**Alcohol Consumption and its Effects on Farmers in Khana Local Government Area of Rives State, Nigeria**

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**Abstract:** The study examined the effects of alcohol consumption among rural farmers in Khana Local Government Area of Rivers State Nigeria. The following objectives were to: determine the socio-economic characteristics of the farmers in the study area; identify the types of alcohol consumed by the farmers; ascertain the rate of alcohol consumption; examine the causes of alcoholism among farmers and examine the socio-economic consequences of alcoholism. A total of 120 respondents of rural farmers were selected using random sampling technique. Primary and secondary data were collected and analyzed with the aid of questionnaire and interview. Data analysis was done using descriptive statistics and regression analysis. The result obtained shows that 58% were female whose age ranged between the category of 41-50years frequencies of 46 with (41.1%). Majority (49.3%) of the respondents obtained secondary education. It was observed that farmers in the study area consume different types of alcohol such as ogogoro, palm-wine, and beer but local gin (kaikai/ogogoro) that constitutes the highest type of alcohol consumed with 64.29%. Also factors such as family transmission (genetic), ethnic and cultural background, peer/social club, affordability of alcohol, lack of self-control etc were causes of alcohol consumption in the study area. Government should direct the extension workers to educate the rural farmers on the consumption of alcohol. Government institute should put a ban on the excessive intake of alcohol in the rural areas. The world health organization should help the farmers on the rate of alcohol intake at which rate to be consumed which will not damage their health. [Edward, J.O., A.T. Harry and N. M. Amugo. **Alcohol Consumption and its Effects on Farmers in Khana Local Government Area of Rives State, Nigeria.** *N Y Sci J* 2018;11(8):24-32]. ISSN 1554-0200 (print); ISSN 2375-723X (online). <http://www.sciencepub.net/newyork>. 4. doi:[10.7537/marsnys110818.04](http://www.dx.doi.org/10.7537/marsnys110818.04).

**Keywords**: Alcohol consumption, rural farmers.

1. **Introduction**

Alcohol has been widely consumed since prehistoric times by man as a component of the standard diet for hygienic or medical reasons, for its relaxant and euphoric effects, recreational purpose, artistic inspiration, as aphrodisiacs and for several other reasons. Some drinks have been invested with symbolic or religious significance suggesting the mystical use of alcohol; for example, in the Christian Eucharist and on Jewish festivals particularly, Passover (Bennett, Janca, Grant, & Sartorius 2014). Globally, alcoholic beverage consumption pattern vary considerably among different countries and even among ethnic groups within the same country.

The variations in drinking patterns therefore include; the types of beverage consumed preferentially, occasions on which it typically occurs, drinking levels that are considered moral and population subgroups for which drinking is considered acceptable. It is therefore important to posit that alcohol beverage preference of a particular area depends on the type of alcoholic beverages produced in the area. For instance beer is preferred in several European and African countries, wine is preferred in the wine producing countries of Europe and spirits are preferred in Eastern Europe, Asia and some island states. The *arrack*; a traditional drink produced by distilling fermented molasses, raw brown sugar, palm wine, rice or palm sugar is consumed more often in Bangalore region of India. This is followed by palm wine produced from either coconut tree or other palm trees, which has alcohol content ranging from 20 – 40 percent.

The third is imported liquors such as whiskey, brandy and rum. Beer is also consumed in the Bangalore region, although less commonly than the three patterns of alcohol consumption. In Nigeria various types of alcohol are consumed. They range from beer, wine and spirit categories. Some of the alcohols are traditionally produced at the local level. The traditionally produced alcohols include palm wine, Raffin palm, Ogogoro (also known as Kindana).

These types of local alcoholic beverages produced locally are produced in different sections of the country and beyond. Obot (2010) opined that before the arrival of western factory – made drinks, alcohol consumption was limited to a variety of beverages produced from palm trees and food grains. He further remarked that beer has become the most popular drink in the country, but traditional beverages (palm wine, Raffin palm, Ogogoro, Pito) are still widely consumed in both rural and urban area.

This makes Alcoholic beverages of palm wine which is produced from the sap of the palm tree and beer are mostly consumed in Ibadan area of Nigeria. Generally, throughout Nigeria native gin distilled from raffia palm wine is popular.For a long time however, consumption of alcohol has been strictly regulated by traditions, social norms, religion, natural limitations and laws. In the last two decades, global alcohol market is expanding particularly into developing countries. In many developing countries alcohol is often more easily available than clean drinking water. Today, many big multinational brewers sell a lot of their alcoholic products; beer among others to different parts of the world and the share of the global market is increasing (Abderhalden, 2007).

It simply implies that there is a massive marketing effort that is aimed particularly at new user groups such as young people, women and ethnic groups who traditionally do not drink. Consequently, new drinks and drinking habits are being globalized across different continents and sections of the population. For example young people in the developing countries are increasingly drinking and displaying some harmful patterns of drinking like ‘binge drinking’ which is common among young people in developed countries.

The consequences of drinking habits vary from heavy drinking, heavy episodic drinking (binge drinking), and alcohol dependent and moderate drinking (WHO, 2014).The increase in alcohol consumption in many developing nations where health and economic systems are weakest is of great concern. The poor people around the globe are vulnerable even to small changes destabilizing their daily hand to mouth economy. For those living under harsh circumstances, alcohol may seem an easy way out, but the social, economic, health and other problems created by alcohol use are severe additional burdens for poor people.

The paradox however, is that many developing countries are highly dependent on national revenues from alcohol. Such countries seek to maximize income, but the social costs of alcohol are often overlooked.Alcohol beverage enterprise is experiencing heavy traffic in terms of new entrants in most rural communities of the state. The operators of these drinking spots are increasingly being patronized by alcohol beverage consumers. Many of the alcohol consumers have formed the habits of going to the drinking spots on daily basis, even during working hours and stay their into the night. According to Babor, Caetano, Casswell, Edwards, Giesbrecht, Graham, Grube, Gruenewald, Hill, Holder, Homel, Osterberg, Rehm, Room & Rossow*.* (2013) alcohol is not an ordinary commodity; it is linked with connotations of pleasure and sociability in the minds of many, its use has harmful consequences, particularly on rural farmers and households whose livelihood activities are seasonal, capital and labour intensive.

Therefore this study wants to unravel the effect of alcohol consumption on farmers in Khana local Government Area of Rivers State.Alcohol in its purest form is colourless, odourless, and inflammable and contains no nutrients for the body (drugs the different types of alcohol in its purest form includes methanol, ethanol, propane and other component made up of hydro carbon and hydroxyl groups, but the alcohol that is contained in drinks is known as ethanol, Robert (2004). In many part of the world, drinking of alcohol is a behaviour that is socially acceptable and light drinking may be good for the health, especially for the heart. But such health benefits of alcohol cannot be compared to the numerous health risks associated with it consumption.

This means that the heath detriment of alcohol out weight its benefits. According to the National Health Service (2004). Alcohol has been discovered to have direct effect on health. These effects include disease such as cancer, diabetes and cirrhosis of the liver. It also aggravates the intensity of diseases such as HIV because it weakens the immune system and effects positive response to Antiretroviral drug, (Health promotion agency) Tesino, G. (2008). The Australian drug foundation (2010) has linked to both short and long term health effects. The short term effect includes; confusion, blurred vision, poor muscle control, nausea and sleep while the long term effects includes damages to many part of the body such as permanent impairment of the brain and liver function, emotional difficulties such as depression and problem with relationships. Other long term effect includes memory loss, change in red blood cells, flushing and blushing of the skin, stomach ulcer, hepatitis, impotence and death may result in severe cases.

Alcohol consumption has therefore, been categorized based on the manner and extent of consumption which is why Drug Abuse Com. (2014) categorized of alcohol consumption into; moderate use, abuse and alcoholism. Moderate use involves consuming just enough for the body handling capacity, while abuse has to do with consuming more alcohol beyond the body handling capacity. Alcoholism is referred to as alcohol addiction. It is a situation where there is physical and psychological dependence on alcohol such that it cannot be avoided.

At this stage, the body without alcohol is considered will function abnormally (Tracy, A. and Sarah, R. 2005). World Health Organization (WHO) has therefore raised alert over harmful use of alcohol e en as it is linked to the phenomenal rise in cases of non- communicable diseases and sudden death. Global Status report of alcohol and health released by WHO has an estimate of 3.3 million deaths, equivalent to 5.9 percent of GLOBAL deaths (7.6 percent for men and 4.0 percent 0r women) (WHO, 2014).

Alcohol consumption does not only lead to dependence but increase people’s risk of developing more than 200 diseases, including liver cirrhosis and some cancers. Harmful drinking has also led to several violence and injuries and harmful use of alcohol makes people more susceptible to infectious diseases such as tuberculosis and pneumonia. Harmful drinking has led to numerous highway accidents and criminal activities in Nigeria. The major role of alcohol in a wide variety of personal family, and social problems is known and acknowledged by communities. Governments and agencies (WHO, 2014). The issues of alcohol misuse, dependence, control and treatment have produced emotionally charged debate and controversy because there are different beliefs about why alcohol problems happen. Different beliefs about causes lead to different beliefs about how to treat alcohol misuse. Whatever beliefs are accepted as true, community members, leaders and decision-makers will influence what kind of help to be made available.

A very large population of the Nigeria lives in non metropolitan or rural areas. These areas are notable for their rich diversity and agrarian lifestyle: from farming communities in the north. to the fishing and farming areas of the Niger Delta in the south. The rural communities vary greatly in socioeconomic characteristics, ethnic and minority mix, and availability of health and social services. At the same time, rural communities share a number of characteristics: they are defined by the low population density: with many severely limited by access to professional health facilities, and substance abuse rehabilitation resource centers.

**2.0 Methodology**

**2.1 Area of Study**

Khana Local Government Area is one of the twenty three Local Government Areas in Rivers State, Nigeria which lies in the Niger Delta within latitude 40.420. NE and longitude 8021E. It has an area of 560km2 and a population of 294,217 at the 2006 Census. It occupies an area of about 560km2. The LGA is made up of one urban centre (Bori) and several rural communities. The inhabitants are predominantly Ogoni’s who engaged in subsistence farming and trading. Household included many low-income earners living in typical mould houses in a hydrocarbon-polluted environment. The study area will be communities in Khana Local Government Area of Rivers State. The Local Government Area of the state is richly blessed with natural resources majorly crude oil and large area for farming.

**2.2 Research Design**

Research design that will be used for this study will be survey research design. According to Isangedighi, *et al.,* (2004), survey research design involves the collection of data to accurately and objectively describe existing phenomena; Studies that make use of this approach are employed to obtain a picture of the present conditions of particular phenomena. Kerlinger (1986) describes the survey research as that which is directed towards determining the nature of a situation as it exists at the time of investigation. Baridam (2001) described it as a framework used as a guide for collection and analyzing data for study.

**2.3 Population of the Study**

The population of the study will be made up of the entire farmers (fishermen, crop farmers, poultry and other livestock farmers in Khana Local Government Area of Rivers State.

**2.4 Sampling Procedure/Sample Size**

Khana local Government area is made up of twenty five (25) communities, six communities will be purposively selected based on the presences of farmers. The sample size will consist of one hundred and twenty (120) respondents that will be randomly selected. A proportionate sample of twenty respondents from each of the selected communities-from the six (6) communities in Khana Local Government Area will be employed. The six (6) communities to be selected are: Bori, Eken, Kpean, Deken Betem and Bie Gwara. A list of heads of households who are farmers will be compiled in each of the selected villages using research assistants.

**2. 5 Method of Data Collection**

Primary data will be used for the study. Primary data will be generated from sets of structured questionnaire which will be administered to farmers in the selected communities in the Local Government Area. The questionnaire will be structured in such a way as to cover the objectives of the study. Experts like extension workers will be employed in administering the questionnaire to the contact farmers. However, personal observation technique will also be employed in administering the data collection instrument to the respondents especially the illiterate ones.

**2.6 Method of Data Analysis**

Descriptive statistics-namely, frequencies, means and percentages will be used along with the non-parametric/inferential statistical tools such as chi-square (at the 0.05 level of significance).

**2.7 Measurement of Variables**

Objective 1 The socio-economic characteristics of the respondents in the study area was analysed using frequencies and percentages.

Objective 2 To assess the type of alcohol consumed among farmers in the study area, tables, frequencies and percentages were used.

**3.0 Results**

**3.1 Socio-economic Characteristics of the Respondents**

Data collected with the structured questionnaire on the demographic profile of the respondents were subjected to statistical scrutiny; the results are presented in table 4.1 below. Table 4.1: Section 1 of the below table showed that majority of the respondents were female. The table also showed that majority of the respondents was in the age bracket of 41 – 50 years. Section 3 of table 4.1 exposed that 72.34% of the respondents had at least secondary education.

**Frequencies on the Socio-economic Characteristics of the Respondents**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **S/n** | **Variable** | **Category** | **Frequency** | **Percept** |
|  |  | Male | 47 | 42 |
| 1 | Sex | Female | 65 | 58 |
|  |  | Total | 112 | 100 |
|  |  | < 20 Years | 5 | 4.5 |
|  |  | 20-30 Years | 13 | 11.6 |
| 2 | Age of Respondent | 31-40 Years | 17 | 15.2 |
| 41-50 Years | 46 | 41.1 |
| 51 – 60 Years | 21 | 18.8 |
| Above 60 Years  | 10 | 8.9 |
| Total | 112 | 100 |
|  |  | No Education | 15 | 13.4 |
| 3 | Educational Qualification | Primary Education | 16 | 14.3 |
| Secondary Education | 44 | 39.3 |
| Graduate | 26 | 23.2 |
| Post Graduate | 11 | 9.8 |
| Total | 112 | 100 |
| 4 | Primary Occupation | Crop Farming | 56 | 50.0 |
| Poultry Farming | 11 | 9.8 |
| Fishing/Fish Farming | 7 | 6.3 |
| Public Servants | 7 | 6.3 |
| Civil Servants | 25 | 22.3 |
|  |  | Others | 6 | 5.4 |
|  |  | Total | 112 | 100.0 |
| 5 | Religion | Christian Religion | 108 | 96.4 |
| Islamic Religion | 4 | 3.6 |
| Traditional Religion | 0 | 0 |
| Total | 112 | 100 |
| 6 | Household Size | 1-4 | 24 | 21.4 |
| 5-8 | 55 | 49.1 |
| Above 8 Persons | 33 | 29.5 |
| Total | 112 | 100.0 |

**Source:** Field Survey 2016.

**3.2 Types of Alcohol Consumed**

The types of alcohol consumed by the respondent were determined using structured questionnaire. The data collected were presented in table 4.2 using frequencies and percentages. Table 4.2 is a multiple response table implying that there was no restriction on the response, consequently, those who drink palm wine had the option to also indicate that they also drink red wine and others while those who drink sprit were not restricted from indicating that they also drink local gin, beer, red wine and others.

**Table 4.2: Types of Alcohol Consumed**

|  |  |  |  |
| --- | --- | --- | --- |
| **S/No.** | **Type of Alcohol Consumed**  | **Frequency** | **%** |
|  | Palm wine | 56 | 50.00 |
|  | Local gin (kaikai/ogogoro) | 72 | 64.29 |
|  | Raffin palm  | 41 | 36.61 |
|  | Spirit/Dry gin (eg brandy)  | 58 | 51.79 |
|  | Red wine  | 47 | 41.96 |
|  | Beer | 64 | 57.14 |
|  | Others | 22 | 19.64 |
|   | Multiple Response |   |   |

**Source:** Field Survey 2016.

**3.3 Rate of Alcohol Consumption**

The rate of alcohol consumption was ascertained using the semantic difference scale as shown in table 4.3 below. Table 4.3 showed that 18.8% of the respondents do not consume alcohol at all while 11.6% consume at least once daily. The scale showed a mean response of 3.88, this implied that the respondents had low rate of alcohol consumption (3.88 < 4.0 which is the required mean for a semantic difference scale).

**Table 4.3: Rate of Alcohol Consumption**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **S/n** | **Rate of Alcohol Consumption** | **Frequency** | **Percept** | **Mean** |
| 1 | None | 21 | 18.8 | 3.88 |
| 2 | Once every a month | 11 | 9.8 |
| 3 | Once in two weeks | 14 | 12.5 |
| 4 | Once in two weeks | 19 | 17.0 |
| 5 | Once every week | 21 | 18.8 |
| 6 | 2-5 days in a week | 13 | 11.6 |
| 7 | At least once daily | 13 | 11.6 |
|   | Total | 112 | 100 |

**Source;** Field Survey 2016.

**Table 4.4: Causes of Alcohol Consumption**

Table 4.4 revealed that the respondents agreed upon family transmission risk (genetics) as a cause of alcohol consumption in the study area (3.04 > 2.5). The table also showed that Ethnic and cultural background was also agreed upon as a cause of alcohol consumption in the study area (2.75 > 2.5). Peer pressure! social club, need to cope with high-risk and stressful job, poor awareness on the negative consequences of alcoholism, lack of self-control, joblessness and high emotions, depression and family pressure! Problems all had mean scosres greater than 2.5 and were consequently agreed upon as causes of alcohol except Affordability and availability of alcohol (Mean score of 1.63 <2.5).

**3.5 Socio-Economic Consequences of Alcohol Consumption**

The socio-economic consequence of alcohol consumption was ascertained using a 4 point likert scale as indicated in the methodology. The summary of results is tabulated on table 4.5.

**Table 4.4: Causes of Alcohol Consumption**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **Causes of Alcohol Consumption** | **Sum** | **Mean** | **Remark** |
| 1 | Family transmission risk (genetic) | 343 | 3.06 | Agree |
| 2 | Ethnic and cultural background  | 308 | 2.75 | Agree |
| 3 | Peer pressure/ social club  | 357 | 3.19 | Agree |
| 4 | Affordability and availability of alcohol  | 182 | 1.63 | Agree |
| 5 | The need to cope with high-risk and stressful job  | 386 | 3.45 | Agree |
| 6 | Poor awareness on the negative consequences of alcoholism  | 382 | 3.41 | Agree |
| 7 | Lack of self-control  | 426 | 3.80 | Agree |
| 8 | Joblessness and high emotions | 345 | 3.08 | Agree |
| 9 | Depression – (farmers believing alcohol as way out | 342 | 3.05 | Agree |
| 10 | Family pressure/ problems  | 432 | 3.54 | Agree |
|  | Grand Mean |  | 3.10 | Agree |

**Source:** Field Survey 2016.

**3.5 Socio-Economic Consequences of Alcohol Consumption**

Table 4.5 showed that the social consequences of alcohol consumption were; increases crime rate (3.41 > 2.5), aiding and abetting violence (3.22 > 2.5), Increases sexual risk behaviour (harassment, rape, unprotected sex resulting to STDs (2.95 > 2.5). increase crime rate (3.05 >2.5), and finally carelessness which may lead to loss of job and child neglects (3.25 > 2.5). Table 4.5 also showed that the economic consequences were; Reduction in man-hour, and low agricultural production which may lead to food scarcity and increase in the price of agricultural produce and related commodities (3.2 > 2.5).

**Table 4.5: Socio-economic Consequences of Alcohol Consumption**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **S/n** | **Socio-economic Consequences** | **Sum** | **Mean** | **Remark** |
| 1 | Reduction in man-hour in farming | 401 | 3.58 | Agree |
| 2 | Reduces efficiency | 189 | 1.69 | Agree |
| 3 | Increases farm hazards | 388 | 3.46 | Agree |
| 4 | It leads to low agricultural production which may lead to food scarcity and increase in the price of agricultural produce and related commodities | 390 | 3.20 | Agree |
| 5 | Alcohol consumption increases crime rate  | 382 | 3.41 | Agree |
| 6 | It aids and albeit violence (intra and inter family) | 361 | 3.22 | Agree |
| 7 | Increases sexual risk behaviour (harassment, rape, unprotected sex resulting to STDs | 330 | 2.95 | Agree |
| 8 | It leads to carelessness which may lead to child neglects, and loss of job  | 362 | 3.23 | Agree |
| 9 | It increases accident rate | 342 | 3.05 | Agree |
|  | Grand Mean |  | 3.09 | Agree |

**Source:** Field Survey 2016.

**3.6 Effects of Socio-Economic Activities on the Rate of Alcohol Consumption**

Dependent Variable; Rate of Alcohol consumption

RAC = ao+ a1Gen + a2Age + a3Edu + a4Occ + a5HHS +a8Inc + U1

RAC = ao+ 1.26Gen + 0.32Age -0.10Edu + 0.08 Occ + 0.54 HHS + 0.75 Inc

t-values: (-15.9) (8.56) (5.315) (-1.76) (1.77) (5.23) (7.34)

**Table 4.6: Summary of Regression Analysis Showing the Effects of Socio-economic Characteristics on the Rate of Alcohol Consumption**

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Variables | Coef. | t-cal | Sig. t | t-tab (0.05, 119) | R | R2 | F-cal | F-tab (0.05, 5, 105 ) | Sig F |
| (Constant) | -3.10 | -15.92 | .000 | 2.05 | 0.975 | 0.951 | 339.8 | 2.02 | 0.000 |
| Gender | 1.26 | 8.557 | .000 |
| Age | 0.32 | 5.314 | .000 |
| Education | -0.10 | -1.755 | .082 |
| Primary Occupation | 0.083 | 1.766 | .080 |
| Household Size | 0.535 | 5.297 | .000 |
| Income per Month | 0.748 | 7.339 | .000 |

**Source:** SPSS 22.0 Output (Based on Field Survey Data, 2016)

**4.0 Discussion**

**4.1 Socio-economic Characteristics of the Respondents**

Section 1 of table 4.1 showed that 46.7% of the respondents were male. Majority of the respondents (53.3%) however were female. Conventionally, the female gender is more involve in agriculture than men. According to the International Labour Organization (ILO, 2014). Over 67 per cent of African women are farmers; they work as smallholder subsistence farmers. Women participate in farm practices like production, harvesting, storage, processing and marketing (Raidimi, 2014). Section 2 of table 4.1 showed that majority of the respondents (46%) was in the age bracket of 41-50 years. Farming requires experience. These ages range is an indication that the farmers were quite experienced. Respondents over 50 years were 31(27.7%) while 35 (31.4%) were below 41 years old. Section 3 of table 4.1 exposed that 13(13.4%) of the respondents had no education. A total of 31 (27.7%) of the respondents had at most primary education, this section also showed that 81(72.34%) of the respondents had at least secondary education. This is an indication that the respondents were literate.

Section 4 of table 4.1 indicated that majority of the respondents (56) representing 50% were mainly crop farmers. About 22.2% were mainly civil servant, though they indulge in agriculture. 9.8% and 6.3% were mainly poultry and fish farmers respectively. This is an indication that fish farming is not very popular in the study area. Section 5 of table 4.1 indicates that the respondents were mainly Christians. However, 3.6% were Muslims.

Section 6 of table 4.1 revealed that majority of the respondents (49.1%) had household size of 5-8. 29% of the respondents had household size above 8 while 21.4% had household size of at most 4. A look at this section is an indication that 78.6% of the respondents had household size of at least 5. This is a true reflection of rural families in Nigeria that have populated households resulting from living with extended families. This is an advantage to the farm families as family labour is a major source of farm labour, it is also disadvantage as the more family size indicate lesser quantity of food available to each member of the family.

**4.2 Types of Alcohol Consumed**

Table 4.2 showed the major types of alcohol taken in the study area. The table showed that the types of alcohol consumed by farmers in the study area are; palm wine, local gin (kaikai/Ogogoro), raffia palm, spirit/dry gin (like brandy), red wine and beer. The table also showed multiple responses implying that some of those who take palm wine also take the local gin, those who take red wine also take spirit and other alcoholic drinks.

Table 4.2 showed that local gin (kaikai/ogogoro) was mostly consumed by the respondents (64.29%) while raffia palm was the least consumed. About 58% and 50% of the respondents drink spirit/dry gin and palm wine respectively.

**4.3 Rate of Alcohol Consumption**

The rate of alcohol consumption was ascertained using the semantic deference scale as indicated in the methodology. The left hand side of the scale indicates low rate while the right hand side indicates high rate. Table 4.3 showed that 18.8% of the respondents do not take any form of alcohol.9.8% and 12.5% respondents drink alcohol at most once every month and at most once every two weeks respectively. 16.6% each of the respondents respectively drink alcohol 2 to 5 time a week and at least once in a day. The table showed that the average rate of alcohol consumption was 3.88%. considering the fact that the required average for the semantic difference scale is 4, the calculated mean of 3.88 <4 hence the researcher accepts the left side.

**4.4 Causes of Alcohol Consumption**

Agreeing or disagreeing on a factor as a cause of alcohol consumption was determined using a 4 point likert scale. As indicated in the methodology, mean scores of 2.5 and above imply that the factor is accepted as a cause. Table 4.4 revealed that family transmission risk (genetics) was agreed upon as a cause of alcohol consution in the study area (3.04 > 2.5).

The findings from the study of Strasus (l998) found out that no specific physiological or biochemical factor have yet been satisfactorily identified as causing alcoholism, however, the existence of some biological deficiencies hereditary or sensitivities were possible contributing factors that cannot be completely ruled out. Biological scientists have also attributed genetic factors as being responsible for alcoholic beverages.

This result agrees with the findings of Schuckit (1981) made a social and medical research with adopted children from Sweden and identified two different forms of inherited alcohol problems. One type is called “Male limited” which implies a transfer from father to son. This study showed that a son of an affected father is very likely to show alcohol problems regardless of the environment in which the child grows up. Walker (2013) accepted this idea to an extent and corrected that this condition seems to occur only in men whose fathers have extensive criminal records in addition to histories of alcohol abuse.

Table 4.4 also showed that that ethnic and cultural background was agreed upon as a cause of alcohol consumption in the study area (2.75 > 2.5). This agrees with the study of McCord and Gudeman (1960) who investigated the sociological dimension of alcoholism and found out that ethnic and cultural background was significantly related to alcoholism. Wilson (1966) stated “the values and customs of the community influence attitude towards drinking. In a community where the beverage is considered as food and is served mainly at meals and drinking is not considered either a virtue or vice, the consumption rate is unrestricted.

Peer pressure/social club which, need to cope with high-risk and stressful job, poor awareness on the negative consequences of alcoholism, lack of self-control, joblessness and high emotions, depression-(farmers believing alcohol as way out), and family pressure! problems all had mean scores greater than 2.5 and were agreed upon as causes of alcohol except affordability and availability of alcohol which had mean score of 1.63.

**4.5 Socio-economic Consequences**

Agreeing or disagreeing on a factor as a socio-economic consequence of alcohol consumption was determined using the 4 point likert scale as indicated in the methodology, means scores of 2.5 and above imply that the factor was agreed upon. The result in table 4.5 showed that all factors were accepted except the fact that it reduces efficiency (1.69 < 2, 5). This is true considering the fact that most farmers take alcohol to enhance their work performance; they equally, give alcohol to hired labour to enhance their ability to work. Alcohol is consequently not an inhibiting factor. Specifically, the study showed that the social consequences of alcohol consumption were; Alcohol consumption increases crime ‘rate (3.41 > 2.5), It aids and albeits violence (3.22 > 2.5), Increases sexual risk behaviour (harassment, rape, unprotected sex resulting to Sexual Transmitted Diseases (STDs) (2.95 > 2.5). increase crime rate (3.05 >2.5), and finally carelessness which may lead to loss of job and child neglects (3.25 > 2.5).

Table 4.5 showed that the economic consequences were; Reduction in man-hour, the respondents however agreed that it reduces man man-hour in farming. This is possible because in cases of farm hazard which is also agreed upon as consequence of alcohol consumption (3.58 > 2.5), man-hours are lost. Alcohol consumption leads to low agricultural production which may lead to food scarcity and increase in the price of agricultural produce and related commodities (3.2 > 2.5)

**4.6 The Effects of Socio-economic Characteristics on the Rate of Alcohol** **Consumption**

Table 4.6 in chapter four shows the summary of regression results on the effects of socio-economic characteristics on the rate of alcohol consumption. The table revealed that the multiple correlation coefficients was 0.975, this value is very high implying that a very strong correlation exist between socio-economic characteristics and rate of alcohol consumption.

The coefficient of multiple determination (R2) = 0.951, this implies that 12.6% variation in the rate of alcohol consumption is explained by variations in the socio-economic characteristics of the respondents. This indicates that the model has a good fit. The remaining 4.9% is explained by other variables not included in the model. The F-calculated of 2339.8 had a corresponding significant f-value (0.000 < 0.05 level of significance); therefore the researcher concludes that the overall model is useful. Conventionally F-Cal = 339.8 >F-tab (0.05,6, 105) = 2.19 hence the decision of a useful model is upheld.

**4.7 Test of Hypotheses**

HO1 The Socio-economic Characteristics of farmers do not significantly affect the rate of alcohol consumption. The test of significance conducted as shown in table 4.6 shows that: Gender had significant effects on the rate of alcohol consumption in the study area (PV = 0.000 < 0.05 level of significance), furthermore, t-cal = 8.56 > t-tab (0.05, 111) = 1.98 henceforth the null hypothesis is rejected and it is consequently concluded that gender of the Respondents significantly influence the rate of alcohol consumption.

Age significantly affected the rate of alcohol consumption in the study area (PV = 0.000 < 0.05 level of significance), more so, t-cal = 5.31 > t-tab (0.05, 111) = 1.98consequently, the null hypothesis is rejected and it is concluded that age of the Respondents significantly affect the rate of alcohol consumption. Table 4.6 also showed that respondents education had no significant effects on the rate of alcohol consumption in the study area (PV = 0.082 > 0.05 level of significance), additionally, t-cal = -1.76 <t-tab (0.05, 111) = 1.98consequently, the null hypothesis is accepted and it is concluded that respondents education does not significantly affect the rate of alcohol consumption.

The coefficient of education is negative implying that an inverse relationship exists between education and the rate of alcohol consumption in the study area. Table 4.6 also showed that respondents primary occupation had no significant effects on the rate of alcohol consumption in the study area (PV = 0.080 > 0.05 level of significance), t-cal = 1.77 <t-tab (0.05, 111) = 1.98consequently, the null hypothesis is accepted and it is concluded that respondents primary occupation does not significantly affect the rate of alcohol consumption. Net Income per Month had (PV = 0.606> 0.05) additionally, t-cal = -0.517< t-tab (0.05, 119) = 1.96, the null hypothesis consequently accepted and concluded that Net Income per Month of the Respondents does not significantly influence the level of satisfaction with NDDC Agricultural Programmes. However, the negative sign of the coefficient is an indication that increase Net Income per Month decreases the level of satisfaction with NDDC Agricultural Programmes.

Table 4.6 disclosed that Household size significantly affected the rate of alcohol consumption in the study area (PV = 0.000 < 0.05 level of significance), more so, t-cal = 5.30 > t-tab (0.05, 111) = 1.98 consequently, the null hypothesis is rejected and it is concluded that household size of the Respondents significantly affect the rate of alcohol consumption. Table 4.6 revealed that respondents income significantly affected the rate of alcohol consumption in the study area (PV = 0.000 <0.05 level of significance), more so, t-cal = 7.34 >t-tab (0.05, 111) = 1.98therefore, the null hypothesis is rejected and it is concluded that respondents income of the Respondents significantly affect the rate of alcohol consumption.

**5.1 Conclusion**

The alcohol consumption and its effects among rural farmers in Khana Local Government Area of Rivers State has been discovered to be low, therefore farmers in the locality should be encouraged since they do not consume in excesses, therefore affecting the activities of agricultural production and also causing health challenges on them. From the analysis carried out. The result showed the farmers who consumed alcohol are low. If the rural farmers are been enlightened on the effect of alcohol consumption, there will be a positive change in their behaviour towards the consumption of alcoholic drinks to zero level in order to avoid health damages caused by the high rate of alcohol intake. Based on the findings of this research, it can be concluded that both male and females are engaged in alcohol consumption and both gender have almost the same behavioural pattern but majority of the males consumed alcohol than the females.

**5.2 Recommendations**

Based on the findings, the following recommendations were made;

1. Government should help in the reduction of high rate of alcohol consumption in the rural area especially in khana local Government Area of Rivers State.
2. Government should direct the extension workers to educate the rural farmers on the consumption of alcohol. Government institute should put a ban on the consumption of high rate of alcohol intake in the rural areas.
3. The world health organization should help the farmers on the rate of alcohol intake at which rate to be consumed which will not damage their health.

**5.3 Contribution to Knowledge**

The study has contributed greatly to knowledge in the sense that it has revealed that alcohol consumption affects the performance of rural farmers in production of agricultural produce in Khana Local Government Area of Rivers State.

**5.4 Recommendations**

The subject matter in this context cannot be over emphasised in one single work. Therefore, further research should be conducted on the behavioural pattern of alcoholism among the rural farmers.

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