other chemical substances leading to the effects that are detrimental to the individual's physical and mental health or the welfare of others. Psychoactive Drugs, chemical substances that alter mood, behavior, perception, or mental functioning. Throughout history, many cultures have found ways to alter consciousness through the ingestion of substances. In current professional practice, psychoactive

substances known as psychotropic drugs have been developed to treat patients with severe mental illness.

Prevalence of Substance Use

Psychoactive substance use can result in a wide range of health and social problems for individuals, their families and the wider community. Globally, about two billion people use alcohol (WHO 2007) and it is estimated that between 172 and 250 million persons used illicit drugs at least once in the past year in 2007 (UNODC 2009) said About 2.5 million deaths are attributable to the use of alcohol and about 200 000 to the use of illicit drugs. (WHO 2009) Harmful alcohol use accounts for 4.5% of the global burden of disease and is responsible for 3.8% of all deaths worldwide (WHO 2009). Rates of death attributable to alcohol are the highest in Europe and the countries of the American continent and are rising in all six WHO regions. Illicit drug use is also a major concern for the developed and developing world (UNODC, 2009; UNODC/WHO 2008). Psychoactive substance use and substance use disorders can result in a wide range of health and social problems for individuals, their families and the wider community (WHO 2007). It is estimated that worldwide there are about 25 million people with drug dependence (UNODC/WHO 2008). Cannabis is the most commonly used illegal substance and accounts for an estimated 80% of illicit drug use worldwide (Hall 2006). The next most commonly used illegal psychoactive substances are stimulants, which include amphetamines (29.6 million people), cocaine (13.3 million people) and ecstasy (8.3 million people) (Hall, 2006). Data on the size of the injecting drug use population indicate that there are about 15.9 million people injecting drugs worldwide (Mathers, 2008), although it is acknowledged that it is difficult to produce precise figures. Injecting drug use, a growing phenomenon, is reported in 148 countries (Mathers, 2008), with 0.4% of deaths worldwide attributable to it (WHO 2009).

The use of stimulants such as amphetamine has increased rapidly in Asia and Europe (WHO 2007), with evidence of a substantial increase in the use of crack and crack cocaine in Europe (UNODC 2007), South Africa (Parry, 2007) and the Americas (UNODC, 2009). The non-medical use of tranquillizers and analgesics is also thought to be considerable, although statistics on this are not available for many countries.

According to Eneh and Stanley (2004) most prevalent of substance abuse in Nigerian secondary school start in the age group between 10-14 years, corroborating with the finding of Abiodun (2003) which was found that, the mean age of onset of consumption of drugs like cocaine, cigarette and petrol, latex (glue) was high while that for alcohol and kolanut was low. In fact some students have admitted taking alcohol from about the age of two according to their parents. This could be as a result of availability of alcohol in the homes and also more social permissiveness in some cultures in the Niger Delta Areas of Nigeria where children are given alcohol to sip when the adults are drinking. Parental influence played important role in the use of alcohol, kolanut and cannabis while peer pressure influenced significantly the use of tobacco/cigarette, cannabis and cocaine. These findings are generally in keeping with the previous reports on the strong influence of peer pressure, and parental influence, on substance use among youths. The common reasons for the use of substances were to relieve stress, feel good, parental influence and availability. Alcohol and tobacco/cigarette were the commonly used substances to relieve stress. It was found that there was positive correlation of the use of cigarette with the use of most of the other substances investigated. This sub-population of more than one substance users may therefore represent a particularly high-risk group that may be more vulnerable to the physical and psychosocial complications of poly-substance use. In the present

study, the majority of students did not experience the harmful effects of the substances especially, petrol, latex (glue), hypnotics, morphine, cocaine and cannabis. This is in support of a previous study in Port Harcourt in which the students demonstrated poor knowledge of the adverse consequences of drug abuse. This may be attributed to inadequate drug education received by students and relative lack of appropriate information about drug abuse. Perceived harmfulness of alcohol and tobacco/cigarette by the students did not necessarily deter them from substance use. This finding is supported by results of some studies

Causes of psychoactive substance use

Substance use seems to be linked to many factors. Black and Matassarin-Jacobs (1993) explains the possible causes of substance use as the following factors. These factors are likely to coexist.

Biological Factors:

If parents have addiction struggles, chances are that the offspring of that family will be detectable to addiction. . Black and Matassarin-Jacobs (1993) refers to biologic theorist's speculation that substance dependent people may lack naturally occurring endorphins (chemicals in the brain) and, therefore take substances in a physiologic attempt to replace the missing chemicals. Probably this suggests interplay between personality features and genetic susceptibility in the individual response to the chemical substance family role models who drink excessively.

Behavioral Factors

Behaviourists believe that rewards or "pay off" from use reinforce the use of any given substance. Culturally, the acceptance of various substance influences levels of use, e.g. a

permissive attitude towards alcohol. Social acceptance of the offending substance is therefore a key issue in substance use (Mireku, 2002; Emenike and Ogbonna, 1995).

Occupational Factors

The occupation of the person (high-stress jobs) has a high incidence of substance use. Bar staff that has regular contact with alcohol and therefore predisposed to the use of alcohol.

Psychodynamic Factors

A number of psychological theories have attempted to explain how people become substance dependent. People who are alcoholic dependent have often been viewed as individuals who easily succumb to the escape provided by alcohol. Psychoanalytic theory describes people with alcohol dependency as having strong oral tendencies related to unresolved needs for early attachments (Frosch, 1985),

Peer Pressure

Peer pressure is huge and many people tend to indulge in activities that their peers are involved in so as to maintain the relationship.

Loneliness

People naturally want to feel good physically and emotionally and they resort to drug or illegal substances.

Personality Factors

Feelings of inferiority are said to be a feature. The inadequate personality use substances to achieve power in the form of disinhibition, to relieve tension and improve self-esteem.

Ironbar and Hooper (1993) argue that there is no one factor that predominates in the causation of substance use. But for each person there exists a complex interaction between themselves, those around them and the environment. It is in the light of this, that Kaltenbach and Finnegan (1997)

notes that paradigms shift began to occur in which a multifactor approach becomes acknowledged as the appropriate model.

Duxbury (1997) states that anyone can be at risk, however, some significant factors that appear to be influential other than those addressed above include factors such as the cost and availability of the substance (Awake!, 2005, Mireku, 2002 and Duxbury, 1997).

Pattern of Psychoactive Use/Abuse

Patterns of development of dependence and abuse are described. The first pattern is one of an individual whose physician originally prescribed the CNS depressants as treatment for anxiety or insomnia. Independently, the individual has increased the dosage or frequency from that which was prescribed. Use of the medication is justified on the basis of treating symptoms, but as tolerance grows more and more of the medication is required to produce the desired effect. Substance seeking behaviour is evident as the individual seeks prescriptions from several physicians in order to maintain sufficient supplies.

The second pattern, which the DSM-IV-TR reports is more frequent than the first, involves young people in their teens or early 20s who, in the company of their peers, use substances that were obtained illegally. The initial objective is to achieve feeling of euphoria. The drug is usually used intermittently during recreational gatherings. This pattern of intermittent use leads to regular use and extreme levels of tolerance. Combining use with other substance is not uncommon. Physical and psychological dependence leads to intense substance seeking behaviours, most often through illegal channels.

According to the Townsends (2006) There are many ways and patterns in which drug addicts or abusers used among them are smoking, injecting, huffing bagging and orally/chewing.

Smoking:

Drugs commonly used in this method are stimulants like cocaine. Cannabis like tetrahydrocannabinols, marijuana, hashish and hashish oil, hallucinogens, phencyclidine etc

Parenteral:

These include intra muscular and intra venouse injection. In intravenous usually veins in the antecubital space are used, but as vein membranes break down and sclerose other veins are selected for injection. The needles are frequently passed from one user to another. Infections including acquired immunodeficiency syndrome have been relatively common. Drugs commonly used in this way are heroine, morphine, amphetamine, phencyclidine, marijuana etc.

Huffing: Is a procedure in which a rag soaked with the substance is applied to the mouth and nose and the vapours breathed in. Substance used by these way are aerosol, propellants, fluorinated hydrocarbons, nitrous oxide(in deoderants and hair spray. Paint, cookware coating products). Solvents like gasoline, kerosene,nail polish remover, typewriter, correction fluid, cleaning solutions, lighter fluid. Paint. Paint thinner and glue. Inhalant substances are readily available, legal and inexpensive. These three factors make inhalants the drug of choice among poor people and among children and young adults. Use may begin by ages 9 to 12 and peak in the adolescent years; it is less common after age 35 (APA 2000).

Oral/Chewing

Example of substances that fall under this category are stimulants like amphetamine, dextroamphetamine, methamphetamine, caffeine and nicotine. Depressants like alcohol, diazepam (valium), chlordiazepoxide (librium). Cannabis like hashish and marijuana.

Bagging

Is another method of substance administration in which the substance is placed in a paper or plastic bag and inhaled from the bag by the user. They may also inhale directly from the container or sprayed in the mouth or nose example Solvents like gasoline, kerosene, nail polish remover, typewriter correction fluid, cleaning solutions, lighter fluid, paint, paint thinner and glue

Problem associated with psychoactive substance use.

The use of psychoactive substance has produced severe socio-political, economic and health-related problems, all over the world, especially in Nigeria. These problems are profound, pervasive and tragic. Mireku (2002), Duxbury (1997) and Imogie (1993), discuss the variety of effects of psychoactive substance use, vis-à-vis physical, physiological, psychosocial and psychiatric problems. Generally, the consequences of psychoactive substance use on both the individual and society can be examined under the following headings.

Psychological problems

Substance-related problems may be in various forms including, loss of control which may lead to helplessness, depression and sometimes suicide. Anxiety attack when not using drugs leading to relapse to relieve anxiety. Low self-esteem, feelings of inadequacy and poor motivation. Memory loss and disorientation following long or heavy drinking bouts. Psychosis presenting in

the form of delusion and hallucinations. Substance use, particularly in young individuals may precipitate the development of mental illness such as schizophrenia. Defensiveness about behaviour and often denial that there is a problem (defense mechanisms: denial and rationalization).

Behavioural and Social Problem

The behavioural and social course of psychoactive substance use includes difficulty maintaining successful relationships, which often leads to isolation, divorce and separation. Stigma may lead to further rejection and isolation. Loss of job, home and financial difficulties may occur. The user experience persistent drug use despite obvious personal, social and physical damage. The victim will find it difficult putting the needs of others before self. Disinhibition due to effects of drugs may feature. High-risk behaviours due to disinhibition, for example walking out in front of cars, unprotected sex, no sense of danger, believing one has powers such as being able to fly.

Physical Problems

The physical consequence of drug use include physical dependency leading to craving, tremor, sweats, agitation, anxiety, disorientation, psychosis, jitters, paranoia and panic attacks, withdrawal symptoms usually start 24-72 hours after cessation of substance use. The individual recovers from physical discomfort within 5-7 days; however, the following may be suffered; malnutrition due to poor appetite and gastro-intestinal problems: nausea, anaemia, weight loss, vitamin deficiency particularly vitamin B12. Approximately 10-15 % of people with alcohol problem develop cirrhosis of the liver due to toxic effects of alcohol. Pancreatitis and general

infections such as HIV/AIDS may also occur. Others may include blackouts, loss of consciousness and risk of death due to overdose of psychoactive substance.

Gambo (1995) states that drug addiction can lead to the committing of criminal offences. Since psychoactive substance addicts are always prepared to sustain their habit by all means. Some of them are often induced to getting involved in theft, burglary and robbery in order to obtain the needed money to procure the substance. Psychoactive substance addicts are also relatively prone to accidents on the highways while driving vehicles. Such accidents could involve other people and may lead to serious injuries and loss of property thus leading to great loss to the country.

The patterns of psychoactive substance use including a tendency among commercial motorcycle riders to take a variety of drugs simultaneously or in a sequence to obtain specific effects may become a feature. A pattern of use generally ranges from experimental to compulsive use. Although an individual may move back and forth among patterns, compulsive use is indicative of addiction and only abstinence or a drug-free status can break the pattern (Orth. Duphorne and Lisanti, 2000).

Effect of Substance Abuse

The effect of substance abuse is mainly to the individual family and the society as follows

The individual

People who use drugs experience a wide range of physical effects other than those expected (Ajzan, 2005). Most of the abused substances have after effects. For tobacco taken in cigarette

form, abusers are exposed to lung cancer and other chronic illnesses (WHO, 2009). For alcohol, abusers are exposed to liver cirrhosis, cancer and a host of other chronic illnesses (Saddock, 2009). Abstinence from certain drugs result in withdrawal syndrome. For example, heroin withdrawal syndrome causes vomiting, muscle cramps, convulsions and delirium. Sharing hypodermic needles used to inject some drugs dramatically increases the risk of contracting AIDS and some types of hepatitis (Atta, 2004).

Many drug users engage in criminal activities such as burglary and prostitution to raise money to buy drug (Rocha 2009).

The Family

According to the world Drug Report (2004), 20% of alcoholics face problems that affect their jobs and misuse of money as a result of alcohol consumption. According to Global Status Report on alcohol (2007), 55% of women in Nigeria face domestic violence from their husbands after taking alcohol (WHO, 2009). Most of the abusers (children) usually become drop-outs from school posing a problem to the family

The users pre-occupation with the substance, plus its effects on mood and performance can lead to marital problems and poor work performance or dismissal from the work (Ajzen, 2005). Violence, conflict, separation and divorce are common among females of alcoholics husband (World Drugs Report, 2004). Pregnant mother who uses drugs have much higher rate of low-birth weight babies than the average especially those who take cocaine and heroine.

The Society

Drug users are more likely than non users to have occupational hazards, accidents, endangering themselves and those around them (Fisher, 2008). Drug related crime can disrupt neighborhoods due to violence among drug dealers and pose threat to the residents and society at large (Fishers, 2008). Over half of the highway deaths are caused by alcohol (WHO, 2009). Majority of homeless people have either a drug or alcohol problem or a mental illness or in some cases have all three.

Risk Factors Associated with Substance Abuse

▪ Availability and encouragement

Advertising campaigns make the use of chemical substances appealing and socially acceptable.

- Sedatives and anti anxiety agents are prescribed excessively for a variety of reasons.

Adverse social conditions

- Poverty, unemployment, discrimination, homelessness, and lack of social and educational opportunities contribute to high rates of substance abuse.

Environmental or biologic factors

- Abuse patterns occur in families (e.g., heavy smoking and drinking).

Psychological influence

- Certain personality traits (e.g., low frustration tolerance, risk-taking behavior, impulsivity) may make the development of substance abuse more

likely.

Â Psychodynamic factors, such as anxiety or panic disorders mood disorders, and personality disorders, are linked with substance abuse.

Disabilities

- Physically disabled individuals have higher rates of alcoholism and problems with other substances.
- Many individuals with disabilities have low self-esteem, chronic medical problems, and high incidence of depression.

Developmental influence

- Individuals who sustain parental loss (through death, divorce, abandonment) may be predisposed to substance abuse problems.
- Children of substance-abusing parents are at greater risk for becoming substance abusers.

Cultural influence

- Cultural beliefs influence religious rituals and practices that support or inhibit substance use and abuse.
- Alcoholism is a major problem among Native-American and Alaskan Natives. Hispanics may also have high rates of alcohol abuse.
- Type of abuse varies with age, gender, and specific minority subgroup.

Addiction

Addiction describes that state when the person experiences severe psychological and behavioural dependence on drugs or alcohol with the tendency to increase its use psychoactive drugs are

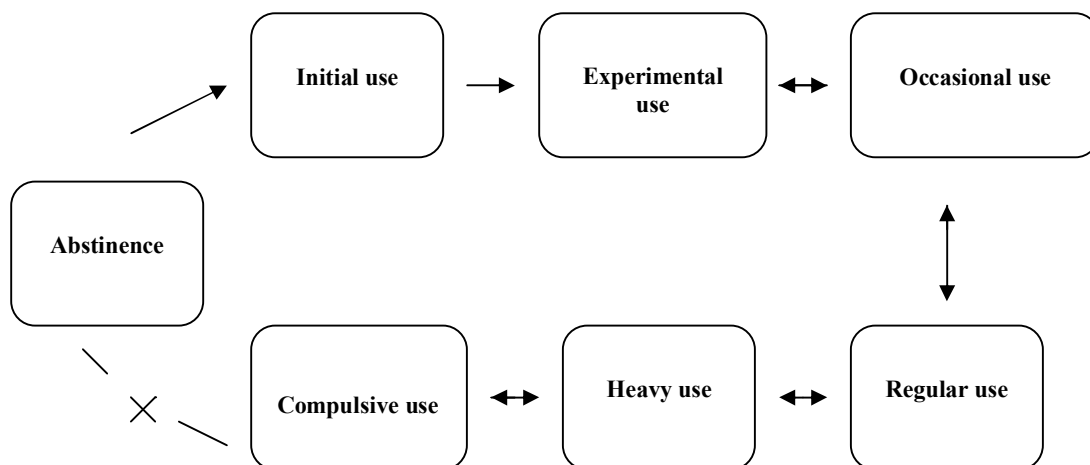
often associated with addiction. Addiction can be divided into two types: psychological addiction, by which a user feels compelled to use a drug despite negative physical or societal consequence, and physical dependence, by which a user must use a drug to avoid physically uncomfortable or even medically harmful withdrawal symptoms. (Lenhart, Amanda 2010) Not all drugs are physically addictive, but any activity that stimulates the brain's dopaminergic reward system typically, any pleasurable activity can lead to psychological addiction. Drugs that are most likely to cause addiction are drugs that directly stimulate the dopaminergic system, like cocaine and amphetamines. Drugs that only indirectly stimulate the dopaminergic system, such as psychedelics, are not as likely to be addictive. (Ksir, Oakley and Charles, 2002).

Common forms of rehabilitation include psychotherapy, support groups and pharmacotherapy, which uses psychoactive substances to reduce cravings and physiological withdrawal symptoms while a user is going through detox. Methadone, itself an opioid and a psychoactive substance, is a common treatment for heroin addiction, as is another opioid, buprenorphine.

According to Johnson (2010), physical dependence refers to a state resulting from chronic use of a drug that has produced tolerance and where negative physical symptoms of withdrawal result from abrupt discontinuation or dosage reduction. Physical dependence can develop from low-dose therapeutic use of certain medications such as benzodiazepines, opioids, antiepileptics and antidepressants, as well as misuse of recreational drugs such as alcohol, opioids and benzodiazepines. The higher the dose used, the greater the duration of use, and the earlier age use began are predictive of worsened physical dependence and thus more severe withdrawal syndromes. Acute withdrawal syndromes can last days, weeks or months, and protracted withdrawal syndrome, also known as "post-acute withdrawal syndrome" or "PAWS" - a low-

grade continuation of some of the symptoms of acute withdrawal, typically in a remitting-relapsing pattern, that often results in relapse into active addiction and prolonged disability of a degree to preclude the possibility of lawful employment - can last for months, years, or, in relatively common to extremely rare cases, depending on individual factors, indefinitely. Protracted withdrawal syndrome is noted to be most often caused by benzodiazepines, but is also present in a majority of cases of alcohol and opioid addiction, especially that of a long-term, high-dose, adolescent-beginning, or chronic-relapsing nature (viz. a second or third addiction after withdrawal from the self-same substance of dependence).

Withdrawal response will vary according to the dose used, the type of drug used, the duration of use, the age of the patient, the age of first use, and the individual person. (Ibogaine 2007)



The addictive cycle (Orth Duphorne and Lisanti, 2000).

Addictive cycle shows that step 1, the problem or need arouse stress or anxiety and is dealt with through substance use. Steps 2 through 4, the cycle of substance use, relief and recurring stress

or anxiety is repeated until psychologic dependence is established. Interrupting the cycle brings about anxiety but not physical symptoms. Steps 5 and 6, physiological dependence usually follows psychologic dependence. Withdrawal symptoms follow abstinence.

The above are by no means exhaustive and individual problems will exist in addition or isolation depending on so many factors. These include the individual circumstances, personality, coping resources, assistance available, type, and degree of substance use. Most victims will develop a mixture of both physical and mental health problems, as addiction is both relentless and all consuming, devouring those it develops and destroying the lives of those it meets.

Symptom of psychoactive substance dependence

Physical dependence can manifest itself in the appearance of both physical and psychological symptoms which are caused by physiological adaptations in the central nervous system and the brain due to chronic exposure to a substance. Symptoms which may be experienced during withdrawal or reduction in dosage include increased heart rate and or blood pressure, sweating, and tremors. More serious withdrawal symptoms such as confusion, seizures, and visual hallucinations indicate a serious emergency and the need for immediate medical care. Sedative hypnotic drugs such as alcohol, benzodiazepines, and barbiturates are the only commonly available substances that can be fatal in withdrawal due to their propensity to induce withdrawal convulsions. Abrupt withdrawal from other drugs, such as opioids can cause an extremely physiologically and psychologically painful withdrawal that is very rarely fatal in patients of general good health and with medical treatment, but is more often fatal in patients with

weakened cardiovascular systems; toxicity is generally caused by the often-extreme increases in heart rate and blood pressure (which can be treated with clonidine), or due to arrhythmia due to electrolyte imbalance caused by the inability to eat, and constant diarrhoea and vomiting. Treatment for physical dependence depends upon the drug being withdrawn and often includes administration of another drug, especially for substances that can be dangerous when abruptly discontinued. Physical dependence is usually managed by a slow dose reduction over a period of weeks, months or sometimes longer depending on the drug, dose and the individual.[Landry , Smith , McDuff and Baughman 1992). A physical dependence on alcohol is often managed with a cross tolerant drug, such as long acting benzodiazepines to manage the alcohol withdrawal symptoms.

Treatment Modalities of Psychoactive Substance Abuse

Treatment for substance abuse is critical for many around the world. Often a formal intervention is necessary to convince the substance abuser to submit to any form of treatment. Behavioral interventions and medications exist that have helped many people reduce, or discontinue, their substance abuse.

Psychological treatment

From the applied behavior analysis literature, behavioral psychology, and from randomized clinical trials, several evidenced based interventions have emerged: behavioral marital therapy, motivational Interviewing, community reinforcement approach, exposure therapy, contingency management.

In children and adolescents, cognitive behavioural therapy (CBT) and family therapy currently have the most research evidence for the treatment of substance abuse problems. These treatments can be administered in a variety of different formats, each of which has varying levels of research support (Jhonson, 2002). Social skills are significantly impaired in people suffering from alcoholism due to the neurotoxic effects of alcohol on the brain, especially the prefrontal cortex area of the brain. It has been suggested that social skills training adjunctive to inpatient treatment of alcohol dependence is probably efficacious, including managing the social environment (Ibogaine, 2007).

Medical Treatment

Pharmacological therapy - A number of medications have been approved for the treatment of substance abuse. These include replacement therapies such as **buprenorphine** and **methadone** (Buprenorphine is a semi-synthetic opioid that is used to treat opioid addiction in higher dosages (>2 mg), to control moderate acute pain in non-opioid-tolerant individuals in lower dosages (~200 µg), and to control moderate chronic pain in dosages ranging from 20 to 70 µg/hour. It is available in a variety of formulations: Subutex, Suboxone (buprenorphine HCl and naloxone HCl; typically used for opioid addiction), Temgesic (sublingual tablets for moderate to severe pain), Buprenex (solutions for injection often used for acute pain in primary-care settings), Norspan and Butrans (transdermal preparations used for chronic pain (**Methadone** also known as Symoron, Dolophine, Amidone, Methadose, Physeptone, Heptadon and many other names is a synthetic opioid. It is used medically as an analgesic and a maintenance anti-addictive and reductive preparation for use by patients with opioid dependency) as well as antagonist medications like **disulfiram** and **naltrexone** in either short acting, or the newer long acting form.

Several other medications, often ones originally used in other contexts, have also been shown to be effective including **bupropion** (Bupropion is a drug that is primarily used as an atypical antidepressant and smoking cessation aid. Marketed as Wellbutrin, Budeprion, Prexaton, Elontril, Aplenzin, or other trade names, it is one of the most frequently prescribed antidepressants in the United States. Marketed in lower-dose formulations as Zyban, Voxra, or other names, it is also widely used to reduce nicotine cravings by people who are trying to quit smoking. It is taken in the form of pills, and in the United States is available only by prescription) and **modafinil** (is a wakefulness-promoting drug that is approved by the United States' Food and Drug Administration (FDA) for the treatment of narcolepsy, shift work sleep disorder and excessive daytime sleepiness associated with obstructive sleep apnea).(Maglione, Maher, Wang, Shanman, Shekelle, Roth, et al (2011).

Prevention of Drug Abuse

Level of Prevention	Action
Primary Prevention	Teaching and counselling of non users and occasional users. Education on immediate effects of substances on body, long term negative outcomes, effects of Experimental and continued use. Adolescents and Young adults are target groups.
Secondary Prevention	Education, case finding, early detection. Detection through health screening clinics. Intervention through peer or employee assistance programs Support and teach substance-free alternatives and

Stress management techniques.

Tertiary Prevention Engaging and motivating in treatment. Education regarding relapsed, identification of precipitating factors, higher risk situations, triggers of use. Referral to treatment, support groups, relapse prevention programme.

Laws and policies on psychoactive substance use

Evans (2001) identifies the Medicine Act 1968 and the Misuse of Drugs Act 1971 as acts that control the manufacture, supply and use of drugs. Part 3 of Medicine act broadly classify drugs into three: Prescription-only Medicines (POM), Pharmacy medicine (P) and General Sales List medicines (GSL). Different legal requirements apply to the sale, supply and labelling of each class. The Misuse of Drugs Act designates and defines as controlled drugs a number of ñdangerous or otherwise harmfulò substances. These substances are all also by definition POM under the Medicines Act. The main purpose of the misuse of Drugs Act is to prevent abuse of controlled drugs e.g. cocaine, amphetamine and morphine. An exception to the restriction is in accordance with various regulations made under the Act such as prescribing the drugs to addicts for the treatment of their addiction.

According to Annual report of NDLEA (2010) the Agency arrested 6,788 suspected drug offenders, made up of 6,296 male and 492 female offenders. The total quantity of drugs seized stood at 178,120.73 kilogrammes. Like the previous years, cannabis seizure maintained the lead. A total of 174,661.59 kilogrammes of the illicit drug crop was seized. Psychotropic substances

followed with 2,550.662 kilogrammes while heroin is 202.08 kilogrammes. However, in 2009, a total of 7,042 suspected drug offenders were arrested and 115,910.24 kilogrammes of illicit drugs were seized. This figure is made up of 6,700 male and 342 female suspects. Seizures of cannabis amounted to 114,700.71 kilogrammes. Psychotropic substances are 712.77 kilogrammes while cocaine and heroin were 392.05 kilogrammes and 104.71 kilogrammes, respectively.

There is also noticeable increase in the quantity of cannabis sativa seized in 2010 as compared to the figure in 2009. About 174,661.59kgs cannabis sativa was seized in 2010 as compared to 114,700.71kgs in 2009. This represents an increase of about 34.33%. This increase may be adduced from the fact that the Agency destroyed more cannabis farmlands in 2009 than in 2010. In 2009 the Agency took the war directly to the farms under operations Burn the Weeds (OBW), resulting in the destruction of 924.38 hectares of cannabis plantations nationwide while in 2010 593.22 hectares of cannabis plantations were destroyed. It is worthy of note that cannabis farm operations are not easy. They are hazardous and cumbersome as the farms are located in very remote forests.

An appreciable increase was noticed in the quantity of cocaine and heroin seizures. The sea ports especially the Tin-can Island Port, is becoming notorious for illicit trafficking of these substances. In the year under review, about 450.4kgs and 138.73kgs of cocaine and heroin respectively were seized at this port. The number of females getting involved in this illicit business is also on the increase since 2008. One other indicator of the Agency's operational

effectiveness is the increasing price of drugs at every point in time due mainly to scarcity induced by continued active operation all around the country.

NDLEA 2010 Annual Report

This record revealed that Kano state led in arrests with 638 suspects. Katsina was next with 411 suspects, Rivers 347, Anambra 280 and Edo 280 suspects. However, more drug seizures were made in the Southern States. Ondo State tops the list with 67,979.8 kilogrammes of illicit drugs. Edo state was next with 39,501.597 kilogrammes, Delta 10,096.548 kilogrammes as indicated in Appendix II

Senior Secondary school Students

Are students in the second phase of secondary education of 6-3-3-4 education system in Nigeria, who finish primary school. This stage of growth and development is called adolescence period which is between 15 to 20 according to Redmond (2008)

The onset of puberty marks the beginning of adolescence. Physical growth and development, including sexual maturation, is an important part of adolescence. But this period of life is also shaped by other changes: entry into secondary schools that are larger and more impersonal than elementary schools, peer groups that include older children, and greater independence in extracurricular activities. Adolescents achieve new cognitive skills permitting highly abstract thinking, engage in new kinds of social intimacy with peers, and embark on a search for identity that result in greater awareness of the self. Developmental scientists believe, however, that one's behavior and personality as an adult are inevitably determined by earlier influences. Childhood

sets the stage, but a person's traits may be changed by subsequent events and experiences (Redmond 2008)

Concept of Adolescence

Multiple definitions of adolescence exist in scholarly works, some researchers distinguish different stages of adolescence – early (ages 10-13), middle (ages 14-17), and late (ages 18-20s). Smetana, Camp, Lonsbury-Barr, and Metzger (2006) offer a summary of adolescence as a transitional time period. They suggest, "Adolescence begins in biology and ends in culture, because the transition into adolescence is marked by the dramatic biological changes of puberty, while the transition to adulthood is less clearly marked. During adolescence there is complex interplay between biology and culture. As a result, the transition from childhood to adulthood is multifaceted, and sometimes challenging.

Adolescence (from Latin: *adolescere* meaning "to grow up") is a transitional stage of physical and psychological human development that generally occurs during the period from puberty to legal adulthood (age of majority). The period of adolescence is most closely associated with the teenage years, though its physical, psychological and cultural expressions may begin earlier and end later. For example, although puberty has been historically associated with the onset of adolescent development, it now typically begins prior to the teenage years and there has been a normative shift of it occurring in preadolescence, particularly in females. (Steinberg 2011) Physical growth, as distinct from puberty (particularly in males), and cognitive development generally seen in adolescence, can also extend into the early twenties. Thus chronological age provides only a rough marker of adolescence, and scholars have found it difficult to agree upon a

precise definition of adolescence. According to Steinberg (2011) thorough understanding of adolescence in society depends on information from various perspectives, most importantly from the areas of psychology, biology, history, sociology, education, and anthropology. Within all of these perspectives, adolescence is viewed as a transitional period between childhood and adulthood, whose cultural purpose is the preparation of children for adult roles. According to Viner (2005). It is a period of multiple transitions involving education, training, employment and unemployment, as well as transitions from one living circumstance to another. The end of adolescence and the beginning of adulthood varies by country and by function, and furthermore even within a single nation state or culture there can be different ages at which an individual is considered (chronologically and legally) mature enough for society to entrust them with certain privileges and responsibilities. Such milestones include driving a vehicle, having legal sexual relations, serving in the armed forces or on a jury, purchasing and drinking alcohol, voting, entering into contracts, finishing certain levels of education, and marriage. Adolescence is usually accompanied by an increased independence allowed by the parents or legal guardians and less supervision as compared to preadolescence.

In popular culture, adolescent characteristics are attributed to physical changes and what is called raging hormones. (Dorn and Biro, 2011) adolescence can be defined biologically, as the physical transition marked by the onset of puberty and the termination of physical growth; cognitively, as changes in the ability to think abstractly and multi-dimensionally; or socially, as a period of preparation for adult roles. Major pubertal and biological changes include changes to the sex organs, height, weight, and muscle mass, as well as major changes in brain structure and organization. Cognitive advances encompass both increases in knowledge and in the ability to think abstractly and to reason more effectively. The study of adolescent development often

involves interdisciplinary collaborations. For example, researchers in neuroscience or bio-behavioral health might focus on pubertal changes in brain structure and its effects on cognition or social relations. Sociologists interested in adolescence might focus on the acquisition of social roles (e.g., worker or romantic partner) and how this varies across cultures or social conditions. Developmental psychologists might focus on changes in relations with parents and peers as a function of school structure and pubertal status.

Characteristics of Adolescence

The adolescent growth spurt is a rapid increase in the individual's height and weight during puberty resulting from the simultaneous release of growth hormones, thyroid hormones, and androgens. (Steinberg 2008) Males experience their growth spurt about two years later, on average, than females. During their peak height velocity (the time of most rapid growth), adolescents grow at a growth rate nearly identical to that of a toddler—about 4 inches (10.3 cm) a year for males and 3.5 inches (9 cm) for females. In addition to changes in height, adolescents also experience a significant increase in weight (Marshall, 1978). The weight gained during adolescence constitutes nearly half of one's adult body weight. Teenage and early adult males may continue to gain natural muscle growth even after puberty. The accelerated growth in different body parts happens at different times, but for all adolescents it has a fairly regular sequence. The first places to grow are the extremities—the head, hands and feet—followed by the arms and legs, then the torso and shoulders. (Steinberg 2008) This non-uniform growth is one reason why an adolescent body may seem out of proportion. During puberty, bones become harder and more brittle. At the conclusion of puberty, the ends of the long bones close during the process called epiphysis. There can be ethnic differences in these skeletal changes. For example,

in the United States of America, bone density increases significantly more among black than white adolescents, which might account for decreased likelihood of black women developing osteoporosis and having fewer bone fractures there(Steinberg 2011). Another set of significant physical changes during puberty happen in bodily distribution of fat and muscle. This process is different for females and males. Before puberty, there are nearly no sex differences in fat and muscle distribution; during puberty, boys grow muscle much faster than girls, although both sexes experience rapid muscle development. In contrast, though both sexes experience an increase in body fat, the increase much more significant for girls. Frequently, the increase in fat for girls happens in their years just before puberty. The ratio between muscle and fat among post-pubertal boys is around three to one, while for girls it is about five to four. This may help explain sex differences in athletic performance. Pubertal development also affects circulatory and respiratory systems as an adolescents' heart and lungs increase in both size and capacity. These changes lead to increased strength and tolerance for exercise. Sex differences are apparent as males tend to develop "larger hearts and lungs, higher systolic blood pressure, a lower resting heart rate, a greater capacity for carrying oxygen to the blood, a greater power for neutralizing the chemical products of muscular exercise, higher blood hemoglobin and more red blood cells. (Stenberg 2011) Despite some genetic sex differences, environmental factors play a large role in biological changes during adolescence. For example, girls tend to reduce their physical activity in preadolescence and may receive inadequate nutrition from diets that often lack important nutrients, such as iron. These environmental influences in turn affect female physical development (Steinberg 2011)

Factors influencing adolescence behaviour

The life task of family, friends and community is an evolving one. That is, when a child is preadolescent, his community and friends are severely limited, the family being the center of his life. In adolescence, the movement is essentially one from major emphasis and influences of family to greater influence and emphasis of friends and movement into the greater community (Manaster, 1977).

The nature of the situation or what we called the situational element for this life task may therefore be broken down into these three major areas: the relationship and the relative influence of family; the relationship and relative influence of peers as individuals and groups; and lastly the movement participation with large groups, small groups, and intimate friends, i.e., being integrated as a member of the total community.

Family Influence on adolescence

Parents remain central in the expanding social world of middle childhood. Although it is common to view peers as replacing parents in importance to older children, parents continue to support their children's self-esteem, define and reinforce values, promote academic success, enable participation in neighbourhood and community activities, and offer a sensitive ear and perceptive judgment. They are reliable cheerleaders as their children face the challenges of middle childhood and adolescence. It has been observed that much of substance use among youths take place in schools. The incidence of substance use among students is high. It has been suggested that drug and alcohol use during adolescence is almost always a social experience and a learned behaviour. Miller (2003) reported that environmental variables such as curiosity and

experimentation may be important factors for substance use among male adolescents while in females, such determinations are more likely to be emotional and psychodynamic in nature.

Family factors have been shown to significantly influence the course of adolescent substance use or non-use while substance use by parents may serve to influence adolescent substance use, peer influence has been found in some studies to be an important determinant in adolescent substance use, although there could be a synergistic effect. Students many of whom are still in their formative years (transition to adulthood) and a period of experimental exploration and curiosity are particularly prone to the many disruptive effects (physical and psychosocial) of drug and alcohol abuse. It is essential to develop educational strategies and materials for drug and alcohol use prevention programmes for this very important high risk group. School population studies are important for the understanding of the factors associated with substance use in the adolescent population

Adolescence marks a rapid change in one's role within a family. Young children tend to assert themselves forcefully, but are unable to demonstrate much influence over family decisions until early adolescence when they are increasingly viewed by parents as equals. When children go through puberty, there is often a significant increase in parent-child conflict and a less cohesive familial bond. Arguments often concern minor issues of control, such as curfew, acceptable clothing, and the adolescent's right to privacy, which adolescents may have previously viewed as issues over which their parents had complete authority. Parent-adolescent disagreement also increases as friends demonstrate a greater impact on one another, new influences on the adolescent that may be in opposition to parents' values. Social media has also played an increasing role in adolescent and parent disagreements. While parents never had to worry about

the threats of social media in the past, it has become a dangerous place for children. While adolescents strive for their freedoms, the unknowns to parents of what their child is doing on social media sites is a challenging subject, due to the increasing amount of predators on social media sites. Many parents have very little knowledge of social networking sites in the first place and this further increases their mistrust. Although conflicts between children and parents increase during adolescence, these are just relatively minor issues. Regarding their important life issues, most adolescents still share the same attitudes and values as their parents. (Silverd, 2012).

During childhood, siblings are a source of conflict and frustration as well as a support system. Adolescence may affect this relationship differently, depending on sibling gender. In same-sex sibling pairs, intimacy increases during early adolescence, then remains stable. Mixed-sex siblings pairs act differently; siblings drift apart during early adolescent years, but experience an increase in intimacy starting at middle adolescence. Sibling interactions are children's first relational experiences, the ones that shape their social and self-understanding for life. (Steinberg 2011) Sustaining positive sibling relations can assist adolescents in a number of ways. Siblings are able to act as peers, and may increase one another's sociability and feelings of self-worth. Older siblings can give guidance to younger siblings, although the impact of this can be either positive or negative depending on the activity of the older sibling.

A potential important influence on adolescence is change of the family dynamic, specifically divorce. With the divorce rate up to about 50%, divorce is common and adds to the already great amount of change in adolescence. Custody disputes soon after a divorce often reflect a playing out of control battles and ambivalence between parents. In extreme cases of instability and abuse

in homes, divorce can have a positive effect on families due to less conflict in the home. However, most research suggests a negative effect on adolescence as well as later development. A recent study found that, compared with peers who grow up in stable post-divorce families, children of divorce who experience additional family transitions during late adolescence, make less progress in their math and social studies performance over time. Another recent study put forth a new theory entitled the adolescent epistemological trauma theory, which posited that traumatic life events such as parental divorce during the formative period of late adolescence portend lifelong effects on adult conflict behavior that can be mitigated by effective behavioral assessment and training. A parental divorce during childhood or adolescence continues to have a negative effect when a person is in his or her twenties and early thirties. These negative effects include romantic relationships and conflict style, meaning as adults, they are more likely to use the styles of avoidance and competing in conflict management.

Despite changing family roles during adolescence, the home environment and parents are still important for the behaviors and choices of adolescents. (Dorn and Biro 2001) Adolescents who have a good relationship with their parents are less likely to engage in various risk behaviors, such as smoking, drinking, fighting, and/or unprotected sexual intercourse. In addition, parents influence the education of adolescence. A study conducted by Adalbjarnardottir and Blondal (2009) showed that adolescents at the age of 14 who identify their parents as authoritative figures are more likely to complete secondary education by the age of 22 as support and encouragement from an authoritative parent motivates the adolescence to complete schooling to avoid disappointing that parent.

Peer Influence on Adolescence

Peer groups are essential to social and general development. High quality friendships may enhance children's development regardless of the characteristics of those friends. As children begin to gain bonds with various people and create friendships with them, it later helps them when they are adolescent. This sets up the framework for adolescence and peer groups are especially important during adolescence, a period of development characterized by a dramatic increase in time spent with peers and a decrease in adult supervision. Steinber (2011) Adolescents also associate with friends of the opposite sex much more than in childhood and tend to identify with larger groups of peers based on shared characteristics. It is also common for adolescents to use friends as coping devices in different situations. Viner (2005) A three factor structure of dealing with friends including avoidance, mastery, and nonchalance has shown that adolescent's use friends as coping devices with social stresses.

Peer groups offer members the opportunity to develop social skills such as empathy, sharing, and leadership. Peer groups can have positive influences on an individual, such as on academic motivation and performance. But they can also have negative influences, like encouraging experimentation with drugs, drinking, vandalism, and stealing through peer pressure. Susceptibility to peer pressure increases during early adolescence, peaks around age 14, and declines thereafter. (Cooney, 2010).

During early adolescence, adolescents often associate in cliques, exclusive, single-sex groups of peers with whom they are particularly close. Despite the common notion that cliques are an inherently negative influence, they may help adolescents become socially acclimated and form a stronger sense of identity. Within a clique of highly athletic male-peers, for example, the clique

may create a stronger sense of fidelity and competition. Cliques also have become somewhat as a "collective parent," i.e. telling the adolescents what to do and not to do. Steinberg (2011) towards late adolescence, cliques often merge into mixed-sex groups as teenagers begin romantically engaging with one another. These small friend groups break down even further as socialization becomes more couple-oriented.

While peers may facilitate social development for one another, they may also hinder it. In Spanish teenagers, emotional (rather than solution-based) reaction to problems and emotional instability has been linked with physical aggression against peers. Chen, Suyen, fuyang, Chih (2009) both physical and relational aggression are linked to a vast number of enduring psychological difficulties, especially depression, as is social rejection. Because of this, bullied adolescents often develop problems that lead to further victimization. Bullied adolescents are both more likely to continue to be bullied and more likely to bully others in the future. Chen, Suyen, fuyang, Chih (2009). On a larger scale, adolescents often associate with crowds, groups of individuals who share a common interest or activity. Often, crowd identities may be the basis for stereotyping young people, such as jocks or nerds. In large, multi-ethnic high schools, there are often ethnically-determined crowds as well. While crowds are very influential during early and middle adolescence, they lose salience during high school as students identify more individually Alcohol and illicit drug use (Green 2006).

Social Influence on Adolescence

Social acceptance and social norms gain a significantly greater hand in directing behavior at the onset of adolescence; as such, the alcohol and illegal drug habits of teens tend to be shaped largely by the substance use of friends and other classmates. In fact, studies suggest that more

significantly than actual drug norms, an individual's perception of the illicit drug use by friends and peers is highly associated with his or her own habits in substance use during both middle and high school, a relationship that increases in strength over time. Ferguson and Winegard (2011). Whereas social influences on alcohol use and marijuana use tend to work directly in the short term, peer and friend norms on smoking cigarettes in middle school have a profound effect on one's own likelihood to smoke cigarettes well into high school Leinhardt (2007).

Environmental Influence on Adolescence

Within the past ten years, the amount of social networking sites available to the public has greatly increased as well as the number of adolescents using them. Several sources report a high proportion of adolescents who use social media: 73% of 12-17 year olds reported having at least one social networking profile (Silver 2012). Two-thirds (68%) of teens text every day, half (51%) visit social networking sites daily, and 11% send or receive tweets at least once every day. In fact, more than a third (34%) of teens visit their main social networking site several times a day. One in four (23%) teens are "heavy" social media users, meaning they use at least two different types of social media each and every day. (Ferguson and Winegard, 2011). Although research has been inconclusive, some findings have indicated that electronic communication negatively affects adolescents' social development, replaces face-to-face communication, impairs their social skills, and can sometimes lead to unsafe interaction with strangers. Studies have shown differences in the ways the internet negatively impacts the adolescents' social functioning. Online socializing tends to make girls particularly vulnerable, while socializing in Internet cafés seems only to affect boys academic achievement. However, other research suggests that Internet communication brings friends closer and is beneficial for socially anxious teens, who find it easier to interact socially online. Chen, Suyen, Fuyang, Chih (2009). The more conclusive

finding has been that Internet use has a negative effect on the physical health of adolescents, as time spent using the Internet replaces time doing physical activities. However, the Internet can be significantly useful in educating teens because of the access they have to information on many various topics.

Media profusion and influence on adolescence

Exposure to media has increased over the past decade; adolescents' utilization of computers, cell phones, stereos and televisions to gain access to various mediums of popular culture has also increased. Almost all American households have at least one television, more than three-quarters of all adolescents' homes have access to the Internet, and more than 90% of American adolescents use the Internet at least occasionally. As a result of the amount of time adolescents spend using these devices, their total media exposure is high. In the last decade, the amount of time that adolescents spend on the computer has greatly increased (Andrew, 2012). Online activities with the highest rates of use among adolescents are video games (78% of adolescents), email (73%), instant messaging (68%), social networking sites (65%), news sources (63%), music (59%), and videos (57%)

Prevalence of psychoactive substance use among senior secondary school students

Following a steady decline beginning in the late 1990s up through the mid-2000s, illicit drug use among adolescents has been on the rise in the U.S. Aside from alcohol, marijuana is the most commonly indulged drug habit during adolescent years. Data collected by the National Institute on Drug Abuse shows that between the years of 2007 and 2011, marijuana use grew from 5.7% to 7.2% among 8th grade students; among 10th grade students, from 14.2% to 17.6%; and among

12th graders, from 18.8% to 22.6%. Additionally, recent years have seen a surge in popularity of Marijuana; between 2010 and 2011, the use of marijuana increased from 1.4% to 2.3% among high school seniors. Chen, Suyen, fuyang, Chih (2009). One significant contribution to the increase in teenage substance abuse is an increase in the availability of prescription medication. With an increase in the diagnosis of behavioral and attentional disorders for students, taking pharmaceutical drugs such as Vicodin and Adderall for pleasure has become a prevalent activity among adolescents: 15.2% of high school seniors report having abused prescription drugs within the past year. Chen, Suyen, fuyang, Chih (2009). Out of a polled body of students, 4.4% of 8th graders reported having been on at least one occasion been drunk within the previous month; for 10th graders, the number was 13.7%, and for 12th graders, 25%. Chen, Suyen, fuyang, Chih (2009). More drastically, cigarette smoking has become a far less prevalent activity among American middle- and high-school students; in fact, a greater number of teens now smoke marijuana than smoke cigarettes, with one recent study showing a respective 15.2% versus 11.7% of surveyed students. Chen, Suyen, fuyang, Chih (2009). Different drug habits often relate to one another in a highly significant manner. It has been demonstrated that adolescents who drink at least to some degree may be as much as sixteen times more likely than non-drinkers to experiment with illicit drugs

At the decision making point of their lives, youth are susceptible to drug addiction, sexual abuse, peer pressure, violent crimes and other illegal activities. Developmental Intervention Science (DIS) is a fusion of the literature of both developmental and intervention sciences. This association conducts youth interventions that mutually assist both the needs of the community as well as psychologically stranded youth by focusing on risky and inappropriate behaviors while

promoting positive self-development along with self-esteem among young adults. (Hindustan 2008)

Review of Related Theories

This section would cover the following Theories, namely, Social learning theory and peer cluster theory and.

Social learning theory

Social learning theory by Bandura (1977) suggests that drug use may be viewed as a socially acquired behavior that is initiated and reinforced by drug-using friends. Principles for this theory include: (1) the relationship between positive and negative reinforcement influencing behavior, (2) the importance of repeating behaviors through imitation and modeling, and (3) the importance of norms, attitudes, and orientations of socially significant groups such as peers, family, and schools. According to Akers, Krohn, Lanza-Kaduce, and Radosevich (1979), the probability of abstinence decreases and the frequency of use increases when there is greater exposure to using rather than to abstinent models.

Application of Social Learning Theory

In an effort to explain drug and drinking behaviour using the social learning theory framework, Akers (1979) collected data from 3,065 students using a self-report questionnaire. Approximately five percent of this sample was interviewed individually between two and eight weeks after the questionnaire was administered. Results indicate that friends provide social reinforcement or punishment for abstinence or use, provide normative definitions of use and

abstinence, and, to a lesser extent, serve as admired models to imitate. This study suggests that adolescent drinking behavior may be modified by nondrinking, as well as, drinking peers. Supported by the National Institute of Justice, Winfree and Bernat (1998) evaluated the ability of social learning theory and control theory to predict substance abuse. Data were collected from the National Evaluation of the Gang Resistance Education and Training program (Esbensen, 1995) which surveyed all eighth graders in eleven localities. Winfree and Bernat based their analysis on two very different school districts included in this program: Las Cruces, New Mexico, and Phoenix, Arizona. Their results indicate that both theories predict substance use and that the differential definitions (i.e. what behaviours and attitudes are acceptable to the group) for both school districts predicted substance use. This study suggests that reinforcing positive attitudes and behaviours of the peer group may influence substance use. Using social learning theory, peer relationship may be examined in terms of the attention, retention, reproduction, motivation, and self-regulation (Bandura, 1986). Who are the attention-getters and what draws attention to them? Does repeated exposure aid in retention of the behaviors? What are the positive and negative reinforcers affecting the behavior? What are the underlying norms and values of the group influencing the behavior?

Peer cluster theory

Peer Cluster theory by Oetting and Beauvais, 1986; Swaim, 1998; Oetting, Edwards, Kelly, & Beauvais, 1997. Stressing the importance of peer relationships, the peer cluster theory suggests that peers have a direct influence of adolescent drug use. The following studies suggest that associating with a drug-using peer group would encourage drug use and strengthen the bonds within that group but that other pro social groups, such as schools, could influence non-drug

using behaviour. After identifying a range of psycho-social characteristics related to drug involvement through drug surveys and finding that the highest positive correlations were with peer encouragement to use drugs and the highest negative correlations were with peer sanctions against using drugs, Oetting and Beauvais (1986) developed the peer cluster theory. This theory suggests that small, identifiable peer clusters determine where, when, and how drugs are used and that these clusters specifically help shape attitudes and beliefs about drugs. Unlike peer pressure, all members of peer clusters influence the behavior of the group rather than acting as a passive member of the group. Emphasizing the importance of attachment to the group, associating with deviant peers would likely lead to deviant behaviors. Alternatively, attachment to non deviant peers would lead to non deviant behaviors (Swaim, 1998). Other factors such as family, church, and school primarily affect drug use by indirectly influencing the type of peer cluster formed (Edwards, 1994). The strong connections between the family and school which support prosocial norms and behaviours toward drinking can help to build friendships among young people who share those positive norms and ideals (Oetting, Edwards, Kelly, & Beauvais, 1997). This theory seeks to explain substance use by emphasizing the important connections between adolescents and peer clusters.

Application of peer Cluster Theory to present research

A new psychosocial model, peer cluster theory, suggests that the socialization factors that accompany adolescent development interact to produce peer clusters that encourage drug involvement or provide sanctions against drug use. These peer clusters are small, very cohesive groupings that shape a great deal of adolescent behavior, including drug use. Peer cluster theory

suggests that other socialization variables, strength of the family, family sanctions against drug use, religious identification, and school adjustment influence drug use only indirectly, through their effect on peer clusters. Correlations of these socialization variables with drug use confirm the importance of socialization characteristics as underlying factors in drug use and also confirm that other socialization factors influence drug use through their effect on peer drug associations. Peer cluster theory suggests that treatment of the drug-abusing youth must alter the influence of the peer cluster or it is likely to fail. Prevention programs aimed at the family, school, or religion must also influence peer clusters, or drug use will probably not be reduced. (Redmond, 2012)

Review of empirical studies

In a survey conducted by Kwada (2007), it was found that 43% of secondary school students in northern Kaduna used illegal drugs at least once in their life and over 80% of senior secondary schools students in Kafanchan have used drugs and alcohol. These findings show that majority of secondary school students use psychoactive drugs without reaching age of 21 years.

Similar studies were carried out by Effanga (2003) on incidence of drug/substance abuse and behavioral pattern of youths in Calabar South Local Government Area Secondary School. The survey of drug/substance abuse was based on a sample of 200 students in their fifth and final year in the three secondary schools which were a single gender school and two mixed schools. The survey was conducted by means of a self-respond drug-use questionnaire. There were 100 males and 100 female respondents. Their age was between 13 to 19 years and majority 81 (40 to 50 percent) of them were from low socio economic level while 50(25 percent) and 69(34.50) were from high and average socio-economic levels. The main finding revealed that more boys

(93) admitted that they are involved in drug abuse than the girls (88). Also socio-economic status of students has no significant influence on students rate of drug abuse. The finding also reveals that there is a significant relationship between a student's sex and the consumption level of drug. That being girl or a boy can determine the level of which one may be involved in drug abuse. The result shows that more boys (93) admitted that they are involved in drug abuse than the girls (88). Also analysis shows that alcohol cocaine and cannabis were discovered to be more influential in the behaviour of the youth than other drugs. This was evident in the significance of the result between coffee and alcohol, kolanut and alcohol, coffee and cocaine, coffee and cannabis, kolanut and cannabis, kolanut and cocaine, cigarette and alcohol, cigarette and cannabis.

In another study of use of psychoactive substances among secondary school students in two local Government areas of Akwa Ibom State Nigeria by Abasiobong , Atting , Bassey , and Ekott, (2005). Four hundred secondary school students from two local Government Area were assessed for use of psychoactive substances during the second term of 2004/2005 school session, using a youth survey questionnaire. Result shows that more student from Uyo 37(31.1%) used kola nuts, 54(45.4%) sedative while more students from Eket, 47(34.8%) used tobacco cigrattes, 76(56.3%) alcohol, 25(15.6%) Indian hemp,5(3.7%) cocaine and 1(0.7%) heroine. The findings of this study confirm the presence and use of psychoactive substances in varying proportions among students.

In other studies of psychoactive substance use among school adolescents in Zaria, northern Nigeria what are the triggers by Idris and Sambo(2005). The study was cross sectional descriptive in designed. A multi stage sampling technique was used to interview 280 respondents

using administered structured and pretested questionnaires. Data was analyzed manually and chi square tests statistics was used. The result shows that 157(56%) use one or more substance or the other. The commonest push factor is to experiment. (54%) also show statistically significant relationship between family background and psychoactive used.

In another study carried out by Azaiza, Shoham , Bar-Ham, Burger, Abu-Ash of school of social work, the university of Haifa. Mount camel, Haifa Israel in (2008) to find out Substance Use among Druze adolescent in Isreal: Identifying predictor and patterns of use. Participants were sampled using a cluster method 900 participants from 15 schools in northern Israel completed self report questionnaire assessing substance use and other variables. The result indicates that 20% consumed alcohol in the past year and 10% uses illegal substances of various types. Also male students had much higher use rates than females students. Low religiosity was related to higher level of use. These findings provide an indication of the extent of substance use among Druze secondary Students.

In similar studies conducted by Eneh and Stanley (2004) on pattern of substance use among secondary school students in Rivers State using a total of 1049 students in the survey. There were 600 (57.2%) males and 449 (42.8%) females giving a male/female ration of 1.3:1. One thousand and eighteen (67%) had used at least one of the substances. The age range most frequently represented was the 10-14 years, (51.2%). The commonly used drugs were alcohol, kolanut, tobacco/cigarettes, in order of decreasing frequency 651 (65%), 611 (63.1%) and 595 (61%). The least used was cocaine 45 (4.3%) while no student used any hallucinogen. There were significant sex differences in the use of morphine, petrol, latex (glue) and cocaine. They

were used by boys only. Cannabis, kolanut and tobacco were also significantly more commonly used by boys 289 (98%), 501 (81%) and 398 (66%). The commonly used drugs among females were alcohol and hypnosedatives 300(46%) and 117 (46%) respectively. The use of cocaine, petrol/latex (glue), cannabis, morphine/ pethidine and hypno-sedative were more likely to have commenced in the secondary schools than the use of kolanut and alcohol which started earlier in life due to parental and cultural influences. The common reasons were to relieve stress, feel good and parental influence in decreasing frequency. The least was to sleep. Among those that used alcohol, the common reasons for the use of alcohol were to relieve stress 651 (100%), to feel good 549 (84.3%), parental influence 492 (75.5%) and availability 390 (59.9%). The various reasons for using kolanuts were to keep awake 581 (95.1%), parental influence 494 (80.9%), and availability 388 (63.5%). Kolanut was the only substance used to keep awake. The common reasons for the use of tobacco/cigarette were to relieve stress 408 (68.5%), school friends' influence 400 (67.2%), and to feel good 385 (64.7%). Ninety (15%) of the students had no reason for the use of cigarettes. Only drugs like cannabis, petrol, latex (glue), cocaine and tobacco/ cigarette were used by a few students to enhance sex.

Majority of respondents claim to have heard of less commonly available drugs such as cannabis 941 (89%), cocaine 901(85%) and to a lesser extent morphine/pethidine 548 (51.6%), heroine 540 (51%) and hallucinogen 480 (46%). However only a few claimed to have seen these drugs namely cannabis 470 (42%), heroine 25C (23.8%) pethidine/morphine 200 (17.2%) and cocaine 65 (6.2%). None of the students have seen or used hallucinogen. Onset of consumption of substances showed that cocaine and petrol, latex (glue) had the highest mean age 13.7 years each, followed by morphine and hypnosedatives 12.5 years each, cannabis, tobacco and kolanut

were 12years, 11 years, and respectively. Alcohol had the lowest mean of onset of consumption of 4 years. The common drugs that their harmful effects were not perceived were petrol, latex (glue)

Summary of reviewed literature

This sections covered summary of reviewed literature on Concept of psychoactive substances and psychoactive abuse. Most of the literature reviewed showed that, throughout the ages, people have used various substances to alter their mood perception or behaviour. Most of these substances were derived from plants or their seeds and included marijuana, coca leaves, opium and psilocybin from mushrooms. Refined substances include alcohol, heroin and cocaine. Synthetic drugs include lysergic acid diethylamide (LSD), phencyclidine (PCP), Cracic and amphetamine. Also the literature focuses on pattern and prevalence of psychoactive substance which smoking huping, injection etc. Problems associated with psychoactive use include psychological problem like hallucination euphoria, amnesia and distortion of thinking. Behavioural problem include difficulty in maintaining successful relationship which often leads to isolation divorce, loss of job etc. Physical problem associated with drug abuse include anxiety, craving, tremor and malnutrition in chronic and prolong use. Addiction is divided into two, psychological and physical addiction. Treatment modalities of psychoactive abuse include psychological treatment which is by the use of psychotherapy, psychoeducation and family therapy. Another method of treating drug abuse is by the use of drugs. Drugs commonly used in treatment of psychoactive substance abuse are Naltrexone, diulprim etc. Nevertheless, the review touches some common features associated with risk factors of substance abuse, which include availability and encouragement, adverse social conditions, environmental or biological factors,

psychological influences, disabilities, developmental influences and cultural influence. The review also considered some causes of psychoactive substance abuse which include biological, psychosocial and socio-cultural in nature. These factors are likely to coexist. One group of theories considers the importance of personality. However, review discussed some policies and laws on psychoactive substance use which include some arrest made by NDLEA and indicated that Kano is the highest in all arrest in the Nation in 2009 to 2010 report.

Senior secondary school students are students in second phase of 6-3-3-4 education system in Nigeria and they are in a stage of growth and development called adolescence. The period characterized by so many changes such as spurt growth, maturation of sexual organs, cognitive and behavioural changes. Its delicate period of one's life which can be influenced by various factors, either positively or negatively. Among influential factors are family, peer groups, social networking, environmental and media profusion.

Finally, the review pointed some theories with regard to influence of drug and substance abuse. This included social learning theory and peer cluster theory. Empirically some studies were carried out in Calabar Eastern Nigeria with regard to incidence of drug/substance abuse and behavioural pattern of youth in Calabar South Local Government Area Secondary School, another one is the study of use of psychoactive substances among secondary school student in two local government in Akwa Ibom state Nigeria, also another study was carried at ABU Zaria to ascertain psychoactive substance use among school adolescents in Zaria Kaduna state Northern Nigeria. Also reviewed another studies of substance use among Druze adolescent in

Israel: Identifying predictors and patterns of use. All studies indicates strong relationship between secondary schools and drug use.

CHAPTER THREE

RESEARCH METHOD

Introduction

This chapter describes the design of the study, the area of the study, population of the study, sample and sampling procedure, instrument for data collection, validity and reliability of instrument, ethical consideration and procedure for data collection and method of data analysis.

Research Design

The study adopted a cross sectional descriptive design and describes the prevalence and patterns of substance use among Government senior secondary schools students in Dala local government area of Kano State. This design was chosen because Fajonmi (2003) says that survey is used for descriptive, explanatory and exploratory purposes, and of course this survey is descriptive in nature and therefore is more appropriate for this study. However cross sectional descriptive design is considered appropriate because it allows for collection of data from a group of people at the same time for the purpose of describing phenomena under study. Descriptive study also allows the investigator to discuss the phenomenon under study as it exists at the time of study.

Area of Study

The study was carried out in Dala LGA in Kano city in Northern Nigeria. Kano city is the capital of Kano State. In ancient times, Kano is a powerful city of the Hausa people and a very important city in West African Savannah for centuries

Kano is a densely populated old city and is surrounded by a well-preserved 22-km long wall dating from the 13th century. The old city contains the 16th century Kurmi Market, the traditional palace of Kano's emir, newer commercial, industrial and residential districts are located to the east and northeast of the old city.

Kano is the center of a prosperous, densely populated agricultural region in which millet, sorghum, peanuts, and beans are produced. It is an important market center for peanuts, livestock, grains, and other foodstuffs from the surrounding area. Kano is one of Nigeria's leading industrial centers, tanning; oilseed processing, meatpacking, and the production of furniture and enamelware are long-established industries. Newer factories produce textiles, flour, pesticides, farm machinery, and various consumer goods. The city is also known for its handcraft industries, including the production of morocco leather, metalworking, and the weaving and dyeing of cloth. The city is well connected by road and rail with other parts of Nigeria, and it has a major international airport. Bayero University (1977) and Kano State Polytechnic (1976) are located in Kano. The city also has major air force and army bases, and it is home to the Nigerian Police Academy.

Settlement at Dala dates from the 7th century and is the initial origin of Kano, by which time Hausa peoples of the area were smelting iron. Dala was founded in the 10th century as one of the

seven original Hausa city-states. Kano was a major terminus of trans-Saharan trade caravans, and the city became a dominant political center of the West African savannah. The Kano area was taken by the Fulani in the 19th century and held by them until 1903, when it was seized by the British.

Dala Local Government is the largest Local Government in terms of population in Kano State with 448,777 numbers of people (National population census 2006). It is in the centre of ancient city of Kano. Dala Local Government was created in 1989 as a local government. Majority of the people in the local government are business men. Dala local Government has 24 secondary schools both junior and senior schools 10 are senior and junior secondary while 14 are junior secondary schools only, one renowned boarding Girls secondary school and fourteen junior secondary school across the local government. (See appendix).

Population for Study

The target populations for this study are all Government Senior Secondary School Students in Dala Local Government area of Kano State. Dala is selected because it is the oldest local government in the centre of Kano metropolitan and also it is the largest in terms of population. The population consists of both boys and girls in senior secondary schools. There are ten senior secondary schools and fourteen junior secondary school in the local government, according to the department of planning and statistics of Dala zonal office (2010). The total populations of all senior secondary students in all ten senior secondary schools in Dala are 11045. As shown in Table 1

Table 1: Senior Secondary Schools and their population in Dala LGA.

	Schools	SSS1	SS2	SS3	Total
1	GSS Dala	735	938	737	2410
2	GSS Kwammaja	665	599	581	1845
3	GSS Kurna Asabe	400	378	424	1202
4	GGC Dala	417	436	509	1362
5	GGSS Kofar Mazugal	327	332	272	931
6	GGASS Gwammaja	244	271	189	704
7	GGSS Bulukiya	322	407	367	1096
8	GGSS Damdinshe	160	150	085	395
9	GGSS Gwammaja	126	190	106	422
10	SAS Yalwa	248	245	185	678
	TOTAL	3644	3946	3455	11045

The Male Population

	Schools	SSS1	SS2	SS3	Total
1	GSS Dala	735	938	737	2410
2	GSS Gwammaja	665	599	581	1845
3	GSS Kurna Asabe	400	378	424	1202
4	SAS Yalwa	248	245	185	678
	TOTAL	2048	2160	1927	6135

Female Population

1	GGC Dala	417	436	509	1362
2	GGSS Kofar Mazugal	327	332	272	931
3	GGASS Gwammaja	244	271	189	704
4	GGSS Bulvkiya	322	407	367	1096
5	GGSS Domdiunshe	160	150	085	395
6	GGSS Gwammaja	126	190	106	422
	TOTAL	1596	1786	1528	4910

Sample

The sample comprises of 2293 senior secondary school students constituting of 1202 boys from GSS Kurna Asabe and 1096 girls from GGSS Bulukiya selected from two secondary schools in Dala LGA. The sample includes all the students in SS1, SS2 and SS3 respectively for the two schools selected by cluster sampling procedure.

Sampling procedure

Purposive and cluster sampling procedures were used to select the sample for study. Purposive sampling procedure was used to select Dala LGA as area of study. There are ten senior secondary schools in Dala LGA comprising four boys senior schools and six girl senior secondary schools. The ten secondary schools are taken as clusters that are each senior secondary school constitutes a cluster. For boys secondary schools there are four clusters and six clusters for girls' senior secondary schools. Simple random sampling was employed to select the two

schools for study. The names for the four boys's schools were each written on a piece of paper and folded very well. Likewise the names of the six girls's secondary schools were each written on a piece of paper and folded very well. From the four boys schools one school was randomly selected (GSS Kurna Asabe) and from the six girls secondary schools one school was also randomly selected (GGSS Bulukiya). Cluster sampling was used to select the students. All the students comprising 1202 boys from GSS Kurna Asabe and all 1096 girls from GGSS Bulukiya was included in the studies since each school serve as a cluster. The sampling size therefore constitutes of 2298 senior secondary school students.

Inclusion Criteria

1. Willingness to participate in the study. Questionnaires were administered to those students who were willing to participate in the study.
2. Availability, the questionnaire was administered to available students who were willing to participate in the study at the time of data collection

Instrument for Data Collection

The instrument for Data collection was a WHO Youth Drug Survey (WHODYDSQ) adapted questionnaire. This questionnaire was developed and standardized by the World Health Organization in collaboration with the United Nations Fund for Drugs Abuse and Control among youths and secondary schools students. The questionnaire was developed for studies of non-medical drug use among student, Soldiers and prisoners, since these groups can be readily convened for survey administration.

The WHOYDSQ consists of 32 items that are either open or closed ended. The closed ended items have a stem each and a response (alternatives) options from where the respondents will tick the ones that are applicable to him or her.

The WHOYDSQ has two sections A and B. Section A contains of 10 questions on demographic variables while section B contains 22 questions on non-medical drug use and related questions.

The reliability of the WHOYDSQ was established in two WHO centres at Toronto and Mexico City. Test re-test method was used to establish the reliability of the instrument. In Toronto, the questionnaires were administered to 197 students on two occasions of 8 weeks apart. Data from the two administrations were correlated using Pearson product moment correlation and a correlation coefficient of 0.88 ($P < .001$) was obtained for the two tests.

In Mexico City, the questionnaires were administered to 294 students on two occasions of 6 weeks intervals Pearson correlations were calculated for the data from the two administrations and a correlation coefficient of 0.71 was obtained. The YDSQ is an internationally accepted instrument designed to study or conduct survey on non-medical drug use among the youth and students.

Validity of the Instrument

The face and content validity of YDSQ was determined by giving the instrument to two senior lecturers in the Department of Nursing Sciences, UNEC to read through and make their input. They were asked to examine the purpose, research objectives and research questions in line with

the specific items in the questionnaire. Their input and suggestions were affected. The final copy was submitted to the project supervisor who approved it after some corrections were made.

Reliability of the Instrument

The reliability of the instrument was determined by using a test re-test method conducted in a pilot study. Sixty copies of the instrument was administered to 60 senior secondary school students (30 males and 30 females), consisting of 10 students from SSI, 10 from SSII and 10 from SSIII for each gender. The questionnaires were administered on 2 occasions with 6 weeks interval in Government Senior Secondary School Gwammaja for both girls and boys.

Pearson correlations were used to correlate the two sets of data and a correlation coefficient of 0.82 was obtained. Based on this the instrument was considered adequate for the study.

Ethical Consideration

A letter of introduction from the Department of Nursing Sciences University of Nigeria Enugu campus was collected and taken to the Ministry of Education Kano State for approval to carry out the research using secondary school students in Dala LGA of Kano State.

Permission to carry out the study was obtained from the Executive Director of Secondary School management Board and zonal officer, Ministry of Education Dala Local Government Zonal office (see appendix 2). Before collecting the data informed consent of respondents were obtained and purpose of the study was explained to them. Participation in the study was voluntary and a respondent has the right to withdraw if he/she wishes to do so. Information provided was treated confidentially and respondent's anonymity was adequately maintained.

Procedure for Data Collection

An introductory letter from the Department of Nursing, Faculty of Health Science and Technology University of Nigeria Enugu campus as well as ethical approval from ministry of education and zonal education office in Dala were taken to the schools. Prior Meeting was held with the principals of the schools with regard to the arrangement of date and time of collecting data. On the scheduled date and time, respondents consent was obtained, after some introduction and explanation, researcher and research assistants arranged students appropriately to ensure confidentiality and shearing of information and also administered the questionnaire to the students on the spot in the classroom and allow them to fill it without distraction. The completed questionnaires were collected immediately. Data collection lasted for four weeks.

Method for Data Analysis

Data generated for the study were analysed using both descriptive and inferential statistics (means, standard deviation etc.). Analyses of the data were carried out with the aid of computer using the Statistical Package for Social Scientists (SPSS) version 17.0. Statistical package used included descriptive statistics of frequency counts and their percentages, means and their standard deviations; inferential statistics including Chi-square to test the hypotheses or answer research questions. Probability value less than 0.05 was considered statistically significant.

CHAPTER FOUR PRESENTATION OF RESULTS

Two thousand two hundred and ninety-eight (2298) questionnaires were distributed. One thousand nine hundred and fifty-seven (1957) of the questionnaires were analyzed, while three hundred and forty-one(341) were not properly filled. This gave a response rate of 85.2%.

Objective 1: To identify the characteristics of Students who use identified substances

Table 1: Respondents' demographic characteristics n= 1957

Characteristics	Frequency	Percentage
Sex		
Male	1036	52.9%
Female	921	47.1%
Age Group		
15-17yrs	200	10.2%
18-20yrs	1333	68.1%
21-23yrs	424	21.7%
Mean age 19.3 ± 1.5 Years		
Grade (Class)		
SSS1	528	27.0%
SSS2	644	32.9%
SSS3	785	40.1%
School		
A (boys)	1036	52.9%
B (girls)	921	47.1%
Resident		

With my parents/other relatives	644	32.9%
With my friends	785	40.1%
Father's Highest Level of Education		
No formal schooling	484	24.7%
Primary school	234	12.0%
Secondary or High School	632	32.3%
University or Post Secondary School	574	29.3%
Don't know	33	1.7%
Mother's Highest Level of Education		
No formal schooling	489	25.0%
Primary school	247	12.6%
Secondary or High School	1035	52.9%
University or Post Secondary School	150	7.7%
Don't know	36	1.8%

Result on Table 1 Shows That male respondents were 1036 (52.9%), while the female were 921 (47.1%). Their age ranges between 15- 23 years with a mean age of 19.3 ± 1.5 years. Majority 1333 (68.1%) of the respondents were 18-20 years. Respondents in SS1, SS2 and SS3 constituted 528(27.0%), 644(32.9%) and 785(40.1%) respectively, while 1036(52.9%) of them were from School A and 921(47.1%) were from School B. Majority of the respondents 1563 (79.9%) lived with their parents/ other relatives, while only 394 (20.1%) lived with their friends. Most of the respondents 632(32.3%) had their fathers highest educational level as Secondary or High School and 574 (29.3%) as University or other Post Secondary School education. Only 484(24.7%) of them had their fathers with no formal schooling, while 33(1.7%) of them did not know their father's highest educational level. Also, majority of the respondents 1035(52.9%) mother highest educational level as Secondary or High School but 489(25.0%) of them had their mother with no formal schooling, while 36(1.8%) of them did not know their mother's highest educational level.

Objective 2: To establish the prevalence of substance use among the senior secondary school students in Dala Local Government Area, Kano State.

Table 2: Prevalence of lifetime, past year and current users of psychoactive substances

Psychoactive Substances	Lifetime Use	Past Year Use	Current Use
Tobacco product	303 (15.5%)	231 (11.8%)	164 (8.4%)
Alcoholic beverage	82 (4.2%)	38 (1.9%)	26 (1.3%)
Cannabis	107 (5.5%)	66 (3.4%)	79 (4.0%)
Cocaine	16 (0.8%)	12 (0.6%)	11 (0.6%)
Amphetamines or other stimulants (only kolanut)	1783(91.1%)	1622 (82.3%)	1711(87.4%)
Hallucinogen (only PCP)	91 (4.6%)	53 (2.7%)	67 (3.4%)
Sniffing or inhaling any substance to get high	127 (6.5%)	115 (5.9%)	82 (4.2%)

Tranquillizers	96 (4.9%)	61 (3.1%)	64 (3.3%)
Sedatives (only <i>fura da nono</i> and caffeine)	133 (6.8%)	92 (4.7%)	107 (5.5%)
Opium	77 (3.9%)	59 (3.0%)	63 (3.2%)
Heroin	21 (1.1%)	14 (0.7%)	9 (0.5%)
Opiate	52 (2.7%)	37 (1.9%)	29 (1.5%)
Others (like <i>gadagi</i> , <i>kwaga</i> and smooth)	703 (35.9%)		

Results on Table 2 shows the prevalence of psychoactive substance use among the respondents. The result shows that majority 1783 (91.1%) of the respondents have been using amphetamines or other stimulants (kolanut mainly). for current use, past year use and the respondents' life time use. It shows a past year prevalence of (82.3%) and a current use prevalence of (87.4%). on the other hand, heroin was the least used substances. It shows a lifetime, past year and current use prevalence of 21(1.1%), 14(0.7%) and 9(0.5%) respectively. The same Table also shows that the prevalence of current use for the substances ranges from 9(0.5%) to 1622(87.4%). The overall prevalence of substance use is (10.3%) for current use and (14.1%) for lifetime use.

This is followed by use of tobacco products which has a past year prevalence of 231(11.8%), current use prevalence of 164(8.4%) and a life time prevalence of 303(15.5%)

Objective 3: To identify the patterns of substance use among the senior secondary students

Table 3: Patterns of drug use in days per month based on current use

Psychoactive Substances	Pattern in days per month		
	1 – 5	6 – 19	> 20
Tobacco product (n=164)	74 (45.1%)	47 (28.7%)	41 (25.0%)
Alcoholic beverage (n=26)	20 (76.9%)	3 (11.5%)	3 (11.5%)
Cannabis (n=79)	31 (39.2%)	23 (29.1%)	25 (31.6%)
Cocaine (n=11)	7 (63.6%)	3 (27.3%)	1 (9.1%)
Amphetamines or other stimulants (n=1711)	319 (18.6%)	413(24.1%)	979 (57.2%)
Hallucinogen (n=67)	41 (61.2%)	15 (22.4%)	11 (16.4%)
Sniffing or inhaling any substances to get high	49 (59.8%)	23 (28.0%)	10 (12.2%)

(n=82)			
Tranquillizers (n=64)	42 (65.6%)	9 (14.1%)	13 (20.3%)
Sedatives (n=107)	69 (64.5%)	16 (15.0%)	22 (20.6%)
Opium (n=63)	34 (54.0%)	21 (33.3%)	8 (12.7%)
Heroine (n=9)	7 (77.8%)	1 (11.1%)	1 (11.1%)
Opiate (n=29)	16 (55.2%)	4 (13.8%)	9 (31.0%)

Result on Table 3 shows the patterns of drug use in days per month based on current use. The result shows that among the current users of the substances, more than half of the users of each of the substances take it occasionally, using them on 1 to 5 days in a month except amphetamines or other stimulants (kolanut). On the other hand, almost one-quarter of the users of each of the substances take it on 20 or more days in a month. This constitutes the abusers of these drugs and it is mostly amphetamines or other stimulants (kolanut).

Objective 6 & 4: To determine the age of onset of substance use among secondary school students and identify the substances commonly used by the Students

Table 4: Respondents age ranges at first use of various substances based on life time use

Substances	Age at First Use (years)					
	≤10	11-12	13-14	15-16	17-18	≥19
Tobacco product (n=303)	49(16.2%)	37(12.2%)	39(12.9%)	46(15.2%)	51(16.8%)	81(26.7%)
Alcoholic beverage (n=82)	18(22.0%)	21(25.6%)	11(13.4%)	19(23.2%)	8(9.8%)	5(6.1%)
Cannabis	3(2.8%)	12(11.2%)	9(8.4%)	19(17.8%)	23(21.5%)	41(38.3%)

(n=107)						
Cocaine (n=16)	0(0.0%)	0(0.0%)	5(31.3%)	2(12.5%)	2(12.5%)	7(43.8%)
Amphetamines	497(27.9%)	411(23.1%)	329(18.5%)	247(13.9%)	190(10.7%)	109(6.1%)
or other stimulants						
(n=1783)						
Hallucinogen	1(1.1%)	4(4.4%)	13(14.3%)	13(14.3%)	19(20.9%)	41(45.1%)
(n=91)						
Sniffing or	0(0.0%)	3(2.4%)	11(8.7%)	23(18.1%)	29(22.8%)	61(48.0%)
inhaling any substances to get high (n=127)						
Tranquillizers	3(3.1%)	9(9.4%)	4(4.2%)	14(14.6%)	24(25.0%)	42(43.8%)
(n=96)						
Sedatives	2(1.5%)	21(9.4%)	13(4.2%)	19(14.6%)	31(25.0%)	47(43.8%)
(n=133)						
Opium (n=77)	0(0.0%)	7(9.1%)	3(3.9%)	2(2.6%)	14(18.2%)	51(66.2%)
Heroin (n=21)	0(0.0%)	0(0.0%)	0(0.0%)	3(14.3%)	5(23.8%)	13(61.9%)
Opiate (n=52)	4(7.7%)	3(5.8%)	3(5.8%)	9(17.3%)	10(19.2%)	23(44.2%)
Others (n=703)	97(13.8%)	83(11.8%)	114(16.2%)	95(13.5%)	103(14.7%)	211(30.0%)

Table 4 Respondents age ranges at first use of various psychoactive substances based on life time use. Most 497 (27.9%) of the respondents first used amphetamines (kolanut) at the age less than 10years, alcoholic beverages at the age of 11-12years(25.6%) while others first used psychoactive substances like tobacco11-12years(12.2%), cannabis19- and above(38.3%). Others like cocaine, hallucinogen, sniffing or inhaling any substances to get high, tranquilizers, sedatives at the age of 15-19years.

Table 5: Admission of drug usage in this questionnaire

Admission of drug status	Frequency	Percentage
If you have ever used any cannabis, would you have admitted it in this questionnaire		

No	1143	58.4%
Not sure	426	21.8%
Yes	388	19.8%
If you have ever used any opium or heroine, would you have admitted it in this questionnaire		
No	1268	64.8%
Not sure	314	16.0%
Yes	375	19.2%

In Table 5, more than half of the respondents would have never admitted in this questionnaire if they had taken any cannabis, opium or heroine.

Table 6: Route of drug administration

Admission of drug status	Frequency (n=21)	Percentage
What method have you used for taking heroine		
Sniffed or snorting	11	52.4%
Smoking	17	81.0%
Injection	3	14.3%
By mouth	1	4.8%

Result on Table 6 shows patterns of psychoactive use among the respondents. Among the 21 respondents that had ever taken heroine when more than one option could be taken, most of them (52.4%) sniffed or snorted heroine, while only 4.8% of them that took heroine by mouth.

Objective 5: To identify the sources of influence of drug use among secondary school children

Table 7: Source of introduction to non-medical drug use

Source of introduction to drug use	Frequency	Percentage
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Who introduce you to non-medical drug use?		
Family	213	27.6%
Casual acquaintance	19	2.5%
Friends	467	60.6%
Drug pusher	11	1.4%
Doctor (Physician)	3	0.4%
Other health practitioners	8	1.0%
Pharmacists or druggists	6	7.8%
Others (nobody)	44	5.7%
Total	771	100.0%

Result on Table 7 shows the source of introduction to drug abuse. Result shows that majority 467(60.6%) of respondents who use psychoactive substances were introduced by their friends, 213(27.6%), by the family and 44(5.7%) by nobody that is they started using their substances by themselves. Other sources include casual acquaintance 19(2.5%), drug pusher 11(1.4%), health practitioners 8(1.0%), pharmacists or druggist 6(7.8%) and Doctors 3(0.4%).

Objective 7: To identify the reasons why senior secondary school students use drugs

Table 8: Reason for non-medical drug use

Reason s	Frequency	Percentage
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What was your reason for your non-medical drug use?		
Religious custom	2	0.1%
To be accepted by others	61	4.5%
To be sociable	342	25.4%
Enjoyment	329	24.4%
Enhancement of sex	97	7.2%
Curiosity	211	15.6%
Treatment of health disorder	106	7.9%
Relief to psychological stress	78	5.9%
Relief to cold, hunger or fatigue	69	5.1%
Improvement of work performance	54	4.0%
Total	1349	100.0%

Results on Table 8 shows the reasons for non medical drug use among the respondents., the major reasons for using non-medical drugs include to be sociable 342 (25.4%) and for enjoyment 329(24.4%), to improve work performance 54(4.0), relief to cold hunger or fatigue 69(5.1%), curiosity 211(15.6%), treatment of health disorder 106(7.9%), enhancement of sex 97(7.2%). Religious custom is least considered for the reason of using non-medical drug 2(0.1%).

Approval or disapproval status of people under 18 years or older engage in the following behaviours

Table 9: Approval status of drug use by individual

S/N	ITEMS Do you approve of people doing the following	Don't disapprove	Disapprove	Strongly disapprove	N	Sum	$\bar{x}$	Stdev	Decision
a.	Smoking 20 or more cigarettes a day	127	47	1783	1957	2258	1.15	0.51	Disapproved
b.	Trying marijuana (cannabis, pot, grass) once or twice	136	34	1787	1957	2263	1.16	0.52	Disapproved
c.	Smoking marijuana occasionally	143	29	1785	1957	2272	1.16	0.53	Disapproved
d.	Smoking marijuana regularly	142	34	1781	1957	2275	1.16	0.53	Disapproved
e.	Other drug-related behaviour to be investigated (Gadagi syrup)	154	32	1771	1957	2297	1.17	0.55	Disapproved
	Mean of means						1.16	0.53	Disapproved

Table 9 showed the approval status of drug use by respondents. Out of the 5-item statements designed for the respondents, all of them were disapproved since their mean values were less than 1.50 which is the cut-off point for a 3-point scale. In general, the respondents disapproved of the people (who are 18 or older) involving in drug-related behaviour since the mean is 1.16.

Table 10: Perceived availability of types of drug

S/N	Types of drug	Probable impossible	Very difficult	Fairly difficult	Fairly easy	Very easy	N	Sum	$\bar{x}$	Stdev	Decision
a.	Marijuana (cannabis, pot, grass)	695	56	1147	36	23	1957	4507	2.30	1.02	Difficult
b.	Amphetamines and other stimulants	13	76	757	449	662	1957	7542	3.85	0.96	Easy
c.	Cocaine	1424	170	335	8	20	1957	2901	1.48	0.86	Difficult
	Mean of means								2.54	0.95	Difficult

Table 10 showed the perceived availability of how difficult the respondents think it would be for them to get each of the above mentioned types of drug if they wanted some. Out of the three drugs specified for the respondents, all of them were difficult to get since their mean values were less than 3.00 which is the cut-off point for 5-point scale except amphetamines and other stimulants. In general, the respondents find it difficult to get any of the drugs specified since the mean of means is 2.54.

Table 11: The respondents view on sort of people who use drug

S/N	View on using drug	Much less than average	Less than average	About average	More than average	Much more than average	N	Sum	$\bar{x}$	Stdev	Decision
a.	Ambitious	974	246	244	421	72	1957	4242	2.17	1.34	Less
b.	Antisocial	983	240	236	421	77	1957	4240	2.17	1.35	Less
	Mean of means								2.17	1.34	Less

Table 11 showed the view of the respondent on the sort of people who used drugs. Out of the two views specified for the respondents, both of them were less than the average since their mean values were less than 3.00 which is the cut-off point for 5-point scale. In general, the respondents viewed that the sort of people who use drug less than the average since the mean of means is 2.17.

Hypothesis 1: There is no significant relationship of lifetime drug use between male and female secondary school

Table 12: Prevalence of life time use of the various substances base on gender (sex)

Substances	Male (n=1036)	Female (n=921)	χ^2	df	P-value
Tobacco product	261 (25.2%)	42 (4.6%)	336.39	11	0.000
Alcoholic beverage	59 (5.7%)	23 (2.5%)			
Cannabis	91 (8.8%)	16 (1.7%)			
Cocaine	16(1.5%)	0 (0.0%)			
Amphetamines or other stimulants	987 (95.3%)	796 (86.4%)			
Hallucinogen	91 (8.8%)	0 (0.0%)			
Sniffing or inhaling any substances to get high	89 (8.6%)	38 (4.1%)			
Tranquillizers	73 (7.0%)	23 (2.5%)			
Sedatives	128 (12.4%)	5 (0.5%)			
Opium	68 (6.6%)	9 (1.0%)			
Heroin	21 (2.0%)	0 (0.0%)			
Opiate	52 (5.0%)	0 (0.0%)			

Result in Table 12 shows that Males are more involved in drug use and abuse in life time use as shown in Tables 12 ($P < 0.05$). Cocaine, hallucinogen, heroine and opiate were not used by any of the female respondents. However, more males than females have used all the substances as shown in fig. 1 below. The null hypothesis is therefore rejected ($p < 0.05$)

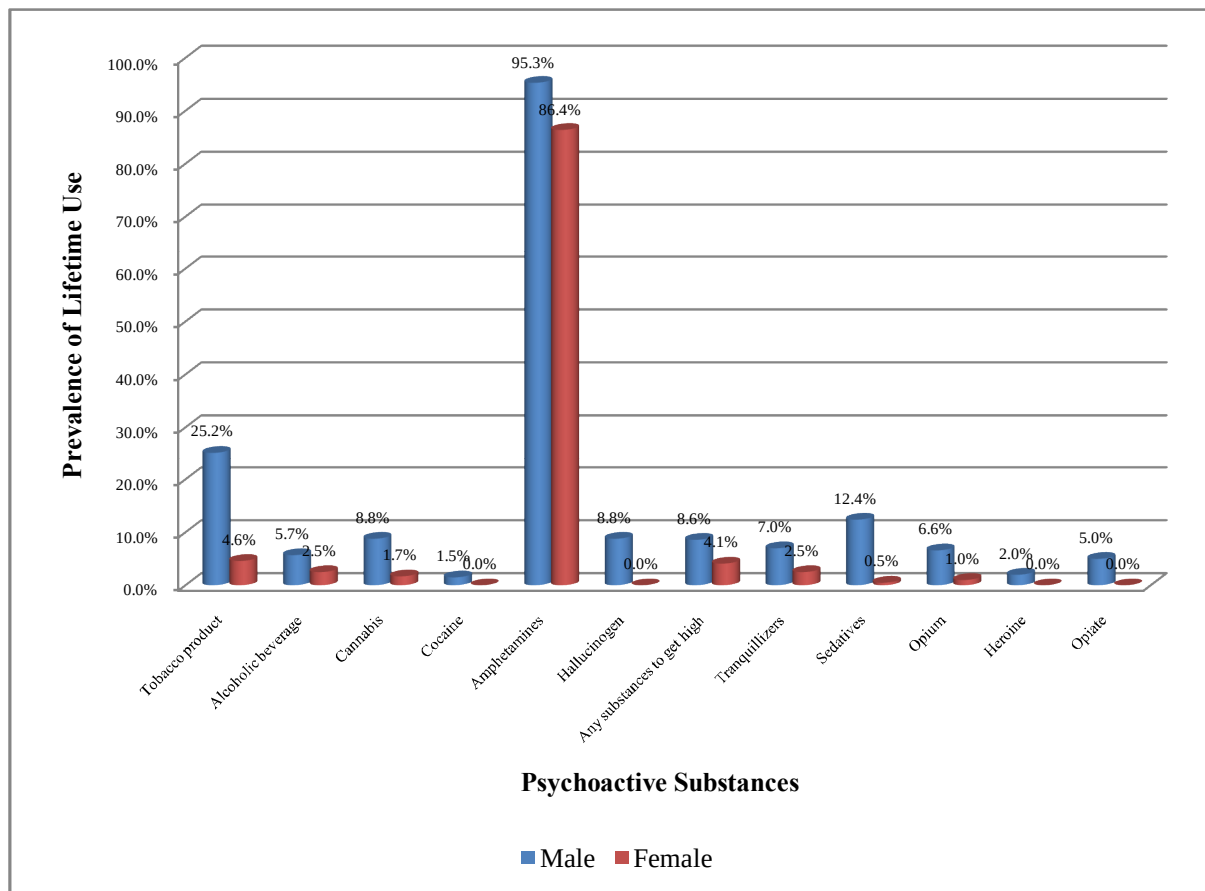


Fig. 1: Prevalence of life time use of the various substances base on gender (sex)

Hypothesis 2: There is no significant relationship of patterns of drug use in days per month based on current use of psychoactive substances

Table 13: Patterns of drug use in days per month based on current use

Psychoactive Substances	Pattern in days per month			χ^2	df	P-value
	1 – 5	6 – 19	> 20			
Tobacco product	74 (45.1%)	47 (28.7%)	41 (25.0%)	540.64	22	0.000
Alcoholic beverage	20 (76.9%)	3 (11.5%)	3 (11.5%)			
Cannabis	31 (39.2%)	23 (29.1%)	25 (31.6%)			
Cocaine	7 (63.6%)	3 (27.3%)	1 (9.1%)			
Amphetamines or other stimulants	319 (18.6%)	413(24.1%)	979(57.2%)			
Hallucinogen	41 (61.2%)	15 (22.4%)	11 (16.4%)			
Sniffing or inhaling any substances to get high	49 (59.8%)	23 (28.0%)	10 (12.2%)			
Tranquillizers	42 (65.6%)	9 (14.1%)	13 (20.3%)			
Sedatives	69 (64.5%)	16 (15.0%)	22 (20.6%)			
Opium	34 (54.0%)	21 (33.3%)	8 (12.7%)			
Heroin	7 (77.8%)	1 (11.1%)	1 (11.1%)			
Opiate	16 (55.2%)	4 (13.8%)	9 (31.0%)			

The pattern of drug use in days per month based on the current use depend on the psychoactive substances ($P < 0.05$). This implies that amphetamines or other stimulant (kolanut) is confirmed statistically to be mostly abused. The null hypothesis is therefore rejected

Hypothesis 3: There is no significant relationship of respondent's age range at first use based on life time use of psychoactive substances

Table 14: Respondents age ranges at first use of various substances based on life time use

Psychoactive Substances	Age at First Use (years)						χ^2	P- value
	≤10	11-12	13-14	15-16	17-18	≥19		
Tobacco product	49(16.2%)	37(12.2%)	39(12.9%)	46(15.2%)	51(16.8%)	81(26.7%)	859.44	0.000
Alcoholic beverage	18(22.0%)	21(25.6%)	11(13.4%)	19(23.2%)	8(9.8%)	5(6.1%)		
Cannabis	3(2.8%)	12(11.2%)	9(8.4%)	19(17.8%)	23(21.5%)	41(38.3%)		
Cocaine	0(0.0%)	0(0.0%)	5(31.3%)	2(12.5%)	2(12.5%)	7(43.8%)		
Amphetamines or other stimulants	497(27.9%)	411(23.1%)	329(18.5%)	247(13.9%)	190(10.7%)	109(6.1%)		
Hallucinogen	1(1.1%)	4(4.4%)	13(14.3%)	13(14.3%)	19(20.9%)	41(45.1%)		
Sniffing or inhaling any substances to get high	0(0.0%)	3(2.4%)	11(8.7%)	23(18.1%)	29(22.8%)	61(48.0%)		
Tranquillizers	3(3.1%)	9(9.4%)	4(4.2%)	14(14.6%)	24(25.0%)	42(43.8%)		
Sedatives	2(1.5%)	21(9.4%)	13(4.2%)	19(14.6%)	31(25.0%)	47(43.8%)		

Opium	0(0.0%)	7(9.1%)	3(3.9%)	2(2.6%)	14(18.2%)	51(66.2%)
Heroin	0(0.0%)	0(0.0%)	0(0.0%)	3(14.3%)	5(23.8%)	13(61.9%)
Opiate	4(7.7%)	3(5.8%)	3(5.8%)	9(17.3%)	10(19.2%)	23(44.2%)
Others	97(13.8%)	83(11.8%)	114(16.2%)	95(13.5%)	103(14.7%)	211(30.0%)

The psychoactive substances use based on lifetime use is dependent on the age at first use ($P < 0.05$). Majority of the respondents first used amphetamines (kolanut) at the age less than 10years, alcoholic beverages at the age of 11-12years while others first used psychoactive substances like tobacco, cannabis, cocaine, hallucinogen, sniffing or inhaling any substances to get high, tranquilizers, sedatives at the age of 15-19years.

Summary of the major findings

The findings from the study were summarized under followings.

2298 questionnaires were distributed. 1957 of the questionnaires were analyzed.

While 340 were not properly filled and were rejected, this gave a response rate of 85.2%

The male respondent in this study were 1036 (52.9%) while the female were 921 (47.1%), Their age range were 15 years to 28 years comprises SSS₁, SSS₂ and SSS₃ senior secondary school students respectively.

- 1 The results show that 1783 (91.1%) of the respondents have ever abused one substance or the other. Stimulants precisely (Kolanut) is the most widely abused substance. The overall prevalence of substance use was 10.3% for current use and 14.1% for lifetime use

- 2 Majority of the respondents first used kolanut at the age less than 10 years, alcoholic beverages at the age of 11- 12 years, others drugs at the age of 15-19 years and above.
- 3 Most of the users take kolanut orally, others like tobacco, petroleum, glue e.t.c by inhaling and the least route is by injection.
- 4 Study reveals that majority of the respondents were introduced to abuse by friends 60.63% other notable source of introduction to Substance use is family members which contributed to 27.6% of the introduction.

Also the major reasons of secondary school taken drugs include to be sociable 342(25.4%) and also to gain pleasure 329(24.4%). custom and religion is the least considered for the reason for substance abuse 2(0.1%)

CHAPTER FIVE

This chapter presents the discussion of the major findings, implication of major findings, limitation of the study, summary of the study, conclusion, recommendations and suggestion for further studies.

Discussion of Major Findings

The major findings from the study were discussed with respect to the specific objectives, research questions and hypothesis set for the study in relation to findings from previous related studies. The discussion was done under research questions for better understanding.

Prevalence rate of psychoactive substance use

The result indicates that most of the respondents have taken one or more substances and according to the finding kolanut is the most widely used substance both for current use, lifetime use and past year used. The overall prevalence of psychoactive substance use was 10.3% for current use and 14.1% for life time use.

The above results agree with the study carried out by Ekott (2005) that more students from Oyo use one substance or the other mostly kolanut and other psychoactive substances, It is in conformity with the survey conducted by Kwada (2007), which found that most of secondary school students in northern Kaduna has used an illegal drugs at least once in their life and most of senior secondary schools students in Kafanchan have used drugs and alcohol.

Psychoactive substance use is a social problem that has spread and increased rapidly in educational institutions especially among secondary school students. This social problem is considered an issue of serious concern as it adversely affects the lives and performance of students involved as well as the harmonious functioning of the entire structure of the society. Use of psychoactive drugs and other associated problems are inimical to the survival and effective functioning of human societies.

Commonly used Psychoactive substances

The substance most commonly used by the student is kolanut follow by Tobacco product and then caffeine and cannabis the least is cocaine. The most frequently consumed psychoactive substance by the respondents is kolanuts. This is because kolanut has several roles in social functions such as marriage ceremony, naming ceremony and other festivals in Hausa land. As such it is highly socially recognized. Another reason for kolanut use is its ability to increase mental activity and alertness to keeping the respondents awake and alert (Karch, 2002). Cigarette another highly addictive stimulant was consumed by the respondents, Cigarette also makes the

consumer to concentrate and at the same time it is used to belong to peer group or imitate other adults they admire. Both cigarette and kolanut are cheaper and readily available

This agreed with a study by Abasiobong, Atting, Bassey and Ekott, (2005). Result shows that more student from uyo 37(31.1%) used kola nuts, 54(45.4%) used sedative while more students from Eket, 47(34.8%) used tobacco cigrattes, 76(56.3%) used alcohol, 25(15.6%) indian hemp,5(3.7%) used cocaine and 1(0.7%) used heroine. The finding of this study confirms the presence and use of psychoactive substances in varying proportions among students.

In other studies by Idris and Sambo (2005). The result shows that most Students use one or more substance or the other.

In another study carried out by Azaiza, Shoham , Bar-Ham, Burger, Abu-Ash . The result indicates that 20% consumed alcohol in the past year and 10% uses illegal substances of various types. These findings provide an indication of the extent of substance use among Druze secondary Students.

This is in conformity with the studies conducted by Eneh and Stanley (2004)The commonly used drugs were alcohol, kolanut, tobacco/cigarettes, in order of decreasing frequency 651 (65%), 611 (63.1%) and 595 (61%). The least used was cocaine 45 (4.3%) while no student used any hallucinogen.

In a similar study conducted by Eneh & Stanley (2004) the result shows that, the commonly used psychoactive substance were kolanut alcohol and tobacco/cigarettes in order of decreasing frequency 65%, 63% and 61%.

Marijuana is another commonly used substances often reported, this is likely due to its sedative effects, mental slowness, tiredness, anxiety, paranoia and euphoria. It was warns that long term effects of marijuana used leads to subtle and selective impairments of a specific higher cognitive function, and impairs driving skills.

The respondents reported using rubber solution and petroleum. These substances are dilirients which produces mind altering effects by depressing the central nervous system. Their effects are capable of claiming the life of an individual. Damage to the central nervous system can affect the mental and physical capabilities of the users.

Patterns of Psychoactive Substance use.

The results shows that among the current users of the substances more than half of the users of each of the substances take it occasionally, using them on 1-5 day in a month except amphetamines or other stimulant like kolanut. On the other hand almost one quarter of users of each of the substances take it on 20 or more days in a month.

The above result agrees with Shuttlewarth (2005) that most people psychoactive Substance in different ways. Some smoke tobacco, Indian hemp and chew kolanut. In a similar study conducted by Eneh and Stanley (2004). The commonly used drugs were alcohol, kolanut, tobacco/cigarettes, in order of decreasing frequency. The least used was cocaine while no student used any hallucinogen. There were significant sex differences in the use of morphine, petrol, latex (glue) and cocaine. They were used by boys only. Cannabis, kolanut and tobacco were also significantly more commonly used by boys. According to their finding the commonly used drugs among females were alcohol and hypnosedatives respectively. The use of cocaine,

petrol/latex (glue), cannabis, morphine/ pethidine and hyponosedative were more likely to have commenced in the secondary schools than the use of kolanut and alcohol which started earlier in life due to parental and cultural influences. This means that some psychoactive substances are consumed orally. Marijuana and alcohol are also taken orally. However rubber solution and petroleum are vehicle chemical substances and hence can be sniffed.

Characteristics of students who abused substances

The results presented reveals that male respondents in this study were majority follow by female were. Majority of them are within age range of 18-20 years. This indicates that majority of them are adolescent and this is the major age of senior secondary school students. Also this is a sensitive period of an individual life risk for abusing substance. Usually young boys & females at this age learnt positive or negative behavior. Majority of the respondents are from SSS₃ then SSS₂ and the least are from SSS₁. Majority of the respondents live with their parents or other relatives while the rest live with their friend. Majority of respondents Father highest level of Education were secondary school or high then university or post secondary school. Some of respondents fathers have not done formal school. Majority of respondent mothers attended secondary school and have no formal schooling. Few of them attended university or post secondary school. This is because formal education was not formally accepted among Hausa Northerners especially in the past years.

In Similar studies carried out by Effanga (2003). Majority were from low socio economic level while few were from high and average socio-economic levels. The main finding revealed that socio-economic status of students has no significant influence on students rate of drug abuse

Source of influences of drug use

According to the studies. Majority of the respondents were introduced to drugs use by friends. Other notable source of introduction to drug use are family members . According to (Agwogie, 2013) friends are one of the most significant reasons why people start abusing drugs. Members of the peer group are deceived into believing that drugs are used to solve emotional problems. They take it initially to enjoy, to relax and to be more sociable.

In other studies by Idris and Sambo(2005). The result shows that most use one or more substance or the other. The commonest push factor is to experiment and also shows statistically significant relationship between family background and psychoactive used.

According to (Agwogie, 2012) ñcases have been reported of the children who started abusing drugs by snatching the drugs from either their mothers or their fathers. For parents who smoke cigarette, the children start with the remnant dropped by their father. From there they graduated to removing cigarette sticks from their father pack. Before you know it the child had started smoking cannabis, the social acceptance of the offending substance is a key issue in substance use. Hanson (2010) noted that teen smoking accounts for 85-90% of new smokers. Increasing evidence have shown that young people learn not only from real people (such as friend, parents and family members) but also from characters whose live they witness and admit through the media. This agree with Peer Cluster theory by Oetting and Beauvais, 1986; Swaim, 1998; Oetting, Edwards, Kelly, & Beauvais, 1997. Stressing the importance of peer relationships in influencing character, the peer cluster theory suggests that peers have a direct influence of adolescent drug use

Age of onset of substance use

Majority of the respondents first used stimulant (kolanut) at the age of less than 10yrs, alcoholic beverage at the age of 11-12years while others psychoactive substance like tobacco, cannabis cocaine, hallucinogen, tranquilizers and sedative at the age of 15 -19years

This studies agree with the one conducted by Eneh and Stanley (2004) which shows that majority start using one of the substances at the age ranges mostly between 10-14 years.

It doesn't matter at which age somebody can take kolanut in Hausa land. According to Agwogie (2012) drug use may be initiated at any age but mostly initiated at adolescent age (11-18 years) it is not unlikely that one started abusing drug within this age range. This stage of life naturally is the period of adventure, excitement, and provide a new thrill to young people. This possibly exposes one to the danger of experimenting with drugs.

Reasons for use of Psychoactive Substances

The findings show that among the respondents, the major reasons for using drugs include to be sociable and for enjoyment. Religious and customs is the least considered for the reason for Psychoactive Substance use. Other include Curiosity, treatment of health disorder, relief of psychological stress, relief of cold, hunger or fatigue, to be accepted by others and to improve walk performance. According (Agwogie, 2012,) most abusers possibly started abusing illicit drugs after taking social drugs like alcohol, cigarette and kolanut. They are also called gate way drugs. The desire for a "better feel" possibly made them to go for more dangerous substances of abuse.

In similar studies conducted by Eneh and Stanley (2004). The common reasons were to relieve stress, feel good and parental influence in decreasing frequency. The least was to sleep. Among

those that used alcohol, the common reasons for the use of alcohol were to relieve stress, to feel good, parental influence and availability. The various reasons for using kolanuts were to keep awake, parental influence, and availability. Kolanut was the only substance used to keep awake. The common reasons for the use of tobacco/cigarette were to relieve stress, school friends' influence, and to feel good. Some of the students had no reason for the use of cigarettes. Only drugs like cannabis, petrol, latex (glue), cocaine and tobacco/ cigarette were used by a few students to enhance sex.

Hypothesis 1: There is no significant relationship between male and female in secondary schools in abuse of drugs.

The study indicates that males are more involved in drugs abuse in life time use. Cocaine hallucinogen, heroine and opiate were not used by any of the female respondents. In addition more males than females have used all the substances as shown by the study. Therefore the null hypothesis is rejected. This result also agreed with a study carried out by Effanga (2003). The main finding revealed that more boys admitted that they are involved in drug abuse than the girls. The finding also reveals that there is a significant relationship between a student's sex and the consumption level of drug. That being girl or a boy can determine the level of which one may be involved in drug abuse. The result shows that more boys admitted that they are involved in drug abuse than the girls.

According to (Agogule, 2012) generally men abuse more drugs than women. This is basically due to hormonal as well as social factor such as sex typing. For example, men are more socially accepted when seen smoking cigarette than women. Women who indulge in this practice are in most cases seen as doing what is socially reserved for men.

Hypothesis 2: There is no significant relationship of patterns of drug use in days per month based on current used of psychoactive substances.

The pattern in days per month based on the current use depend on the psychoactive substances. This implies that amphetamine or other stimulant like kolanut is confirmed statically to be mostly abused.

The above result agrees with Osayande (2011) findings that showed most people smoke tobacco and chew kolanut. This means some psychoactive substances are consumed orally. Marijuana and alcohol are also taken orally (Martin 2010). However rubber solution and petroleum are volatile chemical substances (Agwogie, 2010) and hence can be sniffed. Majority of the respondents use psychoactive substance daily, mostly kolanut and cigarette.

Hypothesis 3: There is no significant relation in respondent's age range at first use substance based on life time use of psychoactive substances.

The psychoactive substances based on lifetime use is dependent on the age of first used. Majority of the respondents first used amphetamines (kolanut) at the age less than 10years, alcoholic beverages at the age of 11-12years while others first used psychoactive substance like tobacco, cannabis, cocaine, hallucinogen, tranquilizers sedative at the age of 15-19years. Agwogie, (2012) stated that drug abuse may be initiated at any age but mostly initiated at adolescent age (11-18years). Adolescent age therefore becomes a predisposing factor to drug abuse.

Adolescent tends to seek adventure, excitement and a new thrill and do not always realize the dangers inherent in trying out drug. Most often the attraction is the need to be accepted by members of their peers as identified under peer group.

Implication of the study to Nursing practice

As observed from the study, the prevalence and patterns of psychoactive substance use in present study is in increasing rate. Nurses constitute a large number of health care workers in hospitals where patient with drugs abuse/addiction are admitted. Therefore nurses should health educate patients and the general public on the prevention, predisposing factors and signs and symptoms of drug dependence.

Nurses also should educate victim of drug abuse on how to stop the drug and also assist in caring drugs addicts in our societies.

Summary of the study .

The study was designed to determine prevalence and patterns of drugs abuse in senior secondary school students in Dala Local Govt. Area of Kano state. Literature were reviewed in the areas of specific psychoactive substance and problems associated with their use. Other areas reviewed also were causes of psychoactive substance use, Laws and policies on psychoactive substance use and some empirical studies. Data were collected using WHO Youth Drug Survey questionnaire and the information obtained was analyzed using descriptive and inferential statistic.

The findings of the study reveals that, the male respondents constituted 1036(52.9%)while the female were 921(47.1%) of the sample. Their age ranges were 15 ÷ 23yrs and the respondents comprises senior secondary school students in SS1, SS₂, SS₃, respectively and the schools were government secondary school Kurna Asabe and government girl secondary school kuka bulukiya in Dala local government kano state. Majority of the respondents live with their

parents and other relatives.632(32%). Majority of the respondents fathers highest education level was secondary school or higher school. Majority of the respondents 1035(52.9%) had their mothers highest education level as secondary school.

The study reveals that most widely used psychoactive substances were kola nut, 1783(91.1%) for both current use, past year use and lifetime use. Other commonly used psychoactive substances were tobacco product 303(15.5%), cannabis 107(5.5%), alcoholic beverages 82(4.2%), caffeine 133(6.8%), sniffing substances to get high 127(6.5%) and others like gadagi, kwaya and smooth 703(35.9%). In the same vein heroine is least used substances. Also the study shows that among the current users of the substances more than half of the users of each of the substances take it occasionally. Majority of the respondents first used kola nut at the age less than 10 years, alcoholic beverages at the age of 11-12 years while others at the age of 15-19 years. 467(60%) of the respondents were introduced to drug abuse by influence of friends, other notable introduction to drug abuse is family members 213(27.6 %). The major reasons for using drugs abuse include to be sociable 342(25.4%) and for enjoyment 329(24.4%).

Conclusion

The Study has established Prevalence and the Patterns of Psychoactive Substance use among Senior Secondary School Students in Dala Local Govt. Area Kano State. Two schools were used one for males and the other for females respectively.

The study has also revealed that psychoactive substance commonly used by student include kolanuts, cigarette, marijuana, rubber solution and alcohol. The finding reveals that most of the respondents were influence by friends and some relatives and their major reasons in

indulging in drug abuse is to be sociable and some for enjoyment. Oral and Sniffing were the two major route used by the respondents.

The study further shows that, it is difficult for the respondent to get most of the abused drug and they never approved people of less than 18 years to abuse drugs.

Limitation of the Study

The study was delimited to government secondary schools Dala only. It could not be extended to other private institutions due to time constraints and limited resources.

Recommendation

1. There should be education of parents on adjustment process of their children
2. Also political, religious and traditional leaders need to be involved in educating the public against this menace.
3. There is also need for an intervention by the government and non government organizations on preventive strategies of drug abuse. Government should ensure the enforcement of anti psychoactive substance laws. Government should be encouraged to established drug treatment centre in our hospitals. Also more health worker should be trained on how to identify addicts, prevent and treat victims of drug abuse and also to educate the public
4. The media should continue to give publicity on psychoactive substance use and its consequences.

5. Family should be encouraged to monitor the behavior of their children especially adolescent one. Also there should be collaboration between teachers and parents on monitoring strategies of the secondary school student both at home and in schools.

Suggestion for further study

Based on the findings from the study, the researcher hereby suggests that further research be made on the:

- . Prevalence and patterns of substance abuse in other local government across the state
- . Prevalence and patterns of substance abuse in private schools in the state
- . Prevalence and patterns of substance abuse in tertiary institutions in the state
- . Prevalence and patterns of substance abuse in private schools in other states in Nigeria.

REFERENCES

- Ajala , M. (2010). Challenges and prospects of drug use among sabongari youth community (Unpublished research) Zaria, Kaduna.
- Ajazen. I. (2005). Theory of planned behaviour. Organisational behaviour and human decision processes. African journal of drug and alcohol studies.
- Awake!. (2005). *Alcohol misuse and health-the drinking trap: are you at risk?* New York: Watchtowers Bible and Tract Society.
- American Psychiatric Association. (2000). *Diagnostic and statistical manual of mental disorders* (4th ed., text rev.). Washington, DC: Author.
- Anderson, R., & Gittler, J. (2005). Unmet Need For Community-Based Mental Health and Substance Use Treatment Among Rural Adolescents. *Community Mental Health Journal*, 41(1), 35-49. Retrieved March 25, 2014, from Academic Search

- Agwogie, M.O. (2010). An investigation into the Nature and predisposing factors related to drug Abuse in Kano and Lagos State. Unpublished M.ED. Thesis A.B.U. Zaria
- Agwogie, M.O (2011). Perception of Human Resources Managers on Drug Abuse Employees (A case Study of National OpenUniversity of Nigeria, Lagos Study centre). Unpublished MBA Project NOUN, Lagos.
- Black, J.M. and Matassarin-Jacobs, E. (1993). *Luckmann and sorensen's medical surgical nursing: a psychophysiologic approach*. 4th ed. London: W.B. Saunders Company.
- Bandura, A. (1977). *Social learning theory*. Englewood Cliffs, N.J.: Prentice-Hall.
- Bandura, A. (1986). *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs, NJ: Prentice Hall.
- Bandura, A. (2000). Social-cognitive theory. In A.E. Kazdin (Ed.), *Encyclopedia of psychology* (Vol 7, pp. 329-332). Retrieved October 23, 2006, from Psyc books
- Berger, Philip A. "Psychoactive Drugs." Microsoft® Student 2009 [DVD]. Redmond, WA: Microsoft Corporation, 2008.
- Caulfield, H. (2001). The legal and professional framework of nursing. *Bailliere's Nurses' Dictionary*. 23rd ed. Barbara F. Weller. Ed. Edinburgh: Harcourt Publishers Limited. 487 ï 497.
- Chen, L. Sun-yen Fuyang-Chi (2009). ñInternet use and academic achievement in early adolescence. New York, N.Y: Macgraw Hill.
- Chisom, C. (2010). Drug misuse warning and effects (Unpublished Lecture) Zaria; ABU.
- Department of Health: national addiction centre. (2003). *Dangerousness of drugs: a guide to the risks and harms associated with substance misuse*. London: DH.

- Edum, T. (2006). Prevalence and patterns of substance use among secondary school student in Calabar north (unpublished research work). Post basic psychiatric school; Calabar.
- Edwards, R. (2004). The problem of tobacco Smoking. *British Medical Journal* 328:217-219.
- Evans. C. (2001). Drugs and their control. *Bailliere's Nurses' Dictionary*. 23rd ed. B.F. Weller Ed. Edinburgh: Harcourt Publisher Limited.
- Fajonyomi, A.A. (2003). Overview of the research process. *Research process in Education and Social Sciences*. A.A. Fajonyomi and M.G. Fajonyomi. Eds. Lagos: Goldy O. Publishing Co. 1 ï 15.
- Ferguson, C. J., Winegard, B., (2011) Who is the fairest one of all. How evolution guides peer and media influences on female body dissatisfaction general psychology.
- Green, M. (2006) ñTrajectories of perceived adult and peer discrimination among black latino and American adolescents pattern and psychological correlates.
- Health Development Agency. (2004). *The smoking epidemic in England*. London: Health Development Agency.
- Hunkuyi, D. A (2004). Mental Health and Psychiatric Nursing. Zaria. Labari Communication, Kaduna.
- Hutchinson, S. (1992). The nursing process with psychoactive substance use disorder. *Psychiatric Nursing*. 4th ed H.S. Wilson and C.R. Kneisl. Eds. Redwood city, CA: Addison- Wesley.

- Karch, A.M. (2005). *Lippincott's nursing drug guide*. Baltimore: Lippincott Williams & Wilkins.
- Kenneth, M. (2012). Method of drug use among youth in Nigeria. (Unpublished lecture) Bayero University Kano.
- Kelly, C. and McCreadie, R.G. (1999). Smoking habits, current symptoms and primordial characteristics of schizophrenia patients in Nithsdale, Scotland. *America Journal of Psychiatry* 156: 1751 - 1757.
- Kelly, E., Darke, S. and Ross, J. (2004). A review of drug use and driving epidemiology, impairment, risk factors and risk perceptions. *Drug and Alcohol Review* 23.3:319-344.
- Kwada, M. (2008) Prevalence and patterns Psychoactive substance among student in Northern Kaduna.(Unpublished research) Kaduna Nigeria.
- Lambo, T.A. (1990). *The challenges of mental health, especially psychiatric nursing in Africa Aro, Abeokuta*. Ikeja: Universal Press Ltd.
- Laumon, B., Gadegbeku, B, Martin, J. and Biecheler, M. (2005). Cannabis intoxication and fatal road crashes in France: population based case-control study. *British Medical Journal* 331.7529:1371.
- Laurence, D.R., Bennett, P. N. and Brown, M. J. (1998). *Clinical pharmacology*. 8th ed. China: Churchill Livingstone.
- Lucas, A.C., Parente, R.C., Picanco, N.S., Conceicao, D.A., Costa K.R., Magalhaes, I.R. and Siqueira, J.C. (2006). Use of psychoactive drugs by health sciences undergraduate students at the Federal University in Amazonas, Brazil. *Cad Saude Publica* 22.3: 1663-1671.

- Maduako, G.U., and Aguwa, C.N. (2002). Drug abuse and drug dependence. *A handbook pharmacology for nursing and allied health professions*. C.N. Aguwa and J.E. Ogboukiri .Eds. Nigeria: Rex Charles & Patrick Ltd. 29 -33.
- Mireku, J. (2002). *Drug abuse*. Takoradi: St. Francis Press Ltd.
- Murdoch, D., Pihl, R. O. and Ross, D. 1990. Alcohol and crimes of violence: present issues. *International Journal of Addiction* 25: 1059 ï 1075.
- National Drug Law Enforcement Agency (2010) Annual Report. Kano, Nigeria. National Highway Traffic Safety Administrationï NHTSA. 2004. *Drugs and human performance fact sheet*. U.S. Department of Transportation Report No. DOT HS 809725. Washington: D.C.
- National Household Survey on Drug Abuse-NHSDA. (1999). National Household Survey. <http://www.samhsa.gov/statistics/statistics.html>.
- National Institute on Drug Abuse-NIDA .(1996). National household survey on drug abuse: population estimates. Washington, DC.
- Neeraja, K. (2011). *Essential of mental Health and Psychiatric Nursing*. Jaypee Medical publishers; India.
- Olade, R.A. (2005). Reforms in nursing education and practice in the 21st century ï which way forward? *West African Journal of Nursing* 16.1: 4-10.
- Onuorah, M. Jan 10, (2007). Nigeria Census Figures. Guardian Newspaper Limited. Retrieved Mar. 10, 2007 from <http://listsmyfirst.org/pipermail/friends/2007-january/001374.html>
- Orth Duphorne, P.L. and Lisanti, P. (2000). Nursing management substance abuse and dependence. *Medical-surgical nursing assessment and management of clinical problem*.

5th ed. S.M. Lewis, M.M. Heitkemper and S.R. Dirksen. Eds. New York: Mosby, Inc. 155
i 186.

Parker, H., Williams .J. and Aldridge, J. (2002). The normalization of sensible recreational drug use: further evidence from the North West England longitudinal study. *Sociology* 36:941-964.

Parrot, A., Morinau, A., Moss, M. and Scholey, A. (2004). *Understanding drugs and behaviour*. Chichester: John Wiley & Sons Ltd.

Petersen, R. C. 2006. *Drug dependence*. Microsoft Encarta [C D].

Rocha, S.L. (2007). Drinking practices, drinking related attitudes and public impressions of services for alcohol and other drug problems. Human science research council.

Steinberg. L (2011). *Adolescence*. 9th edition. New York, N.Y: Macgraw Hill.

Sale, G. (2008). Incidence and prevalence of Drug abuse in the community Zaria (Unpublished lecture); ABU. Kaduna.

S. (1988). *Morbidity and Mortality Weekly Report* 40: 63-71.

Stern, S.R. 2006. The role movies play in alcohol consumption by youths. *International Journal of Psychiatry* 3.2:34-35

Stephen, K. (2007) Alcohol use among soldiers in Bokavo contournment. (Unpublished) ABU, Zaria.

World drug report (2011). Retrieved on 24th July 2011 from (<http://who.int/topiuc/substance-abuse/en>).

World Health Organisation (2011). Retrieved on 24th may 2013 from
(http://www.who.int/topics/substance_abuse/en).

World Health Organisation 2010 annual report on drug addiction.
(http://www.who.int/topics/substance_abuse/en).

APPENDIX I

YOUTH DRUG SURVEY QUESTIONNAIRE

This questionnaire has been developed by the World Health Organization in cooperation with the United Nations Fund for Drug Abuse Control. The questions ask about drug use as well as your age. Whether you are a male or a female, and so on. Your answers will be looked at by people who are trying to learn more about drug use and will be compared with the answers made by young people in other parts of the world.

If this study is to be helpful, it is important that you should answer each question as carefully as possible. All your answers will be kept strictly confidential and we are not asking you your name. Most people enjoy filling in the questionnaire, and we hope that you will too. Ensure to read the instructions before you begin to answer.

Instructions

This not a test: there are no rights or wrong answers, but please answer carefully. For each question pick the answer that fits you the best and put an X in the box opposite that answer. Pick only one answer for each question. Look at the example below:

Have you drunk any water during the last 30 days?

☐ A No

☐ B Yes, on 1-5 days

☐ C Yes, on 6-19 days

☒ D Yes, on 20 or more days

The answer chosen was ñD, indicating that the person who answered the question had drunk water on 20 or more days during the previous 30 days.

If you do not know the answer to a question, or if you fell that you cannot answer honestly, leave the question blank. Complete as many questions as possible.

1. Are you a male or a female

a) Male ☐

b) Female ☐

2. What is your age? é é é é é é é é é é é é é é é

3. Which grade (class) are you in?

a) SSI ☐
☐

b) SSII

c) SSIII ☐

4. What is your school?

a) Male ☐

b) Female ☐

5. Where do you live?

- a) In the hostel ☐
- b) With my parents/other relatives ☐
- c) With my friends ☐
- d) In the village ☐
- e) In a small city or town ☐
- f) In a suburb of a large city ☐
- g) In a large city. ☐

6. How much education did your father received (mark the highest level attended?)

- a) No formal schooling ☐
- b) Primary school ☐
- c) Secondary or high school ☐
- d) University or other post
Secondary education ☐
- e) Don't know ☐

7. How much education did your mother received (mark the highest level attended?)

- a) No formal schooling ☐
- b) Primary school ☐
- c) Secondary or high school ☐

- d) University or other post ☐
Secondary education
- f) Don't know ☐

FOR EVERY QUESTION YOU MUST READ PARTS (a), (b), (c), and (d), AND ANSWER EACH PART

8. (a) Have you ever smoked, chewed, or sniffed any tobacco product (such as cigarettes, cigars, pipe tobacco, chewing tobacco)?

- a) No ☐
b) Yes ☐

- (b) Have you smoked, chewed, or sniffed a tobacco product in the past 12 months?

- a) No ☐
b) Yes ☐

- (c) Have you smoked, chewed, or sniffed a Tobacco product during the past 30 days?

- a) No ☐

- b) Yes ☐
- (d) How old were you when you first Smoked, chewed, or sniffed a tobacco product?
- d) How old were you when you first smoked or Chew tobacco product?
- a) Have never smoked or chew tobacco product
- b) 10 ï 12 years old
- c) 11 ï 12 years old
- d) 13 -14 years old
- e) 15 ï 16 years old
- f) 17 ï 18 years old
- g) 19 years old, or more
9. (a) Have you ever drunk any alcoholic beverage (including beer, wine, and spirits)?
- a) No ☐
- b) Yes ☐
- (b) Have you drunk any alcoholic beverage in the Past 12 months?
- a) No ☐
- b) Yes ☐

(c) Have you drunk any alcoholic Beverage during the past 30 days?

- a) No ☐
- b) Yes, on 1 ÷ 5 days ☐
- c) Yes, on 6 -19 days ☐
- d) Yes, on 20 more days ☐

(d) How old were you when you first had a drink of beer, wine or spirits ÷ more than just a sip?

- a) Have never drunk alcoholic beverage ☐
- b) 10 years old, or less ☐
- c) 11 ÷ 12 years old ☐
- d) 13 ÷ 1 years old ☐
- e) 15 ÷ 16 years old ☐
- f) 17 - 18 years old ☐
- g) 19 years old, or more ☐

10. (a) Have you ever taken any cannabis (marijuana, pot, hashish, grass, Bhang, Ganja)?

- a) No ☐

b) Yes ☐

(b) Have you taken any cannabis in the Past 12 months?

a) No ☐

b) Yes ☐

(c) Have you taken any cannabis during the past 30 days?

a) No ☐

b) Yes, on 1 ï 5 days ☐

c) Yes, on 6 -19 days ☐

d) Yes, on 20 more days ☐

(d) How old were you when you first take a Cannabis?

a) Have never taken cannabis

b) 10 years old , or less

c) 11 -12 years old

d) 13 ï 14 years old

e) 15 ï 16 years old

f) 17 ï 18 years old

g) 19 years old, or more

11. (a) Have you ever taken any cocaine?

a) No ☐

b) Yes ☐

(b) Have you taken any cocaine in the past 12 months?

a) No ☐

b) Yes ☐

(c) Have you taken any cocaine during the past 30 days?

a) No ☐

b) Yes, on 1 ï 5 days ☐

c) Yes, on 6 ï 19 days ☐

(d) How old were you when you first take cocaine

a) Have never taken cocaine ☐

b) 10 years old, or less ☐

c) 11 ï 12 years old ☐

d) 13 -14 years old ☐

e) 15 -16 years old ☐

f) 17 ï 18 years old ☐

g) 19 years old, or more

12. (a) Have you ever taken any Amphetamines or other stimulants (uppers, bennies, speed, pep pills, Diet pills) without a doctor or health Worker telling you to do so?

a) No ☐

b) Yes ☐

(b) Have you taken any Amphetamines or other stimulants in the past 12 months without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

(c) Have you taken any Amphetamines or other stimulants during the past 30 days without a doctor or Health worker telling you to do so?

a) No ☐

b) Yes, on 1 ï 5 days ☐

c) Yes, on 6 -19 days ☐

d) Yes, on 20 or more days ☐

(d) How old were you when you first took an Amphetamines or other amphetamines stimulant without a doctor or health worker telling you to take it?

a) Have never taken amphetamines ☐

b) 10 years old, or less ☐

c) 11 ï 12 years old ☐

d) 13 ï 14 years old ☐

e) 15 ï 16 years old ☐

f) 17 ï 18 years old ☐

g) 19 years old, or more

- (e) If you have ever taken amphetamines or other stimulants,
write in the name of the one you have taken most recently?

13. (a) Have you ever taken any hallucinogens (LSD, mescaline,
peyote, psilocybin, PCP)?

a) No ☐

b) Yes ☐

- (b) Have you taken any hallucinogens in the past 12 months

a) No ☐

b) Yes ☐

- (c) Have you taken any hallucinogens during the past 30 days?

a) No ☐

b) Yes, on 1 -5 years ☐

c) Yes, on 6-19 days ☐

d) Yes, on 20 or more days ☐

- (d) How old were you when you first took Hallucinogen?

- a) Have never taken Hallucinogens ☐
- b) 10 years old, or less ☐
- c) 11 ï 12 years old ☐
- d) 13 ï 14 years old ☐
- e) 15 ï 16 years old ☐
- f) 17 ï 18 years old ☐
- g) 19 years old, or more ☐

- (e) If you have ever taken hallucinogens, write in the name of
The one you took most recently.

17. (a) Have you ever sniffed or inhaled things (such as glue, aerosol
sprays, or other gases) to get high? (Do not include smoke)

- a) No ☐
- b) Yes ☐

- (b) Have you sniffed or inhaled things to get High in the past 12 months?

- a) No ☐
- b) Yes ☐

(c) Have you sniffed or inhaled things to get high during the past 30 days?

a) No ☐

b) Yes, on 1- 5 days ☐

c) Yes, on 6 -19 days ☐

d) Yes, on 20 or more days ☐

d) How old were you when you first Sniffed or inhaled something to get high?

a) Have never sniffed or inhaled anything to get high ☐

b) 10 years old, or less ☐

c) 11 ï 12 years old ☐
☐

d) 13 ï 14 years old

(e) If you have ever sniffed or inhaled things, write in the name of the thing you have sniffed or inhaled most recently

18. (a) Have you ever taken any tranquillizers (Librium, Valium, Miltown) without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

(b) Have you taken any tranquillizers in the past 12 months without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

(c) Have you taken any tranquillizers during the past 30 days without a doctor or health worker telling you to do so?

a) No ☐

b) Yes, on 1 ÷ 5 days ☐

c) Yes, on 6 ÷ 19 days ☐

d) Yes, on 20 or more days ☐

(d) How old were you when you first took a tranquillizer without a doctor or health worker telling you to do so?

a) Have never take tranquillizers

b) 10 ÷ 12 years old

c) 11 ÷ 12 years old

d) 13 -14 years old

e) 15 ÷ 16 years old

f) 17 ÷ 18 years old

g) 19 years old, or more

- (e) If you have ever taken tranquilizers Write in the name of the one you have taken most recently -----

19. (a) Have you ever taken any sedatives (barbiturates, downers, good balls, seconal) without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

- (b) Have you taken any sedatives in the past 12 months without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

- c) Have you taken any sedatives during the past 30 days without a doctor or health worker telling you to do so?

a) No ☐

b) Yes, on 1 -5 days ☐

c) Yes, on 6 -19 days ☐

d) Yes, on 20 or more days ☐

- d) How old were you when you first took a sedatives without a

doctor or health worker telling you to do so?

- a) Have never take sedatives
- b) 10 ï 12 years old
- c) 11 ï 12 years old
- d) 13 -14 years old
- e) 15 ï 16 years old
- f) 17 ï 18 years old
- g) 19 years old, or more

If you have ever taken sedatives write in the name of the one you
have taken most recently -----

20. (a) Have you ever smoked or eaten any opium without a doctor
on health worker telling you to do so?

- a) No ☐
- b) Yes ☐

(b) Have you smoked or eaten any opium in the past 12 months without a doctor or
health worker telling you to do so?

- a) No ☐
- b) Yes ☐

c) Have you smoked or eaten any opium during the past 30days without a doctor or health worker telling you to do so?

- a) No ☐
- b) Yes, on 1 -5 days ☐
- c) Yes, on 6 -19 days ☐
- d) Yes, on 20or more days ☐

d) How old were you when you first smoked or ate any opium without a doctor or health worker telling you to do so?

- b) Have never take or smoked opium
- b) 10 ï 12 years old
- c) 11 ï 12 years old
- d) 13 -14 years old
- e) 15 ï 16 years old
- f) 17 ï 18 years old
- g) 19 years old, or more

21. (a) Have you ever taken any heroin (horse, smack, H)

- a) No ☐

b) Yes ☐

(b) Have you taken any heroin in the past 12 months

a) No ☐

b) Yes ☐

(c) Have you taken any heroin during the past 30 days

a) No ☐

☐

b) Yes, on 1 -5 days

☐

c) Yes, on 6 -19 days

d) Yes on 20 or more days

☐

d) How old were you when you first take heroin

a) Have never take or smoked Heroine

b) 10 ÷ 12 years old

c) 11 ÷ 12 years old

d) 13 -14 years old

e) 15 ÷ 16 years old

f) 17 ÷ 18 years old

g) 19 years old, or more

22. (a) Have you ever taken any other opiate (methadone, morphine, condeine, demerol, paregoric) without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

(b) Have you taken any of these opiate in the past 12 months without a doctor or health worker telling you to do so?

a) No ☐

b) Yes ☐

c) Have you taken any these opiates during the 30days without a doctor or health worker telling you to do so?

a) No ☐

☐

e) Yes, on 1 -5 days

☐

f) Yes, on 6 -19 days

g) Yes on 20or more days

☐

d) How old were you when you first took any of these opiates without a doctor or health worker telling to do so?

- a) Have never take or smoked opiates ☐
- b) 10 ï 12 years old ☐
☐
- c) 11 ï 12 years old ☐
- d) 13 -14 years old
- e) 15 ï 16 years old ☐
☐
- f) 17 ï 18 years old ☐
- g) 19 years old, or more

23. (a) Are there any other drugs not mentioned that you have taken
in the past year without a doctor or health worker telling you to do so?

- a) No ☐
- b) Yes ☐

(b) If yes, write in the name of drug or drugs here.

24. (a) Do you know of any other drugs that people are now taking
to make them feel good or intoxicated?

- a) No ☐
- b) Yes ☐

(b) If yes, what are these drugs called?

25. If you had ever used any cannabis, would you have admitted it in this questionnaire?

a) No ☐

b) Not sure ☐

c) Yes ☐

26. If you have ever used any opium or heroin, would you have admitted it in this questionnaire?

a) No ☐

b) Not sure ☐

c) Yes ☐

27. Route of drug administration what method have you used for taking heroine? (Mark all that apply)

a) Sniffed or ñsnorting: ☐

b) Smoking ☐

c) Injection ☐

d) By mouth ☐

e) Others (please specify) _____

28. Source of introduction to drug use who introduced you to non-medical drug use (Please check one box only)

- a) Family ☐
- b) Casual acquaintance ☐
- c) Friends ☐
- d) Drug pusher ☐
- e) Doctor (Physician) ☐
- f) Other health practitioners ☐
- g) Pharmacists or druggist ☐
- h) Other (Please specify) _____

29. Reason for first non-medical drug use what was the reason for your first non-medical drug use? (Please check one box only)

- a) Religious custom ☐
- b) To be accepted by others ☐
- c) To be sociable ☐
- d) Enjoyment ☐
- e) Enhancement of sex ☐
- f) Curiosity ☐
- g) Treatment of health disorder ☐
- h) Relief to psychological stress ☐
- i) Relief of cold, hunger, or fatigue ☐

- j) Improvement of work performance
- k) Others (please specify) _____
- l) Don't know ☐

30. Approval or disapproval of drug use individuals differ in whether or not they disapprove of people doing certain things, do you disapprove of people (who are 18 or older) doing the following? (Mark one box for each question)

a) Smoking 20 or more cigarettes a day ☐ Don't disapprove
☐ Disapprove
☐ Strongly disapprove

b) Trying marijuana (Cannabis, Pot, grass) once or twice. ☐ Don't disapprove
☐ Disapprove
☐ Strongly disapprove

c) Smoking marijuana occasionally ☐ Don't disapprove
☐ Disapprove
☐ Strongly disapprove

d) Smoking marijuana regularly ☐ Don't disapprove
☐ Disapprove
☐ Strongly disapprove

e) ----- ☐ Don't disapprove
(Other drug-related behaviour of ☐ Disapprove
Interest to be investigated) ☐ Strongly disapprove

31. Perceived availability how difficult do you think it would be for you to get each of the following types of drug if you wanted some? (Mark one box for each question?)

a) Marijuana (cannabis, pot, grass) ☐ Probably impossible
☐ Very difficult
☐ Fairly difficult
☐
☐ Fairly easy
Very easy

b) Amphetamines and other stimulants ☐ Probably impossible
☐ Very difficult
☐
☐ Fairly difficult
Fairly easy
☐ Very easy

c) Cocaine ☐ Probably impossible
(Other drug of interest to the V ☐ difficult
Investigator) ☐ Fairly difficult
☐ Fairly easy
☐ Very easy

32. The sort of people who use drugs. Drug use has different meaning for different people. We want to know how you think most people of your age view others who use various drugs.

Most people of my age believe that those who use marijuana and other such drugs are:

- a) Ambitious
- | | |
|--------------------------|------------------------|
| ☐ | Much less than average |
| ☐ | Less than average |
| ☐ | About average |
| ☐ | More than average |
| | Much more than average |
- b) Antisocial
- | | |
|--------------------------|------------------------|
| ☐ | Much less than average |
| ☐ | Less than average |
| ☐ | About average |
| ☐ | More than average |
| | Much more than average |

Thank you for completing this questionnaire

APPENDIX II

Statistics of Arrests Nationwide by NDLEA (2010)

S/N	COMMAND/OPS UNIT	ARRESTS			
		M	F	TOTAL	%
1.	KANO STATE	618	20	638	9.40
2.	KATSINA STATE	399	12	411	6.05
3.	RIVERS STATE	299	48	347	5.11
4.	ANAMBRA STATE	247	33	280	4.12
5.	EDO STATE	238	42	280	4.12
6.	KADUNA STATE	261	4	265	3.90
7.	SOKOTO STATE	243	21	264	3.89
8.	LAGOS STATE	199	26	225	3.31
9.	BAUCHI STATE	197	4	201	2.96
10.	MMIA AIRPORT	172	28	200	2.95
11.	OYO STATE	186	3	189	2.78
12.	JIGAWA STATE	182	3	185	2.73
13.	FCT	181	Nil	181	2.67
14.	OSUN STATE	161	12	173	2.55
15.	YOBE STATE	171	2	173	2.55
16.	ONDO STATE	154	16	170	2.50
17.	OGUN STATE	147	20	167	2.46
18.	AKWA IBOM STATE	132	30	162	2.39
19.	ABIA STATE	134	15	149	2.20

20.	EKITI STATE	130	17	147	2.17
21.	ADAMAWA STATE	143	3	146	2.15
22.	TARABA STATE	128	15	143	2.11
23.	ENUGU STATE	121	8	129	1.90
24.	BENUE STATE	105	19	124	1.83
25.	KEBBI STATE	113	3	116	1.71
26.	SEME (BORDER)	101	11	112	1.65
27.	IMO STATE	98	11	109	1.61
28.	DELTA STATE	84	21	105	1.55
29.	BAYELSA STATE	103	NIL	103	1.52
30.	ZAMFARA STATE	98	3	101	1.49
31.	NIGER STATE	94	NIL	94	1.38
32.	BORNO STATE	89	3	92	1.36
33.	KWARA STATE	82	4	86	1.27
34.	EBONYI STATE	66	16	82	1.21
35.	KOGI STATE	76	1	77	1.13
36.	PLATEAU STATE	74	3	77	1.13
37.	DOGI (HEADQUARTERS)	76	NIL	76	1.12
38.	CROSS RIVERS STATE	55	7	62	0.91
39.	GOMBE STATE	59	2	61	0.90
40.	NASSARAWA STATE	34	1	35	0.52
41.	IDROKO (BORDER)	17	1	18	0.27
42.	JTF (HQ LAGOS)	10	NIL	10	0.15

43.	PHPORT (SEA PORT)	4	1	5	0.07
44.	TINCAN (SEA PORT)	5	-	5	0.07
45.	MET (HQ LAGOS)	2	1	3	0.04
46.	NAIA (AIRPORT)	3	NIL	3	0.04
47.	PHIA (AIRPORT)	2	1	3	0.04
48.	APAPA (SEA PORT)	2	NIL	2	0.03
49.	MAKIA (AIRPORT)	1	1	2	0.03
	TOTAL	61296	492	6,788	100

Table 2.4 NDLEA 2010 Annual Report

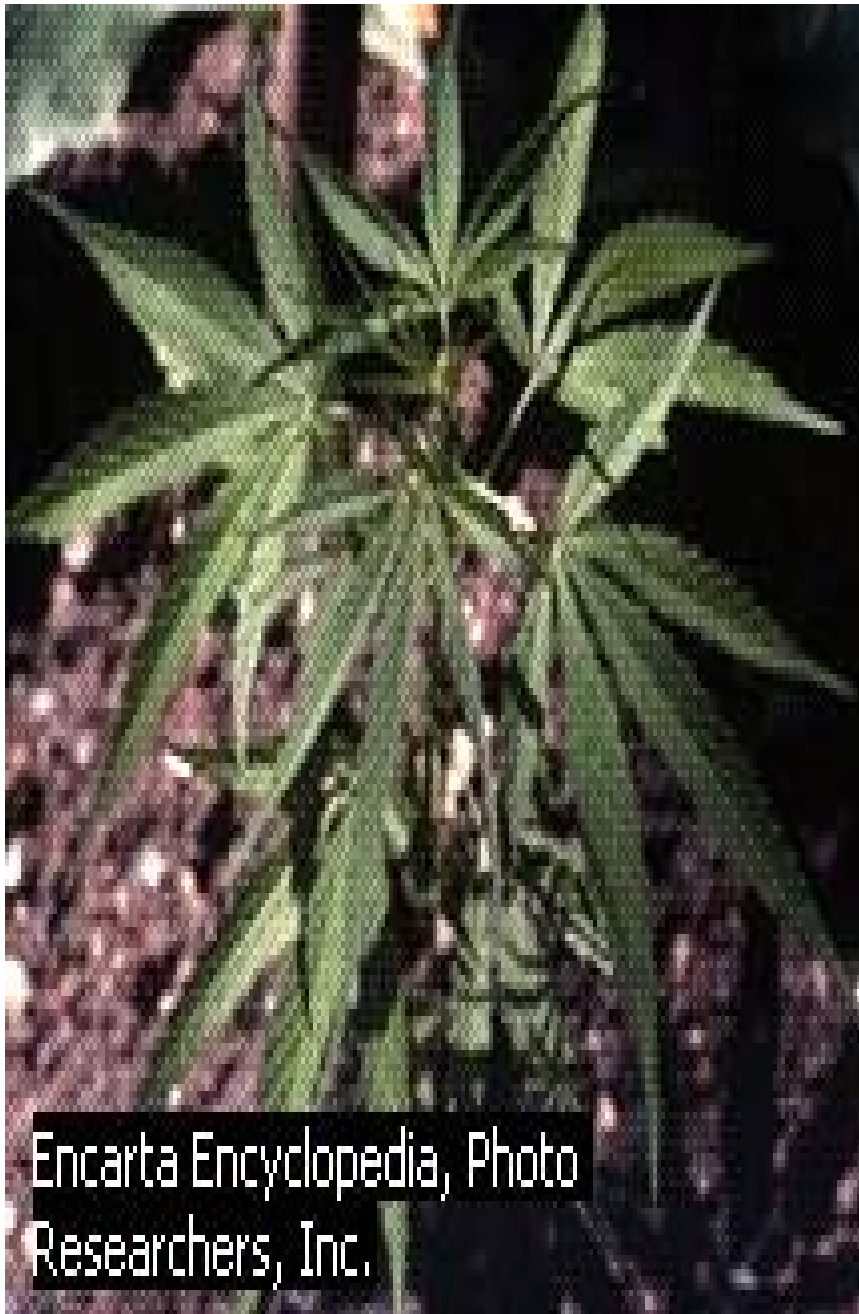
APPENDIX III

Arrests by Geopolitical Zones

GEOPOLITICAL ZONES	MALES	FEMALES	TOTAL	%
NORTH WEST	1,914	66	1,980	32.10
SOUTH WEST	977	94	1,071	17.36
SOUTH SOUTH	911	148	1,059	17.17
NORTH EAST	787	29	816	13.23
SOUTH EAST	666	83	749	12.14
NORTH CENTRAL	465	28	493	7.99
TOTAL	5,720	448	6,168	100

Table 2.5 (NDLEA 2010 Annual Report)

APPENDIX IV



Encarta Encyclopedia, Photo
Researchers, Inc.

Figure 2.0. Marijuana plant.

(Adapted from Redmond, W.A.2005. Microsoft Corporation).

APPENDIX V

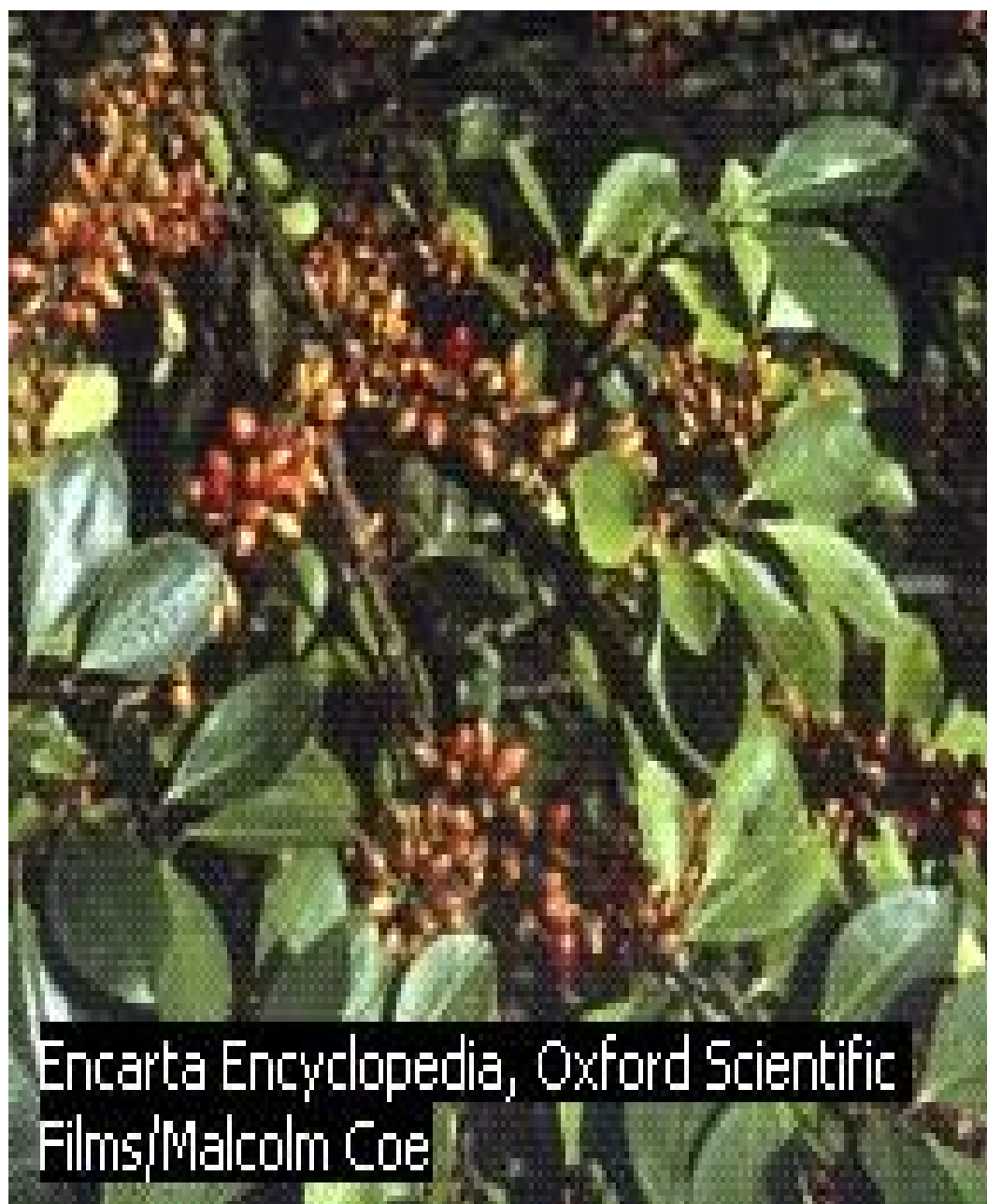


Figure 2.1 . Coca plant.

(Adapted from Petersen, 2006. Drug dependence. Microsoft Encarta [C D]).

APPENDIX VI

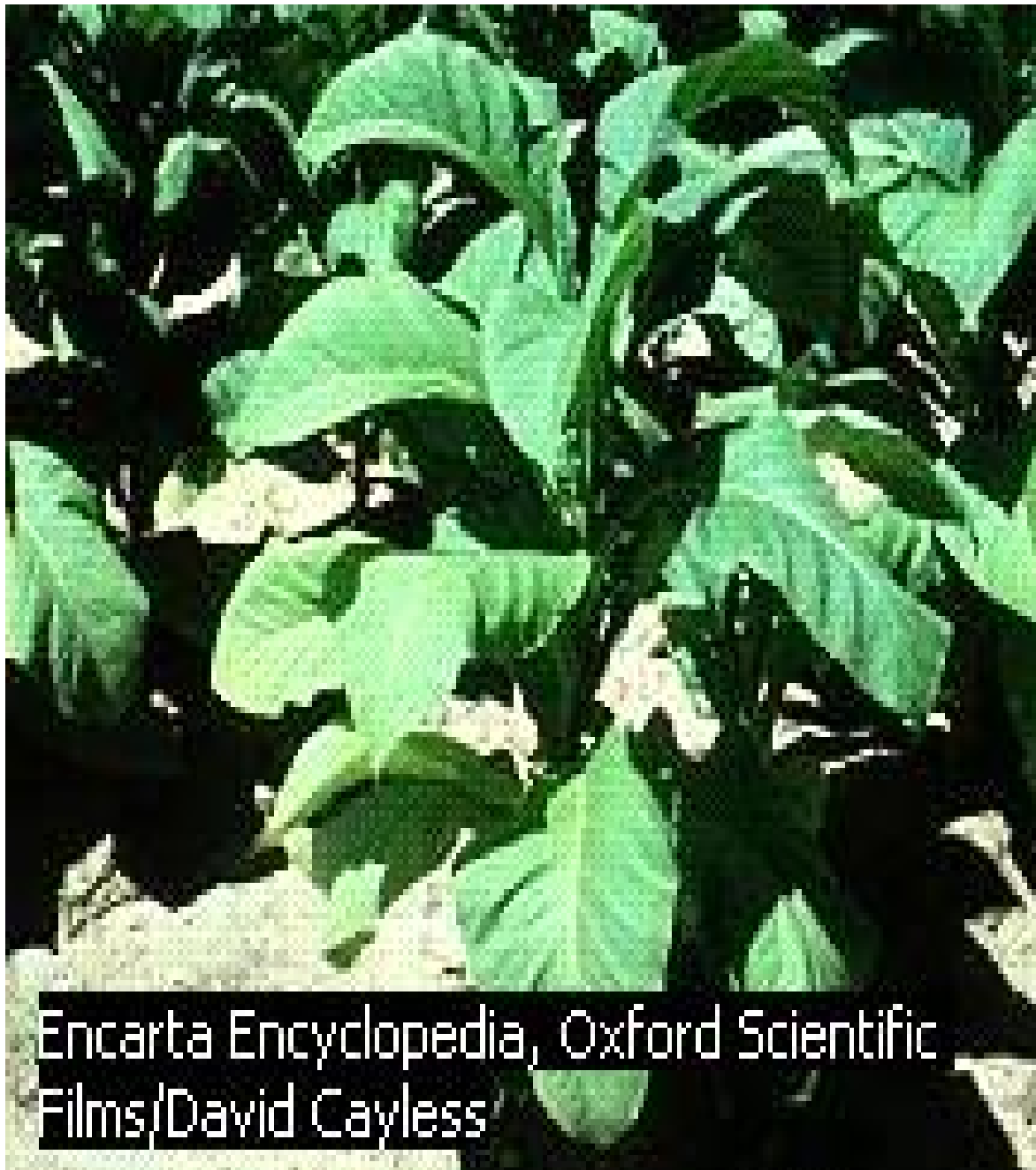


Figure 2.2. Tobacco plant.

(Adapted from Redmond, 2005. Microsoft Corporation).

APPENDIX VII

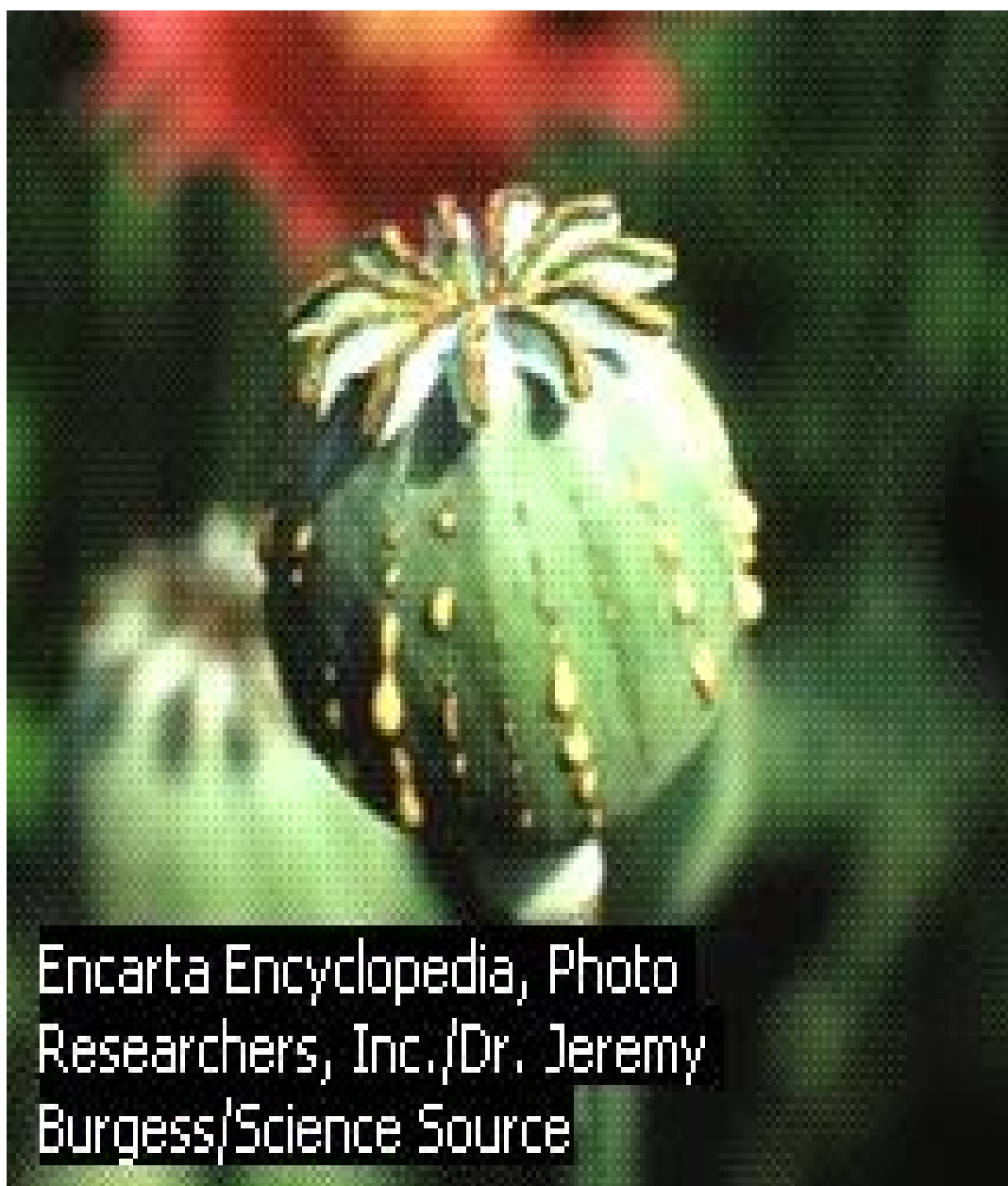


Figure 2.3.Opium poppy.

(Adapted from Petersen, 2006. Drug dependence. Microsoft Encarta [C D]).

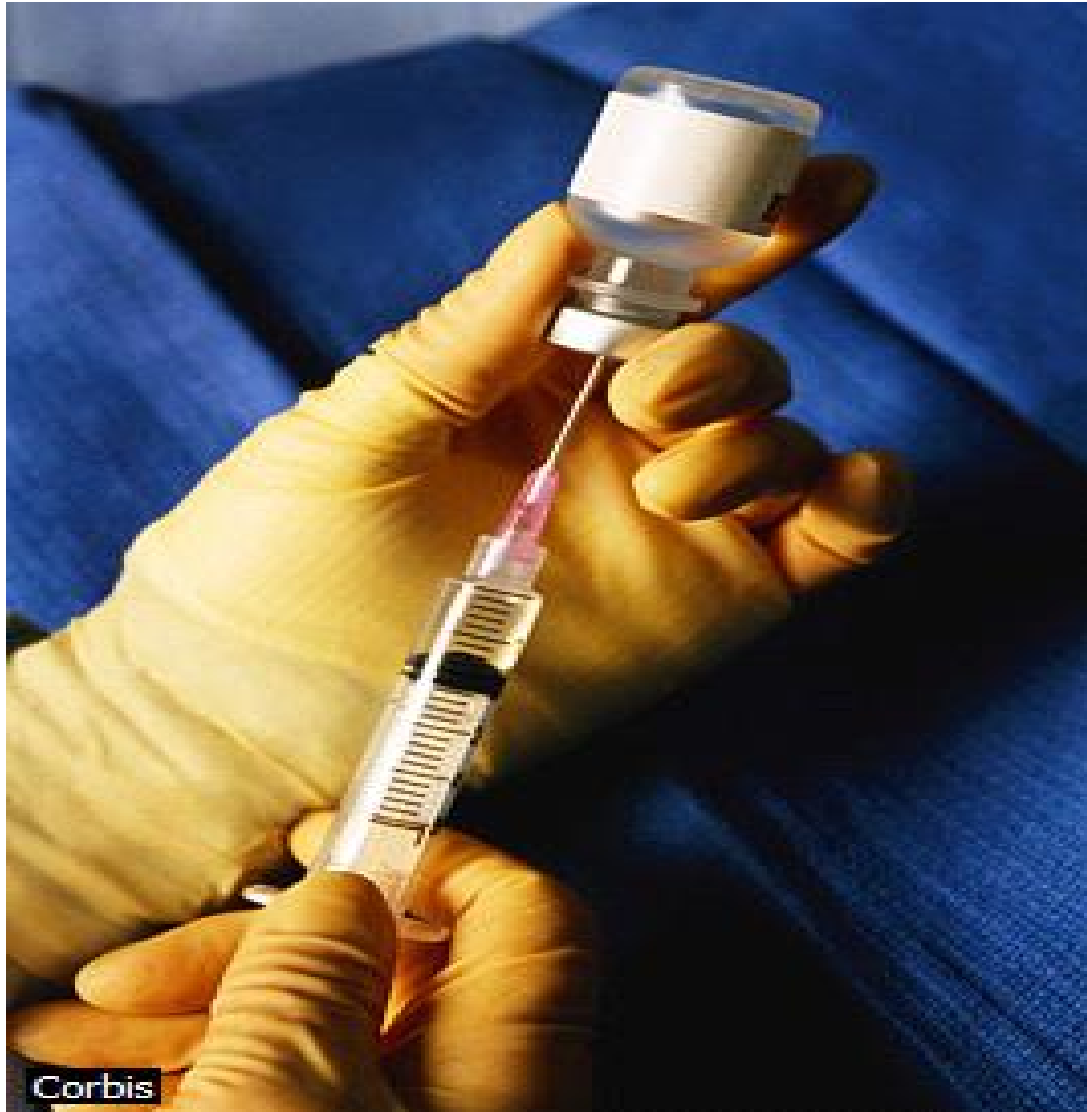
APPENDIX VIII



Figure 2.4. Cigarette advertising.

(Adapted from Microsoft Encarta.1993 – 2005. Microsoft Corporation).

APPENDIX IX

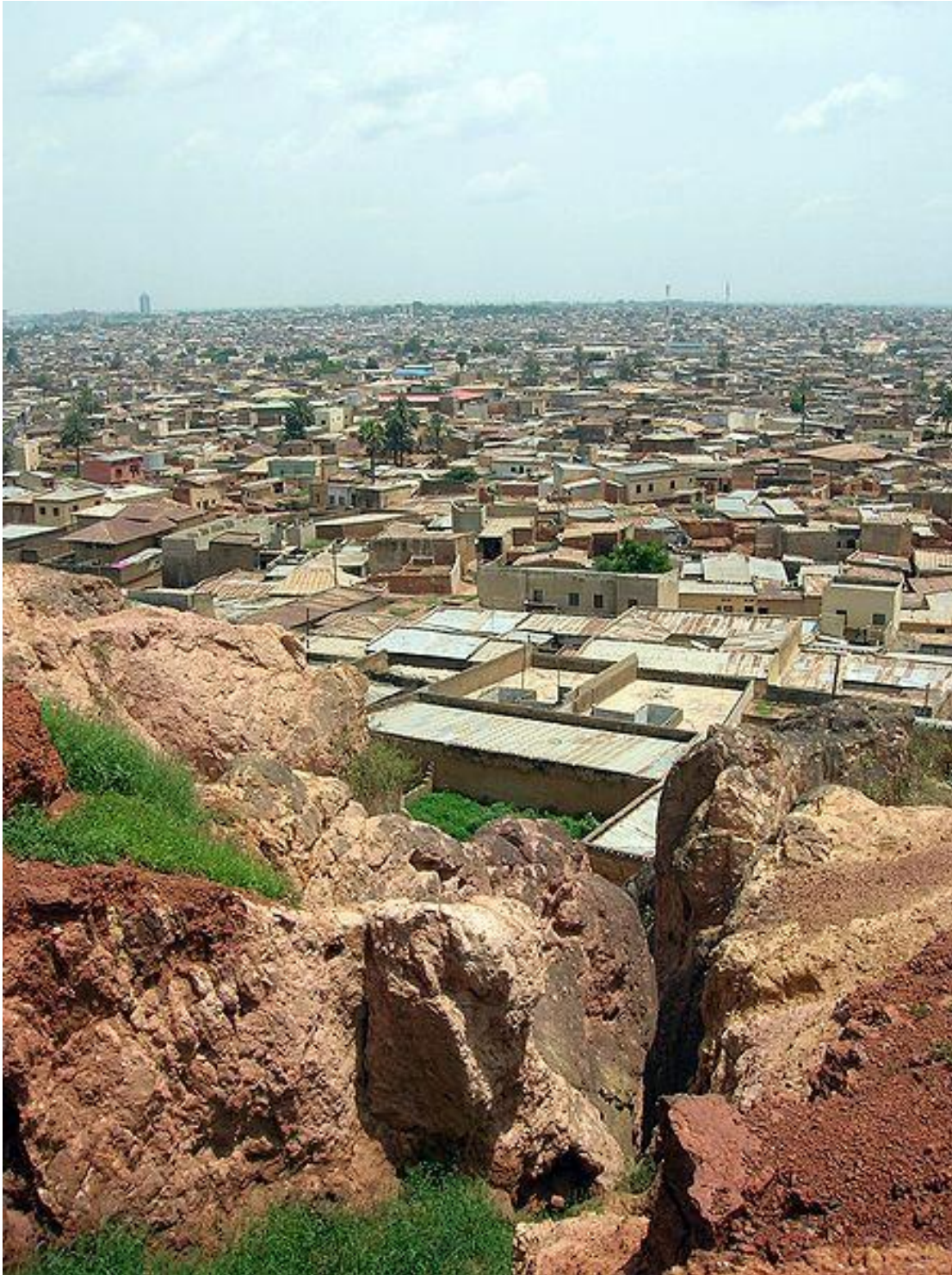


Syringe

Figure 2.5 Method of Drug Administration

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APPENDIX X



Aerial view of Dala LGA from Dala Hill