

# A study of the context of adolescent substance use and patterns of use in yenagoa local government, bayelsa state, Nigeria

## Abstract

**Background:** In the Study, A Study of the Context of Adolescent Substance Use and Patterns of Use in Yenagoa Local Government, Bayelsa State, Nigeria. The most commonly use substance among adolescents in Yenagoa Local Government was examined, the extent to which these substances are used by adolescents in Yenagoa Local Government was determine and make the necessary recommendations from the findings to Bayelsa state government on how preventive measures can be introduced.

**Materials and method:** Purposive sampling technique was applied in selecting the rural community each from the Yenagoa Local Government Areas respectively. Simple random sampling techniques were used in selecting the respondents. Respondents were randomly selected based on personal interview method with the aid of drafted questionnaires. Twenty-five (25) communities were visited in Yenagoa Local Government of Bayelsa State

**Results:** Results of the study indicated that the prevalence level of cocaine (13.8%) among the respondents was low but need to be given proper attention, with male 251(65.2%) respondents indulging in the habit more than the females 134(34.8%). It further showed that majority of the respondents, were between age group 18-20 years (37.7%) and majority of the respondents had secondary education (42.1%). Also, larger percentage of the respondents were single (90.1%) as at the time of the study and 83.1% of the respondents were Christians, 13.8% were Islam while 3.1% practiced other religious. Finally, the result showed that alcoholic beverages (33.2%) followed by cigarettes (26.8%) were the most commonly used substance among adolescence in Yenagoa Local Government Area. Further interview revealed that cigarettes, marijuana and alcoholic beverages were taken regularly while cocaine was taken occasionally.

**Conclusion:** The study concludes that the all stakeholders should step-up mass education and information sharing on the dangers inherent in substance abuse. Also, citizen advocacy should be intensified and encouraged on the health impact of substance use.

**Keywords:** adolescent, substance use, citizen advocacy, pattern, extent, militancy, yenagoa

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## Introduction

Substance use is a problem in society among adolescents. Adolescent substance use has declined from the mid-1990s, but other illicit substances, such as amphetamines and hallucinogens, has remained the same.<sup>1</sup> The constant interaction with peers exacerbates the easy availability of substances to the adolescents because there are more doors open to where they are able to obtain substances. In 2009, the Substance Abuse and Mental Health Services Administration<sup>2</sup> conducted the National Survey on Drug Use and Health (NSDUH) to analyze the prevalence of substance use among adolescents age 12 to 18. They found out that there was an increase in the number of adolescents using substances since 2002.<sup>3,4</sup> There were 21.8million estimated adolescents age 12 to 18 years who used illicit drugs in prior months before taking the survey, increasing from 20.1 million adolescent users in 2008.<sup>3,4</sup> The survey's findings suggested that adolescents' negative attitudes about substances were beginning to change; for example, the negative attitude towards marijuana declined from 9% and 7% between 2008 and 2009.<sup>3,2</sup> The results of the National Survey on Drug Use and Health suggested that adolescents were being misinformed about substances, which had changed the adolescents' perception of the risk in marijuana use.<sup>3,2</sup>

Research on preventing adolescent substance use has shown that adolescents rarely communicated with their parents about the issue.<sup>1</sup> Miller-Day and Dodd<sup>5</sup> suggested adolescents that were taught about the risks of substance use by their parents were 45% less likely to experiment with any type of substance. Risk factors of adolescent substance use have indicated which adolescents were more likely than others to use substances.<sup>6</sup> There are a number of risk factors that can contribute to an adolescent experimenting with a substance, such as lack of family cohesion, poor parent-adolescent relationship, and substance using friends, which are all risk factors associated with adolescent substance use.<sup>7</sup> Substance use in adolescents may not be specifically associated with just one risk factor, but with several risk factors that may lead to the adolescent experimenting with a substance.<sup>8</sup>

## Objectives of the study

This study focuses on A Study of the Context of Adolescent Substance Use and Patterns of Use in Yenagoa Local Government, Bayelsa State, Nigeria.

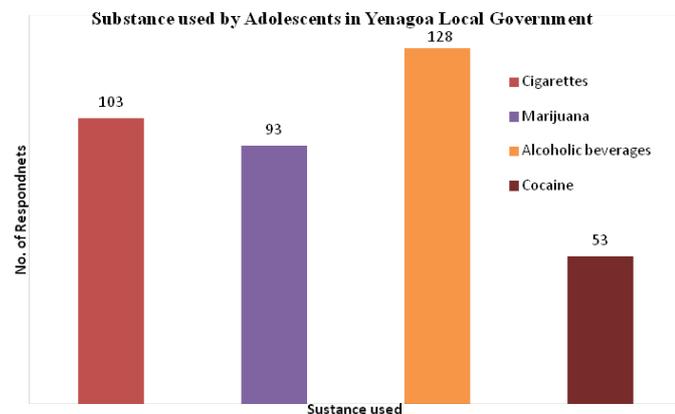
To achieve this, the following specific objectives were to:

- Determine the most commonly used substance among adolescents in Yenagoa Local Government.
- Determine the extent to which these substances are used by adolescents in Yenagoa Local Government.
- Make the necessary recommendations from the findings to Bayelsa state government on how preventive measures can be introduced.

## Research methods

### Description of the study area

Yenagoa became a state Capital when Bayelsa state was created in 1996, Yenagoa is geographically located between latitude 4° 47' 15" and 5° 11' 55" Northings and Long. 6° 07' 35" and 6° 24' 00" Eastings (Figure 1). The LGA has an area of 706 km<sup>2</sup> and a population of 353,344 comprising of 187,791 male and 165,553 females with an annual exponential growth rate of 2.9 as at the 2006 National Census.<sup>9</sup> Yenagoa Local Government Area (LGA) is bounded by Mbiama communities of Rivers State on the north and East, Kolokuma/Opokuma LGA on the north west, Ogbia LGA on the south and Southern Ijaw on the west, Ogbia LGA on the South East and Southern Ijaw on the South west.<sup>10,11</sup> Yenagoa Local Government Area is located on the banks of Ekole Creek the latter being one of the major river courses making up the Niger Delta's river,<sup>12</sup> with only one political/administrative ward namely: Epie-Atisa.<sup>11</sup> There are 21 communities within the study area namely; Igbogene, Yenegwe, Akenfa, Edepie, Agudama, Akenpai, Etegwe, Okutukutu, Opolo, Biogbolo, Yenizue-Gene, Kpansia, Yenizue-Epie, Okaka, Azikoro, Ekeki, Amarata, Onopa, Ovom, Swali, Yenagoa.



**Figure 1** Bar chart showing substance used by adolescents in Yenagoa Local Government.

Yenagoa Local Government Area is the traditional home of the Ijaw people, Nigeria's fourth largest ethnic group after the Hausa, Yoruba and Igbo. The Ijaws form the majority of the town. English is the official language, but Epie/Atissa language, one of the Ijaw languages, is the major local language spoken in Yenagoa. Other Ijaw dialects include Tamu, Mein, Jobu, Oyiriri, and Tarakiri. There are other pockets of ethnic groups such as Urhobo and Isoko. There are local dialects in some places. Other notable languages in the LGA are Epie, Atisa, Nembe and Ogbia. Christianity and traditional religion are the two main religions in the State. The culture of the people is expressed in their unique dresses, festivals, dietary habits, arts and crafts, folklore and dancing. These distinguish the people from other ethnic groups. The major crafts include canoe building, fish net and fish traps making, pottery, basket and mat making.

### Research design

The study designs adopted for this research work were quantitative analysis and descriptive research method. Aggregate data were analyzed for the purpose of this research. Structured questionnaire were used for collection of primary data.

### Population of the study

The population of the study 352,285 residents of Yenagoa Local Government comprising of 182,240 males and 170,045 females<sup>13</sup> and the population was projected to 2017 using annual exponential growth rate of 2.9% as population growth rate as at the 2006 National Census.<sup>9</sup> This gives projected population of 482462 people.

### Sample size

A sample size of 400 was estimated using Taro Yamane formula as presented below:

$$n = \frac{N}{1+N(e)^2}$$

Where,  $N$  = population size = 482462,  $e$  = level of significance = 0.05.

$$n = \frac{482462}{1+482462(0.05)^2}$$

$$n = \frac{482462}{1+482662(0.0025)}$$

$$n = \frac{482462}{1+1206.155}$$

$$n = \frac{482462}{1207.155} = 399.67$$

Hence, the sample size was approximated to 400.

Four hundred was settled for, as the sample size for the study. The sample size is considered adequate for the study. The sample size was distributed evenly among the selected rural communities in Yenagoa Local Government Areas as shown below:

### Sampling methods

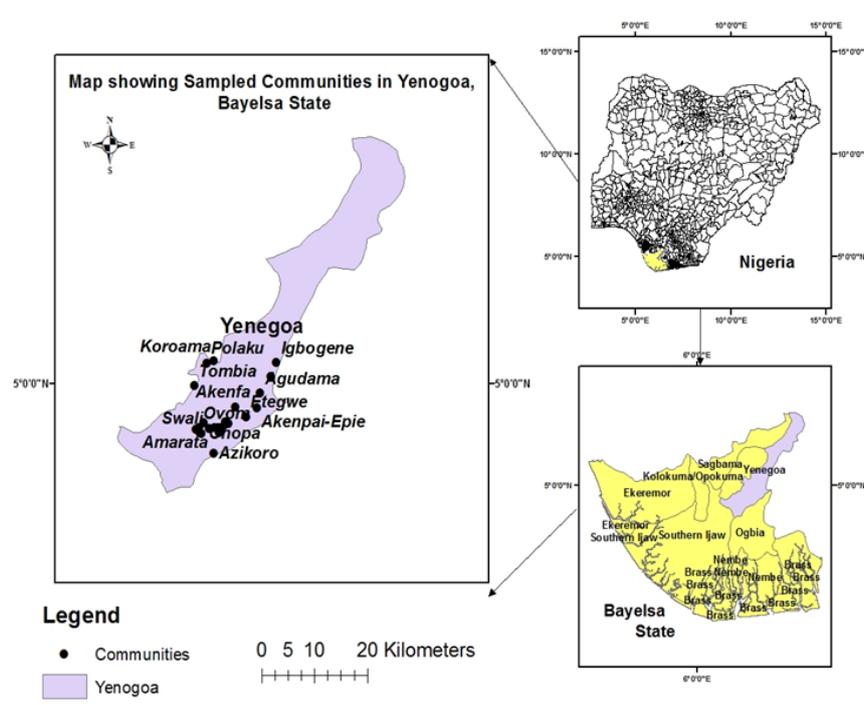
To enhance the reliability of the research work and achieve the desired goal, purposive sampling technique was applied in selecting the rural community each from the Yenagoa Local Government Areas respectively. Simple random sampling techniques were used in selecting the respondents. Respondents were randomly selected based on personal interview method with the aid of drafted questionnaires. Twenty-five (25) communities were visited in Yenagoa Local Government of Bayelsa State (Figure 2).

### Instrument for data collection

The research instruments used for data collection were:

- Structured questionnaire
- Oral interview

Questionnaire: This is a paper, which bears some questions that were answered by the selected respondent. The questionnaire contained questions framed to elicit relevant information from the respondents on the context of adolescent substance use and patterns of use in Yenagoa Local Government, Bayelsa State, Nigeria.



**Figure 2** Map of bayelsa state showing the study area.

Interview: This is a reliable method of collecting information where face-to-face verbal communication was employed.

### Method of data analysis

Data obtained were analyzed using both descriptive analysis and inferential statistics. Data was analyzed descriptively using frequency and percentage while Result was presented in table and data was also presented pictorially using charts.

### Ethical consideration

During the course of this research work, the participants were accorded the due respect so as to ensure co-operation and information collected were treated with utmost confidentiality. The cultures of the community were also respected during the course of the research work. Informed consent was obtained from all of the participants.

### Constraints/limitation of study

There are a number of limitations that need to be highlighted. The first limitation pertains to the questionnaire. Questionnaire was a self-report measure and thus it provides no potential for assessing whether respondents were faking good or faking bad or neither. It also relied on their self-knowledge and subjective experience of situations and this may impact the accuracy of the results. Research has however shown that even when illegal behaviors are being reported on, that the reliability of these self-reports are high with only a small tendency towards over and under-reporting and that overall self-reports provide distinct and very powerful measures.<sup>14</sup> Thus, the study may not be as accurate as assumed, as an underlying belief is that all respondents were honest with their responses. However, questions are exhaustive, and the hypotheses were derived based on the questions asked. Thus, the questions align perfectly with answering the proposed research questions thereby preserving construct validity. Also, because of the sensitive nature of this topic, they may underreport their own drug use. Secondly, the level of education of some of our respondents made

it difficult to some terms in the questionnaire and language was also a barrier because some of them do not speak English. Also, some of them asked to be given financial rewards to enable them to participate in the exercise. Additionally, because of the sensitive nature of the research and the volatility nature of the study area, the researcher in company with the various community mobilizers were used to distribute the questionnaires to the sample population. Perhaps the most felt limitation of the study was the recent flooding being witness in Bayelsa State. This covers seven (7) local government out of eight (8) local government including Yenagoa and its environs thereby posing a challenge in retrieving some of the questionnaires.

## Results and discussion

### Results

#### Response Rate/ Completeness of Data

The response rate was 100%, however, out of the 400 copies of the questionnaire administered, 384 copies representing 96% were retrieved and found useable. All results of data analysis were based on the retrieved questionnaire.

#### Demographics of the respondents

Result in Table 1 reveals the gender distributions, 251(65.2%) of the respondents in the sample were males while 134(34.8%) are females, showing male predominance in the population. Result reveals that most of the adolescent sampled were male (65.2%). Among the age brackets, result presented in Table 2 reveals that 3.9% of the respondents were below 12 years, 6.0% were between 12-14 years 20.8% were between 15-17 years. Result also shows that 37.7% of the respondents were between 18-20 years. Result show that 31.7% of the respondents fall above 20 years. From the result presented so far, it can be deduced that majority of the respondents were between age group 18-20 years (37.7%).

**Table 1** Distribution of respondents by sex

Sex	No. of respondents	Percentage (%)
Male	251	65.2
Female	134	34.8
Total	385	100

Source: Field Survey, 2018.

**Table 2** Distribution of the respondents by age

Age (Years)	No. of respondents	Percentage (%)
Below 12	15	3.9
12-14	23	6
15-17	80	20.8
18-20	145	37.7
Above 20	122	31.7
Total	385	100

Source: Field Survey, 2018.

In the respondents' level of education, result in Table 3 reveals that 1.6% of the respondents had no formal education, 3.1% had primary education, 42.1% had secondary education, 14.5% had technical/vocational education, 23.1% had Polytechnic education while the remaining 15.6% had university education. From the result, it can be deduced that majority of the respondents had secondary education (42.1%) Table 4. Result shows that 90.1% of the respondents were single, 9.4% were married and only 0.5% were Widowed/Separated/Divorced. Based on the result, larger percentage of the respondents were single (90.1%) as at the time of the study. Result in Table 5 shows that 83.1% of the respondents were Christians, 13.8% were Islam while 3.1% practiced other religious.

**Table 3** Distribution of the respondents by highest level of education

Level of education	No. of respondents	Percentage (%)
No formal Education	6	1.6
Primary	12	3.1
Secondary	162	42.1
Technical/Vocational	56	14.5
Polytechnic	89	23.1
University	60	15.6
Total	385	100

Source: Field Survey, 2018.

**Table 4** Distribution of the respondents by marital status

Marital status	No. of respondents	Percentage (%)
Single	347	90.1
Married	36	9.4
Widowed/Separated/Divorced	2	0.5
Total	385	100

Source: Field Survey, 2018.

**Table 5** Distribution of the respondents by religion

Religion	No. of respondents	Percentage (%)
Christianity	320	83.1
Islam	53	13.8
Other	12	3.1
Total	385	100

Source: Field Survey, 2018.

## Answering of research questions

### Research question 1

What is the most commonly used substance among adolescents in Yenagoa Local Government?

Result in Table 6 reveals that 26.8% of the respondent used cigarettes, 24.2% used marijuana, 33.2% said they use alcoholic beverages while 13.8% of the respondent said they used cocaine. Based on the result, alcoholic beverages (33.2%) followed by cigarettes (26.8%) were the most commonly used substance among adolescence in Yenagoa Local Government Area. Result is also depicted using bar chart as shown below. The graph also shows that the commonest used substance is alcohol beverages.

**Table 6** Responses on commonly used substance among adolescents in yenagoa local government

Substance	No. of respondents	Percentage (%)
Cigarettes	103	26.8
Marijuana	93	24.2
Alcoholic beverages	128	33.2
Cocaine	53	13.8

Multiple responses applied. Source; Field Survey, 2018.

### Research question 2

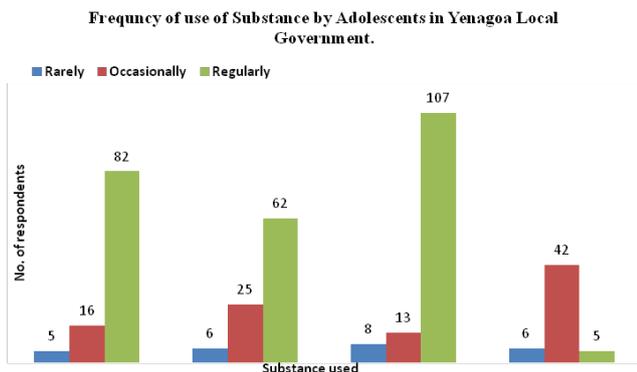
What is the extent to which these substances are used by adolescents in Yenagoa Local Government?

Table 7 shows the extent of use of substance by adolescence in Yenagoa Local Government Area. Result reveals that majority of the adolescent who use cigarettes, used it regularly (79.6%) while marijuana (66.7%) and alcoholic beverages were also taken regularly by most of the respondents who indicated that they take these substances. For cocaine, the majority of the respondents take it occasionally. Therefore, cigarettes, marijuana and alcoholic beverages were taken regularly while cocaine was taken occasionally.

**Table 7** Extent of use of substances by adolescent in yenagoa local government area

Substance	Rarely n (%)	Occasionally n (%)	Regularly n (%)	Total
Cigarettes	5(4.9)	16(15.5)	82(79.6)	103
Marijuana	6(6.5)	25(26.9)	62(66.7)	93
Alcoholic beverages	8(6.3)	13(10.2)	107(83.6)	128
Cocaine	6(11.3)	42(79.2)	5(9.4)	53

Source: Field Survey, 2018.



**Figure 3** Cluster bar chart showing frequency of use of substance by adolescents in Yenagoa Local Government.

## Discussion

### Discussion of findings

The findings of the study go in line with the objectives of the study and therefore shall be discussed in line with how it answered the research questions as follows

### Interpretation of the findings

#### A review of the samples in question

Before the results of the statistical analyses are observed, the samples in question need to be reviewed so as to ascertain from what specific population the results were generated. There was a significant difference observed in the distribution of gender participants in their classification. The number of male respondents was 65.2% greater than the number of female respondents. The 18-20 year age groups were the largest groups in the study. This was as a result of the stratified sampling procedure. This was done in order to minimize the effect that small cell sizes have on skewing the frequency distributions.

Gender too has been found to be one of the main factors that account for substance use.<sup>15</sup> In terms of gender, the results of this study also revealed large discrepancies. 65.2% of the male adolescents compared to 34.8% of the female adolescents. Thus, males tend to be twice as likely to engage in drinking behavior than females, because males abuse substance for effective performance in various spheres of life (sex which can induce the use of substance such as aphrodisiac, effectiveness in work such as hard lab our which can also induce the abuse of tramadol, and to increase academic performance by taking substance such as Nescafe which contains high proportion of caffeine). Furthermore, past literature with reference to illicit drugs confirms that men are far more likely than women to have taken illicit drugs.<sup>16</sup> For example, a study of Glasgow's adolescents, found marked differences in the level of drug use between males and females aged 16-19 years. 41% of men reportedly took illicit drug, compared to 19% of women.<sup>17</sup> Therefore, as past research has suggested<sup>18</sup> and confirmed by this research, males are far more likely than females to engage in substance use activities. According to past research, gender differences seem to widen with increasing age and the gap has been found to be widest among those in their mid to late 20s. Armstrong and Costello<sup>19</sup> maintains that such gender differences may be as much a product of social roles and social expectations of male and female behavior as they are a result of differences in biological vulnerability.

This view is also supported by Daisy and Lydia,<sup>20</sup> who found that males were more obviously involved than the females. Although the number of female respondents was small, a previous study by Odey, Okokon, Ogbeche, Jumbo and Ekanem<sup>21</sup> (also supports this finding, reporting that cigarette smoking was prevalent among adolescents in Calabar, Nigeria, with the males taking the lead. Similarly, the study agrees with that of Adeyeye<sup>22</sup> which submits that cigarette smoking was low among the sample used with more males than females engaging in the behavior. In general, male adolescents are somewhat more likely than their female counterparts to use illicit drugs.

The demographic profile of these study respondents can be compared to that of a study conducted in Southern Africa by WHO/ UNDCP.<sup>23</sup> This sought to determine the knowledge, attitudes, practices and opportunities for interventions in substance use within 3 countries namely Republic of South Africa, United Republic of Tanzania and Republic of Zambia. The demographic profile of the youths used in the survey in South Africa indicated that 59% were females whilst 41% were males. This is a reverse of what existed in this present study.

All categories of the levels of education participated in the study. The largest levels of education were Secondary school. This is congruent with the fact that the largest age group was the 18-20 year olds, who are mostly in Secondary school. A significantly higher proportion of participants are Christian (83.1%) compared to Islam (13.8%). A lower proportion of participants were married (9.4%) compared to participants who are single (90.1%). Meaning that respondent with marital status of single are more involved in substance use than respondents from other categories, this is because those that are single are with little or no responsibility and are free to do whatever they want without any interruption. Thus, the sample was a representative sample of the community composition.

### Commonly used substance among adolescents in yenagoa local government?

The most frequently used substance among adolescents in Yenagoa Local Government is alcohol, cigarettes are in the second place, marijuana in the third and cocaine (as the only drug with significant frequency of consumption) in the fourth place. According to the study results, 33.2% of students have consumed alcohol at least once in their life. The research findings show that alcohol is the most commonly used substance among adolescents in Yenagoa Local Government and this figure is in line with international research. This is consistent with recent international and local statistics that revealed that alcohol is still regarded as the most popular used substance.<sup>24</sup> In this study, 33.2% of the sample reportedly drank alcohol within the past 30 days and a further 14% reportedly binged (drunked) within the past 30days period. In a recent SAMHSA study, approximately 25% of adolescents reportedly used alcohol within a 30days period and thus the results are extremely consistent.

Other drug use was reported at (26.8%) cigarette, (24.2%) marijuana and (13.8%) cocaine which is fairly consistent with SAMHSA findings in 2001 which reported that 10% of adolescents reportedly used marijuana, cocaine, crack, inhalants, hallucinogens or heroin. Past, research however, suggests that cannabis would be the illicit substance most likely to be used by high-school attending adolescents. In this regards, drug use percentage would probably be largely accounted for by cannabis.<sup>25</sup> This is concerning because while the so called "Gateway Theory"-the idea that experimenting with

“soft” drugs like cannabis will inevitably lead to heroin addiction and squalid death-has been discredited, there is evidence to show that adolescents who start drinking, smoking and using cannabis at an earlier age are more likely to take “hard” drugs than those who start later.<sup>26</sup> As the literature highlights, adolescents involved with any form of substance use are more likely to be involved in other risky behaviors has currently being experienced in Yenagoa and its environs; they are more likely to have academic problems; and they are more likely to initiate use in other substances. As a result, the 33.2% of adolescents who reported used alcohol and the 26.8% who use cigarettes, (24.2%) marijuana and (13.8%) cocaine respectively, are a cause of huge concern. It was hypothesized that belonging to different race, groups, age and gender have an effect on one’s level of substance abuse.

The results of this study in terms of substance use patterns are consistent with the literature discussed in chapters two and three. The finding that 33.2%, 26.8%, 24.2% and 13.8% of the sample are drinking and using drugs respectively is one of grave concern in light of the fact that all of the respondents are 20 years or below and that drinking, and drug use are illegal for these age groups. What is also of concern is that although majority of the substance abusers use alcohol, it is known that alcohol use predates entry into many other forms of substance use.<sup>6</sup> Furthermore, studies have found that among adolescents enrolled in substance abuse treatment programmes, 96% are polydrug users, and that 96% of the polydrug users also use alcohol.<sup>27</sup> As such it should be realized that the 33.2% of alcohol abusing adolescents are possibly on the road to more dangerous and illicit drug use.

The Federal Ministry of Health has recommended no alcohol consumption below age 15 years. Health implications can be short term or long term and can involve both acute and chronic adverse effects. Health implications for alcohol use include liver disease, cardiovascular disease, and cancer, violence, and road traffic accidents. Over a quarter of deaths of 16-24 year olds have been attributed to alcohol consumption.<sup>28</sup> comparatively, a study in Canada showed some similarities in the findings of this study in terms of the high prevalence of alcohol use. The top five substances used by youth according to the 2010 Canadian Alcohol and Drug Use Monitoring Survey (CADUMS) were alcohol (71.5%), marijuana (25.1%), hallucinogens (4.6%), ecstasy (3.8%) and cocaine (2.7%) (Health Canada).<sup>29</sup> (While another study in Lagos still showed a lower alcohol prevalence of 29.1%,<sup>30</sup> in relation to this study, another one in Minna revealed even much lower prevalence of thirty-four respondents (17%) abusing alcohol and forty-five respondents (22.5%) cigarette.<sup>31</sup> Also, in a study of 3,870 students from 20 school boards in Ontario, Canada on drug use, it was found that a total of 58.8% students use alcohol, 27.9% use cigarettes and 22.7% use cannabis. Although the proportions are higher compared with this present study, the order of common use agrees with the findings.

Having looked at the results of a number of surveys and compared with that of this study, it can be inferred that the common substances often abused by the youths are cigarettes, cocaine, marijuana and alcohol. The order of occurrence varies with respect to the community studied. The reasons for the lower frequency in cigarette smoking in this study could be attributable to the upsurge of public education and warnings from Ministry of Health “that smokers are liable to die young” about the effects of tobacco in recent years coupled with the involvement of the youths in the celebration of ‘No Tobacco

Days’ nationwide, though infrequent. The level of use of alcohol is probably due to the social permissiveness in alcohol use. It is a drug with important social roles and is therefore acceptable. Consequently, there are few laws governing its usage and restriction within the population. Besides, brewing companies go at length to produce and advertise specific alcoholic beverages aimed at wooing the youth into alcohol use. No specific reason could be attributed to the very low frequency in cocaine use in this study. The result was surprising to investigators since there are heightened speculations that more youth are abusing cocaine. It is strongly felt that respondents probably were not convinced that divulging such information to the research team was safe.

### **Extent to which these substances are used by adolescents in yenagoa local government?**

Substance use amongst the youth worldwide is a major public health problem that has elicited concern from different individuals and groups.<sup>32-34</sup> Surprisingly, the result reveals that majority of the adolescent who use cigarettes, used it regularly while marijuana and alcoholic beverages were also taken regularly by most of the respondents who indicated that they take these substances. Results reveals that majority of the adolescent who use cigarettes, used it regularly (79.6%) while marijuana (66.7%) and alcoholic beverages were also taken regularly by most of the respondents who indicated that they take these substances. For cocaine, majority of the respondents take it occasionally. Therefore, cigarettes, marijuana and alcoholic beverages were taken regularly while cocaine was taken occasionally. This finding is supported by the findings of Perez *et al.*,<sup>35</sup> who stated that alcohol was the major initiator of using psychoactive substances and was the most known substance by the youths. The reason behind this could be that the students do not view alcohol as a psychoactive substance rather a socially acceptable drink. For cocaine, majority of the respondents take it occasionally. Therefore, cigarettes, marijuana and alcoholic beverages were taken regularly while cocaine was taken occasionally. From the data of this study it shows that, different psychoactive substances have been used by the adolescents. This means that all adolescents are at high-risk of these substances. Our results also show that alcohol abuse was the most common practice.

### **Conclusion**

Since the dawn of the 21st century, several researchers have found that the use of substance use has become a moderately customary part of late adolescent and young adult social life. However, substance use and/ or abuse in Yenagoa and its environs is no longer conjectural and exaggeration. The effect is real, complex and constantly changing in form and nature with serious adverse consequences. Generally, youths in rural areas especially in remote villages are vulnerable to misinformation and wrong company. Consequent to their curiosity, they fall into the hands of wrong people, drug addicts and people with low moral credibility. Therefore, it is the responsibilities of the home, families, school and the communities to make sure that at all stages they are not missing out the opportunities of training and enlightening the youth of their responsibility to their families and nations.

Finally, adolescents need to rediscover themselves to enable them determine the trajectory of life they want for themselves by having a constant and consistent example, a positive role model because substance use tends to steal the economic future of the adolescent who engage in it. Therefore, there is an urgent need to develop adequate and comprehensive intervention programmes in Bayelsa State, to

check the use of substance use with its associated emotional, social and militancy problems.

## Recommendations

As research has found, it is the accumulation of multiple stressors that are particularly detrimental to the health of adolescents.<sup>36</sup> By identifying adolescents at risk for substance abuse early, and providing them with necessary skills to cope effectively, one can hopefully minimize the number of stressors these adolescents have at a very transitional stage in their life. The early initiation into substance use, as well as the increase in percentage with age suggests that prevention approaches should be targeting the youth. Similarly, the fact that drug use is related to militancy behaviors especially in the Niger Delta Region of Nigeria, the importance of mental health during the adolescent period is critical. The knowledge about substance use and its devastating consequences should be highlighted.

Based on the findings of this research, it is recommended that:

- a. Effective reorientation of the youths should be carried out by the National Orientation Agency (NOA) in collaboration with NDLEA Bayelsa State Chapter, NDDC, NCDMB, Bayelsa State Ministry of Education, Bayelsa State Ministry of Health and Primary Health Care Board particularly, community and family health department, adolescent health desk on the dangers of substance use. This can be done through traditional and religious leaders who will in turn sensitize their subjects.
- b. The dangers of substance use should be incorporated in our school curriculum so that students can be privy of the dangers of drug use from the cradle.
- c. State institutions (i.e. Bayelsa State Ministry of Health, Bayelsa State Ministry of Education and Bayelsa State Primary Health Care Board particularly adolescent health desk) should be strengthened and citizen advocacy should be encouraged.
- d. The NDLEA should consider the use of counselling and psychotherapy in the fight against psychotropic drug abuse, instead of the confrontational approach it is using now. More psychologists, counsellors, sociologists and other professionals should be engaged by the NDLEA in this regard.

## Acknowledgments

None.

## Conflicts of interests

Author declares that there are no conflicts of interest.

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