

IMPACT OF E-TAX ON REVENUE GENERATION IN NIGERIA

Babatunde, Dorcas Adebola¹

Akinsanmi, Fatima Jummai Shawai²

^{1,2}Federal University Oye-Ekiti, Nigeria

Citation: Babatunde, D.A. & Akinsanmi, F.J.S. (2021). Impact of e-tax on revenue generation in Nigeria. KIU Interdisciplinary Journal of Humanities and Social Sciences, 2(2), 302-312

ABSTRACT

This study examined the impact of E-tax on revenue generation in Nigeria. the objectives of the study includes to: to examine effect of tax reform attitude on the revenue generation in Nigeria development, to examine the impact of manual method of tax collection on Nigeria internal revenue generation, to examine the tax pay usefulness of e tax on the revenue generation.

The method of data analysis adopted includes the use of linear regression and analysis of variance (ANOVA) in order to determine on the relationship between the independent and dependent variables. Regression analysis is a statistical process for estimating the relationships among variables. It includes many techniques for modeling and analyzing several variables, when the focus is on the relationship between a dependent variable and one or more independent variables. The study showed that Nigeria captured more people into the tax net as there was a continuous increase in taxpayers' cumulative growth (more than 20% each year); and found that the primary source of revenue generation in Nigeria was the internally generated revenue (IGR) in which tax revenue constituted about 80%. The result also showed that, on trend, between 1999 and 2005, there was no noticeable increase in revenue generated from tax; but from 2006, there was a sharp, steady and noticeable increase in the tax revenue generated. On the pattern of tax administration in the state, from 2006 the state concentrated more on Electronics tax with less dependence on other sources of internal revenue generation. The result further revealed that there was a long run relationship between the Electronics tax and revenue generated in Nigeria; thus, the Electronics tax had positive and significant effect on the revenue structure in Nigeria. The study concluded that Electronics tax had significantly contributed to revenue generation.

Keywords: e-tax, revenue generation, taxation

INTRODUCTION

Tax is a compulsory levy or financial charge imposed on a taxpayer or upon his property by the government to provide security, social amenities and other amenities for the well-being of the society. The main purpose of taxation is to raise funds to defray the expenses incurred for the common interest of the country without reference to special benefit conferred. The tax system usually involves a tripartite aspect, namely the policy, the tax laws, and the tax administration.

Copyright© 2021 by authors; licensee KIJHUS. This article is an open access article and can be freely accessed and distributed. In a bid to improve tax compliance, the Federal Inland Revenue Service (FIRS) decided to go online, hence, introducing the Integrated Tax Administration System (ITAS). Electronic-Tax pay system is an online self-service tax payment system which gives taxpayers the opportunity to pay their taxes through their banks' online payment portals. It is an initiative of FIRS in collaboration with the (NIBSS) Nigerian Interbank Settlement System Abdallah, (2006). It is meant to facilitate payments of taxes from the comfort of taxpayers' offices or homes. The role of electronic tax system is to enhance revenue generation and to find out whether the system is functioning as intended.

Over the years, revenue derived from taxes has been very low and no physical development actually took place, hence the impact on the poor is not being felt. Inadequate tax personnel, fraudulent activities of tax collectors and lack of understanding of the importance to pay tax by tax payers are some of the problems of this study. The issues mentioned above will therefore constitute the problem to be addressed by this research work. Despite all effort by the government over the year to track down most of these obvious problems and crisis facing the collection of tax in Nigeria. It is on the basis of these that the study is considered essentials attempt to fill these literature gaps by taking electronic tax system as a means of stimulating revenue generation in Nigeria

The primary objective of this study is to examine the effect of electronic tax payment on revenue generation in Nigeria The specific objectives are to:

- examine effect of tax reform attitude on the revenue generation in Nigeria
- examine the impact of manual method of tax collection on revenue generation in Nigeria
- examine the tax pay usefulness of e tax on the revenue generation in Nigeria

From the above, the researcher intends to analyze these problems and to study electronic taxation as a means to boost revenue generation.

REVIEW OF RELATED LITERATURE

Concept of Taxation

Taxation is a major source of government revenue all over the world and governments use its proceeds to render their traditional functions, such as: the provision of goods, maintenance of law and order, defense against external aggression, regulation of trade and business to ensure social and economic maintenance (Edame & Okoi, 2014). A system of tax avails itself as a veritable tool that mobilizes a nation's internal resources and it lends itself to creating an environment that is conducive for the promotion of economic growth (Ayuba, 2014). Therefore, tax plays a major role in assisting a country to meet its needs to promote self-

reliance. The need for tax payments has been a phenomenon of global significance as it affects every economy irrespective of national differences (Oboh & Isa, 2012).

E-Taxation E-tax charge is the cycle of collection and organization of duty procedure through an electronic medium. Ayodele (2007) defined e-payment as electronic transfer of cash via online transactions for business-to-business, business-to consumer, person-to-person, and most recently administration to-consumer purposes. Administration-to-consumer payment addresses the payment of taxes toward the government. Delal (2010) in Vassiliou (2004) defined electronic payment as a form of financial exchange that takes place between the buyer and seller facilitated by means of electronic communication.

Electronic Tax filing system

According to Mumonge (2011), Electronic tax filing, or e-filing, is a system for submitting tax documents to a revenue service electronically, often without the need to submit any paper documents. Electronic tax filing systems are an e-government application that is being utilized with increasing frequency all over the world. The Federal Inland Revenue Service (FIRS) embarked on an Integrated Tax Administration System (ITAS) project in 2013. ITAS is aimed at enhancing tax administration and simplifying the tax compliance process in Nigeria through the use of technology.

Revenue Generation

Etuk-udo (1973), defined revenue as an income from both the fixed asset and current asset. He further state the main reason for decentralization is anchored on allocation sharing or efficiency grounds so it is possible to advance argument for decentralization in Nigeria where there are many ethnic groups. Oates (1993) contends that "there are surely reasons, in principle to believe that policies formulated for the provision of infrastructure and even human capital that describe fixed asset as an asset which is expected to last more than one year and it is for future benefit, the current asset as it is defined by Etuk-udo (1973) means those assets that last for less than a year and can be converted to cash immediately. The Longman dictionary of contemporary English (1995), defined revenue as money that a business or an organization receives over a period of time especially from selling goods or services. It also described revenue as money that government received from tax. Advance learning dictionary of current English (1992), defined revenue as the total annual income of the state collected for public use. It further described it as income, derived from taxation.

E-Tax Payment and Revenue Generation

The need for tax payments has been a phenomenon of global significance as it affects every economy irrespective of national differences. Tax payment is not for the direct exchange of good and/or services but a transfer of resources and income from the private sector to the public sector in order to achieve some of the nation's economic and social goals (Nnubia, et al., 2020;Okpe, 2000). Such goals may be in for of high level of employment, stable prices,

rapid growth of gross national product, favourable balance of payments position, promotion of a free market economy, satisfaction of collective demands, equitable income redistribution, promotion of infant industries, the encouragement of priority sector, encouragement of balance population development and promotion of labour and capital development (Onoh, 2013). Allahverd, Alagoz and Ortakapoz (2017) examining the effect of e-taxation system on tax revenue and cost in Turkey revealed that the transition to the electronic tax system positively affected the tax revenues and reduced the cost per tax. In America, Pippin and Tosun (2014) observed that the rates of e-filling are noticed to be lower in rural communities with low population and with a lower share of females, surprisingly, educational attainment is negatively correlated with e-filing rate and growth in e-filing; whereas in Nigeria, the regression result indicated by Okafor (2012) revealed a very positive and significant relationship between the components of tax revenue and the growth of the Nigeria economy.

Theoretical Framework

The study is grounded upon the Technology Acceptance Model and Theory of Plan Behavior. Technology acceptance model was propounded by Davies (1989) the theory was later modified by Venkatesh and Bala in 2008, states that an individual's intention towards using a new system is determined by perceived usefulness, and perceived ease of use (PEOU), ""the degree to which the user expects the target system to be free of effort and more so help to increase the degree of efficiency and effectiveness of performance.

The theory of planned behavior (TPB) is a psychological theory that links beliefs to behavior. The theory maintains that three core components, namely, attitude, subjective norms, and perceived behavioral control, together shape an individual's behavioral intentions. In turn, a tenet of TPB is that behavioral intention is the most proximal determinant of human social behavior has been applied to studies of the relations among beliefs, attitudes, behavioral intentions, and behaviors in various human domains. These domains include, but are not limited to, advertising, public relations, advertising campaigns, healthcare, sport management, and sustainability.

Empirical Review

Wang ,(2016) in his study mentioned about adoption of electronic tax filing systems. This paper discusses the elements affecting the adoption of electronic tax-filing systems. Using the technology acceptance model (TAM) as a theoretical framework, the study introduced "perceived credibility" as a new factor that reflects the user's intrinsic faith in the digital tax filing systems. The findings of the learn about supplied important implications for growing wonderful digital authorities offerings in well-known and fantastic electronic tax-filing structures in particular.

Lai (2008) examined the effect of e-filling on revenue generation in Malaysia; it revealed the extent to which tax revenue generation has contributed towards the economy's revenue and Gross Domestic Product and also the effect of tax evasion and tax avoidance on revenue generation in Malaysia. The study employed both primary and secondary sources of data. Using a survey research design, both descriptive and regression analysis were carried out on the data. Findings from the study revealed that taxation has a significant contribution on revenue generation, taxation has a significant contribution on Gross Domestic Product (GDP) and tax evasion and tax avoidance have a significant effect on revenue generation in Malaysia. Nasir (2015) examined implementing electronic tax fillings and payments in Malaysia; the main objective was to point out the benefits of maintaining a good e-tax system as opposed to a manual system. The study made use of secondary data from Malaysian Inland Revenue report from 2004 to 2011 using trend analysis to highlight the increase in tax returns since the adoption of an e-tax system in 2004.. Allahverd, Alagoz, and Ortakapoz (2017) examined the effect of e-taxation system on tax revenue and cost in Turkey, the study used secondary data gotten from the Turkish revenue authority, the data were examined in two groups which are pre-electronic tax period of 1993-2004 and post-electronic tax period of 2005-2016. Mann-Whitney U Test was used to analyze the data. The research also provided information on the electronic transformation of the tax system and the Turkish Tax System. According to the empirical result of the research, the transition to the electronic tax system positively affected the tax revenues and reduced the cost

RESEARCH METHODOLOGY

Research Design

An ex-post facto research design was used for the purpose of this study. This was adopted basically, because the study focuses on phenomenon that has already taken place.

Sources and Instruments of Data Collection

The study relied heavily on primary source of data. Primary data used in the study was sourced 100 respondents selected from Nigeria Internal Revenue Service.50 male respondents are from Ado Ekiti and 50 Female also in Ado Ekiti. The choice of this frame is informed by the fact that both Ado Ekiti and ikere Ekiti fall in PPT having the largest population and concentration of big business in the state.

Research Population and Sample Size

The study was conducted on revenue generation of Nigeria . From 2013-2017 was selected because the reports must have been fully prepared based on tax compliance.

Techniques of Data Analysis and Justification

The method of data analysis adopted includes the use of linear regression and analysis of variance (ANOVA) in order to determine on the relationship between the independent and

dependent variables. Regression analysis is a statistical process for estimating the relationships among variables. It includes many techniques for modeling and analyzing several variables, when the focus is on the relationship between a dependent variable and one or more independent variables.

Method of data collection

Method employed in Carrying out this research work was by primary data. Primary data is the name given to data that have been sourced for through the use of questionnaires. Primary data is generally used when the term manpower resources necessary for survey are not available and of course the relevant information required. Primary data were gotten from sources like questionnaire, interviews etc.

Model and Model Specification

Model Specification

Dependent Variable: Tax returns (TR) Independent Variable: IT = Illiteracy LT = Lateness

AH = Attitude RG= α + β AH+ β to μ + β μ st+£......1

RG= Xi+X2+X3+£.....2

Where α = Consatnt, AH = X1, LT = X2, CT = X3 and f =beta (B) values

Where the average of the items measuring illiteracy, lateness, cost in the questionnaire were used to represent the variables.

RESULTS

The factors utilized in this investigation as determined in the model details are revenue generation (proxy by Revenue Mobilization (RM), Personal income tax (PIT), value added tax (VAT) and petroleum profit tax (PPT). The assessment was upheld utilizing regression of Ordinary Least Square (OLS) strategy, through the assistance of E-view 8.1. The rundown of the examination result and its comparing understandings of the impact of e-tax assessment on income generation in Nigeria follow the presentation of data.

Table 1: Descriptive statistic

Descriptive Statistic

Variable	RM	PPT	VAT	CIT
Mean	1313.129	281.2403	203.2241	9.223885
Median	1276.380	297.3369	221.3805	0.825800
Maximum	1911.710	501.6561	269.7938	72.59310
Minimum	778.1935	65.28760	56.39900	0.110600
Std. Dev.	320.8294	129.3164	68.95271	20.21305
Skewness	0.464178	0.142580	-1.304348	2.648504
Kurtosis	2.635592	2.157827	3.520000	8.774530
Jarque-Bera	0.538762	0.428227	3.832670	33.26022
Probability	0.763852	0.807257	0.147145	0.000000

Sum	17070.67	3656.123	2641.914	119.9105
Sum Sq. Dev.	1235178.	200672.7	57053.72	4902.807
Observations	13	13	13	13

Source: E view 10 Output

Bar Chart Result

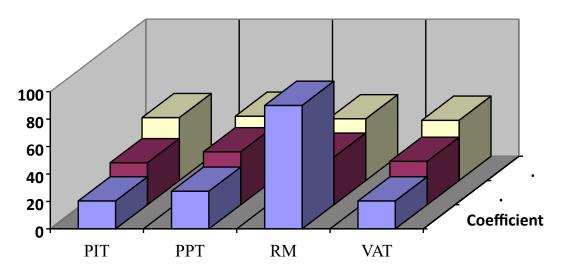


Table above shows the mean (average) for each variable, their maximum values, minimum values, standard deviation. The result provides some insight into the nature of the effect post e-taxation on revenue generation in Nigeria. Firstly, it was observed that over the period under review, the post e-taxation have positive average revenue generation (RM) of 1313.129. The mean of company income tax (PPT) is 281.2403; this also means that the revenue generation has an optimistic company income tax in the period under study. The Table above also discloses that a positive average value of 203.2241 and 9.223885 for value added tax (VAT) and petroleum profit tax (PPT). These values mean that within the period under review, the post e-taxation meet up 1313.129 on the average within the period under review. The maximum value of company income tax is 501.6561 and its minimum value is 65.28760. The maximum value of value added tax is 269.7938 and its minimum value is 56.39900, and maximum value for petroleum profit tax is 72.59310 and its minimum value is 0.110600. The large variances between the maximum and minimum value indicates that the data used for the study are homogeneous.

Table 2: Co-integration Rank Test

Date: 11/19/21 Time: 10:53		
Included observations: 13 after		
adjustments		
Trend assumption: Linear deterministic tre		
Series: RM PIT PPT VAT		

Lags interval (in first differences): 1 to 1						
Lags IIItel vai (II	i ilist dillerence	25). 1 (0 1				
Unrestricted						
Cointegration						
Rank Test						
(Trace)						
(1122)						
Hypothesized						
No. of CE(s)		Trace	0.05			
140. 01 62(3)	Eigenvalue	Statistic	Critical	Prob.**		
	Ligerivatae	Statistic	Value	1100.		
None *						
At most 1	0.700997	74.39975	69.81889	0.0206		
At most 2	0.524910	40.59526	47.85613	0.2019		
At most 3	0.318709	19.75623	29.79707	0.4395		
At most 4	0.220533	9.010769	15.49471	0.3644		
	0.070091	2.034718	3.841466	0.1537		
Trace test						
* denotes reje	ction of the hyp	othesis at th	ne 0.05 level			
**MacKinnon-	Haug-Michelis	(1999) p-valu	ıes			
Unrestricted						
Cointegration						
Rank Test						
(Maximum						
Eigenvalue)						
Hypothesized						
No. of CE(s)		Max-Eige	0.05			
		n				
	Eigenvalue	Statistic	Critical	Prob.**		
	J		Value			
None						
At most 1	0.700997	33.80449	33.87687	0.0510		
At most 2	0.524910	20.83903	27.58434	0.2861		
At most 3	0.318709	10.74546	21.13162	0.6727		
At most 4	0.220533	6.976050	14.26460	0.4920		
	0.070091	2.034718	3.841466	0.1537		

Max-eigenval					
ue test * denotes rejection of the hypothesis at the					
0.05 level					
**MacKinnon-Haug-Michelis (1999) p-values					

Source: E-views 10 Output

FINDINGS AND CONCLUSIONS

Based on the analysis results, the following findings were drawn;

- The result shows that Personal Income Tax (PIT) contributes to total tax revenue of the government
- The study also revealed that Petroleum Tax (PPT) contributes to the Gross Domestic Product of the government.
- Value Added Tax (VAT) revenue has impact on the actual VAT within the period of study.

Conclusion

This work is an attempt to empirically analyze and investigate the impact of e-tax on revenue generation in Nigeria, using the ordinary least squares regression model (OLS) in examining the variables in our hypothesis. The empirical result shows that the e-tax has a positive significant impact on revenue generation in Nigeria. The findings also revealed the following:

- Electronic tax has a positive and significant impact on total revenue in Ekiti; and by extension on the economic growth and development of the State.
- Total revenue growth over the period also has significant impact on economic growth as proxy by Gross Domestic Product of the state

Hence, we can conclude therefore that electronic tax is the best of the entire tax system in Nigeria and it has significant impact on the economic growth of Nigeria. It has greatly contributed to the total revenue of this nation by reducing tax evasion by many people.

REFERENCES

Adereti, S. A., Sanni, M. R., & Adesina J. A. (2011). Value added tax and economic growth of Nigeria. *European Journal of Humanities and Social Sciences*, 10(1), 456-471.

Afuberoh, D. & Okoye, E. (2014). The Impact of Taxation on Revenue Generation in Nigeria: A Study of Federal Capital Territory and Selected States. *International Journal of Public Administration and Management Research (IJPAMR)*, 2(2), 22 – 47. Website: http://www.rcmss.com.

- Akwe, J. A. (2014). Impact of non-oil tax revenue on economic growth: The Nigerian perspective. International Journal of Finance and Accounting, 3(5): 303-309. DOI: 10.5923/j.ijfa20140305.04
- Allahverd, M., Alagoz, A. & Ortakapoz, M. (2017). Effect of e-taxation system on tax revenue and cost in Turkey, *European Journal of Social Sciences*, 9: 100-150.
- Anyaduba, J.O., (2004). Partnership Taxation in Nigeria. ICAN Student Journal, 9(2): 15-17.
- Barati, A. & Bakhshayesh, S. (2015). Electronic tax system and the challenges facing kermansah province tax payers in Iran, *Indian Journal of Fundamental and Applied Life Sciences*, 5(S1): 480-497.
 - Brautigam, D., (2008). Taxation and Governance in Africa. AEI online. Available from http://www.aei.org/publication/taxation-and-governance-in-africa
 - Che-Azmi, A. A. & Kamarulzaman, Y. (2014). Adoption of tax E-filing: A conceptual paper. *African Journal of Business Management*, 10(1): 599-603.
 - Musgrave, R. A. and Musgrave, P. B. (2004). *Public finance in theory and practice*. New Delhi, India: Tata McGraw Hill.
 - Nasir, (2015) Implementing electronic tax fillings and payments in Malaysia. *Journal of Accounting and Economics*, 17(2): 41-67.
 - Ngerebo, T. A., and Masa, A. (2012). Appraisal of tax system in Nigeria: A case of value added tax. *Research Journal in Organizational Psychology and Education Studies*, *1*(6): 338-344.
 - Nnubia, I. C. and Obiora, F. C. (2018). Effect of Tax Incentives on Economic Growth in Nigeria. *CARD International Journal of Social Sciences and Conflict Management*, 3 (2), 141-159.
 - Nnubia, I. C., Okafor, G. O., Chukwunwike, O. D., Asogwa, O. S. and Ogan, R. J. (2020). Effect of ETaxation on Revenue Generation in Nigeria: A Pre-Post Analysis. *Academy of Entrepreneurship Journal*, 26(3), 1-19.
 - Nnubia, I. C. and Okolo, M. N. (2018). Effect of Corporate Tax on Profitability of Business Organizations in Nigeria. *CARD International Journal of Management Studies, Business & Entrepreneurship Research*, 3(4), 14-23.
 - Nnubia, I. C. and Okorie, J. N. (2016). Personal Income Tax (Amendment) Act 2011: Effects on personal income of employees in Nigeria. *Journal of the Literati Philosophia (JOLP)*, 3(2), 85-90.
 - Nwaorgu, I.A. and Nnubia, I. C. (2016). A Comparative Analysis of Personal Income Tax Act 2004 and 2011:
 - Effects on Personal Income of Employees in Nigeria. *Nigerian Journal of Management Sciences*, 5(2), 231-239.
 - Oboh, C. S., & E. F. Isa (2012). An Empirical Investment of Multiple Tax Practices and Taxpayer's Compliance in Nigeria (Unpublished Research Work).
 - Ogbonna G.N and Ebimobowei A, (2012). Impact of tax reforms and Economic Growth of Nigeria: Time Series Analysis. *Current Research Journal of Social Sciences 4(1) 62-68*.
 - Ojong, C. M., Ogar, A. & Oka F. A. (2016). The Impact of Tax Revenue on Economic Growth: Evidence from Nigeria. *IOSR Journal of Economics and Finance (IOSR-JEF)*, 7(1), 32 38. <u>www.iosrjournals.org</u>
 - Okafor, G. T. (2012). "Revenue Generation in Nigeria Through E-Taxation" *European Journal of Economics, Finance and Administrative Sciences ISSN 1450-2275 Issue 49 (2012)* © *EuroJournals, Inc. 2012* Okpe, I. I. (2000). *Personal income tax in Nigeria*. Enugu: Ochumba Printing and Publishing Company.
 - Okunowo A. O. (2015). FIRS introduces E-filing Tax System in Nigeria. Website: https://www.linkedin.com/pulse/firs-introduces-e-filing-tax-system-nigeria-okunowo-a obafemi/

- Ola, C. S. (2001). *Income tax law and practice in Nigeria*, 5th edition. Ibadan: Dalag prints and Part
- Olaoye, C. O. &O. O. Atilola (2018). Effect of E-Tax Payment on Revenue Generation in Nigeria. Journal of Accounting, Business and Finance Research, 4(2), 56 – 65.
- Oluba, M.N. (2008): "Justifying Resistance to tax payment in Nigeria", Economic Reflections Volume B, No 3, April.
- Omotoso, M. 0. (2001). Principles of taxation. (1st ed.) Ibadan: DFirst Shepherd Investment.
- Onaolapo, A. A., Aworemi, R. J. and Ajala, O. A. (2013). Assessment of value added tax and its effects on revenue generation in Nigeria. *International Journal of Business and Social Science*, 4(1), 220-225
- Onoh, J. K. (2013). *Dimensions of Nigerian monetary and fiscal policies- Domestic and external*. Aba: Astria Meridian Publishers
- Piana, V., (2003). Tax revenue. Economics Web Institute. Available fromhttp://www.economicswebinstitute.org/glossary/tax
- Pfister, M., (2009). Taxation for Investment and Development: An overview of policy challenges in Africa. Ministerial Meeting and Expert Roundtable of the NEPAD OECD Africa Investment Initiative on November 11-12
- Pippin, S. & Tosun, M. (2014). Electronic tax filing in the United States: An analysis of possible success factors. *Electronic Journal of e-Government, 12(1): 22-38.*
- Wasao, D. (2014). The effect of online tax system on tax compliance among small taxpayers. University of Nairobi.