Cash Flow Management, Human Capital Investment and Capital Gain of Quoted Commercial Banks in Nigeria

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Abstract
This study examined how cash flow management and human capital investment affect capital gain of commercial banks in Nigeria. Cross sectional data were sourced from the financial statement of the commercial banks from 2009 to 2018.   Capital gain was used as dependent variables while investment on employee training, investment on employee education, investment on employee health, differed employee payment, operating cash flow, cash flow from financing activities, cash flow from investing activities and net cash flow were used as independent variables. Ordinary least square method of panel co-integration, unit root, granger causality test was used. The study found among other things that operating cash flow, cash flow financing activities and cash flow from investing activities showed negative relationship with capital gain while net operating cash flow showed positive relationship with capital gain. Investment on employee training and health has positive relationship with capital gain while differed payment and education has negative relationship with capital gain. From the findings, the study concludes that cash flow management and human capital investments have significant effect capital gain of commercial banks in Nigeria. We that management of commercial banks should investment more on employee education as this can make the employees acquire dynamic knowledge in bank management such as credit appraisal that reduces the incidence of nonperforming loans and increase profitability. Furthermore, employees differed payment procedures should be well planned and seamlessly integrated into management broad policies of investment and financing decisions.

Keywords: Cash Flow Analysis, Human Capital Investment, Capital Gain, Net Operating Cash Flow, Cash Flow from Investing Activities.

1. Introduction

Capital gain is the profit that results from selling a capital asset, such as a stock, for more than was paid to acquire it. It reflects the sum of gains and losses from all the sales of individual securities and other investments, and other gain and loss recognition occurrences (McKenzie and Aileen, 1995). Capital gain is determined by internal and external factors. Internal factors that determine capital gain of commercial banks include investment policy, management quality, financing policy and cash flow management. Effective cash flow analysis and human capital plays important role in the strategic planning on how to create competitive advantages and maximize capital gain.

To accomplish this, commercial banks must invest on human capital to ensure that employees have the knowledge, skills and competencies required to work effectively in a rapidly changing and complex environment (Marimuthu, Arokiasamy, and Ismail, 2009). Commercial banks must optimize their workforce and enhance profitability through effective cash flow management and comprehensive human capital investment strategies which affect long term survival and sustainability of banking system. This implies that cash flow management and human capital investment must be given a critical attention if commercial bank intends to increase capital gain.

Inadequate cash flow planning can negative impact on the financial performance by reducing cash inflow and increasing cash outflow. Effective cash management increase chances of survival of businesses, it attract investors who can fund its expansion. Effective cash management increases the flexibility and competitive advantage of businesses in dealing with emergency situations or taking advantage of opportunities as they arise (Gyebi & Quain, 2013). It enables business to take advantage of cash discounts and avoid costly sources of finance when raising funds (Uwonda, Okello & Okello, 2013).Cash flow management is an internal factor that determines capital gain. Cash flow of commercial banks is crucial factors that enhances its commercial banks operational efficiency and affect capital gains. For the cash flows to be well structured and effectively utilized, the finance manger must devise various ways for selecting best components of its cash flows which can be used in commercial banks operation to raise profitability or achieve performance.

Human capital investment is any activity which improves the quality of the worker such as training, education and health. Human capital investments involve an initial cost which commercial bank expects to gain a return on in the future ((Bapna, 2013). Human capital investment is only undertaken by the wealth maximizing firm if the expected return from the investment or net internal rate of return is greater than the market rate of interest (Bapna, 2013).The theory of human capital investment explained corporate human capital investment such as education, training and development that affect corporate short and long term performance.

The continued ill performance and crisis of the banking sector in Nigeria has over the years attracted the attention of industry watchers, policy makers, the academia and the general public. Traditionally, the regulatory authorities believed that the problem of the banking sector in Nigeria was due to the poor capitalization, it is a known now that this was not the only problem responsible for the poor performance mentioned above because in less than five years after the 1150% increase in bank capital from 2 billion to 25 billion naira some of these banks were found to be having problems. Past experience also proved that there are more banks that collapsed in the regulated banking era than the free banking era (Toby, 2008). The above implies that human factors such as lack of required bank management knowledge and poor corporate governance to great extent affect bank performance.

There are many studies on the effect of cash flow management and human capital investment on corporate performance such as Akindehinde, Enyi and Olutokunbo (2015); Davies (2018); Edom, Inah, and Adanma (2015); Ifurueze, Odesaand Ifurueze (2014); Ikpefan, Kazeemand Taiwo, 2015). These studies focused on human resources accounting and corporate performance. This study examined the effect of, cash flow management, human capital investment and capital gain of commercial banks in Nigeria.

2. Literature Review
Cash Flow Analysis
Cash flow analysis is the process of tracking how much money is coming into and going out of your business. This helps you predict how much money will be available to your business in the future. It also helps you identify how much money your business needs to cover debts, like paying staff and suppliers. Cash flow is the term used to describe changes in how much money your business has from one point to another (Adelegan, 2017). Cash flow analysis is keeping track of this flow and analyzing any changes to it. This helps you spot trends, prepare for the future, and tackle any problems with your cash flow. It pays to practice cash flow analysis often to make sure your business has enough money to keep running.

   A positive cash flow occurs when a business receives more money than it is spending. This enables it to pay its bills on time. A negative cash flow means the business is receiving less cash than it is spending. It may struggle to pay immediate bills and need to borrow money to cover the shortfall. Firms' ability to generate cash flows is an important component in any investment decision. Future cash flows directly affect the value of securities, because they constitute the ultimate payoff expected from the investment and hence, they are a crucial input for financial valuation models (Gilchrist & Himmelberg, 1995).

Cash Flow from Operating Activities
Cash flow from operations is the section of a company's cash flow statement that represents the amount of cash a company generates (or consumes) from carrying out its operating activities over a period of time. Operating activities include generating revenue paying expenses, and funding working capital. It is calculated by taking a company's (1) net income, (2) adjusting for non-cash items, and (3) accounting for changes in working capital.

Operating cash flow is calculated by starting with net income, which comes from the bottom of the income statement. Since the income statement uses accrual based accounting, it includes expenses that may not have actually been paid for yet (Enow, 2015). Thus, net income has to be adjusted by adding back all non-cash expense like depreciation, stock-based compensation, and others.

Net Cash Flow
Net cash flow refers to the difference between a company's cash inflows and outflows in a given period. In the strictest sense, net cash flow refers to the change in a company's cash balance as detailed on its cash flow statement.Net cash flow is the fuel that helps companies expand, develop new products, buy back stock, pay dividends, or reduce debt. It is what allows companies to conduct their day-to-day business. This is why some people value net cash flow more than just about any other financial measure, including earnings per share. Revenues and expenses are big drivers of net cash flow (Gyebi and Quain, 2013).

It is important to note that short-term negative net cash flow is not always a bad thing. For example, if a company needs to spend cash to build a second manufacturing plant, the investment will pay off in the end as long as the plant eventually generates more cash than it cost to build. Investors often hunt for companies that have high or improving net cash flow but low share prices. The disparity often means the share prices will soon increase.Net cash flow from investment is made up of a number of components, some positive and some negative. For example capital expenditure along with operational expenditure must be counted against profits.

Cash Flow from Investing Activities
Cash flow from investing activities is an item on the cash flow statement that reports the aggregate change in a company's cash position resulting from investment gains or losses and changes resulting from amounts spent on investments in capital assets, such as plant and equipment. When analyzing a company's cash flow statement, it is important to consider each of the various sections that contribute to the overall change in its cash position. Negative cash flows are not always indicative of poor performance. Often, firms have negative overall cash flows for a period because of heavy investment expenditures (Kroes and Manikas, 2014). There are three main financial statements: the balance sheet, income statement, and cash flow statement. The balance sheet provides an overview of a company's assets, liabilities, and owner's equity as of a specific date. The income statement provides an overview of company revenues and expenses during a period. The cash flow statement bridges the gap between these two statements by showing analysts how much cash is generated or spent on operating, investing, and financing activities for a specific period.

Cash Flow from Financing Activities
Cash flow from financing activities is a section of a company's cash flow statement, which shows the net flows of cash that are used to fund the company. Financing activities include transactions involving debt, equity, and dividends. Cash flow from financing activities provides investors with insight into a company's financial strength and how well a company's capital structure is managed. The cash flow statement is one of the three main financial statements that show the state of a company's financial health, the other two being the balance sheet and income statement. The cash flow statement measures the cash generated or used by a company during a given period (Nwanyanwu, 2015).

Human Capital Investment
Human capital investment is any activity which improves the quality of the worker. Therefore, training is an important component of human capital investment. This refers to the knowledge and training required and undergone by a person that increases his or her capabilities in performing activities of economic values (Zehri,

Abdelbaki & Bouabdellah, 2012). Human capital investments involve an initial cost such as tuition and training course fees, forgone earnings while at school and reduced wages and productivity during the training period through which the individual or firm hopes to gain a return in future such as increased earnings or higher firm productivity. As with investments in physical capital, this human capital investment will only be undertaken by the wealth maximizing individual or firm if the expected return from the investment or net internal rate of return is greater than the market rate of interest

Investment on Employee Training

Many workers increase their productivity by learning new skills and perfecting old ones while on the job. On-the-job training therefore is a process that raises the future productivity and differs from school training in that an investment is made on the job rather than in an institution that specializes in teaching. The cost of such investment will be value placed on the time and effort of the trainee, the teaching provided by others, and the equipment and materials used. These are believed to be costs in the sense that they could have been used in producing current output if they were not used in raising future output. There are basically two types of on the job training; it could either by general or specific on the job training (Yusulf, 2011).

Investment on Employee Education

Schools and firms are often substitute sources of particular skills. The shift that has occurred over time in both law and engineering is a measure of this substitution. In acquiring legal skills for instance there is attachment to a law firms and studying in the law school. Some types of knowledge can be mastered better if simultaneously related to a practical problem; others require prolonged specialization. That is, there are complementarily between learning and work and between learning and time. The development of certain skills requires both specialization and experience and can be had partly from the firms and partly from schools. It 30 worthy of note that training in a new industrial skill is usually first given on the job, since firms tend to be the first to be aware of its value, but as demand develops, some of the training shifts to schools (Yusulf, 2011).

Investment on Employee Health

One way to invest in human capital is to improve emotional and physical health. Earnings are much more closely geared to knowledge than strength, but in the earlier days and in some countries still developing, strength had a significant influence on earnings. Moreover, emotional health increasingly is considered an important determinant of earnings in all parts of the world. Firms can invest in the health of employees through medical examination, luncheons, or steering them away from activities with high accident and death rates (Yusulf, 2011). It is important to note that the productivity of employees depends not only on their ability and the amount invested in them, both on and off the job but also on their motivation, or the intensity of their work. Economists have long recognized that motivation in turn partly depends on earnings because of the effect of an increase in earnings on morale and aspirations.

Human Capital Compensation

Besides characteristics of human resources in terms of diversity, experience and tenure, the level and structure of compensation is relevant to explaining productivity and firm performance among service firms. Firm performance to a very large extent has impacted on the compensation pattern and structure of financial services related firms like banks. This is evident in the continual pay rise in the financial service industry like bank, without any adverse effect on the banks' performances.

Two interrelated theories are central to explaining pay profiles and show why firms use pay dispersion across experience and tenure, i.e. utilizing rewards for experience gained in the labor market and for tenure within the firm.

Deferred Payment

The second theory addresses the pay profile across tenure. The theory of deferred payment states that a steep pay profile motivates and retains employees Salop & Salop, (1976); Lazear, (1991) believed that starting pay is lower, but employees can expect higher pay in the future, provided they stay within the firm. In addition, shirking will be more expensive in view of higher foregone future earnings. Accordingly, higher individual productivity and lower turnover costs will increase average employee productivity in terms of value added per employee. Leonard, Mulkay, & Van Audenrode (1999) believes that as long as average productivity increases more than average pay there will be a net gain from deferred payment.

Consequently, lifetime earnings for employees as well as profits increase, provided that the gain is shared between employer and employees. Deferred payments when looked at from the Nigerian point of view, the old generation banks have used it efficiently and have made success in that. This is because the old generation banks believe in deferred payment through it pension scheme and where able to retain their staff that are looking forward to that payment. This is in contrast with what is obtainable today in the banking industry especially the new generation banks where bank officials move from one bank to another since they do not have to wait for any deferred payment. Pay dispersion.

Capital Gain

Capital gains or losses arise from the sale of capital assets. Capital gain is the increase in the value of a capital asset realized over its cost basis. For example, an asset purchased for 1,000 naira and sold for 1,500 naira generates a capital gain of 500 naira. Capital gain is the profit that results from selling a capital asset, such as a stock, for more than was paid to acquire it. It reflects the sum of gains and losses from all the sales of individual securities and other investments, and other gain and loss recognition occurrences(McKenzie and Aileen, 1995).

Free Cash flow Theory

Jensen (1986) posited that firms generating cash in excess of that required to fund positive Net Present Value (NPV) projects face greater agency problems as the free cash flow exacerbates the conflict of interest between shareholders and managers. One implication from Jensen's free cash flow theory is that firms with high levels of free cash flow are more likely to initiate takeovers that are value-decreasing. Free cash flow is cash flow in excess of that required to fund all of a firm's projects that have positive net present values when discounted at the relevant cost of capital. Such free cash flow must be paid out to shareholders if the firm is to be efficient and to maximize value for shareholders. Payment of cash to shareholders reduces the resources under managers' control, thereby reducing managers' power and potentially subjecting them to the monitoring by the capital markets, that occurs when a firm must obtain new capital.

Positive free cash flow can be interpreted as the amount of cash a company can pay out whether in terms of cash dividends or stock repurchase. Negative amount of free cash flow means the company has a deficit, and it cannot afford any payment to shareholders (Chikashi, 2015). It is not unusual for a firm with negative free cash flow to pay cash dividends or even buy back their own stocks by using its cash and/or retained earnings since these two are not included in free cash flow. There is also a simplified formula for those companies with a stable debt to capital ratio.

Human Capital Theory

According to Becker (1964) under the human capital theory, people constitute the organization's human capital. Human capital just like every other asset owned by a firm has value in the market place given conditions of stable employment. However, unlike other assets, the potential value of human capital can only be fully realized with the co-operation of the person. Extending the argument, Becker (1964) posited that human capital in management literature refers to the productive capabilities of people. Skills, experience, and knowledge have economic value to organization because they enable it to be productive and adaptable (Becker, 1964).

Mathis and Jackson (2006) agreed with this view when they defined human capital as the collective value of the capabilities, knowledge, skills, life experiences, and motivation of the workforce in an organization. Flamhotz and Lacey (1981) argued that all costs related to eliciting productive behavior from employees in the form of incentives related to motivating, monitoring and retaining them constitute human capital investments made in anticipation of future output.

Empirical Review

Mehtari (2016) explored the relationship between operating cash flow and profitability of firm in TSE. Objectives were to identify the effect of dividend policy on profitability of firm, effect of liability on profitability of firm and establish the effect of retained earnings on profitability. The study used correlations analysis to analyze the relation between these two variables. The study investigated 19 quoted companies in USA and financial indicators and three variables to measure firm's performance, namely profitability (return on investment) market performance (measured by changes in stock market value) and cash flow performance (dividend per share). The study concluded that firms with low total assets, more liabilities, less equity, an unqualified opinion of an auditor and low retained earnings

have better cash flow performance (measured by cash dividend). Recommended that, firms to have efficient operating cash flow management, thus, this study used regression analysis.

Rehaman (2017) analyzed cash flow from investment activities on profitability in Pakistan firm. The study aims to examine the differences between net cash flows from operating and 21 profitability in Pakistan firm. Objectives were to establish effect of cash flow from investing on profitability, effect of current assets on profitability and to assess the effect of current liabilities on profitability the firm. The sample size was 23 firms. The study used descriptive statistics. The findings show a great significance to a firm, because it directly influences both liquidity and profitability. Cash flow from investing comprises of both current assets and current liabilities of the firm. The study concluded that net investing cash flows affect profitability. The study recommended should be net investing should be used to determine the amounts of Interest received Purchases of PPE, and Disposals of PPE and its effects on profitability.

Parsian (2013) carried a study on the effect of operating cash flow on profitability in Tehran stock exchange. The study was conducted to relate the influence of different component of cash flows on profitability growth. The study was based on the following objectives which were; to investigate how depreciation expense affect profitability, to assess how increase in current liabilities affect profitability, and establish the effect of the decrease in current assets on profitability. The study used 42 firms sampled from Tehran stock exchange. The study adopted multiple regression models. The study found that different operating cash flow components affect profitability. The study failed to include correlation analysis to which was essential for determining the relationship between operating cash flows from Cash generated from operation and profits from operations on financial performance.

Ali (2013) investigated the relationship between various earnings and cash flow operations of firm performance and stock returns in Iran. The objectives used were to assess the effect of earning, stock returns and cost of operation on firm performance. Simple and multiple regression analysis were used to analyze the data for the period from 2003 to 2011. The study concluded that the cost of operations to losses predicts financial performance. The study recommended that many firms to be concerned about their ability to performance. The study failed to analyze evaluate the effect of operating cash flows on financial performance using correlation analysis to establish the relationships.

Thanh and Nguyen (2013) did a study on the effect of operating cash flows on bank performance in Vietnam. The objectives were; to investigate the impact of operating cash flows on bank performance, cash flow statement on bank performance and to evaluate the need for generating cash on bank performance. Multiple regression analysis was used to analyze data of 465 companies listed. The study finding indicated that bank performance decreases as the number of operating cash flows increases. Thus, recommended that summary of how much cash should be available for operations of cash flow. The study analyzed operating cash flows using financial performance.

Adelegan (2013) carried out an empirical analysis of the relationship between operating cash flows and dividend changes in Nigeria. The objectives of the were; to explore the relationship between operating cash flows and dividend changes, to identify the effect of capital structure choice, and size of each firm and economic policy changes on dividend changes. The researcher used the ordinary least squares (OLS) method to analyze the data on a sample of 63 quoted firms in Nigeria over a wider testing period from 1984 to 1997. The results revealed that the relationship between operating cash flow and firm performance is positively significant. The study concluded that there exist a relationship between operating cash flows and dividend changes. The study recommended that capital structure choice, and size of each firm and economic policy change should be used to analyze financial performance. This study clarified 19 the relationship between cash flow and financial performance regression analysis and correlations.

Frank and James (2014) studied a study on the relationship between operating cash flow activities and corporate performance in the Food and Beverages sector in Nigeria. The main objective was to establish the effect of financial information on corporate performance. The data collected was derived from the financial statement of the companies under study. The study sampled 5 Food and Beverage companies listed in the Nigerian Stock Exchange. Multiple regression analysis technique was used to analyze data. The study indicated that the there exists a significant positive relationship between operating cash flows and corporate performance in the Food and Beverage Sector of Nigeria. The study concluded that operating cash flows affect corporate performance in the Food and Beverage

Sector of Nigeria. Thus, the study examined the effect of operating cash flow on financial performance using descriptive statistics.

Muchiri (2014) examined how operating cash flow influencing performance in the NSE. The study aims to investigate how operating cash flow influence performance of firms. The study objectives were to establish effect of company size on performance of firms, to investigate how sales growth affects performance of firms, and to establish the effect of the dividend payout ratio Tobin's Q on performance of firms. The study used multiple regressions to analyze data: cash flows, sales growth and Tobin's Q. The sample of 12 listed firms' forms the source of data used in the study was from published financial statements by the NSE between the years 2003 and 2012. The study concluded that operating cash from current asset, current liability has always been an important measure of firm company size and sales growth affect performance of firms. This study analyzed operating cash flow with inferential statistics using correlations which was not rooted in cash flow operation approach to streamline financial performance.

Nwanyanwu (2015) examined the relationship between operating cash flow activities and organization performance in the hospitality in Nigeria. The objective were; to examined the relationship between cash flows from operating activities on organization performance, to determine the impact of loans processing on organization performance and to establish the effect of equity investment on organization performance. The sample size was 45 hospitality and print media firms. The study used inferential statistics using correlations analysis. The study concluded that payment of cash to suppliers and taxes affected performance in cash flow statement. Thus, this study used manufacturing firms to analyze operating cash flow activities.

3. Methodology

Ex-post facto research design was employed to examine the relationship between cash flow management, human capital investment and capital gain of quoted commercial banks in Nigeria. The study used secondary data that was extracted from the Annual Reports and Statements of Accounts of the quoted commercial banks. The target population includes all 23commercial banks in Nigeria. However, the sample size will be limited to the 14 quoted commercial banks.

Data Analysis Method

The method of data analysis to be used in this study was the panel data multiple linear regressions using Ordinary Least Square (OLS) method. This approach, which is a quantitative technique, includes tables and the test of the hypotheses formulated by using ordinary least square regression analysis at 5% level of significance. To arrive at a result that was not lead to spurious regressions, the study tested for stationary at different levels in the variables making up the model. Other tests that were carried out on the model include test of Durbin Watson Test and test of model specification so as to achieve the objectives of our study as well as answer the research question and hypotheses. Moreover, in order to undertake a statistical evaluation of our analytical model, so as to determine the reliability of the results obtained the coefficient of correlation (r) of the regression, the coefficient of determination (r^2), the student T-test and F-test was employed.

- **Coefficient of Determination (r^2) Test** –This measures the explanatory power of the independent variables on the dependent variables. For example, to determine the proportion of economic growth in our model, we used the coefficient of determination. The coefficient of determination varies between 0.0 and 1.0. A coefficient of determination says 0.20 means that 20% of changes in the dependent variable were explained by the independent variable(s).

- **F-Test:** This measures the overall significance. The extent to which the statistic of the coefficient of determination is significant is measured by the F-test. The F-test can be done using the F-statistic or by the probability estimate. We used the F-statistic estimate for this analysis.

- **Student T-test:** measures the individual significance of the estimated independent variables at 5% level of significance.

- **Durbin Watson Statistics**: This measures the collinearity and autocorrelation between the variables in the time series. It is expected that a ratio close to 2.00 is not auto correlated while ratio above 2.00 assumed the presence

of autocorrelation. The Durbin-Watson statistic is a test for first-order serial correlation. More formally, the DW statistic measures the linear association between adjacent residuals from a regression model. If there is no serial correlation, the DW statistic was around. The DW statistic fall below if there is positive serial correlation in the worst case, it was near zero. If there is negative correlation, the statistic will lie somewhere between 2 and 4.Positive serial correlation is the most commonly observed form of dependence. As a rule of thumb, with 50 or more observations and only a few independent variables, a DW statistic below about 1.5 is a strong indication of positive first order serial correlation.

- **Regression coefficient:** This measures the extent in which the predictor variables affect the dependent variables in the study.

- **Probability Ratio:** It measures also the extent in which the predictor variables can explain change to the dependent variables given a percentage level of significant.

To obtain the observed values on the expectation of the effect of, cash flow analysis, human capital investment on the profitability of commercial banks, panel data survey over a ten-year period was employed. Panel data structure allows us to take into account the unobservable and constant heterogeneity, that is, the specific features of each quoted firm. The researcher employed pooled Ordinary Least Square (OLS), Fixed Effects and Random Effects regression models to test the various hypotheses. Pooled OLS regression technique is popular in financial studies owing to its ease of application and precision in prediction (Alma, 2011).

Model Specification
From review of literature, commercial bank profitability can be affected by several generic factors. So, it is necessary to investigate the effect, cash flow management, human capital investment on capital gain of commercial banks in Nigeria. Following the hypotheses earlier stated in chapter one, regression models were formulated to capture the effect of, cash flow management, human capital investment on capital gain of commercial banks.

$$Y = \beta_0 + \beta_{1Xit} + \mu \qquad\qquad 1$$

Where Y	=	Dependent Variable
β_{1Xit}	=	Independent variable
β_0	=	Regression Intercept
μ	=	Error Term

Disaggregating Equation 1 to form the multiple regression models, we have

CG   = $t_0 + t_1 OPCF + t_2 CFFA + t_3 CFIA + t_4 NCF + \mu$ 2
CG   = $\alpha_0 + \alpha_1 IET + \alpha_2 IEE + \alpha_3 IET + \alpha_3 DWP + \mu$ 3
Where
CG =   Capital Gain
OPCF   =   Operating Cash flow
CFFA   =   Cash flow from financing activities
CFIA   =   Cash flow from investment activities
NCF   =   Net cash flow
IET   = Investment on employee training proxy by employee training cost to total cost
IEE = Investment on employee education proxy by employee education cost to total cost
IEH = Investment on employee Health proxy by employee health care cost to total cost
DWP   = Deferred wage Payment proxy by employee retirement benefits
μ =   Error Term
$\beta_1 - \beta_4$
β_0 =   Coefficient of Independent Variables to the Dependent Variables

=   Regression Intercept

A-priori Expectation of the Result

The explanatory variables are expected to have positive and direct effects on the dependent variables. That is a unit increase in any of the variables is expected to increase capital gain of commercial banks. This can be express mathematically as $a_1, a_2, a_3, > 0$.

Estimation Techniques

Panel Data Unit Root Tests

To introduce panel data unit root tests, consider the autoregressive model

$$y_{it} = \alpha_i + \gamma_i y_i t - 1 + \varepsilon_{it}$$ 4

Which we can rewrite as

$$\Delta y_{it} = \alpha_i + \pi_i y_i t - 1 + \varepsilon_{it}$$ 5

Where $\pi_i = \gamma_i - 1$, the null hypothesis that all series have a unit root then becomes $H_0 : \pi_i = 0$ for all *i*. a first choice for the alternative hypothesis is that all series are stationary with the same mean-reversion parameter, that is, $H_1 : \pi_i = \pi < 0$ for each country *i*, and is used in the approaches of Levin and Lin (1992)Quah (1994) and Harris and Tzavalis (1999). A more general alternative allows the mean-reversion parameters to be potentially different across countries and states that $H_1 : \pi_i = \pi < 0$ for at least one country *i*. This alternative is used by Maddala and Wu (1999).Choi (2001) im Pesaran and Shin (2003) and others. For all tests, the null hypothesis is that the time series of all individual variables have a unit root. This implies that the null hypothesis can be rejected (in sufficiently large samples) if any one of the *N* coefficients π_i is less than zero. Rejection of the null hypothesis therefore does not indicate that all series are stationary. The combined test statistics is given by:

$$P = -2\sum_{i=1}^{N} \log \ p_i$$ 6

For fixed *N,* this test statistics will have a Chi-squared distribution with 2*N* degrees of freedom as $T \to \infty$, so that large values of P lead us t reject the null hypothesis, while this test (sometimes referred to as the Fisher test) is attractive because it allows the use of different ADF test and different time-series length per unit. A disadvantage is that it requires individual p-value that has to be derived by Monte Carlo simulations.While the latter test may seem attractive and easy to us, a word of caution is appropriate. Before one can apply the individual ADF test underlying the Mandela and Wu (1999) andIm, Pesaran and Shin (2003) approaches, one has to determine the number of lags and determine whether an trend should be included.

Panel Data Co-integration Tests

Several additional issues are of potential importance when testing for co-integration: heterogeneity in the parameter of the co- integrating relationships, heterogeneity in the number of co-integrating relationship across countries and the possibility of co- integration between the series from different alternative estimators are available. With different small and large sample properties (depending upon the type of asymptotic that is chosen).

$$y_{it} = \alpha_i + \beta_i x_{it} + \varepsilon_{it}$$ 7

Where both y_{it} and x_{it} are integrated or order one. Co-integration implies that ε_{it} is stationary for each i. Homogeneous co-integration. In additionRequires that $\beta_I = \beta$If the co-integrating parameter is heterogeneous. And homogeneity is imposed. One estimate

$$y_{it} = \alpha_i + \beta_i x_{it} + \left[(\beta_i - \beta) x_{it} + \varepsilon_{it} \right]$$

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And in general the composite error term is integrated of order one even if ε_{it} is stationary. However, the problem estimator will also average over i, so that the noise in the equation will be attenuated. In many circumstance, when

$$N \rightarrow \infty$$

the fixed effect estimator for β is actually consistent for the long-run average relation parameter,aswell as asymptotically normal, despite the absence of co-integration (Phillips and Moon, 1999).

Granger Causality Test

Thus, Granger causality test helps in adequate specification of model. In Granger causality, test, the null hypothesis is that no causality between two variables. The null hypotheses is rejected if the probability of F* statistics given in the Granger causality result is less than 0.05 (Gujurati, 2003). The pair-wise granger causality test is mathematically expressed as:

$$Y_t \pi_o + \sum_{i=1}^{n} x_1^{y} Y_{t-1} \sum_{i=1}^{n} \pi_1^{x} x_{t-1} + u_1$$

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and

$$x_t dp_o + \sum_{i=1}^{n} dp_1^{y} Yt - 1 \sum_{i=1}^{n} dp1^{X} x_{y-1} + V_1 \quad 10$$

Where x_t and y_t are the variables to be tested white u_t and v_t are the white noise disturbance terms. The null hypothesis $\pi_1^{y} = dp_1^{y} = 0$, for all I's is tested against the alternative hypothesis $\pi_1^{x} \neq 0$ and $dp_1^{y} \neq 0$. if the co-efficient of π_1^{x} are statistically significant but that of $dp1y$ are not, then x causes y. If the reverse is true then y causes x. however, where both co-efficient of π_1^{x} and dp_1^{y} are significant then causality is bi –directional.

The Fixed Effects Model

The fixed effects model is simply a linear regression model in which the intercept terms vary over the individual units' i.e.

$$y_{tt} = \alpha_j + x_{it}^{1} \beta + \varepsilon_{it} \quad \varepsilon_{it} \approx HD\left(0.\sigma^2\right)$$

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Where it is usually assumed that all x_{it} are independent of all ε_{it} . We can write this in the usual regression framework by including a dummy variable for each unit*i* the model. That is

$$y_{tt} = \sum_{j=1}^{N} \alpha_j d_{ij} + x_{ij} \beta + \varepsilon_{it} \quad \varepsilon_{it}$$

12

Where d_{ij} = 1 if *i*= j and 0 elsewhere. We thus have a set of *N*. dummy variables in the model. The parameters $\alpha_I \ldots \ldots \alpha_N$ and β can be estimated by ordinary least squares. The implied estimator for β is referred to as the least squares dummy variable (LSDV) estimator. It may however, be numerically unattractive to have a regression model with so many repressors. Fortunately, one can compute the estimator for β is obtained if the regression is performed in deviations from individual means (Gujurati, 2003). Essentially, this implies that we eliminate the individual effects α_I first by transforming the data.

The Random Effects Model

It is commonly assumed in regression analysis that all factors that affect the dependent variable, but that have not been included as repressors, can be appropriately summarized by a random error term$^{(Gujurati, 2003)}$. In our case, this leads to the assumption that they α_t are random factors, independently and identically distributed over individuals. Thus we write the random effects model as

$$y_{it} = \mu + x_{it}\beta + x_{it}\beta + \alpha_i + \varepsilon_{it}$$

13

Where α_t + ε_{it} is treated as an error term consisting of two components: an individual specific component, which does not vary over time, and a remainder component, which is assumed to be uncorrelated over time. That is, all correlation of the error terms over time is attributed to the individual effects α_{it}.

It is assumed that α_{it} and ε_{it} is mutually independent and independent of x_{js} (for all j and *s)*. This implies that the OLS estimator for $\mu \ and \ \beta$ from (13) is unbiased and consistent.

4. Results and Discussion of Findings

Table 1:   Cash Flow Analysis and Capital Gain of Commercial Banks

Variable	Pooled Effect			Fixed effect			Random effect		
	β coefficient	T. stat	p. value	β coefficient	T. stat	p. value	β coefficient	T. stat	p. value
CFIA	0.195281	1.915528	0.0576	-0.079416	-0.709566	0.4793	-0.005250	-0.054003	0.9570
CFFA	0.022235	0.301881	0.7632	0.024633	0.502091	0.6165	0.034320	0.713868	0.4766
NCF	0.094061	0.848586	0.3976	0.023262	0.312961	0.7548	0.046028	0.637824	0.5247
OPCF	-0.230016	-1.837304	0.0684	0.053490	0.547102	0.5853	0.056412	0.595360	0.5526
C	4.567819	5.366795	0.0000	4.878203	4.267571	0.0000	4.246125	4.096001	0.0001
R-squared	0.141326			0.760817			0.011510		
AdjR^2	0.115694			0.727212			0.017997		
F-statistic	5.513626			22.64048			0.390068		
F- Prob	0.000386			0.000000			0.815466		
D W	0.541755			1.310123			1.204783		

Correlated Random Effects - Hausman Test

Test Summary	Chi-Sq. Statistic	Chi-Sq. d.f.	Prob.
Cross-section random	8.356836	4	0.0009

Source: Extracted by Researcher from E-View 9.0 (2020)

From the table 1 the Hausman test is distributed as chi-square with 4 degree of freedom. From the table capital gain show the probability of the cross section random effects was 0.0009which is less than 0.05 implying that it's appropriate to adopt fixed effects model.

From the results of the fixed effect model, the model is significant at 5% level as the probability value was less than 0.05. The Durbin- Watson value was 1.310123 indicating that there was no autocorrelation problem (Garson, 2012; Alsaeed, 2005). The Durbin-Watson value should be around 2, if the value of Durbin-Watson is above 1 then there

is serial correlation. The value of R-squared was 0.760817 showing that cash flow analysis explains 76 percent variance in capital gain.

The estimated regression coefficient for cash flow from investing activities was -0.079416shows that with influence of other explanatory variables held constant increase in one percent increase on cash flow from investing activities makes capital gain to reduce by 0.07 percent. The estimated regression coefficient for cash flow from financing activities was 0.024633 shows that with influence of other explanatory variables held constant increase in cash flow from financing activities make capital gain to increase by 0.02 percent. Capital gain has coefficients of -0.023262 which imply that increase on the variable will make capital gain to increase by 0.02 percent while operating cash flow has a positive coefficient of 0.053490 which implies that increase on the variable will make capital gain of the commercial banks to increase by 0.05 percent. The analysis above enables us to test for panel unit root in the table below:

Table 2:Panel Unit Root

Variables	ADF - Fisher Chi-square/ PP - Fisher Chi-square	Statistics	Probability	REMARK	DECISION
CG	Levin, Lin & Chu t*	-12.6034	0.0000	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-5.13049	0.0000	Stationary	Reject H0
	ADF - Fisher Chi-square	83.0984	0.0000	Stationary	Reject H0
	PP - Fisher Chi-square	185.355	0.0000	Stationary	Reject H0
NCF	Levin, Lin & Chu t*	-4.58563	0.0000	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-11.4691	0.0016	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-1.36963	0.0854	Stationary	Reject H0
	ADF - Fisher Chi-square	43.8366	0.0288	Stationary	Reject H0
	PP - Fisher Chi-square	93.8585	0.0000	**Stationary**	**Reject H0**
	Levin, Lin & Chu t*	-12.8128	0.0000	Not Stationary	Accept H0
OPCF	Im, Pesaran and Shin W-stat	-4.73428	0.0000	Not Stationary	Accept H0
	ADF - Fisher Chi-square	81.8881	0.0000	Stationary	Reject H0
	PP - Fisher Chi-square	153.473	0.0000	**Stationary**	**Reject H0**
CFIA	Levin, Lin & Chu t*	-8.18164	0.0021	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-3.43322	0.0003	Stationary	Reject H0
	ADF - Fisher Chi-square	64.3099	0.0001	Stationary	Reject H0
	PP - Fisher Chi-square	85.6132	0.0000	Stationary	Reject H0

Source: Extracted by Researcher from E-View 9.0 (2020)

All panel unit root tests have null hypothesis tests of non-stationary human capital investment. It can be seen that the probability of Levin, Lin and Chu statistic for all the variables has a value < 0.05 which is significant at 5 percent level of significance hence using Levin, Lin and Chu test it rejects the null hypothesis of unit root this shows that the variables are stationery and has no unit root. Im, Pesaran and Shin unit root test, Augmented Dickie-Fuller ADF-Fisher Chi-square, Phillips-Perron Fisher Chi square, were also implemented most confirm stationary data hence no unit root except for natural logarithm of investment on employee health where both tests failed to reject natural logarithm investment on employee health at 5 percent level respectively.

Table 3:Pedroni Residual Cointegration Test
Series: CG CFIA CFFA NCF OPCF

	Statistic	Prob.	Weighted Statistic	Prob.
Panel v-Statistic	-6.887649	0.0005	-2.360264	0.0009
Panel rho-Statistic	4.205029	0.0093	3.029252	0.0088
Panel PP-Statistic	-5.285536	0.0493	-4.987778	0.0000
Panel ADF-Statistic	5.394116	0.0084	-6.989311	0.0013

Alternative hypothesis: individual AR coefs. (between-dimension)

	Statistic	Prob.
Group rho-Statistic	4.732836	1.0000
Group PP-Statistic	-7.773035	0.0000
Group ADF-Statistic	-3.746466	0.0077

Source: Extracted by Researcher from E-View 9.0 (2020)

These seven statistics are asymptotically distributed as standard normal and the detailed description of panel co-integration test statistics can be found in Pedroni (1999, 2004). The seven of Pedroni's tests are based on the estimated residuals from the following long run mode. We conclude that there is a panel long-run equilibrium relationship among variables, meaning that human capital investment and commercial banks net interest income move together in the long run.

Table 4: Pairwise Granger Causality Tests

Null Hypothesis:	Obs	F-Statistic	Prob.
CFIA does not Granger Cause CG	112	1.74125	0.1802
CG does not Granger Cause CFIA		0.53804	0.5855
CFFA does not Granger Cause CG	112	1.11159	0.3328
CG does not Granger Cause CFFA		1.20273	0.3044
NCF does not Granger Cause CG	111	0.74777	0.4759
CG does not Granger Cause NCF		0.97930	0.3789
OPCF does not Granger Cause CG	112	4.75509	0.0105
CG does not Granger Cause OPCF		0.06522	0.9369

Source: Extracted by Researcher from E-View 9.0 (2020)

From the table above, there is uni-directional causality between operating cash flow and capital gain of the commercial banks within the periods covered in this study; this means we accept the alternate hypotheses. Other variables have no causal relationship; this implies that we accept the null hypothesis.

Table 5: Human Capital Investment and Capital Gain of Commercial Banks

Variable	Pooled Effect			Fixed effect			Random effect		
	β coefficient	T. stat	p. value	β coefficient	T. stat	p. value	β coefficient	T. stat	p. value
DWR	-0.001483	-0.044686	0.9644	-0.008509	-0.417231	0.6773	-0.008299	-0.409081	0.6831
IEE	-0.019603	-0.411100	0.6817	-0.005238	-0.201231	0.8409	-0.005599	-0.215401	0.8298
IET	-0.006396	-0.253350	0.8004	0.001501	0.104534	0.9169	0.001257	0.087775	0.9302
IEH	0.002386	0.896729	0.3715	0.000896	0.618530	0.5374	0.000938	0.647779	0.5182
C	5.090835	17.16356	0.0000	5.035859	29.73501	0.0000	5.048508	12.16717	0.0000
R-squared	0.009633			0.760842			0.674745		
AdjR^2	0.020152			0.726961			0.425188		
F-statistic	0.323421			22.45643			4.158518		
F- Prob	0.861872			0.000000			0.008830		
D W	0.414221			1.313106			1.205197		
Correlated Random Effects - Hausman Test									
Test Summary			Chi-Sq. Statistic		Chi-Sq. d.f.				Prob.
Cross-section random			0.645105		4				0.9579

Source: Extracted by Researcher from E-View 9.0 (2020)

The Hausman test results in table 5 are distributed as chi-square with 4 degree of freedom. From the table capital gain income show the probability of the cross section random effects was 0.9579 which is greater than 0.05 implying that it's appropriate to adopt random effects model.

From the results of the random effect model, the model is significant at 5% level as the probability value was less than 0.05. The Durbin- Watson value was 1.205197 indicating that there was no autocorrelation problem (Garson, 2012; Alsaeed, 2005). The Durbin-Watson value should be around 2, if the value of Durbin-Watson is above 1 then there is serial correlation. The value of R-squared was 0.674745 showing that human capital investment explains 67.7 percent variance in capital gain of the Nigeria quoted commercial banks within the periods covered in this study.

The partial regression coefficient for differed payment was -0.008299 shows that with influence of other explanatory variables held constant increase in one percent in differed payment makes capital gain of the commercial bank to reduce by 0.08 percent. The partial regression coefficient for employee investment in education was -0.005599 shows that with influence of other explanatory variables held constant increase in employee investment in education make capital gain of the commercial banks to reduce by 0.05 percent. Employee investment in training has coefficients 0.001257 which imply that increase on the variable will capital gain of the commercial banks to increase by 0.01 percent while investment on employee health has a positive coefficient of 0.000938 which implies that increase on differed payment will make capital gain to increase by 0.09 percent. The analysis above enables us to test for panel unit root in the table below:

Table 6: Panel Unit Root

Variables	ADF - Fisher Chi-square/ PP - Fisher Chi-square	Statistics	Probability	Remark	Decision
CG	Levin, Lin & Chu t*	-12.9229	0.0000	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-4.19745	0.0000	Stationary	Reject H0
	ADF - Fisher Chi-square	70.8676	0.0000	Stationary	Reject H0
	PP - Fisher Chi-square	135.363	0.0000	Stationary	Reject H0
IET	Levin, Lin & Chu t*	-5.05909	0.0000	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-11.4691	0.0016	Stationary	Reject H0
	ADF - Fisher Chi-square	48.9192	0.0085	Stationary	Reject H0
	PP - Fisher Chi-square	105.019	0.0000	Stationary	Reject H0
	Levin, Lin & Chu t*	-3.19374	0.0007	**Stationary**	**Reject H0**
	Im, Pesaran and Shin W-stat	-2.77671	0.0027	Not Stationary	Accept H0
IEE	ADF - Fisher Chi-square	57.2067	0.0009	Not Stationary	Accept H0
	PP - Fisher Chi-square	98.0452	0.0000	Stationary	Reject H0
	Levin, Lin & Chu t*	-5.30213	0.0000	**Stationary**	**Reject H0**
	Im, Pesaran and Shin W-stat	-2.85689	0.0021	Stationary	Reject H0
DWP	ADF - Fisher Chi-square	55.9205	0.0013	Stationary	Reject H0
	PP - Fisher Chi-square	129.595	0.0000	Stationary	Reject H0
	ADF - Fisher Chi-square	89.1018	0.0000	Stationary	Reject H0
	PP - Fisher Chi-square	256.429	0.0000	Stationary	Reject H0
IEH	Levin, Lin & Chu t*	1.49444	0.9325	Stationary	Reject H0
	Im, Pesaran and Shin W-stat	-1.05136	0.1465	Not Stationary	Accept H0
	ADF - Fisher Chi-square	36.6961	0.1257	Not Stationary	Accept H0
	PP - Fisher Chi-square	176.647	0.0000	Stationary	Reject H0

Source: Extracted by Researcher from E-View 9.0 (2019)

Also, panel unit root tests are used to examine the degree of integration between the variables. To assess the stationarity properties of the variables used. In this study we have used five different panel unit root tests including LLC test proposed by Levin, Lin and Chu (2002); IPS test proposed by Im, Pesaran and Shin (2003), Breitung (Breitung , 2000) and Hadri (Hadri, 2000).

All panel unit root tests have null hypothesis tests of non-stationary human capital investment. It can be seen that the probability of Levin, Lin and Chu statistic for all the variables has a value < 0.05 which is significant at 5 percent level of significance hence using Levin, Lin and Chu test it rejects the null of unit root this shows that the variables are stationery and has no unit root. Im, Pesaran and Shin unit root test, Augmented Dickie-Fuller ADF-Fisher Chi-square, Phillips-Perron Fisher Chi square, were also implemented most confirm stationary data hence no unit root except for natural logarithm of investment on employee health where both tests failed to reject natural logarithm investment on employee health at 5 percent level respectively.

Table 7: Pedroni Residual Cointegration Test
Series: CG DWR IEE IET IET01

	Statistic	Prob.	Weighted Statistic	Prob.
Panel v-Statistic	-2.160359	0.0046	-2.801917	0.0075
Panel rho-Statistic	3.430100	0.0097	3.429561	0.0097
Panel PP-Statistic	1.534242	0.0075	-6.536954	0.0056
Panel ADF-Statistic	1.972920	0.0057	-6.147394	0.4414
	Statistic	Prob.		
Group rho-Statistic	4.893356	1.0000		
Group PP-Statistic	-4.428928	0.0000		
Group ADF-Statistic	0.573612	0.0069		

Source: Extracted by Researcher from E-View 9.0 (2020)

These seven statistics are asymptotically distributed as standard normal and the detailed description of panel co-integration test statistics can be found in Pedroni (1999, 2004). The seven of Pedroni's tests are based on the estimated residuals from the following long run mode. The panel cointegration reports the results of Kao's (1999) residual panel cointegration tests, which reject the null of no cointegration at the 5% significance level. We conclude that there is a panel long-run equilibrium relationship among variables, meaning that human capital investment and commercial banks net interest income move together in the long run.

Table 8:Pairwise Granger Causality Tests

Null Hypothesis:	Obs	F-Statistic	Prob.
DWR does not Granger Cause CG	112	0.41717	0.6600
CG does not Granger Cause DWP		0.65397	0.5220
IEE does not Granger Cause CG	112	5.88253	0.0038
CG does not Granger Cause IEE		2.48833	0.0878
IET does not Granger Cause CG	112	8.75453	0.0003
CG does not Granger Cause IET		1.28991	0.2795
IEH does not Granger Cause CG	110	1.95063	0.1473
CG does not Granger Cause IEH		0.40161	0.6703

Source: Extracted by Researcher from E-View 9.0 (2020)

Evidence from the results of the granger causality test as shown in the table below shows that, there is unidirectional causality from investment on employee education to capital gain of the commercial and unidirectional causality from investment employee in training to capital gain.

5. Discussion of Findings

The estimated regression coefficient found that there is positive but no significant relationship between operating and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of 0.053490 and probability of 0.5853signifies that increase in operating cash flow will not lead to significant increase on capital gain of the commercial banks. The positive effect of operating cash flow on profitability of commercial banks confirms the a-priori expectation of the study. The estimated regression coefficient further found that there is

negative but no significant relationship between cash flow from financing activities and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of -0.079416 and probability of 0.5853signifies that increase on cash flow from investing activities will not lead to significant decrease on capital gain of the commercial banks. The estimated regression coefficient also found that there is negative but no significant relationship between cash flow from financing activities and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of -0.079416 and probability of 0.5853signifies that increase on cash flow from investing activities will not lead to significant decrease on capital gain of the commercial banks. The negative effect of the variable on capital gain of Nigeria commercial banks can be traced to poor quality of management and inability to manage the bank business environment. The estimated regression coefficient also found that there is positive but no significant relationship between net cash flow and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of 0.023262 and probability of 0.7548 signifies that increase on net cash flow will not lead to significant increase on capital gain of the commercial banks. The positive effect of operating cash flow on capital gain of commercial banks confirms the a-priori expectation of the study. The positive effect of the net operating cash flow on capital gain confirm that findings of Amuzu (2010) that cash flow analysis measures the performance as well as competitiveness of firms appropriately, the findings of Mazloom, Azarberahman, and Azarberahman (2013) that a company's performance and cash flow have a significant negative relationship and the findings of Amah, Ekwe, and Uzoma (2016) that there is a positive meaningful relationship between operating earning with return on equity, return on assets, and gearing of net market values in operating assets. The negative effect of net operating cash flow on capital gain of the commercial banks contradict the findings of Cheng, Cullinan, and Zhang (2014) that free cash flow with contemporaneous profits, with no consideration for the overlapping effect.

The estimated regression coefficient also found that there is positive but no significant relationship between investment on employee training and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of 0.087775 and probability of 0.9302 signifies that increase on investment on employee training will lead to no significant increase on capital gain of the commercial banks. The estimated regression coefficient also found that there is positive but no significant relationship between investment on employee training and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of -0.005599 and probability of 0.8298 signifies that increase on investment on employee education will lead to significant decrease on capital gain of the commercial banks. The positive effect of investment on employee education on profitability of commercial banks confirms the a-priori expectation of the study and validates theories such as resource base theory and value added theory added intellectual coefficient developed by public (1997) is found most appropriate for the study of human capital and performance.

The estimated regression coefficient also found that there is positive but no significant relationship between investment on employee health and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of 0.000938 and probability of 0.5182 signifies that increase on investment on employee health will not lead to significant increase on capital gain of the commercial banks. The positive effect of investment on employee health on profitability of commercial banks confirms the a-priori expectation of the study and validates theories such as resource base theory and value added value added intellectual coefficient developed by public (1997) is found most appropriate for the study of human capital and performance.

The positive findings of this study confirm the findings Yahaya (2007) that results identified the main training and development activities in the three selected banks as orientation and on-the-job training, skills improvement training, utilization of the newly acquired skills, regular training and acquisition of job experiences in all areas of banking. The respondents were significantly different in the assessment of training and development activities in their banks based on length of service and job status. The findings Yusuf (2013) that efficient utilization of HC did not have

any significant impact on the ROE of banks and the findings of Zehri, Abdelbaki&Bouabdellah (2012) but contrary to the findings of Djamil et al. (2013) that intellectual capital did not affect the current stock return.

The estimated regression coefficient also found that there is negative but no significant relationship between employees' differed payment and capital gain of the commercial banks within the periods covered in the study. The regression coefficient of -0.008299 and probability of 0.6831 signifies that increase on employee payment will not lead to significant increase on capital gain of the commercial banks. The positive effect of employee differed payment on profitability of commercial banks confirms the a-priori expectation of the study. The positive effect of the variable on profitability of Nigeria commercial banks confirm the findings of Storey et al (2014) that training expenses enhance learning environment that improve the company's transformation.

6. Conclusion and Recommendations

Conclusion
From the findings of the study, probability coefficient of 0.5526 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between operating cash flow and capital gain of commercial banks in Nigeria and the findings of the study, probability coefficient of 0.9570 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between cash flow from investing activities and capital gain of commercial banks in Nigeria.

From the findings of the study, probability coefficient of 0.6165 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between cash flow from financing activities and capital gain of commercial banks in Nigeria.From the findings of the study, probability coefficient of 0.7548 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between net cash flow and capital gain of commercial banks in Nigeria.

From the findings of the study, probability coefficient of 0.9302 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between investment on employee training and the capital gain of commercial banks in Nigeria.From the findings of the study, probability coefficient of 0.8298 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between investment on employee education and the capital gain of commercial banks in Nigeria.

From the findings of the study, probability coefficient of 0.0062 is less than the critical value of 0.05 at 5 percent level of significant; the study concludes that there is significant relationship between investment on employee health and the net interest income of commercial banks in Nigeria. From the findings of the study, probability coefficient of 0.5182 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between investment on employee health and the capital gain of commercial banks in Nigeria. From the findings of the study, probability coefficient of 0.6831 is greater than the critical value of 0.05 at 5 percent level of significant, the study conclude that there is no significant relationship between employees differed wage pay and the capital gain of commercial banks in Nigeria.

Recommendations

- Management of the commercial banks should ensure optimal cash flow management policies. Management should enhance the operational efficiency of the commercial banks and there is need to effectively and efficiently manage cash flow from investing activities of the commercial banks.
- Financial policies such as investment policy and capital structure policy should be directed towards achieving positive effect of cash flow from financing activities on profitability of the commercial banks.

Management should appraise the outflow and inflow of cash in the commercial banks to avoid the incidence excess cash and shortage of cash in the commercial banks.

▪ Management of commercial banks should investment more on employee education as this can make the employees acquire the needed knowledge in bank management such as credit appraisal that reduces the incidence of nonperforming loans and increase profitability. Management of commercial banks should intensify investment on employee off the job and on the job training of employees in the commercial banks.

▪ Management of commercial banks should increase its investment on employee health and ensure that employees benefits from the medical policy. An employee cans efficiently and effectively work if he/she is motivated and health. Well plan pension fund policy should be formulated for the employees and the management of commercial banks should comply with the pension reform Act as this will serve as a motivational factor to enhance employee performance that affect positively the profitability of the commercial banks.

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