

INCOME SMOOTHING PRACTICES AND THEIR EFFECT ON THE FINANCIAL STABILITY OF LISTED BANKS IN NIGERIA

Ifeoma Chimamanda Igbokwe

Department of Business Management, Faculty of Management Sciences, University of Uyo, Nigeria

DOI: <https://doi.org/10.5281/zenodo.14678683>

Abstract

The study examined the effect of income smoothening on financial performance of listed deposit money banks in Nigeria. The study adopted the ex-post facto research design sourced data from the financial statement of three selected Deposit Money Banks (DMO). The stated hypotheses were analyzed using the pool regression analysis. The finding revealed that discretionary accrual has positive and insignificant effect on return on asset of selected listed deposit money banks in Nigeria. It was concluded that discretionary accrual has positive and insignificant effect on return on equity of selected listed deposit money banks in Nigeria. The researchers recommended that investors in listed deposit money banks should be aware that managers can engage in income smoothing to manipulate the return on asset of the bank, hence, their decisions should not be based on the return on asset of the bank except stronger corporate governance mechanisms are maintained.

Keywords: Income smoothening, financial performance, Discretionary accrual, Deposit Money Bank, Return on Asset, Return on Equity.

Introduction

The resurgence of income smoothening in commercial banking has increasingly become an issue of international concern to scholars and researchers in the country and in the world in general (Baron and Thompson 2020). Income smoothening is a practice involving the modification of accounting figures to meet the desires and expectations of organizational directors and managers through manipulation of earnings, use of loan provisioning, capital deductions, non-concealment of liabilities and the understatement of incomes (Bayel and Perlyman 2018 in Asuquo et al, 2024). Bank income smoothing in the form of managing loan-loss provisions (LLP) varies from country to country depending on variables such as investor protection, disclosure, regulation, supervision, financial structure, and financial development (Asuquo et al, 2024). Also, most of the accountants believes that there are a number of reasons for income smoothing which include to improve the risk perception of a bank for its investors, regulators, and supervisors. Income smoothing may also be the result of perceived bankruptcy concerns and/or can be intended to discourage investors from acquiring private information that could then be used to trade against uninformed shareholders selling for liquidity reasons (Brainer and Fitzer 2017)

Management is responsible for creating financial statements, as a result, agency theory claims that management knows more about the firm than the firm owner. So, managers have the freedom to take a variety of alternative measures to adjust different accounting procedures in a way that serves the interests of the business. This is what

motivates managers to undertake income smoothing, whether they realize it or not. To satisfy the interests of the firm owner or the manager of the firm itself, management activities to smooth out income are typically based on this, managers use income smoothing to minimize the tax burden paid and/or raise stock prices or company value to satisfy the interests of business owners (Brein, 2016).

It is assumed that income smoothing may affect the financial performance of deposit money banks. Financial performance, on the other hand, is a measure of an organization's earnings, profits, appreciation in value as evidenced by the increase in the entity's worthiness (Burner, and Synord, 2021). For this study, financial performance were proxies with return on asset and return on equity. This study employed the accrual-based measures of income smoothing. This method was used by Tucker and Zarowin (2006) to estimate income smoothing as the negative correlation between the change in a firm's discretionary accruals and the change in its pre-discretionary income.

1.2. Statement of the Problem

The objective of financial reporting is to provide information about financial position, performance and changes in financial position of an entity that is useful in making economic decision for a wide range of users such as investors, employees, lenders, suppliers, customers, government and the general public. Penman (2002) says that accounting quality should be discussed in terms of shareholders interest and fair valuation of that interest. This then raises the question of fairness as to the impact of income smoothening, earnings quality manipulation and whether this attitude of managers' best serves the interest of investors. In addition, how does this manipulation of earnings affect the performance of the firm? Previous financial reporting abuses have raised questions about the quality of accounting information and the impact of such manipulations on the performance of firms.

In Nigeria, the case of Cadbury, the failure of banks and the stock market crash and depression of stock prices leading to huge investment losses by investors places a bold question mark on financial reporting and wets the appetite of researchers on the need to investigate Managers action and reported effects on performance of firms. Prior research documents has shown that managers deliberately influence financial reporting system by disclosing earnings numbers that satisfy projected benchmarks such as research carried out by Burgstahler and Dichev (1997); Zeckhauser and Patel (1999)); Grinaker (1994); Bushee (1998); Tapia and Fernández, (2007). It is believed that the more sustainable the earnings, the higher the quality while according to Joo (1991) there have been some motivations for the phenomenon of income smoothing, such as increasing shareholders' welfare, facilitating the capability of predicting income and enhancing the manager's welfare. Previous studies were mainly in Industrialized and Asian nations with little or no empirical research in third world economies such as Nigeria. This affects generalization due to cultural, economic and technological disparity between countries research.

Furthermore, most of the studies were conducted under GAAP, hence with the introduction of International Accounting Standards (IFRS) there is the need to revisit some of these study areas as the application of standards could impact on reporting behavior of firms which were non-existent under GAAP and may probably impact on the outcome of this present study. In Nigeria there is paucity of study about the effect of smoothening and earnings quality on the performance of firms. This study attempts to fill this gap and establish whether firm's performance can be influenced by smoothing of income and earnings quality. Also, Prior studies such as research conducted by Hejazi and Ansari (2012) used price earnings ratio as the sole performance indicator; the present study uses multiple performance indicators to facilitate detailed probing of the effects of Income Smoothing and earnings quality on different spectrum of performance. Therefore, the aim of the study is to investigate the effect of income smoothing on the performance of listed deposit money banks in Nigeria.

1.3. Objectives of the Study

The main objective of the study is to examine the effect of income smoothening on financial performance of listed deposit money banks in Nigeria. The specific objectives are to:

1. ascertain the effect of discretionary accruals on the return on asset of listed deposit money banks in Nigeria.
2. ascertain the effect of change in revenue on the return on equity of listed deposit money banks in Nigeria.

1.4. Research Questions

1. What is the effect of discretionary accruals on the return on asset of listed deposit money banks in Nigeria?
2. What is the effect of change in revenue on the return on equity of listed deposit money banks in Nigeria?

1.5. Research Hypotheses

The following hypotheses were stated in null form

H0₁: Discretionary accruals has no significant effect on the return on asset of listed deposit money banks in Nigeria

H0₂: Change in revenue has no significant effect on the return on equity of listed deposit money banks in Nigeria

1.6. Scope of the Study

The study focused on effect of income smoothening on financial performance of deposit money banks in Nigeria. Discretionary accruals and change in revenue were used to measure income smoothing while return on asset and return on equity were used to measure performance. The listed deposit money banks (DMB) under study include Access Bank Plc, Zenith Bank Plc and Eco Bank Plc.

Review of related Literature**2.1. Conceptual Review****2.1.1. Concept of Income Smoothing**

Income Smoothing is the use of accounting techniques to level out fluctuations in the income of a business (Doonor 2017). The technique can sometime be used illegally or fraudulently by management and can also be used or deployed legally within the guidelines permitted by generally accepted Accounting Principles (GAAP) (Dorthey, 2015 in Asuquo et al, 2024). It is part of earnings management that involves moving revenues and expenses around by business manager in order to help investors better predict future performance (Dyer and Arnold, 2017). Example of Income smoothening technique is revenue deferring during a good year where it is anticipated that the following year it could be difficult or deferring recognition of expenses in a challenging year in anticipation of improved performance in the near future (Emad, et al., 2020).

Broadly classified into two, income smoothing can be either natural or designed. Natural income smoothing is an embedded opportunity in operations of a business that creates smooth flow of income without manipulation of profits. This type of smoothing is not part of earnings management in actual sense as it does not involve income or profit manipulation (Asuquo et al, 2024). On the other hand, designed or intentional smoothing is earnings management which occurs when managers use their personal judgment in financial reporting to manipulate structure of equations in order to change the financial reporting (Forllen, and Garthmer, 2016). Further, the designed or intentional smoothing could be real or artificial. Real income smoothing refers to techniques of business managers implemented to smooth income with the end result of reducing cash flow volatility (Flywood, and Nee, 2017).

The technique of real income smoothing typical of manufacturing organization according to Gilbert and Njoku, (2020), include manipulation of sale through accelerating the timing of sales, creation of over production and credit conditions with falling prices and engaging in excessive production in order to report lower cost of goods sold among others. These according to Hallison, and Dodharm, (2017) are risky income smoothing to derive assurances among customers and suppliers in anticipation of higher growth prospects.

2.1.2. Discretionary Accruals

Discretionary accruals are accounting adjustments that are made at the discretion of management, rather than being based on objective events or transactions (Asuquo et al, 2024). These accruals can have a significant impact on a company's financial statements and can be used to manipulate income of particular organization (Khante and Canon, 2016). Discretionary accruals are important concepts in accounting and finance and can lead to misperception of a company's financial performance, undermine investor confidence, and increase the risk of

financial reporting fraud when used for income smoothing. It is important for companies to accurately report their financial performance in order to maintain the trust of investors and stakeholders (Asuquo et al, 2024). Generally, to smooth income, managers create "reserves" in periods of good performance, in order to use them to increase earnings in periods of poor performance, hence, the reported earnings less than the true company's economic performance (Leuz et al., 2003). Managers can use both accruals and cash flows for income smoothing purposes. However, given the high costs resulting from cash flows manipulation, and since their manipulation is much more visible than the accruals manipulation, it is expected that managers prefer to use discretionary accruals to normalize the reported income series (Peasnell et al., 2000).

2.1.3. Concept of Financial Performance

Harman, and Gureceno, (2019), define financial performance as the process of measuring the results of a firm's operations and policies in monetary terms and the degree by which financial objectives of firms are achieved. Over the years, the established proxies with which the financial performance of firms in the banking industry is ascertained include Return on Assets (ROA), Return on Equity (ROE), among others.

Return on Assets (ROA)

Return on Assets (ROA) is used to indicate the extent to which the banking industry is able to effectively and efficiently manage its assets to generate profits. Put differently, it measures how judiciously the resources of firms are used to generate the expected income level. Return on assets (ROA) is most commonly calculated by dividing net income by average total assets:

$$\text{Return on Assets (ROA)} = \frac{\text{Profit after Tax}}{\text{Average Total Assets}} \times 100$$

Average Total Assets

Net income equals earnings attributable to common stockholders. Average total assets balance is calculated by dividing the sum of total assets at the beginning and at the end of the period by 2. Similarly, Total assets at the beginning and at the end of the period can be obtained from relevant balance sheets (Harrey and Arthur 2017).

Return on Equity (ROE)

Return on equity (ROE) is a measure of financial performance and a key profitability ratio that investors use to measure the amount of a company's income that is returned as shareholders' equity. This metric reveals how effectively a bank is generating profit from the money that investors have put into the business by buying its stock. ROE is calculated by dividing net income by total shareholders' equity (Kennol, and Gregory, 2017).

2.2. Theoretical Review

2.2.1. Income and dividend smoothing theory

The study is anchored on income and dividend smoothing theory propounded by Miller and Modigliani in 1961 (Kent, and Armin, 2016). The theory postulates that firms adjust dividend payment in response to changes in earnings. Investor's satisfaction is critical to managers as shareholders always consider a company paying high dividends to be more profitable than those paying smaller dividends (Khante, and Canon, 2016).

The general assumption of the theory is that the aim of income and dividend smoothing is to satisfy the expectation of investors and other business stakeholders. Investors do often ascertain the extent to which their expectations are meant by monitoring a company's cash flow to see how much cash they generate from operation (Christen and Harris, 2016). If a company is profitable then it should generate positive cash flow and have enough funds set aside in retain earnings to pay out or increase dividends (Kleiffer, and Leonard, 2015). The relevance of the theory to the study stems from its assumption and emphasis on dividend payment in response to income generated from operation often smoothed to meet the yearnings of investors

2.3. Empirical Review

Karzan and Rizgar (2023) determined whether income smoothing procedures have an impact on the financial performance of return on assets (ROA) and return on equity (ROE). Data for this study came from a sample of banks that are listed on the Iraq Stock Exchange. The research sample consists of banks listed between 2015 and 2019 on the Iraq Stock Exchange. The model estimate is done using the panel data approach. Five banks match the required requirements, and the samples were chosen using a purposive sampling technique. This study employed Miller's model to distinguish between banks that used income smoothing and banks that did not, as well as certain statistical techniques to examine the data of return on assets (ROA) and return on equity (ROE). The findings of this study demonstrate that return on assets (ROA) and return on equity (ROE) have a considerable impact on income smoothing procedures, while variable volume has a significant positive impact as well. The researchers observed that there was statistically significant differences between banks with and without smooth income in terms of their returns on assets (ROA) and returns on equity (ROE). The result revealed that there is significant positive relationship between bank size, financial success, and income smoothing in our study.

Sani (2022), examined income smoothing and performance of manufacturing firms in Nigeria. Using purposive sampling, data for five years (2017-2021) on Market Value Per Share (MVPS), Earnings Per Share (EPS), Net Assets Value Per Share (MVPS), Earnings Per Share (EPS), Net and Income (NI) were obtained from the annual reports of selected 20 manufacturing firms quoted on Nigerian Stock Exchange (NSE) as at 31st December, 2021. The analysis of the data was done using correlation and regression methods. Further, F-test statistics was done to

compare variance obtained from the grouped sample. It was found that relationship exist between income smoothing and performance of manufacturing business, it was also found that firms in the high sales bracket presents less variable income numbers in their financial statements implying smoothed income than those manufacturing enterprises in the low sales bracket. The researchers recommended that engagement of qualified and skilled auditors of investors for proper analysis of financial statements of enterprises for identification of smoothed income in the financial statements which in some cases are done fraudulently.

Ana and Francisco (2022) examined determinants of income smoothing by management of loan-loss provisions in banks around the world. Using a panel database of 3,221 bank-year observations from 40 countries and controlling for unobservable bank effects and for the endogeneity of explanatory variables. Results suggested that there is less bank income smoothing not only with the strength of investor protection, but also with the extent of accounting disclosure, restrictions on bank activities, and official and private supervision, while there is more income smoothing with market orientation and development of a country's financial system.

Imagbe and Okoughenu (2021) examined the relationship between income smoothing and financial performance of firms listed on the Nigerian Stock Exchange after the adoption of IFRSs. Data for the study were quantitatively retrieved from the annual reports and accounts of the studied companies for the year 2013-2017. Pearson correlation and regression was used to analyse the data and it was revealed by fixed effect regression model that income smoothing had a positive and significant relationship with financial performance measured by ROA in Nigerian listed companies. For the control variable, corporate governance was proxied as board independence variable had a positive and significant relationship with firms' financial performance in Nigeria. The researcher therefore recommended that financial statements' users should be aware that managers can engage in income smoothing to manipulate the financial performance of the company and they should not base their decisions on the financial performance of the company except stronger corporate governance mechanisms are maintained. In addition, the management should maintain optimum number of percentage of outside directors (non-executive directors) on the total board members in order to continuously maximize the best return on their investments

Flourien (2019), examined the influence of financial performance proxied by profitability, liquidity and capital structure to income smoothing practice. The population of this study covers property and real estate companies at Indonesia Stock Exchange for the period of 2014-2017. The indicators for income smoothing practice was measured using Eckel index. Mechanical sample selection using purposive sampling and acquired 32 companies within the period of 4 years to get the observed 128 samples. Model data analysis was carried out using the logistic regression analysis with the aid of SPSS version 22. The result of a combination of independent variables such as profitability, liquidity, capital structure and size of company as control variable, explained the variation of the dependent variable of income smoothing practice at 22.10% and 77.90% respectively, as the rest explained by other factors were not involved in this model. The results also showed that the independent variables of

profitability, liquidity, and capital structure significantly influence income smoothing practice. From the test results obtained, partial results showing variable profitability (ROE) with positive direction has significant effect on income smoothing practice, variable liquidity has no significant effect on income smoothing practice, and variable capital structure with positive direction has significant effect on income smoothing practice.

Methodology

The ex-post facto design was used as the most suitable method because of the nature of both the dependent and independent variable of the study. Data were obtained from the financial statement of the listed commercial banks under review between 2010 to 2022. The population of the study comprises of all the Deposit money Banks listed on the floor of Nigeria stock exchange as at 31st December, 2022. Three banks were randomly selected as sample size of this study which includes; Access Bank Plc, Zenith Bank Plc and Eco Bank Plc using purposive sampling technique.

Data Analysis Techniques

Formulated hypotheses were analyzed using pool regression.

Model Specification The model for hypothesis 1 $ROA_{it} = \beta_0 + \beta_1 DC_{it} + U_t$

Where,

ROA_{it} = Return on Asset

DC_{it} = Discretionary accruals (measured by operating profit after tax-cash flow operations) μ = error term α = is the intercept

β_1 = are the parameters estimate or coefficients in the equation it = firm i, time t

A priori expectation for the regression parameters $\beta_0 = \beta_1 > 0$,

The model for hypothesis 2 $ROE_{it} = \beta_0 + \beta_1 DC_{it} + U_t$

Where,

ROE_{it} = Return on Equity

DC_{it} = Discretionary accruals in year t for firm i; (measured by operating profit after taxcash flow operations) μ = error term α = is the intercept

β_1 = are the parameters estimate or coefficients in the equation it = firm i, time t

A priori expectation for the regression parameters $\beta_0 = \beta_1 > 0$,

Results and Discussion of Findings Table 4.1: Pool Regression Result for Hypothesis One

Dependent Variable: ROA_{it}

Method: Pool Regression

International Journal of Banking and Financial **Services**

Research Article

Date: 05/14/24 Time: 10:11

Sample (adjusted): 1 13

Included observations: 13 after adjustments

Variable	Coefficient	Std. Error Statistic	t- Prob.
DCit	1.103461	1.929761	0.5718
C		0.912272	0.6901
	1.119065	1.727589	
		0.647761	
R-squared	0.549057	Mean dependent var	1.927521
Adjusted R-squared	0.522189	S.D. dependent var	3.192721
S.E. of regression	1.232612	Akaike info criterion	11.17258
Sum squared resid	2.119276	Schwarz criterion	12.19271
Log likelihood	-1.102982	Hannan-Quinn criter.	12.71651
F-statistic	0.514921	Durbin-Watson stat	1.752226
Prob(F-statistic)	0.781720		

Source: E- Views 12 computation

From the pool regression results as shown in table 4.1, the R-squared of 0.549057 reveals that 54.9% of the total variations in the dependent variable return on asset (ROAit) was accounted by the explanatory variables (Discretionary accruals (DCit), while the remaining 45.1% was explain by the stochastic variable in the model. Also, A unit increase in discretionary accruals (DCit) will increase return on asset by 1.103461 units.

Test of Hypothesis 1 H0₁: Discretionary accruals has no significant effect on return on asset of selected listed deposit money banks in Nigeria

The p-value (0.5718) of discretionary accruals in table 4.1 is greater than 0.05. Hence, the null hypothesis (H0₁) was accepted and the alternative hypothesis rejected, and thus state that discretionary accruals has positive and insignificant effect on return on asset of selected listed deposit money banks in Nigeria

Pool Regression Result for Hypothesis Two

Dependent Variable: ROE_{it}

Method: Pool Regression

Date: 05/14/24 Time: 11:10

Sample (adjusted): 1 13

Included observations: 13 after adjustments

Variable	Coefficient	Std. Error Statistic	t- Prob.
REV _{it}	1.127210	1.901119	0.7171
C		0.592897	0.7007
	1.110917	1.789304	
		0.620865	
R-squared	0.542987	Mean dependent var	1.765431
Adjusted R-squared	0.523779	S.D. dependent var	3.321921
S.E. of regression	3.176771	Akaike info criterion	1.986556
Sum squared resid	3.876776	Schwarz criterion	1.986554
Log likelihood	-2.287662	Hannan-Quinn criter.	1.986420
F-statistic	0.865381	Durbin-Watson stat	1.679324
Prob(F-statistic)	0.432570		

Source: E- Views 12 computation

From the pool regression results as shown in table 4.2, the adjusted R-squared of 0.523779 reveals that 52% of the total variations in the dependent variable return on equity was accounted by the explanatory variables (change

in revenue (REVit), while the remaining 48% was explained by the stochastic variable in the model. Also, A unit change in revenue (REVit) will increase return on equity by 1.127210 units.

Test of Hypothesis 2 H0₂: Change in revenue has no significant effect on return on equity of selected listed deposit money banks in Nigeria

From table 4.2, the p-value (0.7171) of change in revenue is greater than 0.05. Hence, the null hypothesis (H0₂) was accepted and the alternative hypothesis rejected, and thus, state that change in revenue has positive and insignificant effect on return on equity of selected listed deposit money banks in Nigeria.

Conclusion

Income smoothening is a practice involving the modification of accounting figures to meet the desires and expectations of organizational directors and managers through manipulation of earnings, use of loan provisioning, capital deductions, non-concealment of liabilities and the understatement of incomes. The result from hypothesis one showed that discretionary accruals has positive and insignificant effect on return on asset of selected listed deposit money banks in Nigeria. The result from hypothesis two also showed that change in revenue has positive and insignificant effect on return on equity of selected listed deposit money banks in Nigeria. The study therefore conclude that income smoothing has no significant effect on financial performance of deposit money banks in Nigeria.

Recommendations

1. Because managers can engage in income smoothing to manipulate the return on asset of the bank, hence, investors decisions should not be based on the return on asset of the bank except stronger corporate governance mechanisms are maintained.
2. The management of the studied deposit money banks should strictly adhered to changes in accounting practices in preparing financial statement in order to reduce the incidence of income smoothing.

References

- Ana, Y & Francisco, H (2022). Determinants of income smoothing by management of loan-loss provisions in banks around the world. *Journal of Financial Management and Psychology Studies* 2(6), 61-75.
- Asuquo, M.V, Ewang, A.I, & Obialor, D.C. (2024). Income Smoothing and Market Share Price of Listed Commercial Banks in Nigeria. *Int. Journal of Accounting Intelligence*, 2 (2), 57-74.

International Journal of Banking and Financial **Services**

Research Article

- Baron, O.T & Thompson, A (2020) Income smoothing and earning management and impact on investment decision. *Journal of Entrepreneurial Finance and Management* 11(1) 307-319
- Bayel, N.L & Perlyman, C (2018). Determinants of corporate performance: An analysis of investors perspectives. *Journal of Business and Management Studies* 3(2), 98-110.
- Brainer, D & Fitzer, O.O (2017). Income smoothing quality and stock performance predictions. *Journal of Financial and Entrepreneurial Research*, 9(3), 75-87.
- Brein, M.G (2016) Earnings reporting under IFRS and benefits to cash flow. *Journal of Management Accounting and Social Sciences* 4(2), 192-205.
- Bryan, P & Herfrey, S (2020). Value relevance of accounting information: An analysis of effect of income smoothing. *Journal of Entrepreneurial Finance and Management* 2(1), 39-51.
- Burner, W.T & Synord, E (2021). Artificial Vs natural income smoothing: effect analysis of the two on business performance. *Journal of Financial and Corporate Studies* 12(2), 216-228.
- Burnkyn, A & Singer, F.L (2016). Earnings manipulation and effects on investors' decision. *Journal of Management, Economics and Entrepreneurship Finance* 3(1), 81-93.
- Christen, T & Harris, I.O (2016). Effects of income smoothing on earnings quality. *Journal of Accounting, Management and Entrepreneurial Research Studies* 2(2), 57-68.
- Desmond, B & Elliot, K (2017). Earnings informativeness and hindrances to ideal investment decision. *Journal of Accounting, Management and Economic Research*, 4(2) 103-117.
- Donley, M.M & Cohen, D.B (2019). Earnings Management: A veritable to wooing investors. *Journal of Management and Business perspectives* 1(1), 148-159.
- Doonor, S.B (2017). Income smoothing. Is it a tool of management to report unrealistic performance of a business? *Journal of Business and Management Accounting Research*, 3(3), 227-239.
- Dorthey, R (2015). Intricacies of earnings smoothing: Who benefits? *Journal of Entrepreneurship Studies and Finance* 2(5), 98-111.
- Dosunmu, V & Nabbo, C.H (2020). Income smoothing: An overview of discretionary accruals: *Journal of Finance Entrepreneurship and Auditing* 1(4) 273-285.
- Dyer, W & Arnold, G.I (2017). Income smoothing and rational investment behaviour. *Business and Management Review* 7(4). 139-151.
- Emad, K, Wasan, Y.A & Laith, J.K (2020). Measurement and analysis of income smoothing using Eckel's model and analytical procedure. *International Journal of Innovation, Creativity and Change*, 13(3), 1153-1171.
- Flywood, C.K & Nee, L.T (2017). Income smoothing: Detection models and impact on investment decisions: *Journal of Management Research and Economy* 6(1), 119-132.

International Journal of Banking and Financial **Services**

Research Article

- Forllen, R & Garthmer, A (2016). Income smoothing rationality: The losses decreases perspective. *Journal of Finance and Entrepreneurial Science* 3(4), 204-217.
- Gilbert, P.N & Njoku, E (2020): Corporate performance: the two competing explanations for income smoothing. *Journal of business finance and management* 8(2), 361-373
- Gimtha, U.W & Edwin, I.C (2016). Effect of income smoothing on volatility of earnings: An analysis of investors options. *Journal of Entrepreneurship Finance and Management* 2(6), 56-67.
- Hallison, R.Z & Dodharm, V.A (2017). Income smoothing and effects on organizational growth. *Journal of business management and economics* 2(1), 236-247.
- Harman, J.O & Gureceno, C (2019). The choice between accounting methods and mere manipulation. *Journal of Business Research Studies* 1(5), 69-81.
- Harrey, Y and Arthur, B (2017). Income smoothing and firm value. *Journal of Accounting, Management and Economics* 3(4), 112-121.
- Imagbe, U & Okoughenu, M (2021). Relationship between income smoothing and financial performance of firms listed on the Nigerian Stock Exchange *Journal of Strategic Studies and Accounting* 11(3), 195-206.
- Karzan, A & Rizgar, H (2023). Income smoothing procedures have an impact on the financial performance *Journal of Contemporary Studies in Finance and Business* 8(2), 207-221.
- Kennol, O.B & Gregory, H (2017). Business information and individual investment decisions. *Economy and Socio-Political Review* 4(6) 287-298.
- Kent, F.B & Armin, T.A (2016). The persuasive theory of income smoothing. The principal problem. *Finance and Entrepreneurship Review* 2(7) 59-71
- Khante, N & Canon, S.K (2016) Income smoothing, corporate transparency and firm value. *Journal of Business and Management studies* 5(4), 139-152.
- Kleiffer, Y.I & Leonard, H.H (2015). Income smoothing interrocaion: How to make good investment decisions. *Journal of Entrepreneurship Research and Economy* 3(6) 321-332
- Sani, U (2022). Income smoothing and performance of enterprises: A study of manufacturing firms in Nigeria. *Journal of Business, Management and Financial Studies* 4(1), 141-153.
- Shuaibu, K & Muhammad A. (2019) Income Smoothing and Financial and performance of listed Deposit money Bank in Nigeria. *International Journal of Business Economics and management* January 2021.

International Journal of Banking and Financial
Services

Research Article

International Journal of Banking and Financial **Services**

Research Article

APPENDIX POOL DATA

Years	Discretionary Accrual (DC) (₹ billion)	Return on Asset ROA (%)	Return on Equity (ROE) (%)
2010	16523	4.08	2.26
2011	298317	3.61	3.63
2012	124572	3.72	5.77
2013	624849	5.91	2.44
2014	478529	6.26	3.41
2015	726092	3.47	3.38
2016	973098`	4.74	4.64
2017	435091	4.53	3.72
2018	278091	4.58	4.73
2019	345092	4.43	2.53
2020	210292	2.54	2.7
2021	435922	3.06	2.86
2022	239821	3.68	2.86

Source: Finacial Statement of Studies banks