



## CREATIVE ACCOUNTING AND FINANCIAL PERFORMANCE OF PUBLIC LISTED COMPANIES IN MALAYSIA

 Mazurina Mohd Ali<sup>1+</sup>

 Noor Hasniza Haron<sup>2</sup>

 Nur Ain Othman<sup>3</sup>

 Suhaily Hasnan<sup>4</sup>

<sup>1,2,3,4</sup>Faculty of Accountancy, Universiti Teknologi MARA Selangor, Kampus Puncak Alam, Selangor, Malaysia.

<sup>1</sup>Email: [mazurina@uitm.edu.my](mailto:mazurina@uitm.edu.my)



(+ Corresponding author)

### ABSTRACT

#### Article History

Received: 24 September 2019

Revised: 29 October 2019

Accepted: 4 December 2019

Published: 27 January 2020

#### Keywords

Creative accounting  
Corporate failure  
Financial performance  
Tax avoidance  
Income smoothing  
Malaysia.

Worldwide corporate failure has become one of major issues discussed related to excessive practice of creative accounting. Creative accounting is conducted with the intention to indicate company performance aligned with the companies' objective. This empirical study is conducted with an objective to examine the relationship of creative accounting practices (proxied by income smoothing and tax avoidance) and the impact of financial performance (measured using return on assets) of Malaysian public listed companies. Income smoothing and tax avoidance are some of the important elements being discussed together with creative accounting practices and financial performance. Using 409 public listed companies on Bursa Malaysia, secondary data was collected from data stream and from the information disclosed in the website of the sampled public listed companies. Agency theory is used to support the analysis and results of the research. Descriptive and inferential analyses were performed by using Statistical Package for Social Sciences Software (SPSS) to test variables under study. The result indicates that income smoothing does influence the financial performance of Malaysian public listed companies. The result of this study could benefit the policy maker in order to responsively react on any issues and provides specific guideline for the companies in applying certain judgment by referring to the accounting standard.

**Contribution/Originality:** This study contributes in the existing literature on the influence of creative accounting proxied by income smoothing towards firm performance. This study could benefit policy makers in order to identify the key area of their problems or issues to amend or implement the current policy with regards to creative accounting.

### 1. INTRODUCTION

Creative accounting is a systematic perversion of returns and properties of companies. The practice can be considered legal or illegal depending on its purpose. Creative accounting is also defines as a method that complied with accounting standards but may deviate from the spirit of the regulation due to certain circumstances and factors. Creative accounting could be distinguished by examining certain characteristics which include excessive complications of ways in characterising revenue, expenses, non-current assets, current assets, equities or liabilities with underlying purposes to stimulate users' interpretations on the performance of the company. Information

presented in financial statement is manipulated to influence the stakeholder perception on company performance. However, one may pose a question whether creative accounting is legal.

A group of studies had supported the need for creative accounting. These studies opined that creative accounting is related to the introduction of new ideas and modern techniques of financial reporting with the aim to improve company performance. New ideas and modern techniques that are in coherence with the ethical guideline and the accounting principle, creative accounting is allowable as the mechanism could yield favourable benefits. However, there are concerned that flexibility appeared in creative accounting may reflect that accounting principles negotiable and could lead ethical issues in business. Proponents of creative accounting suggested that creative accounting is not about making the company look good but more on keeping pace with the economic, legal and social developments. Financial statements provide various qualitative information related to financial performance of a company that are valuable to be used by its stakeholders. A company often aims at providing an image distinct from reality, portraying the company with a prosperous financial situation, hence avoiding crisis. Most studies have reached to the conclusion that creative accounting is legal since such practices obey the law.

Another group of studies however, argued that creative accounting maybe illegal. However, it is difficult to distinguish when such practice would become illegal. In principle, creative accounting acts as a set of bookkeeping techniques that manipulates a company's performance to meet the managers' desire. Many studies have suggested that a company often use creative accounting because of the flexibility in the financial reporting regulations (Tassadaq and Malik, 2015). Flexibility in the accounting principles enable the company to present its financial statements as desired by the managers. Of consequence, the company may use several ways to portray positive company performance inclusive of income smoothing to attract investors.

Companies like Enron, Worldom, Parmalat and Tyco are some examples of companies that have been associated with accounting scandals (Salome *et al.*, 2012). The managers of these companies were practicing creative accounting in order to achieve the targeted performance. Similarly, Hamid *et al.* (2012) highlight a situation whereas a multinational company in Malaysia i.e., Sime Darby Berhad did not disclose important information that had resulted huge losses for the companies. Another case highlighted by Bernama in the news include the misleading quarterly financial statements produced by Transmile Group Berhad to encourage public to buy their shares. Hamid *et al.* (2012) highlight that there is a possibility that Transmile Group Berhad had conducted creative accounting by fabricating the reported revenue and profit.

It is argued that some gaps do exist in practices despite the existence of regulatory oversight board and complemented by poor corporate governance practices that allow misleading financial statements published and subsequently permit unethical practices by companies. Motivation behind the actions taken are worth studying as it could affect decision made by shareholders, investors and management of the company itself. Information asymmetry as described in the agency theory could possibly underpin creative accounting practices of public listed companies. Many studies have highlighted some factors that encourage companies to manipulate earnings such as stakeholders' confidence level, income taxation, breach in the debt contract (Li and Richie, 2016) and tax policy changes (Kamau *et al.*, 2012).

There is a possibility that companies may understate or overstate their financial performance on the basis that return received will affect the amount of tax payable for the current year (Nyabuti *et al.*, 2015). The manipulation of income may potentially affect value of the firm and lead to other costs to be paid by company associated with tax planning activities and compliance costs that may become a burden for shareholders (Desai and Dharmapala, 2009). Consequently, accounting processes and policies that are subjected to manipulation due to the variation of human judgment may have resulted in creative accounting to be in placed within companies (Yadav, 2014). Financial statements that are legally prepared but embedded some degree of creative accounting may bring challenges to the credibility of financial reporting. According to Yadav (2014) creative accounting may bring great benefit to the

users if the mechanism is being used wisely but may cause a damage if it is being practiced by the irresponsible person.

This study is conducted with the main objective to examine the relationships of income smoothing and tax avoidance as proxies used for creative accounting practices and the impact towards the financial performance of companies listed in Bursa Malaysia. To have better understanding on the main issues, the concept of creative accounting has been first discussed earlier. The next sections will then cover literature reviews and hypotheses development, followed by methodology, findings, discussion and conclusions.

## **2. LITERATURE REVIEW**

### *2.1. Creative Accounting Practices*

Issues on creative accounting have been widely discussed in literatures. Creative accounting has been brought to light by Anglo-Saxon in 1970s. Inappropriate creative accounting practices may place the company at risk (Gherai and Balaciu, 2011). Creative accounting or transforming accounting figures could range from complying by the accounting rules to non-compliance based on the expectations of the preparer of financial statements (Bhasin, 2016). Marin *et al.* (2015) increases the value of creative accounting practices by having the perception of the techniques that could enhance the information disclosed to the stakeholders. It is argued that different motivation and different ideology in accounting processes could encourage manipulation, cheating and falsification of documents by members in order to achieve the divergence perspectives.

Creative accounting practices can generate a favorable image of financial performance and portray attractive results rather than reflecting the actual business performance. Uncontrolled creative accounting practices may hinder actual performance being communicated to the users. Company managers may have manipulated the income to suit individuals' objectives (Stolowy and Breton, 2004). This can be done by selecting certain loose procedures that may provide avenue to change accounting estimates and accruals (Diana and Madalina, 2007). To overcome the negative impact due to creative accounting practices, appropriate code of ethics need to be embraced by accounting profession. Company that lacks ethical considerations may have difficulties to continue operating and achieve the target vision for an extended time.

Creative accounting can be an instrument of deception to the users if being practiced by irresponsible managers (Yadav, 2014). Given these, financial reports widely used by stakeholders should be reliable and understandable. It is argued that financial reports must provide a clear picture of actual economic resources and performance of a company.

### *2.2. Income Smoothing*

Income smoothing is known as deliberately fluctuating earning to reach a level that is considered as normal performance for a company in order to achieve certain objective. Income smoothing can be referred to as a mechanism practiced by companies to eliminate variation of reported income against some target through changing of man-made accounting or real transaction variables. This method if being conducted consistently may provide misleading information to the users. Considering income as one of the important factors for decision-makings; the reliability of income is undeniably important aspect of firms to evaluate the returns and risks of their investments (Boterenbrood, 2014). There are few reasons that can influence companies across industries to conduct income smoothing. For example, variations of economical and operational faced by industries may motivate and affect income smoothing ability of the companies (Atik, 2009) and high leverage companies are facing greater risk of inability to pay debt is more likely to smooth earnings (Alexandri and Anjani, 2014).

On the other hand, other elements such as high security prices and low cost of capital that can bring advantage to the company are some of the reasons why companies do income smoothing (Stolowy and Breton, 2004). Authorized person in the field of accounting, including revenues and expenses could create opportunities for income

smoothing (Alexandri and Anjani, 2014) and creative accounting. According to DeFond and Park (1997) companies incline to smooth earnings when the current financial performance is detriment as compared to the expected financial performance. They explained that accruals are increased by allocating forthcoming income to be recognised in the current financial statement. Contradict to the earlier situation described, the authors argued that companies will decrease accruals when current performance is better than the expected future performance.

Big bath accounting is another mechanism that can be associated with income smoothing phenomenon (Shah and Butt, 2011). Company will report high expenses and high losses in the current year in order to ensure that earning in the subsequent year is improved. On the long term, income smoothing is the most preferable method as it shows that the company is strong and stable. Public listed companies used income smoothing method in the companies due to different reasons. Companies that reported stable earnings pay a relative constant level of dividends rather than companies with fluctuate earnings. The situation gives a positive signal to the potential creditors with low level of risk. The companies may have lower cost of debt with more stable positive income. To meet the expectation of the users of financial statements, companies may conduct income smoothing to signal certain relevant future information (Ismael, 2017).

Based on these arguments, this study hypothesized that:

*H<sub>1</sub>: Income smoothing has a significant influence on the financial performance of public listed companies in Malaysia.*

### 2.3. Tax Avoidance

Taxation from perception of government and companies has always been contemporary issues discussed globally. Tax avoidance is recognised as a legal method to be practiced for the benefit of the company (Fisher, 2014). The practice will provide opportunity for the company to avoid paying tax by certain degree for the current financial year. The concept is allowable as compared to tax evasion method in which it is conducted to prevent from illegal tax paying. Motivation to pay low tax is one of the reasons companies in Kenya conduct creative accounting (Amat and Gowthorpe, 2004). Companies arrange, manage and plan the financial to ensure that only least possible amount of tax need to be paid but still abide by the law. Various legal mechanisms could be practiced with the objective to avoid paying tax by certain amount and protect companies' liability.

Companies looking for tax consultants to provide professional guidance, increase allowable tax expenses and subscribe for life assurance policies are some initiatives taken to avoid paying tax (Adebisi and Gbegi, 2013). These initiatives are usually regarded as one mechanism that can increase financial performance of the firm and at the same time reduce the amount of tax payable for the year (Desai and Dharmapala, 2009). On the other hand, it is argued that there are two possible motives that can allow the company to pay less amount of tax through appropriate level of employment contracts. Companies need to confirm with level of provisions or compensations that can eliminate certain tax liabilities. Therefore, the company initiative to reduce tax payable must be aligned with the internal control and the standard of procedures to ensure that the mechanism is conducted in a cohesive way. It is found that some companies use creative accounting mechanism to reduce the amount of tax payable (Kamau *et al.*, 2012). Companies may avoid paying tax by understating their income and increase expenses. Based on these, the study hypothesized that:

*H<sub>2</sub>: Tax avoidance has a significant influence on financial performance of public listed companies in Malaysia.*

### 2.4. Agency Theory

Contract exists between the shareholders known as the principal and the managers who are the agents that have been entrusted to manage the business by utilizing the resources at their full potential (Jensen and Meckling, 1976). The term of agency is acknowledged as a situation where as the agent, they are allowed to make decision and act for the benefit of the owner or the principal (Salome *et al.*, 2012). Problems may happen in any situation when the principal allow the agent to make the decisions without require the detailed information to made known to the

principal. Yadav (2014) highlighted that agency problem that exists may motivate creative accounting practices by companies that are supported by information asymmetry appear in the complex relationship between the agent and principal. Apart of that, complex structures and arrangement exist in the companies and diverse stakeholders may support the possibility of overpass the regulation in accounting practices (Schipper, 1989). The agents or managers may give priority for their own benefit and resourceful in nature. The opportunistic managers may intend to maximize individuals' interest at the expense of the owners.

It is argued that agency theory may affect creative accounting practices due to the possibility of conflict of interest incurred between the two parties. However, the accounting profession should act ethically and expected to discharge the duties based on the accounting standard, rules and regulations to eliminate the possibility of misrepresentation or falsification of financial data (Kamau *et al.*, 2015). To curb these, various standards and framework have been introduced to guide the preparer of financial statements. However, information asymmetry that existed within the company environment may prevent the issues from happening. Unethical or creative accounting practices conducted by the agent were in the objectives to ensure the company is profitable and the shareholders wealth is maximized.

### 3. RESEARCH FRAMEWORK

Based on literature reviews conducted, a relationship might exist between creative accounting which are proxied by tax avoidance and income smoothing and financial performance. This study will investigate the influence of income smoothing practices and tax avoidance represented by the sample companies listed in Bursa Malaysia. Information was extracted from the DataStream and Bursa Malaysia website. Out of the population of 806 public listed companies in Bursa Malaysia, only 409 companies are relevant to be used in this study. Financial institutions were excluded from this study as well as all companies with missing data and delisted companies.

The data was collected on the variables of interest for 12 months period starting from 1 January 2016 until 31 December 2016 for all 409 companies. The data was collected and calculated using an appropriate formula in Microsoft Excel spreadsheet and later analysed by using SPSS software. Table 1 shows the sample specification of this study.

Table-1. Sample specification.

Description	Number of firms
Listed companies	805
Financial institution	(25)
Missing data	(18)
Companies not de-listed during the period under study	(353)
Listed companies with complete data (1/1/2016 - 31/12/2016)	409

#### 3.1. Dependent Variable: Financial Performance

Financial performance is measured based on the level of profits earned by the companies. To measure this, return on assets (ROA) has been used as a proxy on the basis this method is the most often used to calculate the level of financial performance (Aliabadi *et al.*, 2013). ROA is an important indicator for internal tool as the measurements take into account of the assets and liabilities.

#### 3.2. Independent Variable

##### 3.2.1. Income Smoothing

The most popular discretionary model to measure income smoothing is by using Jones (1991) model. Jones model could decompose accruals into two groups namely, discretionary and non-discretionary accruals. The advantage of Jones model is that it is simple and easy to implement. Jones (1991) proposed a model assumption that nondiscretionary is constant. Modified Jones model proposed by Dechow *et al.* (1995) consider the change in sales

are attuned for the variation in receivables. The Modified Jones model is planned to reduce the measurement inaccuracy of discretionary accruals especially in a situation where discretion is applied over revenue. This study defines accruals as net income less cash from operation as we will identify the non-cash income. Jones (1991) is as follows:

$$Accruals = \alpha_1 + \alpha_2(Cash\ Revenue\ Growth) + \alpha_3(PPE) + \varepsilon, Or$$

$$NDA_t = \alpha_1 (1/A_{t-1}) + \alpha_2 (\Delta REV_t - \Delta REC_t) + \alpha_3 (PPE_t)$$

Where,

$A_{t-1}$  = total assets at t-1

$\Delta REV_t$  = revenue in year t less revenue in year t-1, scaled by total assets at t-1

$\Delta REC_t$  = net receivables in year t less net receivables in year t-1, scaled by total assets at t-1

PPE = gross property plant and equipment in year t, scaled by total assets at t-1

$\alpha_1, \alpha_2, \alpha_3$  = estimated regression coefficients.

There are two types of approaches that have been used in Jones model such as (i) time series: the sample data used past history for the company and (ii) cross sectional: used industry at one-point time. The discretionary accruals are derived from the estimated regression to get estimated parameters  $\alpha_1, \alpha_2, \alpha_3$  by using cross sectional in Microsoft Excel spreadsheet. The estimated normal accruals from the estimated parameters value of  $\alpha_1, \alpha_2, \alpha_3$  are obtained from the following:

$$Normal\ Accruals = \alpha_1 + \alpha_2(Cash\ Revenue\ Growth) + \alpha_3(PPE),$$

Therefore, *Discretionary Accrual* = *Accruals* – *Normal Accrual*

### 3.2.2. Tax Avoidance

Prior study used effective tax rates (ETRs) to represent the level of tax avoidance with the involvement of either certain or uncertain strategies (Badertscher *et al.*, 2013). Referring to the Generally Accepted Accounting Principles (GAAP), ETR1 being the more risky approach can be calculated based on total tax expenses divided by pre-tax income for the year. Whilst the other approach, ETR 2 is calculated by tax expenses minus deferred tax expenses divided by pre-tax income (Noor *et al.*, 2008). This study used ETR 1 as the method to calculate the tax avoidance and its link with financial performance as for the proxy to measure tax avoidance in this study. Comparison between ETR can be made with statutory tax rate and examine the level of tax avoidance made by companies (Lee *et al.*, 2015). The permanent difference and temporary difference that may cause certain variance with deferred tax for the year can be explained through ETR. Table 2 exhibits the operationalization of variables.

The data in this study was recorded and analyse using the Statistical Package for Social Science (SPSS) v16. Reliable, accuracy, completeness with less error were given priority in the process of obtaining and key in the data in the system. Descriptive statistical analysis, diagnostic testing and multicollinearity test was carried for all variable to examine the research objectives. Multiple linear regressions were carried out to measure the relationship of tax avoidance and income smoothing on financial performance.

**Table-2.** Operationalization of variables.

Variable	Description	Measurement scale
<i>TAV</i>	Tax avoidance is calculated by using a proxy of ETR (current income tax expense divided by pre-tax income).	Ratio
<i>IS</i>	Income smoothing is calculated using the proxy of discretionary accruals. Discretionary accrual measured as accruals minus normal accruals (Jones, 1991).	Ratio
<i>FP</i>	Financial performance is calculated using the proxy of ROA (the net income divided by the total assets).	Ratio

## 4. RESULTS AND DISCUSSION

### 4.1. Descriptive Analysis

Table 3 presents the descriptive analysis of the variables used in this study, namely, income smoothing (IS), tax avoidance (TAV) and financial performance (FP).

**Table-3.** Descriptive statistics for financial performance, income smoothing and tax avoidance.

Variables	Min	Max	Mean	Standard deviation
Financial performance (FP)	-93.7	61.73	1.911	11.946
Income soothing (IS)	-10.97	0.52	-0.031	0.552
Tax avoidance (TAV)	-553.98	347.97	8.157	57.227
<b>N= 409</b>				

Table 3 shows that financial performance had a mean of 1.911 and the standard deviation of 11.946. Thus, it shows that financial performance of the 409 companies during the study had an average of 1.911% return on assets. However, the value of financial performance went as high as 61.73% and as low as -93.70%.

Income smoothing had the value minimum of -10.97, the maximum of 0.52, the mean of -0.031 and the standard deviation 0.552. The second independent variable is tax avoidance with minimum value -533.98% and maximum value 347.97% for 409 listed companies during the study period. The mean and standard deviation for tax avoidance are 8.157 and 57.227.

### 4.2. Multicollinearity Test

The result of multicollinearity test for the research were summarised in the Table 4. All variables can be used for this study as all the variables have the tolerance level of more than 1% with VIF are less than 2. This indicates that the possibility of multicollinearity is low.

**Table-4.** Tolerance and VIF.

Variables	Tolerance	VIF
Income smoothing (IS)	0.999	1.001
Tax avoidance (TA)	0.999	1.001

### 4.3. Multiple Linear Regression

To examine the relationship of income smoothing and tax avoidance on the financial performance, regression analysis was performed based on the following model:

$$\widehat{ROA}_i = \widehat{\beta}_0 + \widehat{\beta}_1 IS_1 + \widehat{\beta}_2 TAV_2$$

Where:

ROA = Return on asset.

IS = Income smoothing.

TAV = Tax avoidance.

The results of multiple regressions between independent variables (income smoothing and tax avoidance) and dependent variable (return on assets) were summarised as per the [Table 5](#).

From the regression analysis, the coefficient of determination,  $R^2$  value is 0.021 which indicates that only 2.1% of the variation of ROA is due to the income smoothing and tax variables. The adjusted  $R^2$  value for variables is 1.6% which show a low variability explained by the independent variables.

**Table-5. Regression analysis result.**

Variables	Beta	Std. Error	Beta	t-statistic	Sig.
Income smoothing	2.377	1.064	0.11	2.234	0.026
Tax avoidance	0.019	0.01	0.091	1.858	0.064
$R^2$				0.021	
Adjusted $R^2$				0.016	

#### 4.4. Income Smoothing and Financial Performance

$H_1$  suggested that income smoothing will affect the ROA of Malaysian public listed companies. Based on the [Table 5](#), the beta value is positive at 2.377 and significant at 1% confidence interval. This study concludes that income smoothing practices has a positive relationship with financial performance measured by ROA. Thus,  $H_1$  is accepted.

Sustainable share price may be achieved through conducting creative accounting as the practices may decrease the apparent levels of debt, thereby reflect low level of risk and presence of a good financial performance ([Amat and Gowthorpe, 2004](#)). The manager may prefer the mechanism of income smoothing in financial reporting that can result in less fluctuate income, at the point when the manager of the company have the option to choose the time when income is recognized ([Tassadaq and Malik, 2015](#)). This may help the organization to stay supported and stay with the presence of good benefits.

#### 4.5. Tax Avoidance and Financial Performance

Referring to the [Table 5](#),  $H_2$  suggested that companies using the tax avoidance practices will also influence the financial performance. Interestingly, beta for the regression is not significant at the confidence interval of 5%. Thus,  $H_2$  is rejected.

The findings also established that tax avoidance has no influence on financial performance even its practice resulted on 0.019 % increase in financial performance. Tax avoidance is not illegal and have no impact on the company performance in Malaysia.

## 5. CONCLUSION

Uncontrolled creative accounting practices may have negative impact on the established financial presentation disclosed by companies.

This practice may tarnish the credibility of accounting profession. The motives of most of the business owners are profit maximization and wealth maximization. However, to maximize profit and wealth, there should be fair presentation of the financial reports that will reflect the true position of the company's affairs and which will not mislead the stakeholders in taking appropriate financial and investment decisions. Effective regulation of financial reporting complement by ethical code of conduct is needed to be implemented in companies to reduce unnecessary creative accounting practices. Strict action needs to be taken to ensure companies abide all accounting rules and regulations.

Due to that, it is important to the regulatory agencies in Malaysia to clearly and specifically require the company to exercise minimum judgement in accounting treatment of transaction that need to be recorded in financial statements. The management should display adequate action in managing the company to embrace the role of agent as custodian of the firm's assets. This is to ensure the company is heading to the same direction

expected by the stakeholders and owners. These can bring financial success together with practicing appropriate tax avoidance and income smoothing that is not against the legal requirement. Same goes with income smoothing, as the management utilising their earnings during the bad period to impress the company performance.

This study could benefit few parties such as for the policy maker in order to identify the key area of their problems or issues to amend or implement the current policy. Accounting standards and policy may not cover every aspect of business transactions and these should not be reasons of companies exploiting the loopholes in the standards.

Any issues in the current standard should be academically discussed and challenged to provide an avenue for policy makers and standard setters to make improvement and suggestions where necessary. Subsequently, policy makers need to responsively react on any issues and provides specific guideline for the companies in applying certain judgment by referring to the accounting standard. This can reduce the negative impact to the company when implement the creative accounting.

Companies can use the result of this study to identify the areas of issues to be focussed in order to improve company performance. Positive company performance can restore the public confident towards the company. Besides that, practitioners can use the results to identify which creative accounting practices have influence and mostly use by company in Malaysia. Creative accounting was developed for solving an accounting issue, where each has a different effect on company performance and position. Therefore, in order to find a solution for accounting issues, the practitioners must implement the ethical behaviour; follow rules and regulation to present the reliability of financial reporting.

This study is without its limitations. Firstly, the explanatory model is between 20.5 percent and 48 percent of the variance that reflects numbers of variables were left out. More variables can be included in the model to enhance the explanatory power of the model. Secondly, this study covered a period of only one year, even though the sample data are large.

Future studies could be conducted to cover more periods of time on the basis that tax avoidance, income smoothing, and financial performance could happen for a considerably length of time. In addition, to obtain a reliability of data, it is suggested to examine for several year. Finally, this study is not focusing on the detail specification of creative accounting technique such as characteristics, motives and others. Therefore, it is difficult to clearly clarify whether the implementation of creative accounting practices may result a bad or good company performance. For further avenue, this study suggests that future studies to carry out similar tests for a longer time period. This will help in more details in observing the companies and the relationships between variables.

**Funding:** We wish to thank the Institute of Quality and Knowledge Advancement and the Institute of Research Management and Innovation of Universiti Teknologi MARA, Malaysia for their support and funding.

**Competing Interests:** The authors declare that they have no competing interests.

**Acknowledgement:** All authors contributed equally to the conception and design of the study.

## REFERENCES

- Adebisi, J. and D.O. Gbegi, 2013. Effect of tax avoidance and tax evasion on personal income tax administration in Nigeria. *American Journal of Humanities and Social Sciences*, 1(3): 125-134. Available at: <https://doi.org/10.11634/232907811301328>.
- Alexandri, M.B. and W.K. Anjani, 2014. Income smoothing: impact factors, evidence in Indonesia. *International Journal of Small Business and Entrepreneurship Research*, 3(1): 21-27.
- Aliabadi, S., A. Dorestani and N. Balsara, 2013. The most value relevant accounting performance measure by industry. *Journal of Accounting and Finance*, 13(1): 22-34.
- Amat, O. and C. Gowthorpe, 2004. Creative accounting: Nature, incidence and ethical issues (No. 749).

- Atik, A., 2009. Detecting income-smoothing behaviors of Turkish listed companies through empirical tests using discretionary accounting changes. *Critical Perspectives on Accounting*, 20(5): 591-613. Available at: <https://doi.org/10.1016/j.cpa.2008.01.003>.
- Badertscher, B.A., S.P. Katz and S.O. Rego, 2013. The separation of ownership and control and corporate tax avoidance. *Journal of Accounting and Economics*, 56(2-3): 228-250. Available at: <https://doi.org/10.1016/j.jacceco.2013.08.005>.
- Bhasin, M., 2016. Creative accounting practices: An empirical study of India. *European Journal of Accounting, Finance & Business*, Suceava, 4(1): 10-30.
- Boterenbrood, R., 2014. Income smoothing by Dutch hospitals. *Journal of Accounting and Public Policy*, 33(5): 510-524. Available at: <https://doi.org/10.1016/j.jaccpubpol.2014.06.005>.
- Dechow, P.M., R.G. Sloan and A.P. Sweeney, 1995. Detecting earnings management. *The Accounting Review*, 70(2): 193-225.
- DeFond, M.L. and C.W. Park, 1997. Smoothing income in anticipation of future earnings. *Journal of Accounting and Economics*, 23(2): 115-139. Available at: [https://doi.org/10.1016/s0165-4101\(97\)00004-9](https://doi.org/10.1016/s0165-4101(97)00004-9).
- Desai, M.A. and D. Dharmapala, 2009. Corporate tax avoidance and firm value. *The review of Economics and Statistics*, 91(3): 537-546.
- Diana, B. and P.C. Madalina, 2007. Is creative accounting a form of manipulation. *Economic Science Series, Annals of the University of Oradea*, 17(3): 935-940.
- Fisher, J.M., 2014. Fairer shores: Tax havens, tax avoidance, and corporate social responsibility. *Boston University Law Review*, 94(337): 337-365.
- Gherai, D.S. and D.E. Balaciu, 2011. From creative accounting practices and enron phenomenon to the current financial crisis. *Annales Universitatis Apulensis Series Oeconomica*, 13(1): 34-41.
- Hamid, F., H.A. Hashim and Z. Salleh, 2012. Motivation for earnings management among auditors in Malaysia. *Procedia-Social and Behavioral Sciences*, 65: 239-246. Available at: <https://doi.org/10.1016/j.sbspro.2012.11.117>.
- Ismael, A.Y.A., 2017. The impact of creative accounting techniques on the reliability of financial reporting with particular reference to Saudi Auditors and Academics. *International Journal of Economics and Financial Issues*, 7(2): 283-291.
- Jensen, M.C. and W.H. Meckling, 1976. Theory of the firm: Managerial behavior, agency costs and ownership structure. *Journal of Financial Economics*, 3(4): 305-360. Available at: [https://doi.org/10.1016/0304-405x\(76\)90026-x](https://doi.org/10.1016/0304-405x(76)90026-x).
- Jones, J.J., 1991. Earnings management during import relief investigations. *Journal of Accounting Research*, 29(2): 193-228. Available at: <https://doi.org/10.2307/2491047>.
- Kamau, C.G., A.N. Mutiso and D.M. Ngui, 2012. Tax avoidance and evasion as a factor influencing 'creative accounting practice' among companies in Kenya. *Journal of Business Studies Quarterly*, 4(2): 77-84.
- Kamau, C.G., A.N. Mutiso and D.M. Ngui, 2012. Tax avoidance and evasion as a factor influencing 'creative accounting practice' among companies in Kenya. *Journal of Business Studies Quarterly*, 4(2): 77.
- Kamau, C.G., G.S. Namusonge and W.O. Bichanga, 2015. Practices influencing creative accounting among corporations listed in Nairobi securities exchange. *Strategic Journal of Business & Change Management*, 2(2): 2230-2248.
- Lee, B.B., A. Dobiyski and S. Minton, 2015. Theories and empirical proxies for corporate tax avoidance. *The Journal of Applied Business and Economics*, 17(3): 21.
- Li, S. and N. Richie, 2016. Income smoothing and the cost of debt. *China Journal of Accounting Research*, 9(3): 175-190. Available at: <https://doi.org/10.1016/j.cjar.2016.03.001>.
- Marin, A.-M., E. Murgu and N.-M. Lesconi-Frumușanu, 2015. The professional accountants perception on creative accounting. *Journal of Business Management and Applied Economics*, 4(6): 1-8.
- Noor, R.M., N.A. Matsuki and B. Bardai, 2008. Corporate effective tax rates: A study on Malaysian public listed companies. *Management and Accounting Review*, 7(1): 1-20.
- Nyabuti, V.O., F. Memba and C.N. Chege, 2015. Influence of creative accounting practices on the financial performance of companies listed In the Nairobi securities exchange in Kenya. *International Journal of Management and Commerce Innovations*, 3(2): 46-59.

- Salome, E.N., M.I. Ogbonna, E.C. Marcel and O.E. Echezonachi, 2012. The effect of creative accounting on the job performance of accountants (Auditors) in reporting financial statement in Nigeria. Kuwait Chapter of Arabian Journal of Business and Management Review, 33(845): 1-30.
- Schipper, K., 1989. Commentary on creative accounting. Accounting Horizons, (December). pp: 91-102.
- Shah, S.Z.A. and S. Butt, 2011. Creative accounting: A tool to help companies in a crisis or a practice to land them into crises. 2011 International Conference on Business and Economics Research IPEDR, 16, IACSIT Press, Singapore. pp: 96-102.
- Stolowy, H. and G. Breton, 2004. Accounts manipulation: A literature review and proposed conceptual framework. Review of Accounting and Finance, 3(1): 5-92. Available at: <https://doi.org/10.1108/eb043395>.
- Tassadaq, F. and Q.A. Malik, 2015. Creative accounting & financial reporting: Model development & empirical testing. International Journal of Economics and Financial Issues, 5(2): 544-551.
- Yadav, B., 2014. Creative accounting: An empirical study from professional prospective. International Journal of Management and Social Sciences Research, 3(1): 38-53.

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