

# **THE INFLUENCE OF PERCEPTION AND ATTITUDE ON TAX COMPLIANCE: EVIDENCE FROM SMALL AND MEDIUM SCALE ENTERPRISES TAXPAYERS IN GHANA**

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## **Abstract**

*The study evaluated the influence of perceptions and attitude of Small and Medium Scale Enterprises (SMEs) taxpayers on the tax authority and its effects on tax compliance in Ghana. A questionnaire based on a 5 point Likert scale ranging from 1-strongly disagree to 5-strongly agree was used to collect data from a sampled 275 SMEs respondents who are on the database of the Small Tax Office Unit of Ghana Revenue Authority (GRA) in Greater Accra Region and the data collected were analyzed via the Structural Equation Modelling (SEM) approach, using Partial Least Squares (PLS) technique. The findings supported the opinion that perceived effectiveness and perceived procedural fairness of the tax authority on compliance behaviour is statistically significant. By an extension, non-compliant behaviour will decrease as the taxpayer gain a more favourable perception about the tax authorities' effectiveness and procedural fairness. The study outcome provides some insight in addressing tax noncompliance problems among the informal sector in Ghana; hence provide insightful information to the authority in addressing tax compliance issue.*

*Keywords: Tax Compliance Behaviour, Tax Compliance Intention, Tax Authority, SMEs*

## **INTRODUCTION**

The growing over-reliance on foreign support to finance a budget deficit especially in the developing economies is viewed as a threat to their economic and social independence. In fact, the deficit in tax revenues turns into an overall under-performance of domestic income. The effect is that governments will be more likely to cut its spending in order to keep its deficit target.

Such actions affect national developmental goals since most projects are left untouched. According to 2017 budget figure (MOF, 2017), in the 2017 fiscal year, the Government of Ghana's expected total revenue was estimated at GH¢44.9 billion as against a targeted expenditure of GH¢58.1 billion. This figure which represents 28.6% of GDP implies that tax revenue targets will be missed. The shortage in revenue as already discussed is a major concern as it is affecting the state's projected activities earmark to meet the expectation of its citizenry.

The small and medium scale enterprises (SMEs) sector in addition to making up 70% of the economy in Ghana, constitute about 80% of all businesses registered in Ghana (Frimpong, 2013) and employs about 71% of the total country workforce (Ghana Statistical Service, Report ,2017- Ghanaweb 2018). The predominant nature of SMEs and the economic and social contributions they make towards national growth and development make the sector most appealing as one of the leading revenue generating centres for government to boast its domestic revenue, yet information available contradicts this preposition. Evidence from the World Bank (2015) report for the period 2005 to 2011 revealed that the sector has contributed on average 14.68% of its tax revenue to GDP. Within Sub Saharan Africa (SSA), tax revenue to gross domestic product (GDP) is only 15% compared with 35% in the OECD countries (OECD, 2010).The Minister of Finance Mr. Ken Ofori Attah, Speaking at the opening ceremony of the 38<sup>th</sup> annual Commonwealth Association of Tax Administrators (CATA), conference in Accra indicated that, the country's current tax to GDP ratio is a woeful 16% compared with the required standard GDP ratio of about 22% to 25%. Given the dominant posture of the SMEs in our economy, it is easy to attribute the poor performance of our tax revenue to high tax non-compliance in the informal sector.

Although non-compliance is prevalent in the developing countries (Fagbemi, Uadile & Noah (2010) , it appears worse in the informal sector (Seidu *et al.*, 2015 and Gbadago & Awunyo-Vitor, 2015) As a result, effort to reduce the gap through improvement in a domestic revenue mobilisation drive is an important policy decision that has to be embraced by all nations.

In Ghana, like in most developing countries, non-compliance with tax rules and regulations among businesses, especially those in the SMEs sector has been a daunting task for government and revenue agencies. The unformalised nature of the sector contributes to huge sums of tax revenue uncollected. It is therefore not surprising that, in spite of a very large informal economy, it is believed that out of the total of 1.2 million businesses that pay tax only 200,000 (16.6%) are from the informal sector. Indeed there is a reported wide spread of tax evasion and avoidance within the African continents (IMF, 2011).

The critical concerns that need addressing include, the revenue authority possible failure with respect to poor non-compliance detection rate (Nagin 2013), the possible authority perceived damaged trust and unfairness among taxpayers (Sellywati Mohd Faizal, Mohn Rizal Palil, Ruhanita Maelah and Rosiati Ramli, 2017) and or the perceived possibility that the tax authority has failed to provide atmosphere that would enhance taxpayers' awareness and desire to pay taxes willingly (Malima, 2013).

Indeed one is left with no accurate answers as to why in spite of the authority high tax education campaign drive among SMEs in Ghana, the sector per the views of Mr. Adogla, Assistant Commissioner at the Takoradi Medium Tax Office of Ghana Revenue Service (GRA), the country is still having 80% of businesses and individuals operators not paying tax (Ghana Business News, 2014).

A study on understanding the determinants of taxpayer compliance is pertinent and timely. Therefore this study will contribute to the debate in filling the research gap in areas of authority legitimacy, procedural fairness on deterrence measures, the authority effectiveness in detecting and punishing non-compliance taxpayers largely to improve taxpayer compliance (Ken Devos, 2013) by examining the influence of perception and attitude of SMEs taxpayers on the tax authority and its effects on tax compliance behaviour of SMEs using the theory of planned behaviour (TPB) proposed by Ajzen (1991): a proposition that is widely not discussed in Ghana.

The tax authority is chosen because often the blame is placed at the doorsteps of the officials of the regulator, in this case the GRA. Therefore, the researcher viewed the SMEs taxpayers and the tax authority as having the adequate information in assessing whether attitude and perception of taxpayers in the SMEs sector have on tax authority plays any role in the high non-compliance behaviour as reported by policy makers.

The structure of the study is as follows. After this introduction, the study organisation will be followed by literature review and hypotheses, research methodology, data analysis and findings, and ends with the discussion of findings, conclusions and limitations of the study.

## **LITERATURE AND HYPOTHESES**

### **The Concept and Definition of Tax Compliance**

Kirchler 2007, as cited in Mohd Rizal Palil and Ahmed Fariq Mustapha, 2011) took a simplistic and narrow view to define tax compliance as taxpayers' willingness to pay their taxes. Palil and Mustapha's (2011) position on tax compliance re-echoed the definition offered by Kircher (2007). However, Andreoni et al. (1998, cited in Mohd et al, 2011) came up with a deviant

position by looking at tax compliance beyond taxpayers' willingness to abide by tax laws to consider economics view with emphasis on allocation efficiency in discharge of tax obligations.

James and Alley (1999: 32, as cited in JM Rillstone - 2015) defined tax compliance by focusing on individuals and other taxable bodies willingness to act in accordance within the spirit, letter of tax law and administration devoid of the use of enforcement activity. Other authors (see Weber et al. 2014; Leviner 2009) have looked at tax compliance from avoidance and evasion angle.

Gangl, Hofmann, & Kirchler (2015) looked at tax compliance from the perspective of taxpayers motivational position and asserted that tax compliance has to be seen in harmony with the following (a) enforced motivation - Taxpayers unwillingly pay taxes for fear of audits and fines or hold the view that there is no alternative to compliance. (b) Voluntary Motivation - taxpayers' willingly pay taxes by adhering to due processes in terms of law and without complaint (c) committed motivation- taxpayers sees payment of tax as a moral issue.

Tax compliance has also been viewed as compliance in relation to administration and compliance in relation to one's ability to complete the tax returns (Harris 1989, as cited in Mohd et al, 2011).

Mohd et al, (2011) offered a comprehensive definition of tax compliance which the study will adopt as an envelope of taxpayers' willingness to obey tax laws, declare income accurately and timely, claim the correct deductions, relief and rebates and pay all due taxes promptly and in a timely manner

### **Influence of Perceived Legitimacy of the Tax Authority on Behavioral Intention**

Legitimate power (i.e. the power of accepted authorities), is argued by Gangl, K., Hofmann, E., & Kirchler, E. (2015) as more appropriate and effective in determining individuals' behaviour to comply than strict controls and punishment (i.e. audit and fines). This view is widely supported by Jackson et al., 2012a.

Gangl et al. (2013) and Hartner et al. (2011) asserted that legitimacy include power of position, provision of relevant information, knowledge and skills. They further revealed in their survey among taxpayers that legitimacy has a positive influences on tax compliance. Other studies (see Alm et al. 2010; Feld and Frey 2007; Wenzel 2002) pinpointed the relevance of authority legitimacy in tax compliance literature and further indicated that the influence of legitimacy on compliance is grounded on how the tax authorities appear to be transparent, fair, and participation to taxpayers.

Hofmann et al, (2014) attempted to offer some reasons why legitimate power increases tax compliance by suggesting that legitimacy has a direct effect on reason-based trust and hence has a high propensity to stimulate a service climate which assures voluntary cooperation by taxpayers. Hofmann et al, (2014) findings appear to be supported by Kogler et al. (2013) and Wahl et al. (2010) who concluded in their studies that compliance improves significantly whenever power and trust are perceived as high.

From the aforementioned literature (see Gangl et al.2013; Hartner et al. 2011; Alm et al. 2010) and other empirical studies (see e.g., Tyler, 1990; Reising et al., 2014; Tyler, 2010), there is an established fact that there is an association between the authority's legitimacy and compliance behaviour.

In this direction, one can infer that a negative opinion towards the tax authority legitimacy will decrease the taxpayer's intention to fulfil tax obligations and vice versa. This area has not been researched in Ghana; as a result, the study attempts to examine this relationship by hypothesizing as:

H1: Taxpayers positive perception of the tax authority's legitimacy has a positive influence on tax compliance behaviour.

### **Influence of Perceived Effectiveness of the Tax Authority on Behavioural Intention**

Perception and attitude measured in terms of the authority's efficiency and effectiveness in detecting and punishing non-compliance behaviour without fear or favour (late filings, delay in payment of tax due and imposition of sanctioning of non-tax payers) may deter taxpayers from engaging in practices that violate the tax laws and hence influence compliance behaviour. Indeed, taxpayers are more probable to develop strong intentions to obey the laws if their assessment of the authority in detecting manipulations through audit and enforcing the law is deemed effective. Deterrence theory assumed that laws discourage non-compliance if and only if there is a perceived probability (or threat) of penalties (Maciejovsky et al., 2001). It can be inferred from the deterrence theory that individuals with lawless behaviour and attitude would be more deterred only when they perceive the likelihood of wrong-doers or law breakers been caught and punished severely. In supporting this view, Andreoni, Erard and Feinstein (1998) and Nagin (2013) asserted that a high probability of detection and penalties will deter would-be offenders from violating laws. With this, if taxpayers will be assessing the authority and form an opinion with regards to the authority effectiveness in easily detecting and severely sanctioning non-compliant behaviour. A positive perception in this regard will influence compliance positively. The effectiveness and efficiency of the tax authority or tax administrators in deterring non-compliance behaviour have not been widely researched in Ghana, hence in examining the

predicted effects of perceived effectiveness of the tax authorities on taxpayer's compliance behaviour, the study hypothesis below as:

H2: Taxpayers perceived positive effectiveness of the tax authority will significantly influence tax compliance behaviour.

### **Influence of Perceived Procedural fairness Systems of the Tax Authority on Behavioural Intention**

Generally, equity considerations on the procedural impartiality of the tax authority have received a great deal of interest in most tax compliance literature. Procedural justice according to Thibaut & Walker (1975) is the perceived fairness of decision-making procedures.

Studies show that higher equity is a precursor to higher compliance behaviour (Torgler, 2007, OECD, 2012). The Process Model Regulation (PMR) posits that authorities' procedural fairness could promote law-abiding behaviour and hence make more individuals voluntarily compliant. This proposition is supported by Tyler (1990) who posited that legal authorities could discourage unlawful behaviour through the application of neutrality in procedural measures during their public engagement. It follows therefore that taxpayers who perceive the allocation of taxes and enforcement measures of tax authorities to be administratively and procedurally unbiased are expected to be less non-compliant (OECD, 2012). If taxpayers believe that the authorities who are to ensure fairness in the administration of taxes are bias towards other taxpayers by encouraging others to cheat or go unpunished when rules are violated, then obviously the culture of non-compliance will escalate as taxpayers will also be tempted to cheat (Bergman, 2002; Sandmo, 2005; Alm, 2012). This, in the view of Murphy (2009), leads to loss of trust and confidence in the authority, hence less tax compliant. This position was also supported by Jan-Willem van Prooijen, Marcello Gallucci and Gaby Toeset (2008) who argued that unfair treatment will make individuals infer that the authority regards them as marginal members and this has the tendency to decrease their willingness to cooperate and hence not compliant. Taxpayers who sense procedural fairness in the tax system tend to be more tax compliant (OECD, 2012). Therefore from the views of Thomas (2012) taxpayers' perception of the fairness of a tax system is key determinant factor for policy decision making.

Various empirical investigations (e.g. De Cremer, 2002; Tyler & Degoey, 1995; Tyler, Degoey, & Smith, 1996) have alluded to the fact that procedural justice envisages cooperation in groups which help to enhance taxpayers' perception of fairness in the administration of the tax system, thereby increasing in voluntary tax compliance. A position other research (see Kirchler et al., 2008; Andreoni et al., 1998) posited.

In Ghana, there are little or no studies on this point. This makes it difficult drawing conclusion about this relationship. In view of that, the current research will examine the question of whether the perceived (un)fairness can predict compliance. The study therefore hypothesized as:

H3: Taxpayers perceived fairness by the tax authority has a positive relationship with tax compliance behaviour.

### **Influence of Perceived Tax Service Quality Offered by the Authority on Behavioural Intention**

Service quality and satisfaction is measure within the service industry with a view to determine the influence the behavioral intentions of their customers (Saha & Theingi, 2009). And as Nor Khasimah Aliman & Wan Normila Mohamad, (2013) puts it people's perception of service quality is a major factors in determining the influence of attitude and behaviour intentions. Alm et al., (2010) looked at it from tax evasion angle and asserted that high levels of taxpayer services are most important and a positive means for dealing with tax evasion.

Service quality, defined by Jenkin and Forlemu (1993) as involving a set of measures the tax administration undertakes to help the taxpayers in conforming to tax laws. Researchers (see Alm et al., 2010; Ulrike Bauernfeind, Mayr & Zins; 2006) have established a positive relationship with compliance behaviour.

According to OECD (2007), the perception that taxpayers have with regard to the quality of tax service the tax authority renders will reinforce their willingness to conform to tax rules and regulations thereby influencing their compliance level. Alm et al. (2010) supported this position by indicating that increasing services by the authority to taxpayers enhances the taxpayers understanding of the tax law and hence leads to lower tax evasion and noncompliant behaviour. The interaction between the tax administration and taxpayers should be rearranged, with the tax authority providing respectful and service-oriented treatment to taxpayers. This view was supported by Saad's (2014) studies for New Zealand, in which it was inferred that cooperation between taxpayers and the authority reduce tax complexity issues and hence improve compliance.

Warrington et al. (2012) contributed to the discussion and opined that research on service quality must always incorporate the perspectives of both the provider and the receiver. Alabede, Affrin and Idris (2011) investigated the influence of perceived tax service quality on taxpayer's compliance behaviour in Nigeria and concluded a significant positive relationship between perceived tax service quality and tax compliance behaviour.

Therefore the authority service, in terms of provision of taxpayers assistance centres, workshops and other tax training by the authority, will enhance knowledge and confidence among tax payers and hence lead to compliance. This has not been widely researched in Ghana in order to offer any policy statement and direction on it. Thus, study hypothesised as:

H4: Perceived positive service quality of the authority has a positive relationship with tax compliance behaviour.

### Influence of Behavioural Intentions on Tax Compliance

Behavioural intention, according to Ajzen (1991), is a precursor to actual behaviour. In predicting ones behaviour, the theory of planned behaviour (TPB) suggests that behavioural intention is the most significant predictor. This implies that if a taxpayer intention to comply with the tax laws is positive then obviously that taxpayer will have a positive tax compliance behaviour and vice versa. The below hypothesis proposes to establish the relationship between behavioural intention and actual compliance behaviour as:

H5: A positive (behavioural) intention to comply will positively influence taxpayer’s compliance behaviour.

### Conceptual Framework

Based on the literature, the study identified the following variables believed to have a positive relationship between behavioural intention and, consequently, actual compliance

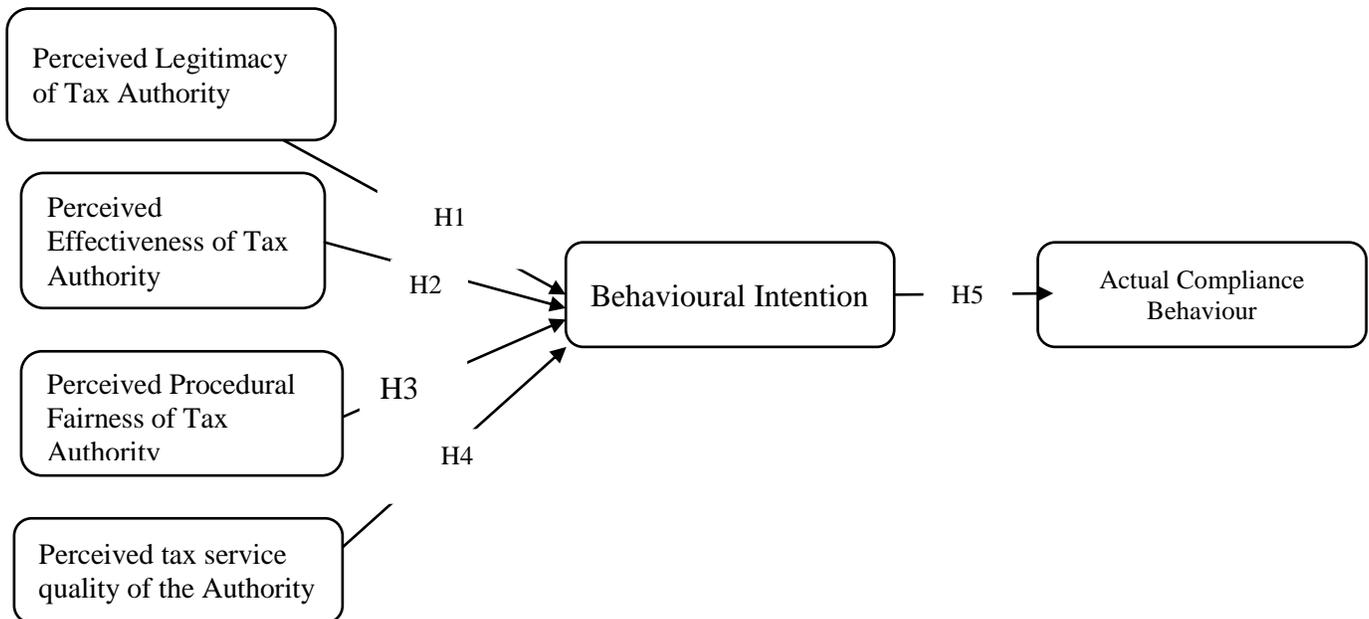


Figure 1: Proposed Research Model

## RESEARCH METHODOLOGY

### Population, Sampling and Data Collection

The target population for the study consisted of all SMEs on the database of all small tax offices (STO) of the GRA in Greater Accra Region. Both probability and non-probability sampling were used in the study. Three hundred and fifty (350) questionnaires were personally administered to solicit data from the respondents. The three hundred and fifty (350) was arrived at by randomly selecting twenty-five SMEs each from the fourteen STOs in Greater Accra to represent the total sample size of three hundred and fifty (350). During the distribution, fifteen (15) SMEs were not located per the address provided at their tax office and they were replaced using the purposive sampling approach. The process of distribution and collection of questionnaires was undertaken over a four (4) month period (May to August 2017). In all, two hundred and seventy-five (275) respondents out of the total number distributed were received completed and used for the analysis. This gives a response rate of approximately 79%. The SmartPLS 3.0 software was used to analyze the data collected from the 275 respondents and to test the measurements' reliability and validity and to perform the path analysis.

### Survey Instrument and Measures

The following four (4) variables were identified for the study: the perceived legitimacy of the tax authority; perceived effectiveness of the tax authority; perceived fairness of the tax authority in administration of justice; and perceived service quality in non-compliant behavior of taxpayers.

Each variable in the study was constructed on multi-items and measured on a 5-point Likert scales ranging from 1- strongly disagree to 5-strongly agree where respondents were required to specify their level of agreement.

Measurement items for behaviour intention was adapted from Venkatesh et al. (2012) and Belanger and Carter (2008) and that the items for procedural fairness also adapted from Simmons and Cheng (1996). The rest of the measurement items were self-designed. However, it must be stated that most the adopted questionnaires were modified to meet the specific context of this research work.

The questionnaire comprised of 18 items measuring the constructs on perception and attitude on tax authorities and compliance: the perceived legitimacy of the tax authority (3 items); perceived effectiveness of the tax authority (4 items); perceived procedural fairness of tax authority (3 items); and perceived service quality (2 items); compliance behaviour intention (3 items) and Tax compliance (3 items).

The dependent variable was tax compliance. It was measured with 3-items based on SMEs self-reported tax compliance behaviour. Taxpayers were asked to answer these questions by reflecting on how they felt their enforcement experience had affected their subsequent taxpaying behaviour.

Behavioural intention was measured by SMEs responses to a hypothetical scenario and measures of their beliefs in moral intentions to comply. The behavioural intent construct was measured by 3 items: the number of times income or revenue has been hidden and whether the view it as something that is good to do or not.

Perceptions of the tax authority legitimacy refer to reflected taxpayers' perception of the obligation to follow the directives of the authority - GRA. This construct was measured by 3 items.

Perceptions of the tax authority procedural fairness refer to reflected taxpayers perception on the degree of allocation, sanctions and collection fairness. Three items were used to measure the construct.

Perception of the authority's effectiveness refers to an individual's general opinion of the ability of the tax authority to identify and punish non-compliant behaviour. Respondents' views of effectiveness were measured by four items.

Perceived quality of service refers to the positive outcomes developed by taxpayers in their contact with the authority officials that may not cause violations of tax policies and rules by taxpayers and this was measured by two measurement items.

## **ANALYSIS AND FINDINGS**

### **Assessment of the Measurement Model**

Cronbach's Alpha and Composite Reliability (CR) were used to measure the internal consistency reliability. The use of the CR in addition to the traditional measure (Cronbach's Alpha) of the internal reliability was in support of prior literature that has recommended the use of Composite Reliability as a replacement for the traditional measure (Hair *et al.*, 2010) with the understanding that a CR score is superior to Cronbach's Alpha measure of internal consistency since the latter weighs all items equally without considering their factor loadings.

The generated SmartPLS 3.0 output, shown in Table 2, indicates all the constructs in the Cronbach's Alpha showed good reliability since the values exceed the 0.60 (Churchill, 2001) threshold. Additionally, the composite reliabilities for the five measured constructs ranged from 0.866 to 0.94, therefore using the Hair, Hult *et al.* (2014, pp.101-102) benchmark, all the constructs demonstrate high levels of internal consistency reliability among all the latent variables. Hence, the measurement items are suitable for the individual latent variables.

Further, the average variance extracted (AVE) which measures the amount of variance that a latent variable captures from its measurement items relative to the amount of variance due to measurement errors was used to examine the convergent validity. The results from table 3, confirm convergent validity for all constructs. This is so because the results as summarized indicates that, the AVE values for the model are larger than the acceptable minimum threshold of 0.50 for the constructs (Hair *et al.*, 2010).

After the individual item reliability and convergent validity of the measurement model has been assessed and confirmed as acceptable, the discriminant validity, which stipulates the degree to which a specified latent variable differs from other latent variable in the model, was measured. In this study, the discriminant validity was measured using: (1) cross-loadings; (2) analysis of average variance extracted (AVE); and (3) heterotrait and monotrait ratio (HTMT). The results are displayed in Tables 1, 2 and 3.

From Table 1, the cross loading analysis of discriminant validity was confirmed accurately and was valid in line with Jacqueline Mayfield and Milton Mayfield's (2012) position, which postulates that items that are empirically distinct will have their highest loadings on their associated latent construct, and will have low loadings on all other constructs. However, Mayfield & Mayfield (2010) indicated that, in order to be considered as having appropriate cross-loadings, the item should load at least 0.71 on the intended construct. As a result, one (1) variable (PFTA2) was dropped.

The results of the Fornell-Larcker (AVE) and heterotrait-monotrait ratio of correlations (HTMT) in the SmartPLS application as summarized in Tables 2 and 3 and indicate further evidence of discriminant validity for all the measurement items.

Given the results as displayed on Tables 1, 2 and 3, the measurement model has good individual item reliability, convergent validity and discriminant validity and, as such, it can be concluded that all the latent variables falls in the acceptable level of error. Therefore, the measurement model reveals adequate robustness required to analysis the relationship between the latent variables and the dependent variable.

Table 1: Cross Loadings Results

	BIT	PETA	PFTA	PLTA	PSQA	TC	$\alpha$	CR	AVE
BIT1	<b>0.815</b>	0.223	0.288	0.211	0.231	0.387			
BIT2	<b>0.831</b>	0.260	0.306	0.149	0.226	0.348	0.779	0.866	0.683
BIT3	<b>0.834</b>	0.377	0.507	0.110	0.359	0.565			
PETA1	0.257	<b>0.736</b>	0.210	0.176	0.332	0.387			
PETA2	0.271	<b>0.831</b>	0.321	0.148	0.332	0.465			

PETA3	0.246	<b>0.807</b>	0.352	0.143	0.411	0.541	0.810	0.874	0.635
PETA4	0.357	<b>0.811</b>	0.425	0.120	0.362	0.537			
PFTA1	0.418	0.352	<b>0.927</b>	0.098	0.384	0.486			
PFTA3	0.456	0.429	<b>0.939</b>	0.121	0.445	0.540	0.852	0.931	0.871
PLTA1	0.158	0.097	0.122	<b>0.827</b>	0.149	0.200			
PLTA2	0.174	0.142	0.062	<b>0.887</b>	0.124	0.214	0.756	0.856	0.666
PLTA3	0.091	0.259	0.126	<b>0.727</b>	0.129	0.223			
PSQA1	0.332	0.406	0.440	0.156	<b>0.944</b>	0.436			
PSQA2	0.318	0.442	0.398	0.149	<b>0.939</b>	0.456	0.872	0.940	0.886
TC1	0.500	0.622	0.471	0.236	0.381	<b>0.899</b>			
TC2	0.448	0.493	0.499	0.230	0.439	<b>0.905</b>	0.888	0.930	0.817
TC3	0.532	0.533	0.522	0.222	0.463	<b>0.907</b>			

Table 1...

**Note:** Loadings greater than 0.71 are shown in boldface. Factors: BIT = Behavioural Intention, PETA = Perceived Effectiveness of Tax Authority, PFTA = Perceived Procedural Fairness of the Tax Authority, PSQA = Perceived Service Quality of the Tax Authority, TC = Tax Compliance

Table 2: Fornell - Larcker Criterion Results

	BIT	PETA	PFTA	PLTA	PSQA	TC
Behavioral Intention	<b>0.827</b>					
Perceived Effectiveness	0.363	<b>0.797</b>				
Perceived Procedural Fairness	0.469	0.420	<b>0.933</b>			
Perceived Legitimacy	0.181	0.181	0.118	<b>0.816</b>		
Perceived Service Quality	0.345	0.450	0.445	0.162	<b>0.941</b>	
Tax Compliance	0.548	0.610	0.551	0.254	0.474	<b>0.904</b>

**Note:** Off diagonal numbers are inter-construct correlations; diagonal numbers are the square roots of AVE

Table 3: Heterotrait Monotrait Ratio (HTMT) Results

	BIT	PETA	PFTA	PLTA	PSQA	TC
BIT						
PETA	0.423					
PFTA	0.540	0.491				
PLTA	0.233	0.263	0.156			
PSQA	0.397	0.536	0.515	0.201		
TC	0.623	0.711	0.631	0.316	0.538	

Note: BIT = Behavioural Intention, PETA = Perceived Effectiveness of Tax Authority, PFTA = Perceived Procedural Fairness of the Tax Authority, PSQA = Perceived Service Quality of the Tax authority, TC = Tax Compliance

### Assessment of the Structural Model

After the assessment of the measurement model, the individual path of the structural model as shown in Fig. 1 was evaluated. The hypothesis of the study was tested via non-parametric bootstrap function of the PLS-Graph 3.0 with a 5000 re-sample to assess the statistical significance of the path coefficients ( $\beta$ ) between each latent variable and the dependent variable.

Table 4 shows the summary of the path results and the corresponding t values and estimated p value associated with each t value.

Table 4: Structural Model Results

Hypothesis	Path	Path Coefficient ( $\beta$ )	T Statistics	P Values	Remarks
H1	PLTA -> BIT	0.095	1.789	0.074	Not Supported
H2	PETA -> BIT	0.152	2.558	0.011	Supported
H3	PFTA -> BIT	0.346	5.792	0.000	Supported
H4	PSQA -> BIT	0.107	1.767	0.077	Not Supported
H5	BIT -> TC	0.548	13.455	0.000	Supported
Model Fit			R squared		
SRMR	0.074		Compliance Intention	0.272	
			Tax Compliance	0.301	

**Note:** BIT = Behavioural Intention, PETA = Perceived Effectiveness of Tax Authority, PFTA = Perceived Procedural Fairness of the Tax Authority, PSQA = Perceived Service Quality of the Tax Authority, TC = Tax Compliance

The hypotheses of this study were measured at a significance level of 5 % (0.05) (Hair *et al.*, 2010).

Table 4 shows that five (5) out of the six paths were significant. The path coefficient of the path linking H2, H3, H4, and H5 are positive and has a statistically significant relationship with tax compliance intentions. The path linking perceived legitimacy of the tax authority to compliance intentions is also positive but has no statistical significant relationship with tax compliance intentions. Furthermore, the path linking tax compliance intention to actual compliance is positive and statistically significant. The overall Model fit was assessed to be 0.074 (7.4%).

The  $R^2$  of the endogenous constructs is significantly higher than 0.24. The  $R^2$  value of the tax compliance was 0.272 suggesting that 27.2% of the variance in the extent of tax compliance can be explained by compliance intentions. Again, the  $R^2$  value of the compliance

intention was 0.301 suggesting 30.1% in the extent of compliance intentions can be explained by the perceived legitimacy of the tax authority, perceived effectiveness of the tax authority, perceived fairness of the tax authority and perceived service quality, indicating that the research model appears to have a suitable predictive power for the dependent variables (Fig. 1).

## DISCUSSION OF FINDINGS

The study examined the influence of perceptions and attitude of the tax authority on compliance intentions among SMEs in Ghana.

The model proposed earlier in this paper consisted of five tax compliance intentions dimensions: perceived legitimacy of the tax authority; perceived effectiveness of the tax authority; perceived fairness of the tax authority; perceived service quality; and one (1) actual compliance dimension.

However, from the PLS analysis of H2, H3, and H5 have been supported and this emphasizes the extent of influence of PETA, PFTA, and BIT; and the extent of influence of BIT on TC.

As already mentioned, Hypothesis 1, which measured the influence of perceived tax legitimacy of the tax authority on the intention to comply was rejected. This is due to the result of a positive path coefficient with a p-value at the 0.074 level as against the acceptable significant level of 5% for this study. The results of this study implied that respondents did not agree that perceived legitimacy of the tax authority has a significant influence on their intention to comply. Respondents believed that the authority has the right to access their information and the power to collect tax and to administer tax rules. However, they did not reflect better compliance behaviour. The result contradicts previous studies (e.g., Reisig *et al.*, 2014; Tyler, 2010; Jackson *et al.*, 2012a) that established a positive relationship between perceived legitimacy and compliance intentions.

Hypothesis 2, which proposes that 'perceived effectiveness of the tax authority by taxpayers significantly influence their tax compliance behaviour', is supported and exerts a significant positive influence on tax compliance intention, with a path co-efficient of 14%: the result also supports findings in previous studies (Andreoni, Erard & Feinstein, 1998; Nagin, 2013). The results imply that, when tax payers have a positive impression of the tax authority, nothing can be left uncovered by the tax authorities. This builds trust in the authority's mechanism in identifying deviant behaviour; and hence develops a positive attitude towards compliance.

Hypothesis 3, which considered the perceived influenced of tax fairness of the tax authority on compliance intention, is supported and exerts a significant positive influence with a

path co-efficient of 28.6%. The outcome shows that respondents consider fairness of the tax authority as having an important influence on their intention to comply. In particular, the positive path coefficients (which were significant at the 0.000 level) suggest that an equitable imposition of sanctions as well as procedural justice by the authority would improve the taxpayers' perceptions of tax fairness; and hence results in high compliance levels. The results were consistent with Sandmo (2005) and Alm (2012) who documented a positive relationship between perceived procedural fairness in the authority and tax compliance.

Next, the result of hypothesis 4 (the relationship between perceived positive service quality of the authority and tax compliance behavior) showed that perceived service quality of the tax authority had no relationship with tax compliance intention at p value of 0.077 level (Table 4). Thus, taxpayers' perception of the service quality offered by the tax authority does not enhance trustworthiness thereby influencing their tax compliance behavior. The finding is consistent with the study by (Lateef Olumide Mustapha, Saheed Zakaree S and Onipe Adabenege Yahaya , 2015) however, it contradicts with studies by Alabede, Afrin and Idris (2011) and Torgler (2007), which found a positive relationship.

H5 is supported and exerts a significant positive influence on TC with a path co-efficient of 54.8%. The path coefficients of 0.548 revealed that respondents support the view that tax compliance intentions had a significant influence on actual compliance in a positive manner. Hence, the results provide support to claims that behavioural intention is a precursor to actual compliance.

## **CONCLUSIONS, LIMITATIONS AND FURTHER RESEARCH DIRECTION**

This paper identifies four (4) significant variables that could influence the perception and attitude of SMEs taxpayers on compliance. It provides a better understanding of SMEs dynamics by discovering the most significant influencing factors that constitute the SMEs tax payers perception and attitude of tax authorities that has been influencing their tax compliance behaviour. The research provides a model for explaining the perceptions and attitude of SMEs towards tax compliance.

The study, apart from advancing knowledge in the field of taxation, has some practical implications as well. That is, the information relating to various dimensions of the study will be a useful tool for the tax authorities as they may rely on it to further improve in areas that have led to positive attitudes regarding their role among taxpayers.

The analysis of the relationship between compliance intentions and perceived procedural fairness and effectiveness are significant, meaning that, when the respondents' distress about the compliance in the tax system is high, they reported a higher level of

compliance to participate when they perceived a greater level of fairness and effectiveness from the authority mandated to implement the tax laws.

This study has developed a new set of measures for measuring perceptions and attitude of tax authorities' effectiveness, fairness, tax legitimacy and service quality; and, as a result, future studies could also benefit from the new measures. Future study may seek to model the relationship between the different user groups in the industry.

The study identifies limitations in its outcome and conclusions. First, the study was conducted in a specific geographical location (Accra). As a result of the geographic restrictions generalizability is limited: there must be caution in generalizing the results to encompass the whole country. Also, the research relied mainly on the perceptions of selected SMEs which might not provide a completely accurate view in reality. Future research may consider adding more SMEs and also come up with other variables that influence tax compliance.

The study did not include the influence of demographic characteristics such as age, gender, marital status, nationality, income level, company type and years in operations on perception and attitude of authority. Future research in additions to using demographic features of tax payers should also focus on how the tax authorities are addressing the negative perceptions taxpayers are holding against them. The tax authorities should be made known of the perceptions taxpayers are having about them which is affecting compliance so that they can make efforts to address them thereby mobilizing resources to finance economic growth and development.

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