



GENDER ANALYSIS OF TRAINING NEEDS OF CASSAVA PROCESSORS ON HAZARDS ASSOCIATED WITH CASSAVA PROCESSING IN OSUN STATE, NIGERIA

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ABSTRACT

The study focused on gender analysis of training needs of cassava processors. Specifically, the cassava processor socioeconomic characteristics were described, the gap existing between standard precautionary and safety measures and what is being currently used among male and female processors were determined, and appropriate trainings to bridge the gaps in processors' knowledge of safety measures were identified. Structured interview schedule was used to elicit information from 256 respondents. Data analysis was carried out using frequency counts, percentage and correlation. The results of the study showed that mean age of both male and female cassava processors was 44.7 years. However, more female (53.2%) than male (46.8%) were into cassava processing in the study area. Majority of cassava processors were literate. Almost all the processors had household members assisting in cassava processing that are exposed to hazards and health related problems. Majority has never had contact with extension agents and had not attended any training on safety and precautionary measures. Both male and female cassava processors had low score in the precautionary and safety measures to protect themselves from processing hazards. Also, there was significant difference ($p=0.01$) between men and women level of practice of standard precautionary and safety measures while there was no significant difference ($p>0.05$) between their training needs on prevention of hazards associated with cassava processing. The study concluded that, although both male and female processors are exposed to hazards at different processing stages in which they are more involved, the identified training needs of both on prevention of hazards in cassava processing are the same.

Keywords: Cassava processing, Gender, Hazard, Safety and Training need.

INTRODUCTION

Cassava is Africa's second most important staple food in terms of per capital calories consumed (Nweke *et al.*, 1999). Cassava is a major source of calories for roughly two out of every five Africans, it contributes more than 1000 calories per person per day to the average diet and many families eat cassava for breakfast, lunch and dinner (FAO, 2005). Cassava is tolerant of low soil fertility, drought and most pest and disease with no critical date of harvest. Cassava is cheap to produce because its production can be done by family labour.

Cassava roots are processed by various methods into numerous products for human consumption. However the processing and utilisation of cassava is fraught with a lot of hazards (Akindaunsi, 2004). Every occupation has its own hazard no matter how minute it poses to an individual. Occupational hazard can be defined as any condition of a job that can result in illness or injury. Ill health arising from agricultural work has negative implications for agricultural productivity. This results in low productivity which in turn lowers the economic productivity of the farmers. Internationally, farming is considered to be one of the most dangerous occupations with the risk of injury being approximately 5-10 persons per 100 workers per year (Dimich-Ward *et al.*, 2004). Cassava processing is not exempted and also has associated hazards in the processing of the tubers to various products. According to Omuetti (2004), these hazards can be classified into physical, mechanical, chemical, biological, environmental and social hazards. Each of these hazards could be

identified in cassava processing stages. Cassava processing consists of different stages; harvesting, peeling, washing, soaking, grating, dewatering, fermentation, sieving and roasting and drying. Each stage exposes the processors to various hazards. More so, the processor is also exposed to cyanide right from the peeling stage through grating and packing, dewatering, fermentation, roasting and sieving. Moreover, the effluent generated from cassava processing which is loaded with cyanogenic glycosides also takes its toll on the bare footed processor (Omuetti, 2004). This may not only lead to skin problems but allows this toxin to enter the body easily through cuts and bruises on the feet.

Furthermore, Omuetti (2004) discussed environmental hazards associated with cassava processing. She opined that the environment is highly polluted with heaps of improperly managed cassava peels and effluent resulting from peeling, grating and dewatering. These two major wastes generated during cassava processing were reported to cause a lot of havoc to vegetation, houses and bring about microbial infection (Oboh, 2005). Also, the effluent from the processes involved after getting into water bodies, affect the growth of aquatic life, while also leaving a foul odour in its pathway. Likewise, drying of cassava flour is done along the roadside in some communities. Spreading cassava meal and chips on roadsides expose processors to various hazards such as road accidents, food contamination and inhalation of lead fumes from vehicles.

Both men and women involved in cassava processing are exposed to various hazards at



different stages of processing which they culturally took part in. It is therefore important to note that gender variations may exist in the level of exposure to hazards. Gender is the culturally specific set of characteristics that identifies the social behaviour of women and men and the relationship between them. An analysis of gender variations in the level of exposure to hazards will provide information on different conditions that women and men face so as to differentiate the training programs required to address the problem. Ajayi (2006) opined that agriculture is hazardous and most of the accident identified as associated with agriculture could be prevented under condition of proper training on precautionary and safety measures. Invariably, hazards associated with cassava processing could be prevented as well under condition of proper training on precautionary and safety measures. This is hinged on proper and scientifically deduced training needs.

Training is an activity aimed at improving peoples' behaviour on how to do their job better. Ajayi (1995) defined training as the acquisition of the best ways to utilise knowledge and skill to achieve a specified goal of production. Since prevention is cheaper than cure, concerted efforts needs to be made on training of the processors to bridge the existing gaps between standard precautionary and safety measures and what is currently practiced among male and female processors.

The main objective of the study is to analyze on gender basis, training needs of cassava processors on hazards associated with cassava processing in Osun State, Nigeria. The specific objectives are to:

- i. describe demographic characteristics of male and female cassava processors in the study area;
- ii. determine the gap existing between standard precautionary and safety measures and what is being currently used among male and female processors; and
- iii. identify appropriate training needs to bridge the required gaps in processors knowledge of safety measures.

The hypotheses of the study, stated in null form, are as follows;

There is no significant difference between male and female processors level of use of standard precautionary and safety measures.

There is no significant difference between male and female processors' training needs on the prevention of hazards associated with cassava processing.

METHODOLOGY

The study was conducted in Osun State of south western Nigeria. Osun State has an area of approximately 8,602 square kilometres and is bounded in the south by Ogun State, in the North by Kwara State, in the East by Ondo State and in the West by Oyo State. The State has 30 Local Government Areas (LGAs) and is grouped into three agricultural administration zones namely: Ife/Ijesha, Osogbo, and Iwo. Multi-stage random sampling procedure was used to select cassava processors for the study. In the first stage, two local Government areas (LGAs) were randomly selected per zone to make a total of six LGAs. At the second stage, five percent of the constituent communities were sampled from selected LGAs making a total of 26 communities. At the last stage, simple random technique was used to select a total of two hundred and fifty six respondents.

Measurements of variables

A set of validated and pre-tested (which gave reliability co-efficient of $r=0.78$) structured interview schedule was developed and used for the collection of data. Independent variables such as age, marital status, household size, level of education, income from cassava processing, contact with extension agents, organisational membership, and household assistance in cassava processing were all measured with absolute values. The absolute value were recorded and analyzed. Descriptive statistics such as percentages, mean and standard deviation were used to summarize the data. Analysis of variance (ANOVA) was used to test the hypotheses formulated.

The dependent variable was the training need of cassava processors on prevention of hazards associated with cassava processing. Some selected precautionary and safety measures against hazards in which cassava processor need training on were listed and respondents rated each of measure on a five point scale and were scored as follows: very important (5 points), important (4 points), fairly important (3 points), unimportant (2 points), very unimportant (1 point). The maximum/possible score point for a respondent was 100 while the minimum score was 20. The range adopted by Ajayi, (1995) for the importance of training is as follows: 0 – 3.05 (low) and 3.05 – 5.0 (high) was used to categorize training needs into low or high.

RESULTS AND DISCUSSIONS

Demographic information of the respondents

Results in Table 1 show that majority (79.0%) of Female Cassava Processor (FCP) had mean age of 42.3 year and a standard deviation of 11.9 and (85.0 %) of Male Cassava Processor (MCP) with the mean age of 45.3 year and a standard deviation of 10.7 were adults with their ages between 30 and 60 years old. This



indicates that majority of cassava processors in the study area are in their productive age which means that they still have strength and vigour to contribute immensely to the economy of their community. This also corroborates Alabi (2011) submissions that people who are in their active ages are more likely to manage their enterprises more effectively than the aged. Moreover, more female (53.2 percent) than male (46.8 percent) were into cassava processing in the study area which might be due to involvement of male in planting of permanent crops. In all, both male and female were into cassava processing in the study area. This corroborates Nweke *et. al*, (2002) studies which found that both men and women make significant contributions of their labour to the cassava industry. Majority (81.7%) of MCP had formal education and 72.1 percent of FCP with formal education. This is an indication that majority of these agro-processors are literate. This will aid in their training on precautionary and safety measures against hazards in cassava processing since literacy makes communication easier. The result is in line with Ogunjimi, Farinde and Adesoji 2012, that farmers in Osun State were literate. Furthermore, majority of the FCP (77.9%) and (85.8%) of MCP were married. This finding confirmed the findings of Jibowo (1992) that majority of adult population of any society consists of married people. Basically marriage imposes some level of responsibility on rural dwellers and the need to be financially

committed might have led to their participation in such venture as cassava processing. Only 20.6% of female and 22.5% of male processors had attended training before. This is an indication that majority of the cassava processors had not attended training on precautionary and safety measures before. It is therefore important that such training should be organised and attendance of processors monitored. The highest membership in social organisation for female cassava processors was recorded in religious organisation (44.9%) while, highest membership for male cassava processors was recorded in cooperative society (59.2%). The results revealed that their membership in informal networks which may influence their access to information. The findings corroborated previous finding by Adesoji (2009), Soyebó (2005), Farinde and Ogunjimi (2007) and Tijani *et al* (2001) who asserted that cooperatives association, influence the farmers in receiving information. Majority, 78.0 percent of FCP and 75.9 percent of MCP made between ₦10,000 and ₦200,000 annually from cassava processing. Thus indicate that cassava processing is a good source of income thus helping respondents to be economically stable enough to be able to purchase protective materials. Majority, 79.4% of FCP and 84.2% of MCP had never had contact with extension agents. This may due to low number of extension agents to number of farmers in the study area.

Table 1: Distribution of respondents according to selected demographic characteristics of FCP (female cassava processors) and MCP (Male cassava processors) n=256

Variables	FCP (136)		MCP (120)		Total		Mean
	Freq	%	Freq	%	Freq	%	
Age (years)							
Less than 30	15	11.0	9	7.5	24	9.4	
30-60	108	79.4	102	85.0	210	82.0	44.7
Above 60yrs	13	9.6	9	7.5	22	8.6	
Sex	136	53.1	120	46.9	256	100.0	
Educational level							
None	38	27.9	22	18.3	60	23.4	
1-6	49	36.0	31	25.8	80	31.2	
7-12	44	32.4	56	46.7	100	39.1	
13 and above	5	3.7	11	9.2	14	5.5	
Marital Status							
Single	9	6.6	10	8.3	19	7.4	
Married	106	77.9	103	85.8	209	81.6	
Divorced	9	6.6	4	3.3	13	5.1	
Widowed	12	8.8	3	2.5	15	5.9	
Contact with extension agents							
Not at all	108	79.4	101	84.2	209	81.6	
Weekly	4	2.9	4	3.3	8	3.1	
Forthnightly	14	10.3	12	10.0	26	10.2	
Monthly	10	7.4	3	2.5	13	5.1	

Variables	FCP (136)		MCP (120)		Total		Mean
	Freq	%	Freq	%	Freq	%	
Income from cassava processing (₦)							
10,000 - 100,000	46	33.8	41	34.2	87	34.0	155,10
100,000 - 200,000	60	44.2	50	41.7	110	43.0	0
200,000 - 300,000	21	15.4	19	15.8	40	15.6	
300,000 - 400,000	6	4.4	4	4.1	10	3.9	
400,000 - 600,000	3	2.1	6	4.2	9	3.5	
Social organisation membership							
Religious organisation	61	44.9	58	48.3	119	46.5	
Cooperative society	53	39.0	71	59.2	124	48.4	
Voluntary organisation	17	12.5	28	23.3	45	17.8	
Attendance of training in the past							
Yes	28	20.6	27	22.5	55	21.5	
No	108	79.4	93	77.5	201	78.5	

Experience of exposure to hazards at different stages of processing

Findings in Table 2 revealed the experience of female processors of different hazards at the different stages of processing. It was revealed that majority of female processors experience fatigue at peeling, roasting and boiling stages of cassava processing. Also, they experience back pain at roasting and boiling stages of processing. Also, they experience eye problem and heat cramps mainly from roasting and boiling stages due to traditional method of processing. The findings also revealed that female cassava processors experience cuts and bruises mainly during peeling of cassava tubers while they are exposed to respiratory disease during roasting and drying. This may be due to lack of protective equipment and inadequate knowledge of safety measures.

Likewise the finding in Table 2 also showed the experience of male cassava processors

of different hazards at the different stages of processing. It was observed that majority of male processors experience fatigue and back pain at harvesting, grating and dewatering stages of processing while few of them said they experience eye problem during roasting. More than average of male processors claimed they experience heat cramps during harvesting of tubers due to scorching of the sun while few of them experience heat cramps during roasting of garri. This may be due to lack of protective equipment and inadequate knowledge of safety measures. The cumulative effect of this exposure might result in health problems. These findings also corroborated previous findings by National Research Council of Nigeria (1993), where it drawn conclusion that early in life exposure to agricultural hazards led to greater risk of cancer, neurodevelopment; impairment and immune dysfunctions.

Table 2: Distribution of respondents according to the experience of exposure to hazards at different stages of processing by FCP and MCP, n=256

Stages of processing	Fatigue	Back pain	Eye problem	Heat cramps/ dehydration	Cut/ bruise	Respiratory disease
Female CP						
Harvesting	19.9	32.4	1.5	23.5	20.6	18.4
Peeling	66.2	39.0	0.0	0.0	72.1	0.0
Washing	7.4	30.9	1.5	0.0	0.0	0.0
Grating	18.4	15.4	2.9	0.7	7.4	75.0
Dewatering	22.1	13.2	4.4	16.2	8.8	7.4
Sieving	29.4	16.2	3.7	1.5	0.0	2.2
Roasting	89.7	76.5	86.8	92.6	0.0	75.7
Drying	30.9	38.2	5.9	25.0	0.0	8.8
Boiling of meal	79.4	82.4	72.1	79.4	0.0	67.6
Male CP						
Harvesting	64.2	76.7	0.8	62.5	65.8	18.3
Peeling	24.2	15.0	0.8	1.7	44.2	0.0



Stages of processing	Fatigue	Back pain	Eye problem	Heat cramps/ dehydration	Cut/ bruise	Respiratory disease
Washing	5.0	6.7	0.0	0.8	1.7	0.8
Grating	80.0	65.8	4.2	2.5	39.2	1.7
Dewatering	68.3	56.7	0.0	0.8	0.8	0.8
Sieving	8.3	6.7	1.7	1.7	1.7	0.8
Roasting	30.0	33.3	37.5	235.0	0.0	42.5
Drying	6.7	8.3	0.0	0.0	0.0	0.8
Boiling of meal	8.3	9.2	18.3	31.7	0.8	35.0

Level of practice in cassava processing precautionary and safety practices

The results in Table 3 reveal that the weighted mean score for female processors' level of practice in safety practices was 7.0. The level of practice is ranked based on the percentage of respondents that are practicing the safety measures. The table showed that the level of practice of female processors was high in the following practices: drying/packaging of peels for livestock feeds (72.8), processing under well ventilated building (65.4), and proper disposal of cassava peels from the working area (61.0). However, the level of practice was low in 17 practices out of 20 in the following – maintaining a clean work environment (42.2), drinking of sufficient water (41.0), adequate salt intake (39.0), avoiding roadside drying of meal (38.9), proper management of cassava effluent (31.6), use of mouth protectors (27.9), use of protective clothing (27.9), use of eyes protector (13.2), immunization against tetanus (13.2), protective roasting method (9.6), channel smoke through chimney (9.5), use of nose protectors (5.2), close burning of dry peels to produce ash (5.2), use of gloves (5.2), use of dryer to dry meal (5.2), use of protective shoes (1.4) and use of treated test paper to determine the level of acidity in cassava processing (0.0%). The result revealed that only three safety practices out of 20 safety practices are well practiced by female cassava processors while their level of practice is very low in 17 safety practices. This may be due to inadequate knowledge and lack of adequate training on those safety management practices.

Likewise, the result in Table 3 show that the weighted mean score of male cassava processor was 5.8 on their level of practice. The level of practice of male cassava processors in safety practices were high in the following practices: drying/packaging of peels (68.3), proper disposal of cassava peels far from the working area (60.8), processing under well ventilated building (60.0) and avoiding roadside drying of meal (51.7). However, the level of practice was low in the remaining seventeen safety practices: adequate salt intake (48.3), maintaining a clean work environment (45.8), drinking of sufficient water intake (42.5), proper management of cassava effluent (22.5), protective clothing (15.8), use of

mouth protector (10.8), use of eyes protectors (10.0), channel smoke through chimney (8.6), use of protective roasting method (5.8), use of nose protectors (5.0), immunization against tetanus (3.3), close burning of dry peels to produce ash (2.5), use of gloves (2.5), use of dryer to dry meal (2.5), use of protective shoes (1.7) and use of treated test paper (1.7).

The results indicate that both male and female cassava processors had low level of practice in the precautionary and safety measures to protect themselves from processing hazards. This may be due to lack of training in these safety practices. Since training aims at increasing the knowledge and skill of performance at a duty (Ajayi 1995), organising training programmes on precautionary and safety measures for cassava processors in the study area is highly important.

Identified areas of training needs in precautionary and safety practices in cassava processing

In Table 3, cassava processing safety practices with low percentages in knowledge and level of practice both for both men and women processors were identified. Therefore both need training on the said practices for proper protection. Also results of findings in Table 4 and 5 showed that both male and female processors perceived high need for training in some selected precautionary and safety measures. Therefore areas of training need as identified in Tables 3, 4 and 5 includes: protective roasting method, home level drying of meal, proper management of cassava effluent, maintaining a clean work environment, use of mouth protectors, use of protective clothing. Other identified areas of training needs includes regular immunization against tetanus, use of nose protectors, close burning of dry peels to produce ash, use of gloves, use of protective shoes, use of dryer to dry meal, channel smoke through chimney, use of treated test paper and drinking of sufficient water. The identified practices listed above are either highly technical, tedious or the cost of acquiring the equipment may be very high. These reasons might be the cause of low knowledge and low level of practice of cassava processors in the said practices.



Table 3: Rank order of respondents' weighted percentages on level of practice of cassava processors of safety practices against cassava processing hazards

Cassava processing safety practices	Frequency	%	Remark
Female Cassava Processors			
Drying/Packaging of peels for livestock feeds	99	72.8	High
Processing under well ventilated building	89	65.4	High
Proper disposal of cassava peels far from working area	83	61.0	High
Maintaining a clean work environment	57	42.2	High
Drinking of sufficient water is beneficial to the processors	56	41.0	Low
Adequate salt intake is beneficial to the processors health	53	39.0	Low
Avoiding roadside drying of meal	53	38.9	Low
Proper management of cassava effluent	43	31.6	Low
Use of protective clothing	38	27.9	Low
Use of mouth protector	38	27.9	Low
Regular immunization against cassava processing related diseases.	18	13.2	Low
Use of eyes protector	18	13.2	Low
Use of protective roasting method	13	9.6	Low
Channel smoke through chimney	8	3.5	Low
Use of treated test paper	0	0.0	Low
Use of gloves	7	5.2	Low
Use of nose protectors	7	5.2	Low
Using of dryer to dry meal	7	5.2	Low
Close burning of dry peels to produce ash	7	5.2	Low
Use of protective shoes	2	1.4	Low
Male Cassava Processors			
Drying/packaging of peels for livestock feeds	82	68.3	High
Proper disposal of cassava peels far from working area	73	60.8	High
Processing under well ventilated building	72	60.0	High
Avoiding roadside drying of meal	62	51.7	High
Adequate salt intake is beneficial to the processors health	58	48.3	Low
Maintaining a clean work environment	55	45.8	Low
Drinking of sufficient water is beneficial to the processors	51	42.5	Low
Proper management of cassava effluent	27	22.5	Low
Use of protective clothing	19	15.8	Low
Use of mouth protector	13	10.8	Low
Use of eyes protector	12	10.0	Low
Channel smoke through chimney	10	8.6	Low
Use of protective roasting method	7	5.8	Low
Use of nose protector	6	5.0	Low
Regular immunization against cassava processing related diseases	4	3.3	Low
Close burning of dry peels to produce ash	3	2.5	Low
Using of dryer to dry meal	3	2.5	Low
Use of gloves	3	2.5	Low
Use of treated test paper	2	1.7	Low
Use of protective shoes	2	1.7	Low

Table 4: Distribution of female processors by their ranked mean scores of perception on importance of training

Safety practices	Very important	Important	Fairly important	Unimportant	Unimportant	Mean
Processing under well ventilated building	82.4	15.4	2.2	0.0	0.0	4.8
Maintaining a clean work Environment	66.2	29.4	0.7	3.7	0.0	4.6
Proper management of cassava effluent	57.4	38.2	3.7	0.7	0.0	4.5
Channeling smoke through	51.5	39.0	7.4	1.5	0.7	4.4



Safety practices	Very important	Important	Fairly important	Unimportant	Unimportant	Mean
Chimney						
Regular immunization against cassava processing related diseases	50.7	33.8	10.3	5.1	0.0	4.3
Proper disposal of cassava peels far from the working area	33.8	58.8	6.6	0.7	0.0	4.3
Use of mouth protectors	33.1	55.1	7.4	2.9	1.5	4.2
Use of eye protectors	41.9	44.9	8.1	4.4	0.7	4.2
Drying/packaging of peels for livestock feeds	34.8	54.8	17.3	0.7	0.0	4.2
Avoiding roadside drying of meal	19.9	64.0	14.0	1.5	0.7	4.0
Use of protective clothing	22.1	55.9	17.6	4.4	0.0	4.0
Adequate salt intake	37.5	36.0	19.9	6.6	0.0	4.0
Use of nose protectors	26.5	52.9	16.2	2.2	2.2	4.0
Using of dryer to dry meal	33.8	33.1	19.1	12.5	1.5	3.9
Use of gloves	18.4	61.8	16.2	2.2	1.5	3.9
Use of protective roasting method	14.0	63.2	16.2	4.4	2.2	3.8
Use of protective shoes	11.0	61.0	22.1	4.4	1.5	3.8
Drinking of sufficient water	11.8	62.5	19.9	4.4	1.5	3.8
Use of treated test paper	33.1	19.1	15.4	30.1	2.2	3.5
Close burning of dry peels to produce ash	27.2	15.4	26.5	29.4	1.5	3.4

Table 5: Distribution of male processors by their ranked mean scores of perception on importance of training

Safety practices	Very important	Important	Fairly important	Unimportant	Unimportant	Mean
Processing under well ventilated building	55.0	43.3	1.7	0.0	0.0	4.5
Channeling smoke through Chimney	57.5	30.0	7.5	4.2	0.8	4.4
Use of eye protectors	48.3	34.2	14.2	2.5	0.8	4.3
Regular immunization against cassava processing related diseases	47.5	39.2	10.0	3.3	0.0	4.3
Proper management of cassava effluent	38.3	57.5	3.3	0.8	0.0	4.3
Proper disposal of cassava peels far from the working area	27.5	61.7	7.5	3.3	0.0	4.1
Drying/packaging of peels for livestock feeds	32.5	53.3	9.2	5.0	0.0	4.1
Maintaining a clean work Environment	52.5	14.2	24.2	9.2	0.0	4.1
Use of treated test paper	48.3	19.2	16.7	14.2	1.7	4.0
Adequate salt intake	30.8	39.2	24.2	5.0	0.0	3.9
Use of mouth protectors	19.2	58.3	18.3	2.5	1.7	3.9
Use of nose protectors	10.0	61.7	25.0	2.5	0.8	3.8
Use of gloves	13.3	56.7	26.7	2.5	0.8	3.8
Use of protective roasting method	12.5	55.0	25.8	5.0	1.7	3.7
Use of protective shoes	6.7	59.2	29.2	4.2	0.8	3.7
Close burning of dry	26.7	31.7	24.2	16.7	0.8	3.7

Safety practices	Very important	Important	Fairly important	Unimportant	Unimportant	Mean
peels to produce ash						
Use of protective clothing	15.8	36.7	39.2	8.3	0.0	3.6
Drinking of sufficient water	6.7	57.5	30.8	3.3	1.7	3.6
Using of dryer to dry meal	15.8	39.2	32.5	11.7	0.8	3.6
Avoiding roadside drying of meal	14.2	40.8	30.8	13.3	0.8	3.5

Hypotheses

The results in Table 6 revealed that there was significant difference at P=0.01, F= 13.531) between male and female level of use of standard cassava processing precautionary and safety measures. This finding indicates that both categories were not equally exposed to hazards because their levels of practice of safety practices significantly differ.

The results in Table 6 Show that there was no significant difference at (P>0.05, F= 1.836) in the training needs of both male and female on the prevention of hazards in cassava processing. This finding implies that both categories have the same curiosity and desire for knowledge. Both male and female processors are ready to learn in order to protect themselves from the hazards.

Table 6: Result of F- test to test for significant difference in selected variables amongst male and female cassava processors

VARIABLE	Mean	F-value	p-value
Level of practice in standard precautionary and safety measures	46.806	13.531*	0.001
Importance of training	127.147	1.836	0.177

* Significant at 0.01

CONCLUSIONS AND RECOMMENDATIONS

The study concluded that, though both male and female processors are exposed to hazards at different processing stages in which they are more involved. Their level of practice in precautionary and safety measures is quite low while the identified training needs of both on prevention of hazards in cassava processing are the same.

The following recommendations are made on the basis of the outcome of the study;

1. Due to low level of knowledge and practice of safety measures by both male and female processors, it is recommended that government should provide training opportunities to the processors on safety

measures to protect themselves from the hazards.

2. Due to the fact that some measures are very expensive to possess, it is recommended that policy makers should encourage each local government area to provide standard processing facilities and then monitor the use by the processors because cassava products form a major percentage of daily diet of an average Nigeria.

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