

SME Performance Measurement: A Technical Review of Malaysia

Nor Mahirah Mustapha, Shahryar Sorooshian

Abstract: This article highlights the background of the problems encountered by SMEs which is related to SMEs performance. It also indicates that the financial-based performance indicators are insufficient to judge the overall performance of SMEs. The importance of shifting focus from short term to long-term objectives of the SMEs business is briefly stated. The literature review method was applied to explore the SME performance problems, which has been outlined and justified by the significance of the need of more research efforts in this field and especially in Malaysia. The specific solution to the problem should be reviewed so that SMEs performance can be improved further in the future.

Index Terms: Small and Medium Enterprises (SMEs), performance, Performance Management System (PMS), Malaysia.

I. INTRODUCTION

A question that emphasises the importance of SMEs is that why should we care about the Small and Medium Enterprises (SMEs) business performance? Evidence has shown that the SMEs business in either developed or developing countries provide a significant positive contribution to the nation's economic development. It was reported that SMEs contribute a high establishment rate and the estimation of the contribution of this industry to every nation's Gross Domestic Product (GDP) by formal SMEs increases up to 40% of the national income and provides more than 60% of total employment in emerging economies [1].

The SMEs primarily involve vital business activities such as food trade, furniture, clothes, and even household needs. These products offer a chance to improve living standards by providing necessities. In addition, they are contributing by producing job opportunities that are necessary for elevating life standards because this industry widely uses workforce for its activities. Hence, the SMEs can underpin the productivity advances that could improve the nation's future prosperity and wealth creation [3]. The importance of the SMEs for the economy is observed from its investment and the number of employees. For these reasons, the development of the SMEs has become the national agenda of every government. In Malaysia, SMEs are the main contributor toward strengthening the Malaysian economy [1].

Due to its importance to the Malaysia's economy, the Malaysian government has paid more focus on SME's development since the early 1970s [4]. SME Corporation [1] pointed out that based on the growth trends of SMEs between 2011 and 2016, the contribution of establishment increased to 98.5% on 1st January 2013, compared to the previous years where only 97.3%. SMEs successfully provided job opportunities to 3,669,259 individuals in 2017. Fig. 1 shows the contribution of SMEs Employment for 2014-2017.

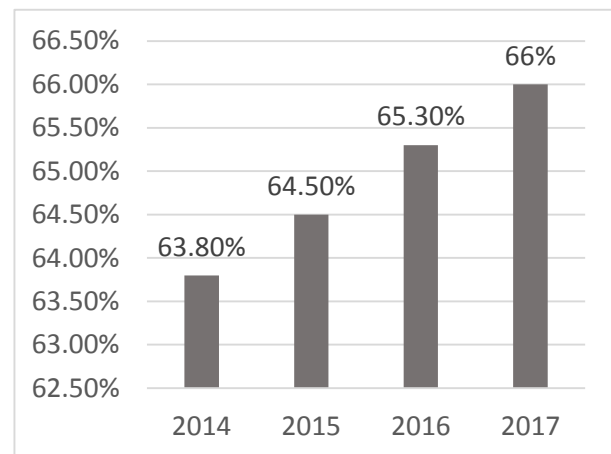


Fig 1. Contribution of SMEs Employment [1]

Since SMEs play a significant role in economic development, Performance Management System (PMS) has been developed by previous researchers for performance management because it is the only way to manage and measure performance [5]. Valmohammadi and Servati [6] define PMS as the process of quantifying the efficiency and effectiveness of actions. Particularly, it is an arrangement where organizations analyses and evaluate the performance and then used the results to access the level of successfulness of their activities. Thus, they can avoid failures and take initiatives to improve their performance by focusing specifically on unstable performance indicators [7]. SMEs are considered the backbone of the Malaysia economy since SMEs attributes to 98.5% of the business establishments in Malaysia. Fig. 2 shows the SMEs Establishment in Malaysia.

Revised Manuscript Received on June 05, 2019

Nor Mahirah Mustapha, She is a PhD student with Universiti Malaysia Pahang.

Shahryar Sorooshian, He is with Universiti Malaysia Pahang.

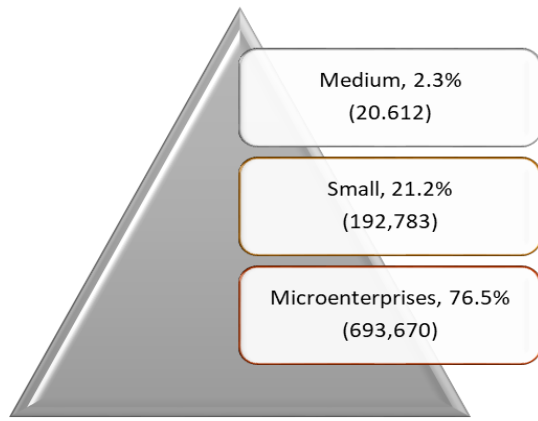


Fig. 2. SMEs Establishment in Malaysia[1]

Traditionally, earlier conceptions of PMS mainly focused on the financial-based performance indicators as the essential elements of the business are dependent on the ability to manage financial issues [8]. However, the sole dependence on financial-based performance indicators is insufficient to judge the overall performance of an organisation. This is because financial indicators are constantly changing based on economic conditions, partially explain the actual performance, and only reports the short-term goals of businesses [9]. In addition, the analysis of business performance is limited in scope because it focuses only on financial performance indicators [10]. Despite prominent efforts and developments in the financial-based management practices to bring improvements and efficiencies in organisation performance, it is still proven to be difficult to achieve success in many SMEs.

The increase of GDP in Malaysian economy is not encouraging at only a 0.5% compared to the previous year, 2016. The formation rate is very high. However, the contribution to the country's economy has increased very little, indicating that the failure rate of SMEs in Malaysia is in the risk phase compared to large industries performance [11, 12]. Fig 3 shows the SMEs GDP Contribution for Malaysia in domain of 2016-2017.

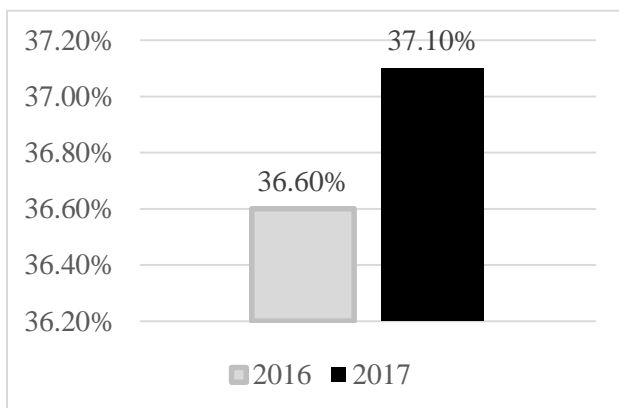


Fig. 3. SMEs GDP Contribution [1]

Sorooshian [13] highlighted that the failure rate is proof that the current PMS is not very effective for SMEs. What is more worrying is that failure can lead to discontinuance of the business or its primary purpose. Failure is defined accordingly to its consequences; it must be noted, that failure

is a process, which has origins, symptoms, and possible preventions [2]. Based on the goals of the company, failure can be considered as the situation where certain profit has not been earned or a certain problem has not been solved [14]. Sometimes, it happens when the business does not meet the anticipated standard or it strays from the real objective. Good performance usually leads to success while poor performance will lead to failure. Furthermore, the average life span of many SMEs is only five years [15].

These situations show that SMEs experience a difficult situation in the turbulent economy, therefore, managing the performance becomes essential to avoid failure [16]. According to Chong [17], Malaysia might face harmful social and economic consequences that may affect its industrial development if the rate of failure is not mitigated. For example, a study from Silvanaviciute [18] proved that SMEs failure might negatively impact social effects, the rate of domestic sales, and export. Economic slowdown and increase of the unemployment rate will also occur. These scenarios are supported by Patel N. [16] where SMEs in Malaysia could not stay longer in the market with competitive enterprises in the same business field. Ineffective PMS provides no appropriate clarification to solve the problem. Regarding this issue, SMEs should be prepared with strategic planning in managing the business to compete in the market.

From the view of government support, despite demanding absolute attention, assistance from the authorities and programmes targeting new entry SMEs were provided, however, the rate is still increasing [2, 19, 20]. According to Zulkiffli [9], the main reason for SMEs closure is lack of awareness among SMEs owners on business challenges, especially in terms of financial and management skills. A study from Ihua [21] shows that internal factors are responsible for SMEs failures. Hence, more effort needs to be focused in the management development for SMEs. Undoubtedly, this failure can be a nightmare for not only the business owners but also a nation. It was reported that SMEs failure contributes to the loss of job opportunities and has directly affected Malaysia's economy [22].

Moreover, previous systems developed to evaluate the performance were specially designed for large organisations [7] such as Balanced Scorecard, Theory of Constraint, Performance Measurement Matrix, European Foundation for Quality Management, and Integrated Performance Measurement System, and many more. Insufficient models were developed for SME and the indicators used for each model are distinctive. Therefore, it could be not suitable for Malaysian SMEs. Wu [23] supported that the models designed for large organisations are difficult to be used for SMEs because the methods used require complex instruments and need specific competence from its users. Besides that, the documents require too much information to fill in the large quantity of the questionnaire that makes such undertakings unsuitable and improper for regular performance monitoring. While according to Zulkiffli [9], SMEs did not practice revised business indicators because determining the appropriate indicator is a high-cost activity. Previously, many



organisations have invested much money in determining the most appropriate indicators as there are countless performance indicators [24]. It was reported that there is a lack of alignment between the strategic intents of an enterprise and what is measured [9]. Therefore, it creates difficulties for the manager to choose which one is most needed. It is also supported by Moullin [25] who highlighted organisation that it is difficult to build cost-effective PMS and examine meaningful indicators that can improve performance without leading to negative consequences.

Performance indicators constantly change as SMEs background is easy to change. Even the definition of SME differs according to country due to several demographics' factors and characteristics including location, size, structure, age, number of employees, sales volume, ownership through innovation and technology. This is a solid reason why performance indicators must be current. In addition, Melnyk, Bititci [26] claimed that if these indicators and metrics are not revised or incorrectly revised, it can adversely affect the performance of SMEs. It is important to ensure PMS uses appropriate performance indicators and relevant as it will affect the business interests [27]. Rompho and Boon-itt [28] supported as they pointed out that improper PMS could give negative feedback and the result can indirectly affect to the organisation and finally may harm the whole organisation structure. Therefore, it is vital to select balanced performance indicators to match the situation in which they are to be used and it is necessary to combine various types of performance indicators to provide a complete and balanced view of a company or the operations under evaluation [9].

Providing a set of performance indicators that could guide the SMEs in achieving successful business is an effective method to solve this problem. This is because Hofstrand [27] asserted that successful entrepreneurs should have a detailed knowledge of the key factors needed for their success. These factors may represent themselves on a smaller scale within the organisation. Nevertheless, on a large scale, they have affected the performance of the industry, and more importantly the overall national economic development. Consequently, it is expected that SMEs must also consider factors that have direct influence on their business objectives, and in turn, affect the nation's economic growth.

In particular, the field of performance measurement for business lacks the required knowledge [29] and this is supported by Syafiah Norsyahira, NorFilianie [8] as there are minimal studies that are focused on developing PMS in Malaysia. Therefore, there is a need to develop a performance measurement framework to improve the quality indicators that are valuable for organisations and significantly addresses both internal and external indicators [30]. PMS has the capability to evaluate how well organisations are managed and the value they deliver to the customers and other stakeholders [31]. SME need a PMS with business performance indicators as SMEs organisation are established on conducting business activities and make profits to sustain in the market. According to Zeinalezhad, Muriati [32], SMEs have various definitions as they are influenced by demographics' factors and characteristics including location, size, structure, age, number of employees, sales volume, ownership through innovation and technology in each

country. Thus, the use of general PMS to measure the performance of SMEs is irrelevant as there may be a lack of performance indicators which impact the measurement result. The main benefit of using PMS for SMEs is that it is able to distinguish that SME is a profitable organisation and not a charity or government organisation.

In addition, business organisations these days operate in an intricate and turbulent environment which causes abrupt changes in their structures, processes, and other organisational aspects [33]. As a result, managers have to be prepared for the unpredictable future [4]. The business industry becomes more challenging from time to time. Therefore, more decisions that are crucial involve highly complicated and tricky problems. Hence, new managerial approaches such as specific performance measurement model for SMEs are needed to allow organisations to grow and increase their competitiveness and capacity for value creation. In particular, excellent management must be coupled with the adoption of business process management itself which are adaptable and flexible that can be used to differentiate from other competitors for successful business practices [33].

II. METHODOLOGY

Google is the greatest search engine to explore published and unpublished article and reports. Hence, this study selects the Google search engine as the main source to gather related documents for review. Therefore, the main methodology of this study is a qualitative-research literature-review.

In this study, a review of related work from journal papers, articles, and newspaper has been done in detail with emphasize on Malaysia. The study present that SMEs are facing failure. With this literature review technique, the researcher concludes with the need for a deeper knowledge regarding SMEs performance issue, which should be properly analyzed.

III. RESULTS

This chapter has previously highlighted the awareness of the failure rate of Small and Medium Enterprises (SMEs) in Malaysia. The fact that many SMEs cannot sustain their business could no longer be denied. SMEs experienced significant failures of 50% in the first five years after starting a business and 70% of the SMEs failed to proceed after ten years of establishment [34, 35]. According to Bureau of Labor Statistics [36], statistics show that 50% of companies in the United States fail to survive after five years and only one-third survive after ten years of business.

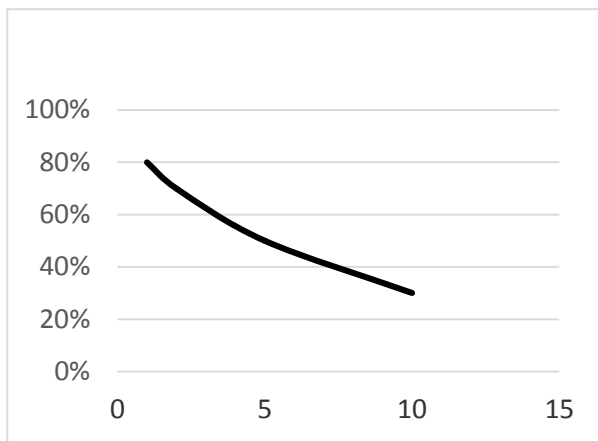


Fig. 4. Survival rate [16]

SMEs in Malaysia share the situation illustrated in Fig.4. Kee-Luen, Thiam-Yong [37] claimed that many of them failed in the first five years. Ahmad and Seet [38] stated that failure rate of SMEs in Malaysia was 60% against failure rate in Australia, which is only 23%. Furthermore, the National Economic Advisor Council [39] reported that the SME Master Plan 2012 to 2020 states that 42% of the SMEs which started business in 2000 failed to continue their business in 2005. Recently, during a programme of entrepreneurship challenge, the Ambank Managing Director emphasises that almost 80% of SMEs could not survive after three years of operation [40].

Ihua [21] discussed that most SMEs in Malaysia are plagued by management decision-making problems. The Malaysian International Trade and Industry Ministry supported that statement by claiming that SMEs failed to survive due to poor management planning and lack of skills to improve performance [41]. Despite notable advances to improve the efficiency and performance, having various government assistance and programmes targeting the new entry SMEs success [1] still proves to be difficult for many SMEs to achieve, with business failures in the SMEs remaining consistently high compared to other industries. Therefore, to ensure an effective and successful decision-making process, the creation of a system to evaluate performance is vital. Basically, PMS is an evaluation system to measure the organisational or company performance. Therefore, PMS plays an important role in supporting the decision making and evaluation process [42].

Previously, PMS has been developed by previous researchers for performance management. According to Garengo, Biazzo [43], there are many types and tools of PMS practised around the world. Each PMS or tool has its own underlying theories, definition, features, strengths, and weaknesses [44]. Each existing model has unique characteristics. Nevertheless, researchers still seek to prove the advantages and plus points of their models. However, the extensive selection of PMS can be confusing for managers or decision-makers to decide on a PMS model that is most suitable for their organisation or company. Nurul hasanah, Zulnaidi [22] have also stressed that the increasing number of failed businesses indicates that the performance factors used in the previous studies did not provide a full picture of how the factors drive the success of SMEs.

Many PMS placed a great emphasis on the financial-based performance indicators, depending solely on financial-based performance which is always changing based on the economic change. Thus, it is deemed insufficient to judge the overall performance of the organisation. Many researchers have focused on developing PMS for large organisations [45] which is not suitable to be used by SMEs. Based on the literature, performance measurement still lack a well-grounded basis in choosing the relevant factors [46]. The lack of research and findings of PMS in SME context, especially in Asia, is quite alarming [8]. Many managers and entrepreneurs are still looking for a suitable and relevant model to be employed in their companies, especially amongst Malaysian SMEs [13]. Furthermore, there is no consensus of a set of performance indicator that can be used in SMEs. Due to this reason, many SME managers are confused when deciding which performance measurement model to choose and implement in their company or organisation.

IV. CONCLUSION

Recently, the need for a suitable PMS has attracted a great interest of both practitioners and academicians due to the economic climate. Ates, Garengo [47] supported that SMEs must revise and identify the key performance indicators periodically. In other respects, based on the literature reviewed, there is an inadequate logical foundation for the relationships between all the factors, and to the best of the researcher's knowledge, none of them has direct links with SMEs strategic activities. Due to these reasons, the study has identified a need to study the existing PMS on their applicability and indicators adoption for the development of PMS based on SMEs in the Malaysia context.

ACKNOWLEDGMENT

This article thanks to MyBrain Scholarship from Ministry of Higher Education, Malaysia.

REFERENCES

1. SME Corporation, M., Annual Report 2016/17. 2017: Kuala Lumpur.
2. Rahman, N.A., Z. Yaacob, and R.M.J.W. Radzi, The challenges among Malaysian SME: A theoretical perspective. 2016. 6(3): p. 124-132.
3. Medalla, E.M. and M.C. Mantaring, Mainstreaming SMEs: Promoting Inclusive Growth in APEC. 2017.
4. Khalique, M., Do Malaysia and Pakistan are suitable for a comparative study of SMEs: An intellectual capital perspective? *INTERDISCIPLINARY JOURNAL OF CONTEMPORARY RESEARCH IN BUSINESS*, 2011. 3(8): p. 98-107.
5. Halachmi, A., Performance measurement is only one way of managing performance. *International Journal of Productivity and Performance Management*, 2005. 54(7): p. 502-516.
6. Valmohammadi, C. and A. Servati, Performance measurement system implementation using Balanced Scorecard and statistical methods. *International Journal of Productivity and Performance Management*, 2011. 60(5): p. 493-511.
7. Sorooshian, S., et al., Review on performance measurement systems. 2016. 7(1): p. 123.
8. Syafiah Norsyahira, J., et al., Performance Measurement System. *International Journal of Management*, 2015. 2(2).
9. Zulkiffli, S.N.A., Business performance for SMEs: Subjective or objective measures? *Review of Integrative Business and Economics Research*, 2014. 3(1): p. 371.

10. Michael L. Roberts, Bruce R. Neumann, and Eric Cauvin, Individual Performance Measures: Effects of Experience on Preference for Financial or Non-Financial Measures. Mary A. Malina (ed.) *Advances in Management Accounting (Advances in Management Accounting)*, 2017. Volume 28: p. pp.191 - 221.
11. Nordin, N., A. Hamid, and Woon, 'Factors affecting profitability of women entrepreneurs business in Malaysia'. Annual Summit on Business and Entrepreneurial Studies (ASBES 2011), 2011: p. pp. 972-985.
12. Abdullah, N.A.H., et al., Modelling small and medium-sized enterprises' failure in Malaysia. 2016. 28(1): p. 101-116.
13. Sorooshian, S.J.C., Adaptation of a Business Performance Measurement System for Malaysian Smaller Enterprises. 2017. 18(157): p. 124.
14. Mason, M.K., Research on Small Businesses. 2009.
15. Abdullah, F., et al., Developing A Framework of Success of Bumiputera Entrepreneurs. *Journal of Enterprising Communities; People and Places in the Global Economy*, 2009. 3(1): p. 8-24.
16. Patel N., 90% Of Start-ups Fail: Here's What You Need To Know About The 10%. 2015.
17. Chong, W., 'Critical Success Factors for Small and Medium Enterprises: Perceptions of Entrepreneurs in Urban Malaysia'. *Journal of Business and Policy Research*, 2012. vol. 7(4): p. pp. 204-215.
18. Silvanaviciute, S., Estimating the Negative Impact of Business Failures in Lithuania. *Social research*, 2008(4): p. 14.
19. Beh, B., 'Why small businesses bite the dust,' 2013.
20. SME Corporation, M., Annual Report 2012/2013. 2013, SME Corp. Malaysia.
21. Ihua, U.B., SMEs key failure-factors: a comparison between the United Kingdom and Nigeria. *Journal of Social Sciences*, 2009. 18(3): p. 199-207.
22. Nurul hasanah, A.R., Y. Zulnaidi, and M.R. Rafisah, The Challenges Among Malaysian SME: A Theoretical Perspective. *World Journal of Social Sciences*, 2016. Vol. 6(No. 3): p. Pp. 124 – 132.
23. Wu, D., Measuring performance in small and medium enterprises in the information and communication technology industries, in A Thesis Submitted in Fulfilment of the Requirements for the Degree of Doctorate of Philosophy. 2009. p. 1-209.
24. Ying, F., J. Tookey, and J.J.B.A.I.J. Seadon, Measuring the invisible: a key performance indicator for managing construction logistics performance. 2018(just-accepted): p. 00-00.
25. Moullin, M., Performance measurement definitions-Linking performance measurement and organisational excellence. *International Journal of Health Care Quality Assurance*, 2007. 20(3): p. 181-183.
26. Melnyk, S.A., et al., Is performance measurement and management fit for the future? *Management Accounting Research*, 2014. 25(2): p. 173-186.
27. Hofstrand, D., "Should you participate in value-added agriculture?," in *Ag Decision Maker Newsletter*. 2015, Iowa state university.
28. Rompho, N. and S. Boon-itt, Measuring the success of a performance measurement system in Thai firms. *International Journal of Productivity and Performance Management*, 2012. 61(5): p. 548-562.
29. Franco- Santos, M., et al., Towards a definition of a business performance measurement system. *International Journal of Operations & Production Management*, 2007. 27(8): p. 784-801.
30. Keong Choong, K., Are PMS meeting the measurement needs of BPM? A literature review. *Business Process Management Journal*, 2013. 19(3): p. 535-574.
31. Kogetsidis, H., "Systems approaches for organisational analysis". *International Journal of Organizational Analysis*, 2011. Vol. 19 (No. 4): p. pp. 276-287.
32. Zeinalzhad, M., M. Muriati, and S. Shahnorbanun, A Study on Benchmarking Models and Frameworks in Industrial SMEs: Challenges and Issues. *Proceeding of the International Conference on Advanced Science, Engineering and Information Technology 2011*, 2011.
33. Saidi Mehrabad, M., M. Anvari, and M. Saberi, Targeting performance measures based on performance prediction. *International Journal of Productivity and Performance Management*, 2011. 61(1): p. 46-68.
34. O'Boyle, E.H., et al. What moderates moderators? A meta-analysis of interactions in management research. in *Academy of Management Proceedings*. 2015. Academy of Management Briarcliff Manor, NY 10510.
35. SBA, Small Business Administration. U.S. Small Business Administration, 2017(Office of Advocacy).
36. Bureau of Labor Statistics, Survival rates of establishments, by year started and number of years since starting, 1994-2015. 2017.
37. Kee-Luen, W., K. Thiam-Yong, and O. Seng-Fook. Strategic planning and business performance: A study of SMEs in Malaysia. in *Proceedings of 3rd Asia-Pacific Business Research Conference*, Kuala Lumpur, Malaysia. 2013.
38. Ahmad, N.H. and P.-S.J.I.J.o.E.V. Seet, Understanding business success through the lens of SME founder-owners in Australia and Malaysia. 2009. 1(1): p. 72-87.
39. National Economic Advisor Council, Part 1: Strategic Policy Direction. National Economic Advisory Council New Economic Model for Malaysia, 2009.
40. Bernama, AmBank launches entrepreneurship challenge 'AMBANK BIZRACE'. 2017: Bernama MREM.
41. The Malaysian Reserve. 2017.
42. Neely, A., *Business Performance Measurement: unifying theory and integrating practice*. 2007: Cambridge University Press.
43. Garengo, P., S. Biazzo, and U.S. Bititci, Performance measurement systems in SMEs: A review for a research agenda. *International journal of management reviews*, 2005. 7(1): p. 25-47.
44. Owolabi, F., D.T. Adetula, and A. Taleatu, Balanced score card and performance evaluation in Small and Medium Enterprises (SMEs) in Nigeria. 2016.
45. Naguit, M.C.G., *Balanced Scorecard practices of medium and large enterprises in the Province of Pampanga*. 2017.
46. Nor Filianie, A., *The applicability analysis of performance measurement system for small and medium enterprises in Malaysia*. 2016, Universiti Malaysia Pahang.
47. Ates, A., et al., The development of SME managerial practice for effective performance management. *Journal of Small Business and Enterprise Development*, 2013. 20(1): p. 28-54.

AUTHORS PROFILE



Nor Mahirah Mustapha She is a PhD student with Universiti Malaysia Pahang. She has more than 10 published arts including journals and conferences.



Shahryar Sorooshian He is with Universiti Malaysia Pahang. He has more than 300 published arts including journals, conferences, and books.