

Child Labour Participation and Educational Attainment among Cassava Farming Households in South West, Nigeria

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Abstract

The study examined the determinants of child labour participation and educational attainment among Cassava farming households in Southwest Nigeria. The specific objectives were to describe the level of child labour participation in cassava production; examine the schooling pattern of children involved in cassava farming and isolate the effects of child labour on school attainment of a child. The Multi- stage sampling technique was employed in selecting the sample size. The data for the study were obtained with the use of structured questionnaire administered to 270 cassava farm households out of which only 252 were retrieved and used for the study. The Logit model was used to isolate determinants of school attainment and age of a child, educational attainment of household head and mother, availability of primary and secondary schools and ages of household heads were found to have positive significant effects on the school attainment age of a child. It was concluded that child labour is an infringement on child education, leisure and pleasure. Child fostering and guardianship put non biological children at disadvantage of schooling and non-availability of schools in the farming locality prevent children from attending schools. The study recommended that Child fostering and guardianship should be done under strict guidance of relevant government and non- governmental agencies to avoid negative threat on non biological children.. Government efforts should be increased towards establishment of primary and post-primary schools in the rural areas and farmers should make efforts to enroll for adult literacy programs.

Keywords: Child labour, educational attainment age, Logit Model, Cassava farming households.

1.0. Introduction

Though restrictions on child labor exist in most nations, many children do work. This vulnerable state leaves the children prone to exploitation. The International Labour Office reported that children work the longest hours and are the worst paid of all laborers (Andvig *et al*, 2001; International Labour Organization/Statistical Information and Monitoring Programme on Child Labour- ILO/SIMPOC, 2002). They endure work conditions which may be hazardous and constitute potential abuse (Gbolagun, 2011). Employers capitalize on the docility of the children recognizing that these laborers cannot legally form unions to change their conditions. Such manipulation stifles the development of youths. Their working conditions do not provide the stimulation for proper physical and mental development. Finally, these children are deprived of the simple joys of childhood, relegated instead to a life of drudgery. In 2000, the International Labor Organization (ILO) estimated that 211 million children between the ages of 5 and 14 were economically active worldwide. According to the International Labor Organization (ILO/SIMPOC, 2002), sub-Saharan Africa has the highest rate of child labor. Most of these children are involved in agricultural work, predominantly on farms operated by their

families, and not paid for their labor. Addressing this problematic issue of child labor is vital to the development of many African youths, who are the future leaders of sub-Saharan Africa.

Since the adoption in 1999 of ILO Convention 182 on the worst forms of child labor and the adoption in 2001 of ILO Convention 184 on safety and health in agriculture, there has been a growing awareness of the need to research the extent and nature of children's agricultural work to determine the types of activities that place children at risk. With the vast majority (70%) of the world's working children in agriculture, these two international standards provide important guidance for addressing the needs of children engaged in hazardous work in this sector. Previous studies conducted on child labor in agriculture have all highlighted the long hours of work, meager wages, and dangerous conditions in which children work (Gbolagun, 2011; Adeoti et. al., 2013).

Child farm labour is defined as any farm activity in which children (less than 18 years) are involved that warrants loss in school days and/or time. It is defined to mean all farms or farm related activities that the opportunity cost is schooling for children between 7-17 years. Nigeria has 12 million child workers (Obayelu and Okoruwa, 2008). The issue has assumed particular importance because approximately two-thirds of the world's cassava production occurs in West Africa—produced, for the most part, on small farms contributing to several million rural livelihoods.

Nigeria is the largest cassava producer in the world, with 38% of global cassava production; other significant cassava producing countries are Cameroon, Ghana, and Togo (FAO, 2008). Unfortunately, Nigeria is characterized with small- scale farmers whose farm size averaged less than 4 ha. These farmers the capital to commercialize their farms and generally use family labour which comprises mainly their wives, children and relatives. Family labour - mainly that of their children who are mostly under-aged (7- 17 years) are use in field preparation, planting, weeding, fertilizer and agro-chemical applications (which are often dangerous to handle especially for children), harvesting and transporting the farm produce back home which are usually in a distant location to the farms. These children school hours are often substituted for all these farm work which are generally stressful to undertake for these tender children. These lost school hours bring them educationally backward when compared with their peers in the developed world. Children represent the future of human race. In the less developed countries, those who grow to school age grow up under a blanket of diseases, malnutrition, lack of food and inadequate schooling, in these circumstances children drift into the labor market. It is estimated that millions of children work worldwide; although the world generally agree that it is unacceptable for children under specific age to do certain type of work. Several other studies exploring the effects of child labour on child educational achievement in developing countries have suggested similar results.

Bhalotra and Heady (2003) explored the impact of child work on school attendance and performance in five countries: Brazil, Kenya, Lebanon, Sri Lanka, and Turkey, and conclude that work reduces the rate of retention, and in some countries the number of hours worked also increased the probability of dropping out. It is widely shown that children brought up in less favorable conditions obtain less education, despite the large financial returns to schooling (Heckman and Masterov (2005). Indeed there is a large correlation between the education level of parents and their children (Björklund and Salvanes (2011). Nkamleu, and Adesina (2000) explored hours worked by children on schooling effects and concluded that hours worked had a significantly negative influence both on children's school attendance and performance. Grootaert and Kanbur (1995) said child labour is associated with deteriorating performance on language and mathematics tests and the adverse effects of child labour were larger when children were engaged

in regular work. They stressed that child labour would never be “complementary or neutral with respect to academic performance provided that the child remains enrolled in school”.

It is observed therefore from literature that child labour is a persistence problem that had negatively affected the educational performance throughout most of the developing world, and to a lesser extent in developed countries. The availability of detailed and reliable child labour statistics and their analysis on a continuing basis are particularly important for establishing policy priorities, targets, formulating and implementing interventions, and monitoring policies, regulations and programs aimed not only at the minimization of the negative consequences of child labour in the short term, but most importantly at the eventual elimination of the practice. Hence, it is imperative to analyze the determinants of child labour participation and schooling in cassava production in south west Nigeria. The specific objectives are to describe the level of child labour participation in cassava production; examine the schooling pattern of children involved in cassava farming and isolate the effects of child labour on school attainment of a child.

2.0. Materials and Methods

The study was conducted in the South West geopolitical zone, the choice of the zone is based on its prominence in the cultivation of cassava; it is in fact the largest cassava producer amongst the five geo-political zones of the country. The South-West, Nigeria falls on the latitude 60 ° to the North and latitude 4 ° to the south. It is marked by longitude 4 ° to the West and 6 ° to the East. The Zone comprises six states namely Oyo, Osun, Ondo, Ogun, Ekiti and Lagos States. The geographical location of South West covers about 11 4,271 kilometers square, that is, approximately 12% of the country land mass. The total population is 15,456,789 people and more than 96% of the populations are Yorubas (NPC, 2006). The Zone is bounded in the North by Kogi and Kwara states. The zone is bounded to the east by Edo and Delta states, south by the Atlantic Ocean and west by the Republic of Benin. However, Oyo and Ogun States were randomly chosen out of the six states in the zone for this study.

A Multi-stage sampling technique was used in selecting the sample size. In the first stage, three local government areas were purposively selected from each of the two states giving a total of six local government areas. In Oyo state, Oluyole, Ona-ara and Lagelu Local Government areas were selected while in Ogun State, Abeokuta North, Odeda and Ifo Local Government areas were selected. In the second stage, three communities were randomly selected from each of the local government areas giving a total of eighteen communities selected for the study. The sampling frame of all cassava farming households was generated from the cassava farmers’ association in each of the selected community. From this sampling frame, proportionate to size sampling was used to select 270 cassava farming households in the area. However, eighteen copies of questionnaire were observed to be invalid, while 252 questionnaire were used for further analysis.

The formula for proportionate to size was given as:

$$n_i = N_i / N * 270$$

where: n_i is number of respondents sampled in the i^{th} community

N_i is sample frame of i^{th} community

N is the pooled sample frame for the study.

Primary data were collected through interview and Focus Group Demonstration (FGD). Information were collected on farm households' socio-economic characteristics, income, farm size, family labour, hired labour, number of children and their ages, level of education of their children, time spent in farming activities and schools, the data collection lasted for a period of six months. Secondary data were sourced from journals, paper presentations, articles and related text.

The statistical tools used to analyze the data were descriptive statistical tools: frequency, percentages, means and standard deviation to describe the level of child labour participation and schooling pattern of children involved in various cassava farming activities and Logit model to isolate the factors affecting school attainment of a child in the study area.

Following Patrinos and Psacharopoulos (1994) and Psacharopoulos (1997); Schooling Attainment Age (SAGE) denoted as θ is given as:

$$\theta = \frac{\mu}{\rho - \varepsilon} * 100\% \tag{1}$$

Where μ is years in school of a child, ρ is the current age of the child, ε is the usual school entry age which is 5 years in Nigeria (Adekola, *et al.*, 2005 and Obayelu and Okoruwa, 2008), when $\theta < 100$, it implies a child does not have full school attainment and $\theta \geq 100$ implies that a child has full school attainment. SAGE (θ) was model into a binomial logistic regression model which posses a dichotomous dependent variable (Gujarati and Porter, 2009), a child's SAGE equal to $\theta < 100$ is taken as unity which indicates the child from cassava farm household does not have school attainment while $\theta \geq 100$ is taken as zero, a situation that a child from cassava farm household had full school attainment. The explanatory variables of SAGE are a set of child, parent, farm and community characteristics which contain both dichotomous and continuous variables. Let P_i denote the probability that i-th child does not have full school attainment because he/ she is subject to farm labour. We assume that P_i is a Bernouli variable and its distribution depends on the vector of predictors (x_i), so that:

$$P_i = \frac{1}{1 + e^{-(x_i\beta)}}; \quad i = 1 \dots n \tag{2}$$

where P_i is the probability that the ith child have partial school attainment given the observed level of child, parent, farm and community characteristics in x_i and β is a conformable vector of parameters. Therefore, if (1) represents the probability a child's SAGE is $\theta < 100$ which implies a child does not have full attainment then $1 - P_i$ will be the probability associated with full school attainment indicated as a child's SAGE is $\theta \geq 100$ Thus,

$$1 - P_i = \frac{1}{1 + e^{-(x_i\beta)}}; \quad i = 1 \dots n \tag{3}$$

$$1 - P_i = \frac{1}{1 + e^{-(x_i\beta)}}; \quad i = 1 \dots n \tag{4}$$

To estimate the odds ratio in favor of answering "no" versus "full" school attainment of a child in cassava farm household, the ratio of both probabilities must be calculated and given as:

$$\frac{P_i}{1 - P_i} = e^{x_i\beta} \tag{5}$$

By taking the natural log, the odds ratio in favor of the children with no school attainment becomes a linear function of x_i , where x_i is a vector of child, parent and farm and community characteristics. This expression can be written as:

$$\log\left(\frac{P_i}{1-P_i}\right) = x_i\beta \quad (6)$$

This expression in equation (4) was transformed into

$$\log\left(\frac{P_i}{1-P_i}\right) = \alpha_0 + \delta_i X_i + \beta_i D_i + \sigma_i E_i + \gamma_i K_i \quad (7)$$

X_i : Child characteristics

X_1 = age of the child in the household (in years)

X_2 = biological child of the household head (dummy variable: yes = 1, otherwise = 0)

D_i = Parents' characteristics

D_1 = age of household head (years)

D_2 = years of schooling of household head (years)

D_3 = years of schooling of mother in the household (years)

D_4 = dependency ratio (percentage per household size)

E_i = Farm characteristics

E_1 = cassava farm size (hectares)

E_2 = Farm income (₦ per annum)

K_i : Community characteristics

K_1 = availability of primary school in the community (yes = 1, otherwise = 0)

K_2 = availability of secondary school in the community (yes = 1, otherwise = 0)

K_3 = state dummy (oyo = 1, ogun = 0)

The parameters δ , β , σ , γ are the coefficients of the variables with constant α .

3.0. Results and Discussion

From Table 1, it was showed that the mean age of female children was 11.7years while that of male children was 10.71 which informed that male children are exposed to strenuous farm activities earlier than their female counterpart. At least 29.7%, 21.8% and 25.8% are non biological for boys, girls and all children respectively; more male children handle crude tools than their female counterparts, this indicated that biological female children are more than biological male children used in cassava farming which might result in education set-back for female biological children. Most boys help in applying agro-chemicals which could cause physical injuries on them through skin burns and other injuries sustain by exposure to chemicals may also create serious developmental harms on them in the future. About 57%, 44.4% and 50.8% of the children were engaged for between 1 – 3 hours on the farm either early morning and/or evening time for boys, girls and all children respectively.

The mean age of school entries were 7.7years and 9.2years for boys and girls respectively, it shows that boys get to school earlier than girl and this may be due to the believe that a boy is the heir to household head and should be educated better than the girl which put girls at disadvantage. The mean of 7.57years for both gender revealed that children are not enrolled in school earlier than 8 years perhaps due to their early exposure to farming activities.

3.1. Child labour participation in cassava production and Parent-Child relationship

As shown in Tables 2, 3 and 4, about 16.04% of female aged between 15 – 17 years helped to apply pesticides compared to 15.45 % of male children helped to apply fertilizers of the same age category and 25.20% and 25.47% of male and female children aged 15 – 17 years helped to apply

fertilizers. Children applying chemical substances are exposed to immediate physical injuries such as skin burn. It thus appeared as if child labour is hazardous occupation especially on farm. When gender differentiations were considered amongst the children; male children participated better than their female counterpart in all operations. This conformed to Nkamleu and Kielland (2006) that women and female children are to some extent constitute only the adjustable labour on the farms. They will be pulled away from their usual tasks in housework when cassava farming demands it when surplus hands are required on farm during harvesting, transportation of cassava tubers from farms to house or markets, processing of cassava to different products.

Table 1: Socio-economic characteristics of the children involved in farm labour

Variables	Boys	Girls	Pooled
Age of child (yrs)			
6 – 8	11 (8.6)	6 (4.8)	17 (6.7)
9 – 11	64 (50.0)	56 (45.2)	120 (47.6)
12 – 14	45 (35.2)	46 (37.1)	91 (36.1)
15 – 17	8 (6.2)	16 (12.9)	24 (9.5)
mean±st.dev	10.71±2.75	11.17±2.97	10.94±2.87
Parenting			
Non- biological child	38 (29.7)	27 (21.8)	65 (25.8)
Biological child	90 (70.3)	97(78.2)	187 (74.2)
Working with dangerous tools			
Yes	47 (36.7)	18 (14.5)	65 (29.8)
No	81 (63.3)	106 (85.5)	187 (70.2)
Helping to apply agro-chemicals			
Yes	47 (36.7)	18 (14.5)	65 (29.8)
No	81 (63.3)	106 (85.5)	187 (70.2)
Hours spent on farm			
1 – 3	73 (57.0)	55 (44.4)	128 (50.8)
4 – 6	45 (35.2)	40 (32.3)	85 (33.7)
7 – 9	8 (6.3)	15 (12.1)	23 (9.0)
10 – 12	2 (1.5)	14 (11.3)	16 (6.5)
mean±st.dev	2.32±0.96	3.52±1.77	2.92±1.55
Years of schooling			
1 – 3	9 (7.6)	10 (8.8)	19 (8.2)
4 – 6	60 (50.8)	45 (39.8)	105 (45.5)
7 – 9	43 (36.4)	50 (44.2)	93 (40.3)
10 – 12	6 (5.1)	8 (7.1)	13 (5.6)
mean± st.dev	7.71±2.75	9.17±2.97	7.57±2.87

Source: field survey, 2015

*Percentages are figures in parentheses

Table 2: Distribution of child labour participation in cassava production by gender

Farm Activities	Age of Boys			Age of Girls		
	6 – 9	10 – 13	14 – 17	6 – 9	10 – 13	14 – 17
Field Prep	37(30.08)	37(30.08)	69(56.10)	28(26.42)	28(26.24)	30(28.30)
Planting	43(34.96)	51(41.46)	74(60.16)	15(14.15)	17(16.04)	67(63.21)
Weeding	43(34.96)	50(40.65)	74(60.16)	14(13.21)	15(14.15)	61(57.55)
Pesticides appl.	19(15.45)	19(15.45)	19(15.45)	6(5.66)	8(7.55)	17(16.04)
Fertilizer appl.	21(17.07)	28(22.76)	31(25.20)	8(7.55)	8(7.55)	27(25.47)
Harvesting	40(32.52)	53(43.09)	73(59.35)	15(14.15)	16(15.09)	80(75.47)
Transportation	45(36.59)	53(43.09)	74(60.16)	16(15.09)	16(15.09)	80(75.47)
Processing	41(33.33)	49(39.83)	69(56.10)	13(12.26)	16(15.09)	66(62.26)

*Percentages are figures in parentheses

Source: field survey, 2015

Table 3: Distribution of biological children participation in cassava production

Farm activities	Biological child			Biological child		
	Age of Boys			Age of Girls		
	6 – 9	10 – 13	14 – 17	6 – 9	10 – 13	14 – 17
Field Prep	19(21.59)	23(26.13)	41(46.59)	37(45.68)	9(11.11)	14(17.29)
Planting	23(26.14)	33(37.50)	48(59.26)	15(18.51)	14(17.28)	13(16.05)
Weeding	23(26.14)	48(54.55)	48(54.55)	43(53.09)	13(16.05)	11(13.80)
Pesticides app	11(12.5)	13(14.77)	17(19.32)	21(23.86)	6(7.41)	8(9.88)
Fertilizer app.	9(10.23)	21(23.86)	21(23.86)	48(59.26)	8(9.88)	6(7.41)
Harvesting	16(18.19)	47(53.41)	47(53.41)	48(59.26)	16(19.75)	11(13.58)
Transport.	21(23.86)	48(54.55)	48(54.55)	38(46.91)	16(19.75)	12(14.81)
Processing	23(26.14)	43(48.86)	43(48.68)	49(60.49)	13(16.05)	12(14.81)

*Percentages are figures in parentheses

Source: field survey, 2015.

Table 4: Distribution of non-biological child participation in cassava production

Farm activities	Non- biological child			Non- biological child		
	Age of Boys			Age of Girls		
	6 – 9	10 – 13	14 – 17	6 – 9	10 – 13	14 -17
Field Prep	8(22.86)	7(20.00)	14(40.00)	10(43.48)	2(8.70)	3(13.04)
Planting	10(28.57)	9(25.71)	13(37.14)	12(52.17)	1(4.35)	2(8.67)
Weeding	10(28.57)	9(25.71)	13(37.14)	12(52.17)	1(4.35)	2(4.35)
Pesticides app	4(11.43)	3(8.57)	12(34.29)	4(17.39)	1(4.35)	2(4.35)
Fertilizer app.	5(14.29)	5(14.29)	16(45.71)	1(4.34)	1(4.35)	2(4.35)
Harvesting	12(34.29)	9(25.71)	13(37.14)	16(69.57)	1(4.35)	2(4.35)
Transport.	9(25.71)	13(37.14)	16(69.57)	1(4.35)	2(4.35)	5(14.29)
Processing	9(25.71)	8(22.86)	13(37.14)	14(60.87)	1(4.35)	2(4.35)

*Percentages are figures in parentheses

Source: field survey, 2015.

It is obvious that both biological and non biological children constitute an important factor of production in the cassava farming, but comparing them, there was difference between the participation of biological and non- biological children in cassava production, Such activities like field preparation, weeding and planting, harvesting, fertilizer application and transportation had more non – biological children aged 6 – 9 years than the biological children of same age, These aforementioned activities are regarded to be physically strenuous, energy and time consuming

which might have unpleasant influence on the educational attainment of a child especially these non – biological children.

3.2. Schooling pattern of Children involved in cassava farming

One of the growing concerns often raised over the issue of working children is whether or not they are enrolled in school. When they were young, boys neither work nor go to school, then took to school when they were between 10 – 13 years and thereafter made to combine school and work in their latter age, only very few were conditioned to work only at this period. Conversely, girls started school and work combination at their tender age, latter were pulled out of work to neither work nor school, some might be made to school only or unfortunately work only on cassava farms, Table 5 indicated that at tender age, 13.82% of male children neither work nor school, as they age, they were enrolled in school as indicated that 7.32% of them were made to school only then at around 14 years, 17.07% of them combine school and work and 3.25% of them were made to work only at this age. But at 6 years, 28.30% of girls enrolled in the school and also made to work on the farm, as they age, they were pulled out to neither work nor school, then 1.89% of them were made to school only when they were 10 years, and then 1.89% pulled to work only on the farm. This inequality of gender enrollment is partially due to believe system of the household head which put female children at the disadvantaged edge against male counterparts. The result also revealed a higher index of male children working but not attending school, and higher index of female children combining schooling with working in all age categories, hence, parents see female children as adjusted labour force on the farm who are made available at such time of cassava harvesting, processing and transportation when surplus hands are required on farm.

Table 5: Distribution of Schooling pattern of Children involved in cassava farming

School/Work options	Age of Boys				Age of Girls			
	6 – 9	10 – 13	14 – 17	All	6 – 9	10 – 13	14 – 17	Pooled
Neither school nor work	17(13.82)	10(8.13)	10(8.13)	37(28.91)	13(12.26)	10(9.43)	9(8.49)	32(25.81)
School only	15(12.20)	9(7.32)	8(6.50)	32(25.00)	4(3.77)	8(6.45)	1(0.94)	13(10.49)
Work only	5(4.07)	3(2.44)	4(3.25)	12(9.38)	3(2.88)	2(1.89)	2(1.89)	7(5.65)
Both School + work	14(11.38)	8(6.25)	25(19.53)	47(36.72)	30(28.30)	22(17.74)	20(16.13)	72(58.06)

*Percentages are figures in parentheses
Source: Field survey, 2015.

3.3. Determinants of school attainment age

As shown in Table 6, logistic regression model were estimated for girl, boy and both gender categories and log likelihood values of -40.734, -70.180 and -123.774 were found to be greater than the values of likelihood ratios of 31.42, 29.95 and 56.56 in absolute terms and these are significant at 1% level of significance showing that all the slope coefficients are significantly different from zero. The pseudo R² of 0.2783, 0.1759 and 0.1860 revealed that 72.17%, 82.41% and 81.40% of the change in school attainment age were captured by the exogenous variables included in three models of girl, boy and both gender respectively. These statistics tell that the model is good fit for expression of determinants of school attainment age.

For the girl model, the parameter estimates revealed that age, educational attainment of household head and girl’s mother, availabilities and location of primary and secondary schools were significant and positively related to school attainment age. The marginal effects showed that a percentage increase in the age of the girl result in 7.0% increase in the probability of school attainment or early school entry. This emphasized the findings of Patrinos and Psacharopoulos,

1994 that a child’s age is a significant indication of the level of his school entrance level and attainment. A percentage increase in educational attainment of household and her mother result to 80% and 0.265% respectively increase probability of school attainment of such girl this is collaborated by Nkamleu and Kielland, 2006 that educational status of a parent impact on the educational attainment of a child. Percentage increases in number of primary and secondary schools situated in the area result in increase probabilities of 50% and 10.5% respectively of school attainment of the girl in the area as indicated by Moyi, 2010 that establishment of a school in the rural settings will improve the school entry age of children in such area.

For the boy model, age, educational attainment of household head and boy’s mother, availabilities of primary and secondary schools and age of household head were significant and positively related to school attainment age. The marginal effects showed that a percentage increase in the age of the boy results in 56% increase probability of school attainment or early school entry, A percentage increase in educational attainment of household and his mother result to 0.4% and 3.4% respectively increase probability of school attainment of such boy. Percentage increases in number of primary and secondary schools situated in the area result in increase probabilities of 5.7% and 7.6% respectively of school attainment of the boy in the area. A percentage increase in the educational attainment of a boy is as a result of 40.4% in crease in age of the household head. The household head tends to send his male child to school to prepare him for taking over his estate when he passed on.

Table 6: Determinants of school attainment age

Variables	Girl		Boy		Both gender	
	Marg. effects	P values	Marg. effects	P values	Marg. effects	P values
Age of child	.070***	0.004	.056***	0.007	.083***	0.000
Biological child	-.104	0.239	.284	0.019	.100	0.219
Farm income	3.25e-6	0.146	-1.42e-7	0.939	1.13e-6	0.406
Educ. Att. of household head	.800**	0.011	.004*	0.072	.009*	0.092
Educ Att. of child’s mother	2.65e-3**	0.051	-.034 **	0.059	-.014*	0.094
Cassava farm size	.081	0.222	-.052	0.673	.023	0.753
Availability of pry sch	.050**	0.068	.057**	0.022	.055***	0.017
Availability of secsch	.105*	0.078	.076**	0.049	.124**	0.024
State dummy	-.158	0.089	-.171	0.203	-.116	0.187
Age of household head	3.84e-5	0.923	.404***	0.000	2.86e-3	0.436
Dependencyratio	.494	0.397	.362	0.348	-.037	0.697

* significant @ 10%, ** significant @ 5%, *** significant @ 1%

LR chi2(13) = 31.42	LR chi2(14) = 29.95	LR chi2(13) = 56.56
Prob > chi2 = 0.0029	Prob > chi2 = 0.0077	Prob > chi2 = 0.0000
Log likelihood = -40.733978	Log likelihood = -70.179502	Log likelihood = -123.7741
Pseudo R ² = 0.2783	Pseudo R ² = 0.1759	Pseudo R ² = 0.1860

Source: field survey, 2015.

For both gender model; age of child, educational attainment of household head and mother, availabilities of primary and secondary schools were significant and positively related to school

attainment age. The marginal effects showed that a percentage increase in the age of the child results in 8.3% increase probability of school attainment or early school entry. Percentage increases in educational attainment of household and mother result in 0.9% and 1.4% respectively increase probability of school attainment of such child. Percentage increases in number of primary and secondary schools situated in the area result to increase probabilities of 55% and 12.4% respectively of school attainment for the child.

4.0. Conclusion and Recommendation

Child labour were prominent among males, work on heavy tasks such as weeding, processing, harvesting among other activities which were inappropriate for their inadequately developed muscles and had direct threat on working safety and adversely affect school attendance. Children involvement in pesticides and fertilizers application posed a great threat to their physical and health status arising from effects of exposing children fragile skin to chemicals. Child fostering and guardianship put non biological children at disadvantage of schooling and they work in the cassava farms more than biological children. Non availability of schools prevents children to attend school and hinder their school attainment with respect to age. The farming activities affect children's school enrollments. They were mostly unable to combine working on the farms with schooling. Low level of parents' educational attainment adversely affects child labour on cassava farms and schooling.

Child involvements in cassava farm activities can be seen as an infringement on the child education and pleasure. Hence, legislation should be step up in the pronouncement of child labour relating activities as illegal and punishable under law, child fostering and guardianship put children that are not biologically related with the household head at great disadvantage of child laboring and schooling hence, such fostering should be done under strict guidance of relevant government and non- governmental agencies to avoid negative threat of non biological children, parent should ensure to send their children to school to be better skilled for modern practices in cassava and other farming activities, efforts of relevant agencies should be intensified towards establishment of primary and post- primary schools in the non available rural areas to allow parents send their children to school and farmers should make efforts to enroll for adult literacy program in order to boost their level of educational awareness.

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