'Published online on August 30, 2021'

EFFECT OF TAX AVOIDANCE ON ACCOUNTING CONSERVATISM OF LISTED NON-FINANCIAL FIRMS IN NIGERIA

Salami Suleiman

Department of Accounting, Ahmadu Bello University, Zaria, Nigeria

Mensah Barnabas

Department of Accounting, Ahmadu Bello University, Zaria, Nigeria

Abstract

The study seeks to ascertain the effect of tax avoidance on accounting conservatism of listed non-financial firms in Nigeria. The independent variable, tax avoidance was proxied by Generally Accepted Accounting Principle Effective Tax Rate (GETR), Cash Effective Tax Rate (CETR) and Book Tax Difference (BTD), while the dependent variable accounting conservatism was measured using Negative Accruals (NA). The control variables utilized were leverage, Return on Asset (ROA) and Firm Size (FS). The study covered a period of seven years (2014-2020) and a population of forty-eight listed non-financial firms on the Nigerian stock exchange. The data was analysed using panel regression technique. From the findings, it was discovered that GETR and BTD significantly affect unconditional conservatism with a negative relationship between the variables. Overall, this paper shows that taxation is a determinant of financial reporting conservatism in Nigeria.

Keywords: Tax avoidance, Accounting Conservatism, Nigeria, Non-Financial Firms

Introduction

Accounting conservatism ensures management reports all possible loss/expense that could be incurred by the firm at some point in the future while all anticipated revenues not yet earned are not accounted for until they have been earned. Generally, all losses are provided for when identified as incurred while gains are recognized when there is a reasonable degree of certainty in earning them. This keeps all relevant stakeholders abreast with the true position of an entity at any point in time.

Unconditional conservatism involves management systematically understating book values of assets or expensing assets which could otherwise have been capitalized due specific aspect of the accounting process while for conditional conservatism book values of asset are written down but not up as well asymmetrical recognition of gains and losses under adverse conditions (Basu, 1997). Under both forms conservatism asset and gains require higher verification than liabilities and losses.

Taxation is a fiscal policy tool used in controlling a country's economy. Although tax avoidance is legal going by the letters of the law, it refers to all measure adopted by an entity reduce explicit tax payable by exploiting loop holes in the tax system. Corporate tax avoidance can be viewed as any medium devised by an entity/individual largely within the scope of the law to minimize its taxable income. Tax motivated conservatism requires a degree of book tax conformity. Where this is not the case, the reporting firm has to devise a means of increasing book income while driving down taxable income.

Literature Review and Hypothesis Development

According to Desai & Dharmapala (2005), tax avoidance is the "downward manipulation of an entity's chargeable income. Gan (2018) examines the relationship between conditional conservatism and tax avoidance. He took a sample of listed U.S. companies during the period of 2009-2016. He computed tax avoidance based on cash effective tax rates (CETR) and employed the C-score method developed by Khan and Watts (2009) and the skewness method from Givoly and Hayn (2000) to measure conditional conservatism. The results of the study indicate that the C-score is negatively correlated to CETR, irrespective of the different models utilized. The negative association of the C-score and CETR corroborates the hypothesis of the study that Ceteris paribus, conditional conservatism is negatively associated with tax burdens.

Bornemann (2018) conducted a study in Austria to analyse the relationship between accounting conservatism, future tax rate cuts and countries' level of book-tax conformity using a panel of firms across 18 countries from 1995 to 2010. He used C score to measure conditional conservatism and use book tax conformity to measure tax avoidance. He established that conditional conservatism is positive and significantly associated with future tax rate cuts when book-tax conformity is high. The effect is particularly manifesting for firms that concentrate the majority of their operations in the country in which the tax rate is cut. In contrast, there is no significantly relationship between future tax rate

cuts and unconditional conservatism.

Yuniarsih (2018) carried out a study to explain the influence of accounting conservatism and corporate governance mechanism against tax avoidance in Indonesia. The study sampled 123 companies listed in Indonesia Stock Exchange (IDX) particularly listed manufacturing companies for a period of three years, between 2014 and 2016. Secondary data was collected via the audited financial statements of the companies. Meanwhile multiple regression analysis was used to test the hypothesis. The results indicate that conservatism has no significant effect on tax avoidance which is in congruence with the findings of Purwantini (2017).

Flowing from the reviewed works, the following hypotheses are therefore formulated:

Ho1: GAAP ETR does not have any significant effect on the degree of accounting conservatism.

Ho2: Tax motivated conservatism is less prevalent for the firms with high book-tax conformity.

Ho3: CASH ETR does not influence the degree of accounting conservatism.

Methodology

The research design utilised for this study is correlational research design. The data used is time-series and cross-sectional in nature which is therefore pooled together to form a panel data set. It is a time-series considering the fact that it will use data from all firms in the consumer goods, conglomerate, industrial goods and health sector over a period of seven years (2014-2020) all after the adoption of IFRS in Nigeria and also cross-sectional in nature since data that will be used for the research cuts across the selected companies used for the study. The design is also correlational research design because it is aimed at examining the effect of tax avoidance on accounting conservatism.

The population of this study comprises of all listed non-financial firms operating in goods. conglomerate. the consumer health and industrial sector of the Nigerian stock exchange. Due to unavailability of annual reports of some firms in all the observation years the study utilized a population of forty-eight firms instead of the 50 listed non-financial firms. Also of the forty-eight firms captured by the study some didn't publish their financial statements in some years as shown in the analysis above, leading to an unbalanced data for the relevant years of the study. In the first year only 36 firms representing 75% of the population published their annual report. In the second and year 43 firms representing 89.5% published their annual reports. From the third year down to the seventh year 45, 42, 40, 43, and 38 firms published their annual reports respectively accounting for 93.75%, 87.5, 83.3%, 89.6%, and 79.2% of the available population.

Data were collected through secondary sources such as; journals and other related materials, since they provide how others have defined and measure the key concepts. Also considering the fact that the variables are quantitative in nature, the published audited annual report of these companies was used, since it is a means through which value of variables used in arriving at the objective of the study can be obtained. This study will utilize correlation and regression analysis to ascertain the effect of tax avoidance on accounting conservatism on listed non-financial firms in Nigeria. GETR, CETR and BTD will be used to measure tax avoidance over a period of seven vears. Unconditional conservatism is adopted as the measure for accounting conservatism.

The variables been considered in this study are conservatism as the explained variable and tax avoidance as the explanatory variable proxied by GETR (Generalaccepted accounting principles lv effective tax rate), BTD (book-tax difference) and CETR (Cash effective tax rate). This study is undertaken to examine the effect of tax avoidance on accounting conservatism. The proxy for conservatism is unconditional conservatism following Givolv and Havn's (2000) Negative Accruals Measure ("NA"). The variables specified in the model are measured as follows. In order to achieve the objective of the study based on the outlined variables and obtained values the following model is developed.

NA=a +&1GETRit+ &2ROAit+&3LEvit+& 4FSit+et

NA=a $+\beta1CETRit+\beta2ROAit+\beta3LEvit+\beta$ 4FSit+et

NA=a +&1BTDit +&2ROAit+&3LEvit+& 4FSit+et

Where,

NA=Negative Accruals

a =constant

GETR it=generally accepted accounting principles effective tax rate at time t CETR it=cash effective tax rate at time t BTD it=book tax difference at time t Lev it=leverage at time t ROA it=return on asset at time t FR it=firm size at time t et=error term at time t i=entity t=time

Results and Discussion

This study uses numerical and secondary data for analysis. The data so collected were presented and analyzed in a logical and systematic manner using tables as shown below.

Descriptive Analysis

The summary statistic of the explained and explanatory variables is presented in table 1

Observation	Mean	STD.DEV	Minimum	Maximum
287	-19.51165	307.0954	-5183.662	15.3128
287	0.0025128	1.813355	-26.7816	11.79752
287	-0.1941336	14.58498	-244.5202	3.862389
287	-2368492	8.105842	-119.6184	64.24893
287	10.0836	0.8842953	7.835545	12.23603
287	8.256533	72.33739	-3.104231	737.5428
287	0.780814	0.304537	-1.102724	3.328261
	287 287 287 287 287 287 287	287 -19.51165 287 0.0025128 287 -0.1941336 287 -2368492 287 10.0836 287 8.256533	287-19.51165307.09542870.00251281.813355287-0.194133614.58498287-23684928.10584228710.08360.88429532878.25653372.33739	287-19.51165307.0954-5183.6622870.00251281.813355-26.7816287-0.194133614.58498-244.5202287-23684928.105842-119.618428710.08360.88429537.8355452878.25653372.33739-3.104231

TABLE 1: DESCRIPTIVE STATISTICS

Table 1 shows the nature of data collected and their distribution. The data set contains a total of 287 observations from 48 listed non-financial firms on the Nigerian stock exchange over a period of seven spanning 2014-2020.

The mean value of GETR is approximately -19.51165 indicating that on average firms get a tax credit of -19.51165 across the industry on profit before tax. The standard deviation of GETR shows the degree of variability from the mean to be high at approximately 307, this shows that the value portraved by the mean could be misleading as there is a very high degree of disparity from the industry average. The minimum and maximum values for GETR as portrayed in the above table are -5183.662 and 15.3128 respectively.

The cash ETR has a low mean value of 0.0025128 showing that the average income tax paid by listed firm in the non-financial sector is 0.25% of profit before tax. This can be attributable to the

low value of GETR of firms across the industry. The standard deviation of 1.813355 shows the degree of disparity from the mean value for CETR. The respective minimum and maximum values are -26.7816 and 11.79752 this shows that the firm paying the minimum income tax receives a tax rebate of -26.7816 of profit before tax and the firm paying the highest income tax pays 11.79752 of profit before tax.

The mean value for BTD shows that the average disparity between book and taxable income for all firms in the industry is -.1941336 while the deviation from the mean is 14.58498. The minimum and maximum values of BTD are -244.5202 and 3.862389 respectively.

The mean values for ROA, leverage and firm size are .0780814, 8.256533 and 10.0836 respectively, showing that the average return on asset for firms in the industry is .0780814, firms are averagely levered at 8.256533 and the average firm size is 10.0836. The standard deviation of for ROA, leverage and firm size are

TABLE 2: CORRELATION MATRIX

Variables	GETR	CETR	BTD	Unconc	LEV	F-size	ROA
GETR	1						
CETR	0.0784	1					
	0.1853						
BTD	0.9982	0.1309	1				
	0.0000	0.0266					
NA	-0.4605	-0.2167	-0.4607	1			
	0.0000	0.0002	0.0000				
LEV	-0.5831	-0.2965	-0.6048	-0.3455	1		
	0.0000	0.0002	0.0000	0.0000			
F-size	0.139	0.069	0.143	0.065	-0.231	1	
ROA	0.0195	0.0152	0.0389	0.0379	-0.0413	-0.0413	1
	0.7419	0.7973	0.5118	0.5223	0.4863		

.3048537, 72.33739 and .8842953 respectively, all having a high degree of dispersion. The mean value for unconditional conservatism is -.2368492 while the deviation from the mean is 8.105842. The minimum and maximum values for conservatism are respectively -119.6184 and 64.24893.

The correlation coefficient represents the linear association relationship or between two variables; explained and explanatory and also between the explanatory variables themselves. The correlation matrix is designed to show whether there is a relationship between the IVs and DV. This table of values indicates that GETR has a negative relationship with NA to the tone of 46% and is significant at 5% level of significance. This implies that an increase in the level of GETR will result in a decrease by 46% of conservatism. Also the relationship between CETR and NA is negative at 21.67% but significant at 5% level of significance indicating that any increase in CETR will result in a corresponding decrease in NA by 21.67%. The relationship between BTD and NA is negative at 46% and significant at 5% level of significance. The relationship between ROA and NA is positive at 38% but insignificant at 5%, while that of leverage is negative at 35% but significant at 5%.

Regression Results

This section discusses the regression result of unconditional accounting conservatism on tax avoidance. Unconditional accounting conservatism was regressed separately on the three independent variables.

NA	coefficient	Τ	P-values
GETR	0264629	-4.58	0.000
FS	137063	-2.36	0.019
LEV	1045046	-2.32	0.021
ROA	.5594091	2.18	0.030
Constant	1.448071	2.32	0.021

Unconditional Accounting Conservatism and GETR

R²=0.7806

$NA = 1.448071 + \beta_1(.0264629) + \beta_2(.137063) + \beta_3(.1045046) + \beta_{4.5594091}$

This implies that GETR, FS and LEV have a negative effect on NA, while ROA has a positive effect on NA. The table future shows that GETR. FS and LEV will influence NA to the tune of 2.6%. 13.7% and 10.5% respectively as such any increase in any of these variables will lead to a corresponding fall the level of NA by their respective percentages. ROA influences NA to the tune of 55.9%. The above table shows that there is a negative but significant relationship between GETR, FS and LEV at 5% level of significance. This is evidence in the respective coefficient values of -.0264629, -.137063 and -.1045046, T-values of -4.58, -2.36 and -2.32 and P-values of 0.000. 0.019 and 0.021. The above regression result also shows that ROA has a positive significant relationship with NA at 5% level of significance. This is evidenced as portraved by the respective coefficient. T and P-values of .5594091, 2.18 and 0.030. The R^2 which is the multiple co-efficient of determination gives the percentage or proportion of total variation in the dependent variable explained by the independent and control variables jointly. Hence the result of R² value of 78.06% indicates that the total variation in NA is caused jointly by GETR, FS, ROA and LEV while the remaining 21.94% is caused by other factors other than those captured in this model.

Unconditional	Accounting	Conservatism	and CETR
		O . O T	

NA	Coefficient	Τ	P-values
CETR	-1.563266	-1.02	0.309
FS	125567	-1.48	0.139
LEV	0505629	-0.81	0.420
ROA	.7042689	3.02	0.003
Constant	1.39573	1.66	0.098

R²=0.2209

$NA = 1.39573 + \beta_1(.125567) + \beta_2(.125567) + \beta_3(.0505629) + \beta_4.7042689$

This table portrays that CETR, FS and LEV all have negative effect on NA, while ROA has a positive relationship with NA. The table further shows that CETR, FS and LEV influence NA to the tune of 156%, 12.6% and 5.1% respectively as such any increase in any of these variables will lead to a corresponding fall the level of NA by the respective percentages. However the relationship portraved above is insignificant for all the variables at 5% level of significance as show by the respective T and P-values. ROA influences NA positively to the tone of 70.4% and is significant at 5% level of significance as shown by the respective T and P-values of 3.02 and 0.003.

The R^2 which is the multiple co-efficient of determination gives the percentage or proportion of total variation in the dependent variable explained by the independent and control variables jointly. Hence the result of R^2 value of 22.09% indicates that the total variation in NA is caused jointly by CETR, FS, ROA and LEV while the remaining 77.91% is caused by other factors other than those captured in this model. This shows that BTD, FS and LEV are all negatively associated with NA, while ROA is positively associated with NA. The further shows that BTD, FS and LEV influence NA respectively to the tune of 58.7%, 15.9% and 11.1%, as such, any increase in any of these variables will lead to a corresponding fall the level of NA by the respective percentages. The relationship is also significant at 5% level of significance as shown by the respective values of T and P in the above table.

The R^2 which is the multiple co-efficient of determination gives the percentage or proportion of total variation in the dependent variable explained by the independent and control variables jointly. Hence the result of R^2 value of 82.58% indicates that the total variation in NA is caused jointly by BTD, FS, ROA and LEV while the remaining 17.42% is caused by other factors other than those captured in this model.

Unconditional Accounting Conservatism and BTD

Table 5: NA= $a_0+\beta_1BTD_{it}+\beta_1BTD_{it}$	$h_{2}ROA_{i}+\beta_{2}I_{F}V_{i}+\beta_{4}FS_{i}+\rho_{4}$
$a_0 + D_1 D_1 D_1 D_1 D_1 D_1 D_1 D_1 D_1 D_1$	$\mathbf{D}_{\mathbf{Z}}$ $\mathbf{N}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$ $\mathbf{D}_{\mathbf{M}}$

NA	Coefficient	Т	P-values
BTD	5873011	-5.27	0.000
FS	158914	-2.66	0.008
LEV	1105946	-2.74	0.007
ROA	1.080402	3.90	0.000
Constant	1.657473	2.61	0.009

R²=0.8282

$NA=1.657473+\beta_1(.5873011)+\beta_2(.158914)+\beta_3(-.1105946)+\beta_{41.080402}$

Test of Hypothesis

Hypothesis 1: Ho1: GAAP ETR does not have any significant effect on the degree of accounting conservatism.

The general assumption under the test procedure is that when P-value is ≤ 0.05 ; the null proposition is rejected else the study fails to reject the null proposition if P-value is ≥ 0.05 . From the result of the regression model, P-value is estimated to be 0.000 indicating that a statistically significant relationship can be inferred from the interaction of variables considered. It therefore means that the null hypothesis fails to stand as such the study accepts the alternate hypothesis. Therefore GAAP ETR has significant effect on the degree of accounting conservatism.

Hypothesis 2: Ho2: CASH ETR does not influence the degree of accounting conservatism.

It can be inferred from the regression model that with a P-value 0.309 there is there is statistically no significant relationship between CETR and NA reason being that the P-value of 0.309 exceeds 0.05 alpha level of significance. This translates to the study failing to reject the null hypothesis. From the forgoing the null hypothesis is not rejected meaning that CASH ETR does not influence the degree of accounting conservatism.

Hypothesis 3: Ho3: Tax motivated conservatism is less prevalent for the firms with high book-tax conformity.

The regression result for this hypothesis shows a P-value of 0.000 which is less than the alpha value of 0.05 significance indicating that there exists a significant relationship as such the null hypothesis Tax motivated conservatism is less prevalent for the firms with high book-tax conformity is invalidated. This implies that Tax motivated conservatism is prevalent for the firms with high book-tax conformity.

Conclusions and Recommendations After careful review of the results and discussion, as well as relevant literatures, the Study concludes that:

i. GETR used as a proxy of tax avoidance has a negatively significant effect on unconditional conservatism. This translates to that the higher the GETR the lower the degree of conservatism; this implies that conservative firms have low GETR.

ii. The study concludes that CETR does not influence the degree of accounting conservatism and the relationship is not negatively insignificant. As such conservative firms need not pay attention to CETR but to other factors that affect conservatism.

iii The study finally concluded that Tax motivated conservatism is prevalent for the firms with high book-tax conformity and the relationship is negatively significant. This simply means that the higher the degree of conformity between book income and taxable income the lower the level of conservatism. As such conservative firm should lower the degree of conformity between book and taxable income.

Based on the conclusions mentioned above, the following recommendations are made:

i. The government should through its relevant agencies identify loop holes in tax legislation and develop and implement relevant complementary laws to checkmate such loop holes to ensure loss of revenue through various avoidance techniques are discouraged. ii. The government should identify appropriate mediums through which firms can be enlightened on the political and reputational cost of tax avoidance and its negative effect on firms.

iii. Regulatory agencies should also look into the concept of conservatism with the aim of limiting management's ability to discretionally utilize the concept at the expense of other stakeholders.

Our conclusions may not be generalisable to countries with lower level local GAAP that inhibit conservatism in their financial reporting. In addition, the study used only unconditional conservatism as the measure for accounting conservatism, future studies can utilise conditional conservatism as a measure of accounting conservatism. The study also only used GETR, CETR and BTD as proxies for tax avoidance, future studies can operationalize cash taxes paid/operating cash flow, Income tax expense/operating cash flow, Long-run cash ETR.

References

Basu, S. (1997). The Conservatism Principle and the Asymmetric Timeliness of Earnings. Journal of Accounting and Economics, 24(1), 3-37.

Bornemann, T., (2018). Tax Avoidance and Accounting Conservatism. WU International Taxation Research Paper Series, No. 2018 – 04.

Desai, A. M & Dharmapala, D (2005). Corporate tax avoidance and firm value. National Bureau of Economic Research 1050 Massachusetts Avenue Cambridge, MA 02138 March 2005.

Gan, Z. (2018). Conditional Conservatism and Tax Avoidance. Unpublished M.Sc Dissertation. Eramus School of Economics, University of Rotterdam Givoly, D. and C. Hayn. (2000). The changing time-series properties of earnings, cash flows and accruals: Has financial reporting become more conservative? Journal of Accounting & Economics 29(3): 287-320.

Khan, M., & Watts, R. L. (2009). Estimation and empirical properties of a firm-year measure of accounting conservatism. Journal of Accounting and Economics, 48(2), 132–150. https://doi.org/10.1016/j.jacceco.2009.08.002

Purwantini, H. (2017). Minimizing Tax Avoidance by Using Conservatism Accounting Through Book Tax Differences (Case Study in Indonesia). International Journal of Research in Business and Social Science, 6(5), Special Issue 2017 ISSN: 2147-4486

Yuniarsih, N. (2018). The effect of accounting conservatism and corporate governance mechanism on tax avoidance. Academic Research International, 9(3).