ISSN: 2616-1346 (Print) ISSN: 2756-5246 (Online)

# IMPACT OF FUNDING THE UNIVERSAL BASIC EDUCATION (UBE) ON HUMAN CAPITAL DEVELOPMENT IN KADUNA STATE

# MARCUS, NATHAN 18

nathanmarcus10@gmail.com +2347039793218

Department of Social Science and Humanities, School of General Studies
Education, Kaduna State College of Education, Gidan-Waya, Kaduna State.

## TAGWAI, KUNABA RACHEAL<sup>2</sup>

rachealtagwai@gmail.com +2347035956722

Department of Economics Education, School of Secondary Education: Arts and Social Science Programme, College of Education, Gidan-Waya, Kaduna State.

#### SAMAILA BITRUS KWASAU<sup>3</sup>

+2348160330821

Department of Social Science and Humanities, School of General Studies Education, Kaduna State College of Education, Gidan-Waya, Kaduna State.

#### **Abstract**

Human capital development is regarded as facilitating the development of national human capacities to achieve sustainable, inclusive, equitable development and, at the same time, enhance well-being of individuals. The study broadly seeks to assess the impact of funding the Universal Basic Education (UBE) on human capital development of Kaduna State. Secondary data were gathered from the relevant agencies in the state on the funds accruing to the state universal education, number of pupil's enrolment in primary and junior secondary schools as well as transition level in the school census report. The hypotheses were tested using Regression analysis because of its ability to determine the variation in one variable (dependent variable) associated with variation in another variable(s) (independent variables). The Ordinary Least Squares (OLS) estimation method is a multiple estimation technique among others; it is used to fit the coefficients chosen to minimize the sum of squares of residual errors with a value of a 1% rise in capital expenditure on UBE (CEUBE) in Kaduna State would give rise to 0.042% in human capital development, 1% rise in junior secondary school enrolment would expand human capital development as proxy by number of pupils who graduated from primary school to junior secondary school in Kaduna state by 0.32%. 1% increase in primary schools enrolment (PSE) would increase number of graduates in the state by 0.95%. The study finds among others that; funding the UBE in terms of recurrent expenditure improves the quality of teachers in terms of trainings and development, workshops and others; funding the capital expenditure of the UBE in terms of project financing leads to HCD. The study therefore recommend among others; the need for the government to increase funding in the entire educational sector with more emphasis on the UBE, since it is the foundation of education.

**Keywords:** Quality Education, Funding, Human Capital Development, Universal Basic Education (UBE), Education.

#### 1.1 Introduction

Over the years, the concept of human capital development has evolved from solely focusing on individual capacity to building institutional capacity at the national level, and other levels through socio-economic policies and development plan and strategies. Human capital development is regarded as facilitating the development of national human capacities to achieve sustainable, inclusive, equitable development and, at the same time, enhance well-being of individuals. As such, human capital development has been seen as empowering people by fostering the contributory capacities that they can bring to the improvement of their own quality of life and that of their families, communities, enterprises and societies (Ojewale & Olayiwola 2020). Education remains a vital instrument for achieving human capital development towards sustainable development of any nation is not in doubt in the minds of many people. Another general consensus is that for education to be seen as successful, it requires huge investments either in terms of policies and implementation, infrastructures, human capacity development and of course funds (Innocent, 2017).

#### 1.2 Statement of the problem

Nigeria is one of the countries within Africa that has been labeled educationally disadvantaged and almost at its height, owing to a numerous problems bedeviling the sector. Dominant among these constraints remain the issue of poor funding of the sector, for which the United Nations Education and Scientific and Cultural Organization (UNESCO) and other stakeholders have consistently advocated for an increase. UNESCO threshold is at 26 % of a nation's national budgets to education alone, this shows states must replicate same to ensure adequate human capital development. But with harsh economic implications the world over, this could however be seen as a giant dream. It is no doubt among the reason for the low human development index (HDI) ranking of Nigeria, where from 2005 to 2020, Nigeria HDI recorded 0.465, 0.484, 0.527, 0.530, 0.532, 0.534, 0.534 and 0.539. This is the HDI rating of Nigeria in 2005, 2010, 2015, 2016, 2017, 2018, 2019 and 2020 respectively (United Nation's Development Programme Reports on Human Capital Development in Nigeria, cited in Irejeh and Faghawari, 2021). By implication, Nigeria is above average for countries with low human development group with a value of 0.504 in 2017 and slightly below the average of 0.537 for Sub-Saharan African countries in 2017, though there is a slight improvement year in year as the years goes by with an increase of the budgetary flow into the education sector, but yet to meet the threshold of 26% as recommended by the UNESCO. In 2016 and 2018 of the data available Kaduna state HDI was at 0.404 and 0.514 respectively with the National average of 0.511 and 0.514 respectively, having Lagos state with the highest HDI in 0.652 in 2016 and 0.673 in 2018. Kaduna state despite ranked as the country at 3rd out of 36 states in terms of population projection (Census 2016) is ranked low in HDI of 24<sup>th</sup> position out of 36 in 2018 (NBS, 2018 in Usiobaifo, 2019). This no doubts inform the reason why we conduct this research in order to ascertain the impact of funding the Universal Basic Education in Kaduna State (SUBEB) as an educational sector on the Human Capital development of the State.

#### 1.3 Objectives of the Study

The following are specific objectives the study intends to achieve:

- To ascertain the extent to which funding has impacted on primary school enrolment in Kaduna State;
- To assess whether funding has improved on transition of pupils to junior secondary school in Kaduna state;
- iii. To examine whether funding the UBE has improved on the quality of teachers in Kaduna state.

#### 1.4 Hypothesis

**H0**: There is no positive relationship between funding the UBE and Human Capital Development in Kaduna State.

**H1:** There is a positive relationship between funding the UBE and Human Capital Development in Kaduna State.

#### 1.5 Methodology

The study is concerned with funding the Universal Basic Education in Kaduna State as it relates to human capital development in the state. This study generates secondary data from Kaduna Sate Budget and planning commission (KSBPC) on budgets and budgetary allocation of the government, expenditure both capital and recurrent, on the State Universal Basic Education Board (SUBEB), generate data as it relates to infrastructural development of the UBE in the state. The study therefore adopts a time series data covering a period of 10 years from 2011 to 2020 fiscal year. The time series data on total budgetary allocation as well as total expenditure both capital and recurrent. The choice of period was to focus basically on a democratic dispensation, precisely the fourth republic. Multiple regression model was applied and estimated using the ordinary least squared in determining the relationship that exist between funding on the UBE (UBE) and Human capital development in Kaduna State. Therefore conclusion and recommendations where reached based on the findings of the study.

#### **Model Specification**

In determining the relationship between funding UBE (FUBE) and Human Capital Development

(HCD) in Kaduna State, the regression model is specification is as follows:

 $\beta$  = Beta,  $\beta$ 0,  $\beta$ 1,  $\beta$ 2,  $\beta$ 3,  $\beta$ 4,  $\beta$ 5, and  $\beta$ 6 are parameters to be estimated, and the a priori expectations should be positively presented (+).

In stochastic format or form, equation 1 becomes:

HCD = 
$$\beta$$
0 +  $\beta$ 1 REUBE +  $\beta$ 2CEUBE +  $\beta$ 4JSSE +  $\beta$ 3PSE +  $\beta$ 5TT +  $\beta$ 6SI +  $\mu$  ......2

#### Where:

HCD = Human Capital Development is proxy by the number of pupils who have graduated

Primary school and proceed to junior secondary schools.

REUBE = Recurrent Expenditure

CEUBE = Capital Expenditure

JSSE = Junior Secondary School Enrolment

PSE = Primary School Enrolment

TT = Teachers Trained

SI = School Infrastructures

M = Error term

Before embarking on the estimation, the variables were subjected to a unit root test in each of the time series data, with the use of a stationary test in order to avoid misleading results.

# **Impact Criteria**

In order for the research to assess impact of funding Kaduna state UBE for Human Capital Development, we therefore see impact in this study as thus:

- 1. Infrastructural rehabilitation and improvement as well as availability of basic learning tools and facilities
- 2. Accessibility in terms of number of enrollment of pupils into the UBE schools across the state both pre-primary and primary levels of ages between 6-11
- 3. Increase in the number of pupils who complete primary school and successful transition to junior secondary schools in the State.

#### Literature Review and Theoretical Framework

Education constitutes the very foundation of meaningful socio-economic, political growth and development of any nation. This is not farfetched from the reason why the federal Government of Nigeria adopted education as an instrument par excellence for affecting national development (Ajeyalemi 2009 in Michael & Wumi 2017). Various governments and international actors are encouraging many children, including those from the poorest countries, to attend school to be assured of having a bright future ahead of them. According to llegbinosa (2013), the accumulation of human capital by countries is seen as an investment decision. He argues that while investment in human capital has been a major source of individual, communal and national economic growth.

Primary education in Nigeria refers to the education which children receive from the age of 6 years to 11 years plus. It is the foundation level of the educational system which runs for six years, and it is aimed at developing basic literacy, numeracy, communication skills and transmission of the culture of the people to younger generations. Basic education is fundamental to human and societal development. It is the foundation upon which other levels of education are built and a necessary prerequisite for human and national development (Anaduaka & Okafor 2013). To Etuk, Ering & Ajake (2012), the primary target of the UBE policy was ensuring that every Nigerian child acquires a minimum of 9 years basic education. Universal basic education comprises (9) nine year duration comprising (6) six years of primary education and (3) three years of junior secondary education. For Aboluwodi (2015), the emphasis of Universal Basic Education Policy is "education" rather than schooling. Aboluwodi (2015) & Abdul, Oyilowhoma & Aboli (2017) maintained that UBE policy has to do with the all-round development of the child. That is, a life-long learning programme aiming at improving the literacy level of the children and adults.

#### An Overview of Universal Basic Education

Universal basic education in Nigeria evolved from the 1955 Universal Primary Education Scheme which operated in western Nigeria. In subsequent years, the Eastern and Northern governments also had in place their respective universal education. The federal government came into the scene only in 1976 with the commencement of the universal primary education in all the regions within the country. The consequence was the provision of a unified and singular framework for educating Nigerians (Kuye, Ishola, & Thomas 2021). The Universal Basic Education (UBE) programme was launched on 30th September 1999 by the then president of Nigeria, President Olusegun Obasanjo. The purpose of the programme is to provide free and compulsory education for children in the primary and junior secondary schools in the country. The UBE programe is designed to remove distortions and inconsistencies in basic education delivery and to reinforce the implementation of the National Policy on Education. It is also Nigeria's response to the achievement of Education for all (EFA),

NATHAN Etal

Millennium Development Goals (MDGs) and the present Sustainable Development Goals (SDGs). The UBE is aimed at enabling all children in the Nigerian society to participate in the free 9 years of schooling from primary one to junior secondary school (JSS) three classes. The formal education system is only one of six components included in UBE. Others relate to early childhood, literacy and non-formal education or apprenticeship training for youths outside the formal education system (Anaduaka & Okafor, 2013; Abdul, Oyilowhoma & Aboli 2017)

## Funding Sources for Universal Basic Education (UBE)

Basic education is financed through different sources at Federal, State and Local Government level. In practice, however, the State government has a strong leading role in all basic education matters. Here, we will provide a summary of the way in which states' influence their own funds. Basic education is financed through different sources at Federal, State and Local Government level. In practice, however, the State government has a strong leading role in all basic education matters. Here, we provided a summary of the ways in which states' influence their own funds, how it influences the allocation of local government funds, and determines how much federal funding to receive for Basic Education through counter-part funding below;

#### **State Funding for Basic Education**

The main source of revenue used by states for all public services, including basic education, comes from a statutory transfer of the Federation Account Allocation Committee (FAAC). Made up of both oil and tax revenue, States jointly receive 26.72% of FAAC revenue, though the amount differs per state, based on an allocation formula. Such federal funding provides the main source for all state payment of development projects, salaries, and other recurrent expenditure. However, overall FAAC funding has been reduced in recent years due to lower global oil prices, thus contributing to states' fiscal deficits and unpaid salaries. As a result of this, States are trying to rely more on internally generated revenue (IGR) at state level, but this is often still a relatively minor source of income. The importance of FAAC versus IGR funding on basic education financing differs significantly across states. For the majority of basic education services, FAAC and IGR funding is provided directly to SUBEB, which is responsible for managing all non-salary spending. Local Government Funding for Basic Education as with state governments, local governments' main revenue comes from FAAC contributions. Yet, the main body to determine how this is allocated is at State level, through the Joint Account Committee (JAC). The JAC manages the State Joint Local Government Account, into which all allocations for LGAs from the Federation Account and from the State are paid, and decides disbursements on a monthly basis to each LGA. It also determines how much recurrent expenditure is allocated to each of the specific sectors (e.g. 'education', 'health', 'agriculture'), overseen by individual LGA supervisors. The JAC even approves allocation for all development projects at the LGA. Although payment of primary teachers' salaries is technically the responsibility for the Local Government Education Authorities (LGEAs), in reality such salaries are deducted each month from LGA allocations and transferred to SUBEB to process salary payments (Jones and Brownell 2014). This means that in case of local teacher recruitment, the LGEA has to submit the personnel details back to the SUBEB for processing, and SUBEB handles all payment processes subsequently. Local governments have two main education actors. The LGEA receives all its funding directly from the SUBEB. Yet, this is small in size and constitutes more of a monthly impress used by the LGEAs to pay recurrent costs and conduct school visits.

#### Federal Government Funding for Universal Basic Education

The Universal Basic Education Intervention Fund (UBE-IF) is the main federal funding that is provided to states for basic education, and designated for development expenditure only. This is funded by a statutory transfer of 2% of the FAAC revenue, and overseen by the Universal Basic Education Commission (UBEC). Half (50%) of UBE-IF funds are provided as a 'matching grant' to states that give an equal share amount to their SUBEB via their state education budget, and provide detailed work plans and spending reports to UBEC. As such, the UBE-IF is the main tool of the Federal government to influence spending on basic education at the lower tiers of government. However, due to a drastic decline in state FAAC allocations in recent years, many states have stopped providing their matching funds, thus forfeiting their UBE-IF funding. The remaining 50% of the UBE-IF is given directly to states to use for specific, earmarked areas. States oversee the procurement of the related goods, and implementation of activities, and provide reports back to UBEC.

The fund is disbursed with the following formula: 50% as Matching Grant Funds for the provision of infrastructure such as classrooms, furniture, toilets, workshops, libraries, equipment etc;14% as Educational Imbalance Fund for maintaining equity and inclusiveness and eliminating all forms of disparities and disadvantages; 15% as Instructional Materials Fund for the provision of textbooks in the core subjects and reading materials; 10% as Teacher Professional Development Fund for the training of the serving teachers and education managers on various aspects of school activities; 5% as Good Performance Fund to encourage states doing well in the implementation of the UBE programme; 2% as Special Education Fund for those with special needs; 2% as UBE Monitoring Fund; 2% as UBE Implementation Fund;" (Gershberg, et al 2015).

#### Universal Basic Education Quality Education and Human Capital Development

#### a. Quality Education

Quality education entails the promotion of equitable lifelong learning opportunities to see that major progress is made for education access, specifically at the primary school level, for both boys and girls. However, access does not always mean quality of education; or completion of primary school (Njoku & Onyegbula 2017)

According to UNICEF (2016) cited in Alex & Juan (2017), a quality education is defined by five elements, the learner's outside experiences, learning environment, content of education; learning processes, and education outcomes. Eze (2017) observed that one of the reasons for poor human capital development is lack of qualified people to develop and implement alternative technologies due to a poor educational system and brain drain. The importance of education in developing a better society in terms of economics and stability cannot be overemphasized.

#### b. Human Capital

Human capital represents the human factor in the organization, the combined intelligence, skills and expertise that give the organization its distinctive character (Njoku & Onyegbula, 2017). The concept of human capital is associated with intellectual capacity with flows of knowledge in an individual and can be regarded as the tangible and intangible resources associated with people. Anugwom (2012) noted that, the quality of human capital has several aspects; one of these involves improvement of health and longevity of the population. This is in line with one of the sustainable development goals.

#### The Nexus between Universal Basic Education and Human Capital Development

The Universal basic education stand as a foundation on which education is built, when a foundation is shaky, the whole building collapse. The relationship between education and human development is no longer in question as Bell Brown & Weiss (2018), states that "the main link between education and economic development is the knowledge and skills it produces in the labour force". Greater assets for nation building are human resources. Obviously, education empowers man in generic terms to understand himself. It empowers man economically, morally and socially (Gaudet, Brown & Ludsford 2017). An educated man has greater occupational mobility. This fact is buttressed by Arop, Owan & Akan (2018) when they noted that education has proven to be the single and most potent factor for social development and transformation.

# **Theoretical Framework**

We adopt the "Human capital theory" introduced by Schultz (1961). Woodhall, (1987) initiated an improvement in human capability that is important to production, and then a term of human capital was called investment in human capital. Human capital widely used after Becker won the novel prizes initiated "human capital theory" stated that a different level of education and training contribute to a different level of wages and salaries, Blaug, (1976) emphasized that human capital can be accumulated in different forms of education, training, the more knowledge, skill and ability, the more likely to get a better job (Fix, 2018).

The human capital approach to development is an economic theory that holds the view

about economic growth and development coming from within the system as an uninterrupted outcome of internal process. More particularly, the theory reveals that the augmentation of a nation's human capital will bring about economic growth by means of the development of new forms of innovations in technology together with efficient and effective means of production through education and trainings. The human capital theory shows how education is able to provide for a better working environment. This theory emphasizes on investing in education for better productivity of individuals (Olaniyan & Okemakinde, 2008; Psacharopoulos & Patrinos, 2018). The human capital theory, which is investing in education for the greater good of a society, has been estimated to be in application since the 1950s (Psacharopoulos & Patrinos, 2018). The human capital theory is important nowadays, as the world is changing rapidly, the advancement of technology demands more skills and human capital is a significant contributor to economic growth (Rabapane, & Wadesango 2020 Afolayan, 2019,).

Therefore, this theory becomes relevant to the research work as it explains thus; when funding increases in the educational sector especially the UBE, it has a multiplier effect on education and trainings which in turn advance as well as improve on human capacity to innovate and develop the state in general.

#### **Empirical Review**

There are numerous researches carried out in the area of human capital development and education, among which are as follows:

Okafor, Ogbonna, & Okeke (2017) & Oluwole 2006 in a similar studies made both descriptive and empirical analysis of the impact of human capital development on economic growth in Nigeria. For that purpose, government expenditure on education, health and other social services were employed as proxies for human capital development. The result of the study showed that despite that education is better funded than health and other social services yet the sector is still faced with challenges which disturbs its proper functioning. Moreover, the result of the study shows that although human capital development is very crucial to economic growth, yet poor funding of education, health and other social services has made it impossible to achieve reasonable result in Nigeria.

Omankhanlen, Ogaga-Oghene, Obarisiagbon, & Okorie (2014) investigate the Nigerian government Expenditure on Human Capital Development. This study seeks to evaluate how efficient government spending on human capital development in Nigeria has been with particular emphasis on the education component. The variables were determined with a unit root test, stationary or not using Phillip Peron test. The Phillip Peron test was used to efficiently account for the stochastic trends in the data series. In order to capture the efficiency of government expenditure on human capital development in Nigeria the data analysis was conducted using Data Envelopment

MARCUS, NATHAN Etal

Analysis involving Input Oriented Variable Return to Scale. The findings of the study reveal that there has been significant reduction in the efficiency of government expenditure since 1990 up till 2011 which has been on decreasing level. This result therefore could be evidenced from the poor quality and output experienced in the Nigerian education sector.

Chude, Nkiru and Izuchukwu (2013) investigates the effects of public expenditure in education on economic growth in Nigeria over a period from 1977 to 2012, with particular focus on disaggregated and sectoral expenditures analysis. Government expenditures are very crucial instruments for economic growth at the disposal of policy makers in developing countries like Nigeria. The study used Ex-post facto research design and applied time series econometrics technique to examine the long and short run effects of public expenditure on economic growth in Nigeria. The results indicate that Total Expenditure Education is highly and statistically significant and have positive relationship on economic growth in Nigeria in the long run. The result has an important implication in terms of policy and budget implementation in Nigeria. We conclude that economic growth is clearly impacted by factors both exogenous and endogenous to the public expenditure in Nigeria.

Among others, none of these studies have looked at the impact of the UBE on human capital development to see the extent to which the UBE has impacted human capital in Kaduna state, using funding as a precursor. This is the gap this paper intends to fill.

#### **Data Presentation and Analysis**

The tables shows the funding of UBE in Kaduna State (Budget and Budgetary Allocations from 2011-2021 SUBEB), rate of enrolment into pre-primary, primary and junior secondary levels, which is further classified based on gender. Data collected were summarized and interpreted using tables and descriptive statistics.

Table 1 (see appendix 1) depicts the budget allocation of Kaduna state government to the Universal basic education. The figures shows a steady rise in funding of the UBE, especially in the area of infrastructure from 2018 to 2019, there is a fluctuation in the year 2020 due to the pandemic that ravage the entire state and an upsurge of almost triple the budgets of the previous years in the year 2021. This could be as a result of the need to recover from the 2020 Covid 19 pandemic. It can also be deduced that Capital expenditure in the Budget of Kaduna state UBE rises, especially lately from the year 2018 to date, excluding the pandemic year 2020. This informs the rise in rehabilitation of infrastructures of over 500 schools out of the 4200 primary schools in the state (KSME, 2021). The total number of Pupils in Public and Private school as shown in Table 2 (See appendix II) is 1, 317,808. 1,159,742 are within the age bracket of (6-11). The enrolment as shown in table 3 (See Appendix III) shows that the Primary enrolment was 1,932,838; out of which 936,361 were girls which constitute 48% of the total enrolment. The Primary enrolments of school age (6-11 years) stood

at 1,678,210; out of which 812,253 were girls which constitute 48% of the school age enrolment. The total number of Pupils in Junior Secondary school as shown in Table 4 (see appendix IV) irrespective of sex and age is 210,216 out of which 96,474 are girls. A total of 153,319 are within the JSS age limit of 12-14. Out of this number, 69,739 are girls. The total number of Pupils in Junior Secondary school as shown in Table 5 (see appendix V) irrespective of sex and age is 342,283 out of which 164,190 are girls. A total of 244,537 are within the JSS age limit of 12-14. Out of this number, 117,894 are girls.

It can be seen from both tables that in 2013/2014, the number of enrolment was at 1, 317,808, while in the year 2018/2019 it is at 1, 932,838 giving an increase in pupils enrolment with about 615,030. Same implies with the enrolment of pupils within the age bracket of 6-11 at 1,159,742 in 2013/2014, while in the year 2018/2019 has it at 1, 678,210. This shows an increase of 518,468. The enrolment in junior secondary school from 2013/2014 is 210,216 while that of 2018/2019 is at 342,283 having an increase of 132,067.

This is as a result of the increase in funding of the present dispensation in the year 2018/2019. As noted by the Kaduna state governor, the major reason for an upsurge in enrolment of pupils in primary school is as a result of investing in infrastructure, personnel and incentives. The push has made the government to rehabilitate about 500 out of 4200 inherited primary schools across the state, with rehabilitating programme to overhaul the educational system in the state by providing decent classrooms, furniture, water and toilets facilities, building multi tiers school blocks to accommodate 30 to 40 pupils per class, which no doubt informs the increase in enrolment from 1.1 million to about 2.1 million, about 91% of school enrolment between 2018 and 2019 in Kaduna state (Annual school census 2020). The recruitment of about 25, 000 competent teachers to replace 21,780 incompetent ones as well in the State.

## **Presentation and Analysis of Results**

We estimated the level of impact of funding UBE on human capital development with expenditure on Capital and Recurrent Expenditure. The result shows that the variables were not stationary in levels except capital expenditure (CEUBE) and Primary schools enrolment (PSE) while the rest were stationary at second difference. We proceed to investigate the impact of funding the UBE on human capital development in Kaduna State, we made used of the ordinary least square (OLS) by estimating equation (2). The result is presented thus:

ISSN: 2616-1346 (Print) ISSN: 2756-5246 (Online)

#### **Regression Results**

Table: Least squares (NLS ARMA) Result Independent Variable: Funding (CUEBEREUBE)

Dependent Variable: Human Capital Development (HCD)

Method: Least Squares

Date: 06/05/2021 Time: 15:28 Sample (adjusted): 2011 -2020

HCD = -2.575 + 0.042CEUBE - 0.187REUBE + 0.321JSSE + 0.945PSE + 0.002TT - 0.049 SI......3

 $T-stat\{1.13\}\{2.38\}\{4.45\}\{-1.53\}\{-2.01\}\{-3.75\}\{1.96\}$ 

 $R^2 = 0.65$ ; R-2 = 0.59; F.Stat = 243.78; DW = 1.412

#### **Analysis of Regression Results and Testing Hypothesis**

The regression results shows that a 1% rise in capital expenditure on UBE (CEUBE) in Kaduna State would give rise to 0.042% in human capital development (HCD) proxy by number of pupils who graduated from primary school and proceed to JSS in the State and the variable is statistically significant as indicated the in the  $\,$ t-statistics. This result is in line with a priori expectation. With this positive relationship, it is expected that the various efforts diverted to increase the level of capital expenditure on UBE in the State budget would increase the number of graduates from primary to JSS in the State.

The coefficient of recurrent expenditure on funding the UBE in Kaduna State (REUBE) is negative but significant. This means that a 1% rise in recurrent expenditure on funding UBE in Kaduna State (REUBE) would result to 0.19% reduction in number of out of school graduate in the State. This is not in line with the a priori expectation. Theoretically, it is expected that increase in recurrent expenditure would expectedly give rise to number of pupils who graduated to JSS in the state. This may be possible as a result of recurrent expenditure like payment of salaries and allowances, are not getting to the teachers adequately or as at when due as well as some shady practices that may be siphoning the funds, making it not impactful.

The coefficient result of junior secondary school enrolment (JSSE) in Kaduna State is positive and insignificant; this is in line with a priori expectation although not significant in explaining number of graduates in the state. A 1% rise in junior secondary school enrolment would expand human capital development proxy by number of pupils who graduated from primary school to junior secondary school in Kaduna state by 0.32%. The coefficient of primary School enrolment (PSE) showed

positive relationship with human capital development proxy with number of graduates in the state and is statistically significant. This means that, 1% increase in primary schools enrolment (PSE) would increase number of graduates in the state by 0.95%.

The coefficient of Teachers training and development is positive; this is in line with the a priori expectation. The increase in the number of Trainings of Teachers would expand the number of graduate from primary to junior secondary school in the state. 1% increase in the Teachers training in Kaduna state would increase the number of graduates in the state by 0.002%. Also, number of schools build and rehabilitated in the state, showed a negative sign and is significant. This is also in line with a priori expectation. The negative relationships between numbers of schools rehabilitated and build and number of primary school graduates may be due to certain factors that may result to the dropout of number of pupils though the population is insignificant. Also the Kaduna state governments has renovated and add up or build more classes in primary schools with an increase in primary school enrolment in the state. The adjusted R<sup>2</sup> of 0.59 shows that 59% of the variation in human capital development as proxy with number of pupils who graduated in the primary schools in the state is explained by government expenditure component in the state. In the same vein, the Fstatistic is high, this is significant and it is an indication of the overpowering significance of the R<sup>2</sup> and the overall integrity of the estimated regression model. The Durbin Watson (DW) statistic is low; it implies the presence of auto-correlation.

**Test of Hypothesis:** The above regression indicates a consistence with our a priori expectation that: holding other variables with positive sign except for capital expenditure and school infrastructures, which is still within limit. This implies that: there is a positive relationship between funding the UBE and Human Capital Development in Kaduna State. This makes the null hypothesis of "There is a no relationship between funding the UBE and Human Capital Development in Kaduna State" rejected, while the alternate Hypothesis is accepted.

#### **Discussion of Findings**

Firstly, funding the UBE in terms of recurrent expenditure improves the quality of teachers in terms of trainings and development, workshops and others;

Secondly, funding the capital expenditure of the UBE in terms of project financing such as construction of conducive class rooms as well as rehabilitation of dilapidated ones, purchasing learning facilities like chairs tables, blackboards, desk etc. improve enrolment thereby enhancing the learning capacity of the pupils;

Thirdly, the higher the enrolment of pupils in both pre-primary, primary due to adequate infrastructure to accommodate more number, the higher the number of transition to junior secondary schools, as well as the higher the literacy level of the state and the higher the literacy level, it has a multiplier effect on the human capital development of the state;

Finally, for UBE to impact positively in the human capital development of the state there must be a high rate of both capital and recurrent expenditure, which will address good remuneration for teachers and staff, proper training, workshops and seminars, adequate supervision as well as rehabilitation and construction of dilapidated structures and facilities from time to time.

#### Conclusion

As we move into a knowledge based society, human capital development becomes sacrosanct and education is paramount or a key factor to human capital development, there is need for more emphasis to be laid on proper funding of the educational sector. Especially, funding the UBE becomes more important as we corroborate Michael & Wumi, (2017) who posit that, Poor quality primary education produce poor candidates for the poor quality secondary education, which in turn produce very poor candidates for the poor quality tertiary institutions of learning; that deliver unfinished professionals to the marketplace for stagnation and further retrogression of our national development. Therefore funding the UBE for a better human capital development needs to be taking seriously.

#### Recommendation

The study therefore recommends the following:

- The Kaduna state government should increase funding in the entire educational sector with more emphasis on the UBE, since it is the foundation of education;
- 2. The state government should ensure proper management and monitoring of funds meant for the UBE;
- Decent salary structure and remunerations of teachers should be done as at when due, as most of the UBE teachers always receive late salaries; which will go a long way in motivating the teachers for better efficiency;
- 4. The counter-part fund disbursement by all stakeholders in the UBE need to be taking seriously, as no tier of government should be found wanting in

NATHAN Etal

disbursing its own share of the fund.

#### Limitations of the study and guide for future study

Even though the research try to do justice in finding data as it relates to funding the UBE as well as pupils enrolment in the state, the study still encounters some difficulty in the process of getting these documents, time constraint was also a factor as well as the limited scope for the paper, as the research intends to cover other areas like the completion rate as well as transition to senior secondary schools and higher institutions. We therefore urge future researchers to look at funding in these areas as well as its impact on the human capital development of the state and the nation in general.

#### **REFERENCES**

- Abdul, U. F., Uyilowhoma, O. E. M., & Aboli, E. J. (2017). An Examination of Universal Basic Education (Ube) Policy in Nigeria. *European Journal of Research in Social Sciences Vol*, 5(4).
- Aboluwodi, A. (2015). Political Will and Strategic Planning in the Implementation of Universal Basic Education in Nigeria: The Obafemi Awolowo Example. *Journal of Education and Research*, 5(1), 41-55.
- Afolayan, O. T. (2019). Human Capital Development and Nigerian Economy in long-Term Perspective: Empirical Evidence. *Journal of Humanities and Social Sciences Studies (JHSSS*, 1(6), 13-27.
- Alex, J. K., & Juan, A. (2017) Quality education for sustainable development: Are we on the right track? Evidence from the TIMSS 2015 study in South Africa. *Perspectives in Education*, 35(2), 1-15.
- Anaduaka, U. S., & Okafor, C. F. (2013). The universal basic education (UBE) programme in Nigeria: Problems and prospects. *Journal of Education Research and Review*, 2(3), 42-48.
- Anugwom, G. A. (2012). Personnel, Human Resources and Human Capital Management—Development, Theory and Practice.
- Arop, F. O., Owan, V. J., & Akan, E. M. (2018). A qualitative analysis of universal basic education policy implementation strategies in Nigeria: Effective management for goals realization. *International Journal of Research and Innovation in Social Science (IJRISS)*, 2.
- Bell, S. T., Brown, S. G., & Weiss, J. A. (2018). A conceptual framework for leveraging team composition decisions to build human capital. *Human Resource Management Review*, 28(4), 450-463.

- Blaug, M. (1976). The empirical status of human capital theory: A slightly jaundiced survey. *Journal of economic literature*, 14(3), 827-855.
- Chude, Nkiru Patricia and Chude, Daniel Izuchukwu (2013), the effects of public expenditure in education on economic growth in Nigeria over a period from 1977 to 2012. International Journal of Business and Management Review Vol.1, No.4, pp.64-71, December 2013
- Etuk, G. R., Ering, S. O., & Ajake, U. E. (2012) Nigeria's Universal Basic Education (UBE) policy: A sociological analysis. *American International Journal of Contemporary Research*, 2(7), 179-183.
- Eze, I. M. (2017) Achieving Effective Human Capital Development in a Global Economy: A Case Study of Enugu State: (2007-2014) (Doctoral dissertation).
- Fix, B. (2018) The trouble with human capital theory (No. 2018/07). Working Papers on Capital as Power
- Gaudet, C. H., Brown, H. Q., & Lunsford, D. L. (2017). HRD curriculum meets global human capital challenge. Advances in Developing Human Resources, 19(2), 124-137
- Gershberg, A., Rai, S., Ezegwu, C., Nnodu, I., Anthony, O., Panguru, K, Z., Olumayowa, A., Nugroho, D., Hearle, C., Elacqua, G., and Alves, F. (2015) Comparative Review of Basic Education Reforms: Part 2 Country Case Studies. Education Data, Research and Evaluation in Nigeria (EDOREN) and Universal Basic Education Board (UBEC). Revised Report.
- llegbinosa, I. A. (2013). Human capital investment as an effective tool for economic development in Nigeria. *International Journal of Management and Business Studies*, 3(1),7-13.
- Innocent, M. N. J. (2017) Government Expenditure and Human Capital Development in Nigeria: an Auto-Regressive Distributed Lagged Model Approach (ARDL). *International Journal*, 5(1)
- Jones, N. D., & Brownell, M. T. (2014) Examining the use of classroom observations in the evaluation of special education teachers. Assessment for Effective Intervention, 39(2), 112-124.
- Kaduna State Ministry of Education Annual Performance Reports (2015) Annual Performance Report.
- Kaduna State Ministry of Education Annual Performance Reports (2019) Annual Performance Report.

- Kuye, L. O., Adebisi, A. S., Ishola, S. A., & Thomas, G. (2021). The Nigeria National Policy on Gender In Basic Education (2006-2015): A Policy Review Of Milestones Achievement. International Journal of Information, Business and Management, 13(2), 122-145.
- Michael, O. B. A., & Wumi, O. (2017) Education Funding and Human Capital Development in Nigeria Journal of World Economic Research, 6(1), 5-16.
- Michael, O. B. A., & Wumi, O. (2017). Education funding and human capital development in Nigeria. *Journal of World Economic Research*, 6(1), 5-16.
- Ministry of Budget and Planning, Kaduna State (2012) Approved 2012-2014 Multi Year Budget, State Secretariat Complex, Independence Way Kaduna Nigeria.
- Ministry of Budget and Planning, Kaduna State (2013) Approved 2013-2015 Multi Year Budget, State Secretariat Complex, Independence Way Kaduna Nigeria.
- Ministry of Budget and Planning, Kaduna State (2015) Approved 2015-2017 Multi Year Budget, State Secretariat Complex, Independence Way Kaduna Nigeria.
- Ministry of Budget and Planning, Kaduna State (2017) Approved 2017-2019 Multi Year Budget, State Secretariat Complex, Independence Way Kaduna Nigeria.
- Ministry of Budget and Planning, Kaduna State (2020) Approved 2019-2020 Multi Year Budget, State Secretariat Complex, Independence Way Kaduna Nigeria.
- Ministry of Budget and Planning, Kaduna State (2021) Approved 2020-2021 Multi Year Budget, State Secretariat Complex, Independence Way Kaduna Nigeria.
- Ministry of Education, Science and Technology (2019) Kaduna State Government Policy on Education
- Njoku, J. U., & Onyegbula, J. C. (2017) Human Capital development as a strategy for sustainable development in the Nigerian education system *African Research Review*, 11(2), 178-189.
- Ojewale, K. A., & Olayiwola, O. A. (2020) Impact of social studies education on students' restiveness in junior secondary schools in Oyo town, Oyo state, Nigeria. Capital Journal of Educational Studies (CAJES), 6(1), 157-168.

of Banking and Finance Research, 3(2), 1-14.

- Okafor, C. N., Ogbonna, K. S., & Okeke, C. I. (2017) Effect of government expenditure on human capital development in Nigeria. *International Journal*
- Olaniyan, D. A., & Okemakinde, T. (2008) Human capital theory: Implications for educational development. *European journal of scientific research*, 24(2), 157-162
- Omankhanlen, A. E., Ogaga-Oghene, J., Obarisiagbon, E. I., & Okorie, U. E. (2014) The Nigerian government expenditure on human capital development: An efficiency analysis. *European Journal of Business and Social Sciences*, 3(7), 01-132.
- Psacharopoulos, G., & Patrinos, H. A. (2018) Returns to investment in education: a decennial review of the global literature. *Education Economics*, 26(5), 445-458.
- Rabapane, M. V., & Wadesango, N. (2020) The Effectiveness of Community Education Services in Influencing Socio-Economic Issues in the Gravelotte Community. Journal of Educational and Social Research, 10(6), 302-302
- Usiobaifo, H. (2019) An Analysis of the Components of Environment and Sustainable Development in Nigeria in 2008-2009 to 2018 Year. JOJ Wildlife & Biodiversity, 1(2), 35-46.
- Woodhall, M. (1987). Human capital concepts. In *Economics of education* (pp. 21-24). Pergamon.

ISSN: 2616-1346 (Print) \ISSN: 2756-5246 (Online)

# **Appendixes** Appendix1

Table 1: Showing the funding of UBE in Kaduna State Budget 2011-2021

S/N	Year	Recurrent Expenditure (in millions)	Capital expenditure (in millions)	Total (in millions)
1	2011	395,099,441	5,564,027,165	5,959,126,606
2	2012	290,500,000	3,728,881,235	4,019,381,235
3	2013	247,239,784	4,563,394,555	4,810,634,339
4	2014	393,289,477	8,665,921,615	9,059,211,092
5	2015	752,190,882	4,325,083,785	5,077,274,667
6	2016	-	3,098,999,835.92	3,098,999,835.92
7	2017	252, 050,805	1,725,853,231.74	1,977,904,036.74
8	2018	184,529,880.96	6,753,219,067.17	6,937,748,948.13
9	2019	189,631,245.17	5,917,339,963.39	6,106,971,208.56
10	2020	223,176,833.18	1,949,999,884.00	2,173,176,717.18
11	2021	200,203,882.57		20,341,458,315.89
			20,141,254,433.32	

Source: KDPBC (2021)

# Appendix II

Table 2: Primary school enrolment by gender and LGA in the year 2013/2014 in KD

	Total			Aged 6-11			
LGA	Pupils	Girls	% girls	Pupils	Girls	% girls	
BIRNIN GWARI	54,691	22,212	41	49,583	20,314	41	
CHIKUN	74,672	36,934	49	62,459	30,996	50	
GIWA	58,326	24,468	42	52,058	21,716	42	
IGABI	96,638	41,599	43	84,250	36,367	43	
IKARA	49,524	21,351	43	45,317	19,613	43	
JABA	43,179	21,284	49	38,899	19,183	49	
JEMA'A	36,644	18,021	49	31,023	15,293	49	
KACHIA	71,127	34,353	48	65,187	31,485	48	
KADUNA NORTH	52,517	25,846	49	44,777	22,182	50	
KADUNA SOUTH	60,926	30,686	50	51,143	25,720	50	
KAGARKO	42,472	20,500	48	36,700	17,876	49	
KAJURU	31,231	15,636	50	43,823	21,990	50	
KAURA	48,777	24,492	50	46,832	21,577	46	
KAURU	52,236	24,036	46	26,840	13,454	50	
KUBAU	62,900	28,907	46	54,872	25,040	46	
KUDAN	41,859	16,399	39	37,256	14,437	39	
LERE	77,539	36,820	47	69,191	32,738	47	
MAKARFI	40,389	17,459	43	33,855	14,741	44	
SABON GARI	57,433	27,837	48	50,947	24,705	48	
SANGA	44,470	21,524	48	37,384	18,114	48	
SOBA	56,202	23,219	41	49,439	20,078	41	
ZANGON KATAF	62,424	31,113	50	56,358	28,098	50	
ZARIA	101,632	48,520	48	91,549	43,652	48	
TOTAL	1,317,808	613,216	47	1,159,742	539,369	47	

Source: KD School Census Report 2013/2014 (2021)

# Appendix III

Table 3: Primary school enrolment by aender and LGA 2018/2019 in KD

	Total			Aged 6-11			
LGA	Pupils	Girls	% girls	Pupils	Girls	% girls	
BIRNIN GWARI	101,561	44,410	44%	90,731	39,601	44%	
CHIKUN	99,239	50,569	51%	87,066	44,162	51%	
GIWA	116,271	54,517	47%	102,026	47,774	47%	
IGABI	237,438	112,592	47%	204,592	96,833	47%	
IKARA	94,362	45,715	48%	80,285	38,858	48%	
JABA	25,829	13,229	51%	22,377	11,447	51%	
JEMA'A	42,449	21,310	50%	35,980	18,066	50%	
KACHIA	88,791	43,563	49%	77,644	38,032	49%	
KADUNA NORTH	76,605	37,583	49%	63,368	31,415	50%	
KADUNA SOUTH	57,837	29,120	50%	50,674	25,490	50%	
KAGARKO	46,945	23,395	50%	39,654	19,760	50%	
KAJURU	32,918	16,887	51%	28,938	14,883	51%	
KAURA	32,630	16,522	51%	28,925	14,640	51%	
KAURU	98,965	47,636	48%	83,977	40,378	48%	
KUBAU	119,669	57,657	48%	107,856	51,896	48%	
KUDAN	65,140	30,016	46%	55,761	25,682	46%	
LERE	120,488	59,769	50%	105,007	52,082	50%	
MAKARFI	70,988	34,034	48%	60,515	29,110	48%	
SABON GARI	72,397	36,112	50%	63,824	31,829	50%	
SANGA	36,570	18,230	50%	29,771	14,792	50%	
SOBA	89,818	41,646	46%	78,141	36,006	46%	
ZANGON KATAF	68,086	34,525	51%	59,896	30,366	51%	
ZARIA	137,842	67,324	49%	121,202	59,151	49%	
TOTAL	1,932,838	936,361	48%	1,678,210	812,253	48%	

Source: KD School Census Report 2018/2019 (2021)

		Total		Aged 12-14			
LGA	Pupils	Girls	% Girls	Pupils	Girls	% Girls	
BIRNIN GWARI	4,501	1,488	33	3,218	1,134	35	
CHIKUN	19,501	9,686	50	13,889	6,871	49	
AWIE	5,896	1,837	31	4,735	1,555	33	
GABI	13,049	5,179	40	9,587	3,816	40	
KARA	4,045	1,350	33	2,802	895	32	
ABA	3,709	2,029	55	3,039	1,768	58	
EMA'A	5,832	2,560	44	4,169	1,923	46	
CACHIA	7,787	3,544	46	5,351	2,468	46	
CADUNA NORTH	17,741	9,853	56	12,353	6,597	53	
CADUNA SOUTH	23,734	12,702	54	17,324	9,265	53	
CAGARKO	8,601	3,788	44	6,116	2,660	43	
CAJURU	5,006	2,324	46	3,954	1,630	41	
CAURA	6,142	2,529	41	4,247	1,719	40	
CAURU	5,997	2,616	44	4,395	1,908	43	
CUBAU	5,515	2,124	39	3,841	1,540	40	
CUDAN	2,459	747	30	1,631	547	34	
ERE	12,584	5,320	42	9,626	4,194	44	
//AKARFI	3,601	1,133	31	2,826	855	30	
SABON GARI	13,782	7,375	54	9,903	5,283	53	
SANGA	5,875	2,579	44	4,756	2,002	42	
SOBA	3,145	787	25	2,713	871	32	
ANGON KATAF	8,044	4,023	50	6,205	2,926	47	
ARIA	23,670	10,901	46	16,639	7,312	44	
OTAL	210,216	96,474	46	153,319	69,739	45	

Source: KD School Census Report 2013/2014 (2021)

# Appendix V

Table 5: Junior secondary school enrolment by gender and LGA 2018/2019 in KD

		Total		Aged 12-14			
LGA	Pupils	Girls	% girls	Pupils	Girls	% girls	
BIRNIN GWARI	8,626	3,129	36%	5,806	2,377	41%	
CHIKUN	28,924	14,799	51%	19,958	10,261	51%	
GIWA	13,891	5,102	37%	10,151	3,872	38%	
IGABI	29,709	12,617	42%	21,304	9,030	42%	
IKARA	10,547	3,820	36%	7,919	3,021	38%	
JABA	4,337	2,176	50%	3,168	1,581	50%	
JEMA'A	12,147	6,006	49%	8,463	4,260	50%	
KACHIA	12,800	6,142	48%	9,017	4,361	48%	
KADUNA NORTH	26,822	15,454	58%	17,532	10,051	57%	
KADUNA SOUTH	24,664	17,250	70%	18,782	13,173	70%	
KAGARKO	10,047	4,869	48%	7,250	3,639	50%	
KAJURU	6,008	2,712	45%	4,360	1,986	46%	
KAURA	6,872	3,347	49%	4,974	2,396	48%	
KAURU	8,335	3,576	43%	6,128	2,647	43%	
KUBAU	12,032	5,514	46%	9,733	4,347	45%	
KUDAN	6,364	2,446	38%	4,836	1,905	39%	
LERE	20,886	9,006	43%	13,900	6,067	44%	
MAKARFI	9,416	3,763	40%	6,453	2,539	39%	
SABON GARI	25,300	12,965	51%	18,318	8,808	48%	
SANGA	5,638	2,679	48%	4,214	2,036	48%	
SOBA	7,740	2,147	28%	5,509	1,657	30%	
ZANGON KATAF	12,366	5,960	48%	8,392	4,056	48%	
ZARIA	38,812	18,711	48%	28,370	13,824	49% t	
TOTAL	342,283	164,190	48%	244,537	117,894	48%	

Source: KD School Census Report 2018/2019 (2021)