Public Sector Audit Effectiveness in Malaysia: A Mixed Method Pilot Study

¹Nor Raihana Asmar Mohd Noor, *2Noorhayati Mansor

ABSTRACT--- Issues surrounding internal audit effectiveness are still lacking in the current literature especially on the government sector internal audit. Thus, a mixed method pilot test was conducted to assess the effects of four determinants of the effectiveness of internal audit in the public sector. They include (i) internal audit quality; (ii) proficiency of internal auditors; (iii) independence; and (iv) types of audit. In addition, this study proposes the practice of whistleblowing as a mediating variable in the relationships between the four determinants. A total of 30 final responses were received from internal auditors from public universities for this pilot study survey and an interview with a head of internal auditor was conducted to validate the data. The internal auditors involved in the pilot study exhibited positive and constructive responses hence it confirmed the reliability of the determinants. The impacts from the practice of whistleblowing will provide further evidence to strengthen the internal control system and practices in improving the accountability and transparency of the public sector. This paper further supplements previous literatures on internal audit effectiveness by imploring its nature and determinants in the public sector agencies. This paper pioneers the study that focuses on the relationship of the practices of whistleblowing and public sector effectiveness.

Keywords--- Internal Audit Effectiveness, Government Sector Frauds, Mixed Method, Public Sector Audit, Whistleblowing Practice.

I. INTRODUCTION

Effective internal audits are crucial to Malaysian economy since the outcome of the audit can be translated into collecting additional billion dollars of taxpayers' money. Numerous guidelines have been developed and issued to overcome the weaknesses and strengthen its effectiveness. These efforts indicate the seriousness of the government in enhancing internal control to mitigate irresponsible actions. However, ongoing challenges in the efficacy of the internal audit within government agencies are making the issues more critical than before (Shamsuddin et al., 2014).

The effectiveness of public sector audit is of concern of the government because they need to gain public trust. Thus, a mixed method pilot test was conducted to examine the effects of the four determinants of public sector audit effectiveness. The determinants or causing factors include the quality of internal audit, internal auditors' proficiency, independence and types of audit. Accordingly, the present study introduces the practice of whistleblowing as a mediator in the associations between the effectiveness of internal audit and the determinants. The findings are expected to provide the enhancing of the efficacy of internal audit through improvements in the

¹Universiti Teknologi MARA, Kelantan's Branch, Bukit Ilmu, 18500 Machang, Kelantan, Malaysia, Universiti Sultan Zainal Abidin (UniSZA), Gong Badak Campus, 21300 Kuala Nerus, Terengganu, Malaysia.

²*Universiti Sultan Zainal Abidin (UniSZA), Gong Badak Campus, 21300 Kuala Nerus, Terengganu, Malaysia,nhayatimansor@unisza.edu.my

government policy and practices. On the other hand, previous studies on whistle blowing practices include (Alleyne et al., 2013; Razak et al., 2015; Said et al., 2017; Ahmad et al., 2013; Vijayakumar & Nagaraja, 2012). However, Said et al. (2017) claimed that although a system to encourage the practice of whistleblowing has been developed, the adverse effects of its practice have demotivated the reporting of unethical behaviors.

II. LITERATURE REVIEW

1) Audit Effectiveness in Public Sector

As the issues of corruption, fraud and malpractices in the public sector keep increasing, the community has developed a negative perception towards the government. The adverse result from the negative perception automatically tainted the image of the department that is in charge with internal audit. Internal auditing is absolutely crucial especially in an economy that relies solely on the constructed information (Peursem, 2005). Most importantly, the issue has triggered a global demand for refinement and improvements in the internal audit efficacy. The effectiveness of internal audit refers to the auditors' capability in achieving the acknowledged objectives of the organization (Badara & Saidin, 2013). The effectiveness is shaped by the importance as well as the role of internal audit in improving the performance and profitability of an organisation. This positive enhancement is beneficial to ensure reliable financial reporting, avoid damages and/or other consequences and to prevent loss of revenues (Vijayakumar & Nagaraja, 2012). Thus, many countries have strengthened their public sector audit to improve the governments' performance and public service delivery. The internal audit efficiency is associated with the achievement of organisations in realising their objectives and to ensure the internal control system is functional and effective (Fadzil et al., 2005).

An effective internal audit assists in achieving the organisation's objective and the effectiveness can be affected by any factors including proficiency and internal auditors' independence. The audit process can bring various forces on the auditees. Despite the establishment of several monitoring authorities to reduce corruption and white-collar crime, Malaysia continues to be rated as one of the corrupted nations. Based on 2019 Corruption Perception Index (CPI), Malaysia is at the 55th place out of 176 countries. It is a worrying signal because a score above 50 suggests a weak and questionable level of transparency.

Overall, the majority of the prior studies incorporate the Institute of Internal Auditors (IIA) standards in their measurement criteria. However, none has examined the role of the whistleblowing practice. Therefore, this study will include the principles established by the International Standards for Professional Practice of Internal Auditing (ISPPIA) as a determinant of internal audit's effectiveness. According to the 2016 ACIIA Survey, Malaysia is one of the countries that applies ISPPIA in auditing especially in the public sector.

2) Internal Audit Quality

According to previous studies (Ahmad et al., 2009; Alzeban & Gwilliam, 2014; Cohen & Sayag, 2010; Mihret & Yismaw, 2007), one of the determinants of the efficacy of internal audit is internal audit quality. This determinant is elucidated by the offices' ability to supply useful and necessary audit findings and recommendations (Mihret & Yismaw, 2007). Hence, it relies on the expertise of staff, the quality of the service rendered and successful planning, implementation and communication of audit reports to the public. Previous empirical studies stressed on the internal audit's proficiency, objectivity and quality of work (Ahmad et al., 2009). Therefore, internal

audit quality is considered as an audit process because it includes the drafting, implementation and communication of audits, as well as audit findings and recommendations.

This research also seeks to observe the associations that are related to the effectiveness of public sector audit and the quality of internal audit which comprises of three phases. The first phase of the audit process is to plan and execute the audit, the second phase is to conduct audit activities and the last phase involves report drafting, providing recommendations and conducting follow-ups. All these determinants are essential as they reflect the efficacy of the quality and the effectiveness of audit in the public sector. On the other hand, Cohen and Sayag (2010) also documented the required standards, planning and execution to improve its efficiency. Therefore, internal audit quality must conform to the government and international standards such as ISPPIA and the International Organisation of Supreme Audit Institutions (INTOSAI).

3) Proficiency of Internal Auditors

Recruiting skillful staff and good staff management contribute to the successful operation of the division of internal audit (Ahmad et al., 2009; Cohen & Sayag, 2010; Noor & Mansor, 2019). Proficiency is related to the staff' competency and the department's environment in carrying out an assignment based on the staff's professional or skillful work experiences, academic achievement, budget, training and hiring policies, capacity of the department, internal audit manual and the willingness of the staffs for their continuous career development (Berhe et al., 2016). Mihret and Yismaw (2007) concluded that what limits an internal audit department to provide a compelling service is the constraint of the technical staff and their poor proficiency as well as high number of staff turnover. This statement is substantiated by Ahmad et al. (2009) who studied on the internal audit efficacy local sectors in several states in Peninsular Malaysia. The results and findings concluded that a lack of qualified audit staff was the biggest challenge in conducting an effective internal audit. Consequently, auditors face difficulties when performing audit activities.

4) Independence

Independence is the absolute freedom granted to internal auditors and it also includes their achievement in an organisation's development (Drogalas et al., 2015). Unlike external auditors, internal auditors may face restrictions as they are the staff of the organization (Shamsuddin et al., 2014). Meanwhile, external auditors report directly to the auditor general so they do not have as much restrictions as the internal auditors. Internal audit must function independently when it comes to auditing where it must be free from daily internal processes (Florea, 2013). Moreover, they must be able to work on their own capacity in all divisions, departments and functions of the organisation.

5) Types of Audit

Types of public sector audits can be classified into three classes which are financial, compliance and performance audit. The audited departments will be audited based on these three elements that have been outlined by the Malaysian National Audit Department. These audit works are conducted to ensure the organizations are following the government regulations and procedures (Noor & Mansor, 2019).

6) Practice of Whistleblowing

Whistleblowing refers to the act of the staff in reporting any fraud or wrongdoing in their organization (Said et al., 2017). The staff may include an employee, public, supplier or customer who confidentially blew the whistle on the wrongdoing that surrounded the organization. The government encourages whistleblowing practices through the introduction of Whistleblower Protection Act 2010 (WPA). WPA 2010 is a regulation enacted to overcome fraud and other wrongdoings by advocating and assisting the act of disclosing the misconducts in any organization. This act was established to shield the individuals who make such reports from harmful action, to provide the mechanisms of investigation as well as to secure remedies that are associated to the case. However, despite the implementation of the law, the implementation and implication is still poor as the number of the studies carried out on it is still limited (Said et al., 2017).

Accountants and internal auditors in the Malaysian government do not extensively practice the whistleblowing policy (Othman et al., 2015). PWC (2014) report claimed that whistleblowing is still not accepted although some organisations have effective whistleblowing in practice. It is still questionable whether the organisations encourage hotline or web-based reporting if the stakeholders detect irregular activities in the organisations. Thus, it is advisable for the current changing environment to explain this issue by providing clear communication to the public on its implementation. There is a need for a well-structured quantitative study on examining the barriers of practice of whistleblowing (Razak et al., 2015).

III. METHODOLOGY

Before the actual or full-scale research was carried out, the researchers conducted a pilot test to assess the framework of the research and to test some of the technical issues.

1) Quantitative Study

The pilot study took place for almost a week in October 2018 to complete this phase. 30 responses were collected from public internal auditors of public universities for this pilot study survey. It profoundly assisted in assessing the questionnaire, improving it effectively and in avoiding errors instigated by the respondents' misunderstanding of the questions.

The reliability of the questionnaire using the pilot test was successfully tested. Reliability refers to the appropriateness and uniformity of the instrument in measuring the concept, clearly free from biases and errors (Asiedu & Deffor, 2017). The reliability of the consistent measurement of various items in the survey instrument was tested by using Cronbach's Alpha. It is a reliability coefficient that shows positive relationships between the items. It calculates the average interconnections amongst the items. Sekaran and Bougie (2013) stated that higher reliability is established when the reading is closer to 1.

In respect to the reliability test, the scale of the reliability in this pilot study data was between 0.933 to 0.978. It is in tandem with the Cronbach's Alpha test and the result is shown in Table 1. The reliability is established. PWC (2014) claimed that 0.60 is the minimum value for the reliability coefficient level, while 0.7 is acceptable and 0.8 is considered good. Hence, the result proves the reliability of the variables in the study.

Table 1: Summary of total number of each item for each instruments and their reliability coefficient

Construct	Number of Items	Cronbach's Alpha	
Internal Audit Quality	15	0.942	
Proficiency of Auditors	12	0.968	
Internal Audit Independence	10	0.949	
Types of Audit	10	0.933	
Practice of Whistleblowing	6	0.943	
Effectiveness of Public Sector Audit	13	0.978	

2) Qualitative Study

The interview scripts were assessed upon collecting the survey data. The participants who were involved in the pilot study are the participants who have fulfilled the participation requirements. The pilot study was carried out to ensure that the interview questions were understandable to the participants. However, the findings from this study were not included in the final results.

Table 2: Key informant profile for pilot study

N	o.	ID	Types of Public Sector Agency	Location of Public Sector Agency	Position
1)	Dr. Z	Federal Statutory Body	Kelantan	Head of Internal Auditor

Based on the outcome of the pilot study, the researcher revoked and amended some of the elements in the original interview script. For example, a change has been made to the validation question. Moreover, a graphical diagram was provided to enhance the participants' knowledge for the full-scale study because some participants found it hard to understand the mediation process.

IV. DISCUSSION AND CONCLUSION

Performing a mixed-method pilot study is crucial in assessing the validity of the main research which is on the public sector audits' efficiency. The reliability of the determinants that contribute to the effectiveness of public sector audit is established through the positive feedback given in the pilot study. This study does not only emphasize on the importance of conducting pilot studies to enhance research designs, but it also extends the knowledge on pilot studies and contributes to the growth of public sector audit. The implication of the study can be seen from its effects on theoretical and practical aspects. For example, in regard to the theoretical aspect, compared to the previous literatures that centered their attention on private sector audit, this study explores the nature and the determinants in the public sector. Moreover, the findings are also practically essential. The regulators and policy makers should consider the findings of the study to initiate the appropriate efforts for the continuous internal audit efficacy and to mitigate the growing cases of fraud. However, there are some limitations to the study especially in its sample size because the concentration of public sector auditors in higher education is thin. The result may be questionable as the small sample size could have influenced the result hence it could not be widely generalized to the whole population. Future studies are recommended to observe the effectiveness of internal audit in all public sector agencies.

V. ACKNOWLEDGEMENTS

The authors would like to thank and acknowledge the very helpful comments provided by the editors. The authors also would like to express their gratitude to Universiti Teknologi MARA Kelantan Campus Malaysia for financial assistance, and the Ministry of Education Malaysia for their continuous support in this project. We would like to express our appreciation to all the authors for their informative contributions and the reviewers for their support and constructive critiques in making this special issue possible.

REFERENCES

- 1. Shamsuddin, A., Manijegar, D. B., Kirupanangtan, K., Rahman, S., and Selvanathan, S. Factors that determine the effectiveness of internal audit functions in the Malaysian public sectors. International Journal of Business, Economics and Law, 2014, 5(1): 9–17.
- 2. Alleyne, P., Hudaib, M., and Pike, R. Towards a conceptual model of whistle-blowing intentions among external auditors. British Accounting Review, 2013, 45(1): 10–23.
- 3. Razak, S. N. A. A., Noor, W. N. B. W. M., and Zakaria, M. Breaking the silence: The efficacy of whistleblowing in improving transparency. Science Research Journal, 2015, 3(4): 35–39.
- 4. Said, J., Alam, M. M., Mohamed, D. I. B., and Rafidi, M. Does job satisfaction, fair treatment, and cooperativeness influence the whistleblowing practice in Malaysian Government linked companies? Asia-Pacific Journal of Business Administration, 2017, 9(3): 220–231.
- 5. Ahmad, S. A., Smith, M., and Ismail, Z. Internal whistleblowing intention by internal auditors: A prosocial behaviour perspective. Malaysian Accounting Review, 2013, 12(1): 145–181.
- 6. Vijayakumar, A., and Nagaraja, N. Effectiveness of internal audit in risk management at public sector enterprises. BVIMR Management Edge, 2012, 5(1): 1–8.
- 7. Peursem, V. Conversations with internal auditors The power of ambiguity. Managerial Auditing Journal, 2005, 20(5): 489–512.
- 8. Badara, M. S., and Saidin, S. Z. The relationship between audit experience and internal audit effectiveness in the public sector organizations. International Journal of Academic Research in Accounting, Finance and
- 9. Fadzil, F. H., Haron, H., and Jantan, M. Internal auditing practices and internal control system. Managerial Auditing Journal, 2005, 20(8): 844–866.
- 10. Ahmad, N. H., Othman, R., Othman, R., and Jusoff, K. The effectiveness of internal audit in Malaysian public sector. Journal of Modern Accounting and Auditing, 2009, 5(9): 53–62.
- 11. Alzeban, A., and Gwilliam, D. Factors affecting the internal audit effectiveness: A survey of the Saudi public sector. Journal of International Accounting, Auditing and Taxation, 2014, 23(2): 74–86.
- 12. Cohen, A., and Sayag, G. The effectiveness of internal auditing: An empirical examination of its determinants in Israeli organisations. Australian Accounting Review, 2010, 20(3): 241–255.
- 13. Mihret, D. G., and Yismaw, A. W. Internal audit effectiveness: An Ethiopian public sector case study. Managerial Auditing Journal, 2007, 22(5): 470–484.
- Noor, M. N. R. A., and Mansor, N. Proficiency of internal auditors and effectiveness of public sector audit in malaysian public organizations. International Journal of Advanced Science and Technology, 2019, 28(15): 164–171.
- 15. Berhe, A. G., Mihret, A. G., and Ali, M. S. The effects of internal audit on performance of Ethiopian

- financial institutions. Journal of Finance, Accounting and Management, 2016, 7(2): 1–30.
- 16. Drogalas, G., Karagiorgos, T., and Arampatzis, K. Factors associated with internal audit effectiveness: Evidence from Greece. Journal of Accounting and Taxation, 2015, 7(7): 113–122.
- 17. Florea, R. R., and Florea, R. R. Internal audit and corporate governance. Economy Transdisciplinarity Cognition, 2013, 16(1): 79–83.
- Noor, M. N. R. A., and Mansor, N. The mediating role of whistleblowing practice between types of audit and effectiveness of public sector audit. International Journal of Advanced Science and Technology, 2019, 28(15): 140–147.
- Othman, R., Aris, N. A., Mardziyah, A., Zainan, N., and Amin, N. M. Fraud detection and prevention methods in the Malaysian public sector: Accountants' and internal auditors' perceptions. Procedia Economics and Finance, 2015, 28: 59–67.
- 20. PWC. Economic Crime: A Threat to Business Globally, Global Economic Crime Survey. Miami: Price Waterhouse Corporation Publisher, 2014.
- 21. Asiedu, K. F., and Deffor, E. W. Fighting corruption by means of effective internal audit function: Evidence from the Ghanaian public sector. International Journal of Auditing, 2017, 21(1): 82–99.
- 22. Sekaran, U., and Bougie, R. Research Methods For Business A Skill Building Approach. John Wiley and Sons, New Jersey, 2013.