

The Usage of Computerised Accounting System: The Case of Small and Medium Enterprise in Malaysia

Amelia, Z. Fariha, Azliza

Faculty of Computer, Media & Technology, TATI University College, 24000Terengganu, Malaysia.

ARTICLE INFO	ABSTRACT
Article history:	Malaysian Small and Medium Enterprise (SMEs) serve as a dynamic and integral part of
Received 20 November 2013	the Malaysian Industrial Development. The strategic use of information and
Received in revised form 24	communication technology among SMEs is seen as one of the key elements that ensure a
January 2014	significant difference in their effort for success. Few attempts have been made to study
Accepted 29 January 2014	the usage of Computerised Accounting System (CAS), especially in the context of SMEs
Available online 5 April 2014	sized firms in Malaysia. This issue is important because results from previous studies
	focus on the implementation of accounting information system for an organization in
Keywords:	general. Therefore, this study sought to identify the usage of CAS among SMEs in
Accounting Information System,	Malaysia and to investigate the factor affecting the usage of this system. Beside
E-Commerce, SMEs,	exploring the types of accounting software adopted, this study also attempts to study the
Firms Performance	problems and impact in using the CAS on the employee work productivity. This study is
	conducted through the questionnaire survey method. Data from 80 firms was collected
	and used for analyses firm's performance. Results revealed that SMEs adopting
	accounting system shows significant improvement in the firms' performance. However,
	the advantages of using the accounting system were not fully utilized since there are still
	firms not adopting the system on their daily operation. It is hoped that this study has
	given new insights regarding the usage of computerised accounting system thus building
	a solid foundation for future research in the adoption of accounting system in Malaysia.

© 2014 AENSI Publisher All rights reserved.

To Cite This Article: Amelia, Z. Fariha, Azliza., The Usage of Computerised Accounting System: The Case of Small and Medium Enterprise in Malaysia. *Aust. J. Basic & Appl. Sci.*, 8(4): 199-205, 2014

INTRODUCTION

Malaysian Small and Medium Enterprise (SME) can be defined according to size, turnover and activity. SMEs in Malaysia falls into two broad categories. Firstly, manufacturing, manufacturing related services and agro-based industries which have either less than 150 full time employees or have an annual sales turnover of less than RM25 million. Secondly is services, primary agriculture and information and communication technology (ICT) which have either less than 50 full time employees or have an annual sales turnover of less than RM5 million.

Malaysia is rapidly shifting its orientation into an Information Technology (IT) based environment that emphasizes on the use of technology in providing information. This is evident by the Malaysian Government's effort in establishing the Multimedia Super Corridor (MSC), 1998 and the National Agenda (NITA) in 1996 which placed a priority on Malaysia to create a new generation of knowledge workers. These efforts are consistent with the increasing globalization of demand and the utilization of IT as a competitive economic upper hand. As the Government moves towards an E-Government, the private sector is also predicted to move in tandem with the Government's aspiration, particularly in adopting the accounting systems.

The usage of the Computerised Accounting System (CAS) among SMEs in Malaysia becomes vital and may well be the determining factor for the survival or success in their business operations. Enhancement of technical capabilities through a greater and more rapid use of IT among SMEs are often an effective way to improve their productivity and competitiveness (Foong, S.Y, 1999). Some of the reasons for SMEs in developing countries to be less competitive is because they are facing problems with the receivable collections, problems with inventory control, low utilization capacity, failure to meet the delivery date and problems with quality control (Munasinghe, L, 1996).

The introduction of new information technology in an organization is usually viewed as a positive step towards enhancing the organization's business processes. IT can be used to effectively overcome almost all these reasons and to be competitive. An excellent opportunity therefore it is important for industries in

Corresponding Author: Amelia, Department of Technology Management, Faculty of Computer, Media & Technology Management, TATI University College, 24000 Terengganu, Malaysia. E-mail: amelia@tatiuc.edu.my

developing countries to make use of the technological advancements of computer technology in order to achieve higher levels of performance and face the challenges imposed by global changes.

The aim of this study is to identify the usage of computerised accounting systems among SMEs in Malaysia. Although the SMEs in Malaysia now has access to the IT systems in their daily business use, the usage of computerised accounting systems is relatively small. The objective are to identify the current status of the usage of computerised accounting systems among SMEs in Malaysia and to identify what are the factors or reason for SMEs not using computerised accounting systems.

This paper is divided into five sections. Introduction to the research problem is presented in the first section while review of relevant literature is reported in the second section. Methodology, results and discussion of this study for identify the usage of computerised accounting systems among SMEs in Malaysia presented in the third and fourth sections respectively. Conclusion are outlined in the last section.

2. Literature Review:

While there is much research on the general adoption of IT, there's little research focused specifically on the usage of the CAS in SMEs in Malaysia. In many studies of SMEs IT usage, accounting software was the predominant applications package used and the driving factor behind the IT hardware acquisition. This approach is also consistent in Australia SMEs and concluded that the main software application package used was accounting (Burgess, S, 1997).

A study conducted in Kuching Sarawak found that the rate of adoption of computerized based accounting systems is at a minimal of 52% (Joseph, C. Janggu.T, 2003). Findings show that most companies maintain general ledger, sales/account receivable and purchase/account payable modules. Other moderately used modules are payroll, report and financial analysis. However, the utilization of more sophisticated modules such as manufacturing, production planning, inventory management, transportation, sales forecast, budgeting, fixed asset management, consolidation and other modules is still minimal. Their findings also indicate that most companies prefer to use ready-made packages and do not modify the purchased package. Small businesses are concerned with the use of information system for purely operational purposes.

Many studies have also been conducted to understand how IT has been used to support information requirements in SMEs ([Ismail, N. A., Abdullah, A. N. and Tayib, M., 2003. In general, results from past studies indicate that IT adoption has grown tremendously within SMEs. Yet there is considerable evidence to suggest that very few of the resulting systems have had any significant impact on the way management makes decisions.

Argued that the key problem of the lack of strategic IT usage in SMEs relates to the relatively poor fit between what the software tools are offering and what is needed, with neither the users nor the suppliers being in a strong position to communicate with each other (Mitchell, R., Reid, G. and Smith, J, 2000). The situation is even more crucial within SMEs because they lack experienced internal accounting and IT expertise and support. The consequent lack of expertise limits information understanding, IT specifications and selection policies, and it inevitably leads SMEs to implement or purchase an information system that is inadequate to the firms' needs.

Malaysian SMEs is a vital component of the country's economic development, SMEs accounted for 93.8% of companies in the manufacturing sector. They contribute 27.3% of total manufacturing output, 25.8% of value-added production, own 27.6% of fixed assets, and employ 38.9% of the country's workforce. In addition, value added products from SMEs are expected to be worth RM 120 billion or 50% of total production in the manufacturing sector by 2020. Despite these statistics, Malaysian SMEs' share of total exports is approximately 20% per cent lower than many other countries', such as the Philippines, Hong Kong, Taiwan and even the US (MIDEC E-Library Statistic).

SMEs in Malaysia are concentrated in the textile and apparel, food and beverages, metals and metals products and wood and wood products sectors. The majority of manufacturing companies is located in the central parts of Malaysia and around the country's major industrial regions. In addition, the strategic use of information technology within SMEs is seen as one of the key elements that can make a significant difference in their success.

The use of computers is not a new phenomenon for SMEs, especially in areas such as accounting. United State revealed that the use profitability of the business has hardly ever been a factor in determining the use, the amount used, or type of computers in small business (IFAC, 2006). The use is however, influenced by the size of the business, the computing skills of the owner and the age of the business. But, once computers begin to be used in small business, the extent of their use is no longer influenced by the computing skills of its owner but primarily by its size and age.

Theory to the adoption of accounting software as the innovation, the software must be perceived better than the predecessor system (most likely a manual accounting system) and must be consistent with the needs of the adopter, must be easy to learn and use, the result must be apparent and the accounting software should be available on a trial basis (Palvia, et al., 1994). The characteristics of the organization can influence the decision on whether to adopt IT or not. Organizational characteristics such as business size, employee's level of IT

knowledge, industry sector, business location and information intensity has been analysed in previous research studies.

Generally, the larger the number of employees, the greater the sales turnover, the more information intensive the industry is and this will lead the small business to adopt IT innovation. Moreover, small businesses tend to suffer resource poverty (Thong, J.Y.L, 1999) in terms of financial capacity, available time and IT skilled staff facilitate innovation adoption. Consequently, resource poverty raises the barriers to innovation adoption in small business (Mitchell, F., Reid, G and Smith, J, 2000).

There is evidence that IT has helped SMEs develop and implement business strategy. It can concluded that the advent of powerful, low cost microcomputer, together with the user-friendly accounting software, has allowed the greater number of SMEs to implement IT in recent years (McMohan, G.P and Holmes, S, 1991). The need to facilitate financial management is another motivating factor for adopting CAS. Moreover, some researcher from previous studies have identified a link between the usage of the CAS and enhancement in business performance (Smith, J, 1999). An alternative view is that a growing SMEs face increased financial challenges and consequently there is a greater need for careful attention to financial management and financial reporting.

The major benefits of usage the CAS are to increase business efficiency and to facilitate timely information (Burgess, S, 1997). Besides the benefits of usage the CAS in SMEs, there still are limitations in adopting CAS. The limitation to adopt CAS is mainly by lack of time. In addition, the managers view is that CAS is costly (Head, B, 2002). Furthermore, the perception is that the technology is not suited to the nature of the business. Lastly, lack of IT expertise, contributes to the limitation of the adoption of CAS in SMEs (ABS Australia Bureau of Statistics, 2000).

In summary, IT adoption in SMEs is a widely researched topic. Most of the studies, however, focus on the use and implementation of information technology in general. The usage of computerised accounting systems and the utilization of IT for business decisions were still lagging behind those of developed countries.

3. Methodology:

The data collection is based on one primary source. The data are collected in order to fulfil the research requirements. There is one set of questionnaire prepared and distributed to the Accountants / Account Managers / Account Executive / Account Assistant of the respective companies among the SMEs in Malaysia.

A sample of 80 SMEs companies in Malaysia was randomly chosen. The locations of the companies are scattered around the country. The majority of the companies was mainly located in Kuala Lumpur, Selangor, Penang and Kedah. From these 80 SMEs companies, 60 were sent through fax, 20 through email and 10 through the mail. Out of these, 51 companies responded and returned all the questionnaires. This had been taken into analysis for this research. It comprises of about 63.75% of the sample.

All the data were analysed using descriptive statistics such as frequencies, mean and standard deviation. The study uses the Statistical Package for Social Science (SPSS) to analyse the data.

RESULTS AND DISCUSSION

This chapter explains the findings of this research. The questionnaires were distributed and collected from all respondents among SMEs in Malaysia.

A) Respondents Analysis:

We use Small and Medium Industries Development Corporation (SMIDEC) classification to determine the type of industry and which industry the companies fall into. From the SMIDEC, that covers 14 types of industries we gathered in this research, companies fall into 11 of those types. Table 1 show the types of industries involved in this study.

Туре	Frequency	Percent (%)	
Rubber products	2	3.9	
Paper & printing	4	7.8	
Electrical, electronics & telecommunications	3	5.9	
Metal product	2	3.9	
Plastic product	2	3.9	
Machinery & engineering	7	13.7	
Services	5	9.8	
Woods product	1	2.0	
Transport equipment	2	3.9	
Chemical & Petro chemicals	5	9.8	
Others	18	35.3	
Total	51	100.0	

 Table 1: Type of Industries.

Amelia et al, 2014

Australian Journal of Basic and Applied Sciences, 8(4) Special 2014, Pages: 199-205

The results in table 1 show that the majority of companies fall under other categories, which comprise of 35.3%. That means the companies are not under the questionnaire questions but the type of industry is still under SMIDEC classifications. The second highest falls under the categories of machinery & engineering that constitutes about 13.7 %. The third highest are under two types of industries, which are services 9.8%, and chemical and petrochemicals. The rest is paper & printing (7.8%), electrical, electronics & telecommunication (5.9%), metal, plastic and transport equipment that falls under the same percentage of 3.9 % and the lowest is a wood product, which contributes 2.0%.

The data in table 2 indicate that the majority of sales turnover of the sample companies falls under sales turnover not more than RM 5 million per year which comprises about 35.3%. From these results, it showed that the sample falls under the category of small-scale companies. Besides than that, 25.5% fall under sales turnover of not more than RM15 million and 23.5% fall under sales not more than RM10 million. The rest, 9.8% are from sales turnovers not more than RM20 million and only 5.9% comes from sales turnover of more than RM25 million.

Table 2: Sales Turnover Per Year.

Sales Turnover (million)	Frequency	Percent (%)
< RM 5	18	35.3
> RM 5 – 10	12	23.5
> RM 10 – 15	13	25.5
> RM 15 – 20	5	9.8
> RM 25	3	5.9
Total	51	100.0

B) Adopters of Computerized Accounting System:

Table 3 shows the level of CAS usage among SMEs in Malaysia. It can be seen that most of the companies (82%) are using computerized accounting systems in their operation. From these CAS adopters, half of the companies are using groupware as their choice of accounting system compared with standalone. From this table, it shows that on average the companies have been using the system for 3.61 years or close to four years.

From 51 companies, the most frequently adopted computerized accounting system software is the User Bussiness Accounting System (UBS). Majority the companies preferred to use the UBS accounting software because the system is user friendly. The second highest are companies using the ACCPAC system. Even though the ACCPAC system is an old system the companies still use it. While implementing the systems, it appears that most of the companies purchased the system (51%) did not modify the system.

Based on the type of applications used by the respondents, it showed that all the respondents agreed that they used financial accounting applications in their business. Besides having financial accounting applications, only a small number of the respondents (14%) also use management accounting applications.

	Frequency	Minimum	Maximum	Mean	Std. Deviation
1) Use Computerized Accounting	82%				.385
System (CAS)					
2) Types of Accounting system					
Standalone	50%				
Groupware	50%				
3) Company use CAS-no. of year		2	6	3.61	1.869
4) CAS Software					
ACCPAC	7.8%				
UBS	56.9%				
 ACCTPRO 	2%				
MR ACCOUNTING	2%				
• MYOB	2%				
5) Implementation method					
Without modification	51%				
With modification	29%				
6) Type of applications used					
a) Financial Accounting	82%				
b) Management Accounting	14%				
7) Type of reports generated					
a) Accounting	82%				.000
b) Inventory	47%				.501
c) Payroll	43%				.505
8) Support service from supplier					
a) Guide	63%				.431
b) Maintenance	43%				.505

Table 3: The Level of Using The Computerized Accounting System.

Amelia et al, 2014

Australian Journal of Basic and Applied Sciences, 8(4) Special 2014, Pages: 199-205

As per type of report that can be generated by the system, it can be summarized that almost all company prepare accounting reports (82%). Some also prepare an inventory and payroll report (47% and 43%). From the findings, after the implementation of the system, the respondents still get the support from their suppliers where they purchased the system. This can be shown by them getting the guide (63%) and maintenance (43%) from the supplier.

In this research, we can analyse the cost incurred by each company in the implementation of the computerized accounting system. The costs incurred would cover the cost of the accounting software used, the costs to install the system and any costs necessary to make the system ready for use.

Based on the findings, we can see that the majority of companies spent not more between RM2,001 to RM5,000 for the implementation of this system. This research can be related to the previous findings that the majority of the companies in the sample used the UBS accounting software (56.9% from table 3) because this software is relatively cheap in the market.

In addition, the fact that the companies can buy a separate UBS accounting package for accounting, payroll, taxation, etc made the package cheaper for those companies, which do not wish to have a complete package. Therefore, make the implementation costs lower.

Based on the findings, the respondents were asked to identify the problems that they encountered while using the application of computerized accounting systems. From the table 4 above, we can see that there are two types of problems encountered by the companies. The problems are human related problems and technical problem. For human related problems, it contributed a mean of 0.76 out of 1 with a standard deviation of 0.431 and for technical problems, the mean is 0.67 out of 1 with a standard deviation of 0.477. This means that the major problem that the companies encounter is human related problems.

	Min	Max	Mean	Std. Dev
Cost incurred to implement system	1	5	2.81	.969
Source of information of C.A.I.S	1	7	3.56	2.309
A problem encountered-Human Problem	0	1	.76	.431
A problem encountered-Technical Problem	0	1	.67	.477

Table 4: General Information of Adopters Computerized Accounting System.

C) Adopters of Computerized Accounting System:

Findings indicate that out of 51 companies, only 9 companies did not have or do not use a computerized accounting system in their daily business operations. From table 5, among the companies that not apply the CAS, 44.4% of the companies used the manual system only and the balance 55.6% used the manual system but with spreadsheet software. Overall, the companies still use the manual system to record their transactions.

Table 5: Alternative System Use.				
	Frequency	Percent (%)		
Manual system only	4	44.4		
Manual system with spreadsheet software	5	55.6		
Total	9	100.0		

Table 6 shows the companies that do not use computerized accounting systems to generate their manual report, 100% shows that all the companies report using accounting report while only 22.2% reported using the inventory while 33.3% reported using the payroll systems.

Table 6 : Reported Generated Using The Manual System.

	Frequency	Percent (%)
Accounting	9	100.00
Inventory	2	22.2
Payroll	3	33.3

When enquired about the reasons why the companies in this study does not implement a computerized accounting system, the majority of the respondents (88.9%) said they had appointed an accounting/audit firm to prepare the necessary reports/ accounts for them. Besides that, the high cost of implementation is the second reasons why they do not implement the computerized accounting system in their companies. This contributes about 44.4%. The respondents also cited the lack of expertise of the system and not exposed to the system is the other factors that give the 22.2%.

Poor computer literacy, the presumption that the system is not suitable with their business and the fact that their business had only small transactions are the other factors that contributed to why the companies did not implement the computerized accounting system in their daily operations in their business. All this gives the same percentage that is 22.2%.

In this study, the respondents were asked about the benefits that they think they would get if their companies implement the computerized accounting system. 100% of the respondents agreed that having the computerized accounting system would be more convenient to them.

Besides that, all the respondents agreed that it will enable them to get speedy information gathering and it can be time saving. By having all this, they think that the system would contribute to less human errors in preparing the reports.

In addition, 88.9% of the respondents also agreed that the computerized accounting system enables them to save costs. They also agreed that they could handle their work easier and faster. They also can generate reports in real time. By having all these, they can make fast decisions. This contributes to 77.8%. Another 66.7% of the respondents agreed that by having the computerized accounting system they are able to modify or delete the data or report in order to suit their company's report requirements.

In conclusion, a majority of these companies that have not implemented computerized accounting systems are aware of the possible benefits that they can get if their companies implement the systems.

Conclusion:

The findings show that out of 51 respondents, the majority of the respondents (mean 1.18 out of 2) uses computer based accounting systems. Most of the companies have already used the system for close to 5 years whereas the rest has just started using it for less than a year. In addition, most of the companies purchased the system without modifications. After the implementation of the computerized accounting system, overall we can see that all the companies still get the support service in the form of advice and technical support from the suppliers of the software.

From the results, it can conclude that the UBS accounting software is the most popular accounting software among all the companies that implement computerized accounting systems with the mean of 2.06 out of 5. Even though UBS is the most popular accounting package, there are companies that use other accounting software such as ACCPAC, Mr. Accounting, MYOB Business and a few companies who develop their own software.

Even though the percentage of companies using computerized accounting systems are high, in this research there are still companies that did not implement a computerized accounting system in their operations. The reason for them not using the system is because the majority of the companies has hired or appointed accounting or audit firms to prepare the necessary report for them, which contributes (88.9%) from the total respondents in this research.

In terms of the benefits of using the system, most of the companies felt that it could work easier and faster as well as it is more convenient than manual systems. The companies also can get the advantage of saving time and cost when using the system as it speeds up information gathering as well as enabling them to modify the transaction with ease. Besides that, the companies can reduce human errors and this will enable faster decision making. In addition, the reports also can be modified to suit the company's requirements.

Government agencies should take the proactive effort to educate the SMEs on the importance of implementing computerized based on the accounting systems in their business operations. By implementing this, the companies can adopt better planning and control and this will enhance their competitiveness in the global market. As we know today success in the world is through excellence in technology and innovation.

REFERENCES

ABS Australia Bureau of Statistics, 2000. "Business Use of information Technology, Australia". Common Wealth of Australia.

Burgess, S., 1997. " A Categorized Study of the Use of IT in Small Business". Detailed Survey Report, Small Business Victoria, Melbourne, Australia.

Burgess, S., 1997. "A Categorized Study of the Use of IT in Small Business".

Foong, S.Y., 1999. "Effect of end-user of end-user personal and systems attributes on computer based information system sucess in Malaysian SMEs", Journal of Small And Business Management, 81-87.

Head, B., 2002. "Small business should log on and write off", Business review weekly, 22(11).

Ismail, N.A., A.N. Abdullah and M. Tayib, 2003. "Computer-based accounting systems: the case of manufacturing-based small and medium enterprises in the Northern Region of Peninsular Malaysia", Jurnal Teknologi, 39(E): 19-36.

IFAC., 2006. "Micto-entity financial reporting: Perspective of prepares and users, Small and Medium Practices Committee", International Federation of Accountants, New York.

Joseph, C., T. Janggu, 2003. "A Survey on the Computerized Based Accounting System Use among Manufacturing Companies in Kuching, Sarawa". Proceedings of the Conference on Social Science Researches, Kuala Lumpur.

MIDEC E-Library Statistic, "profile of SMEs in the Manufacturing Sector, and SMIDEC SMEs Information & Advisory Centre", profile of SMEs in the Manufacturing Sector, http:///www.smidec.gov.my.

Munasinghe, L.J., 1996. "Factors Influences IT Applications in Small & Medium Scale Industries In Developing Countries: Case of Sri Lanka".

Mitchell, R., G. Reid and J. Smith, 2000. "Information system development in the small firm", United Kingdom: CIMA Publishing.

Mitchell, F., G. Reid and J. Smith, 2000. Information system development in the small firm: The use of management accounting. CIMA Publishing.

McMohan, G.P. and S. Holmes, 1991. "Small business financial management practices in north America: a literature review". Journal of Small Business Management, 29(2): 19-30.

Palvia, Prashat, Means, Dwight, Jackson and M. Wade, 1994. "Determinants of Computing in Small and Medium Industries", Information & Management, 27: 161-174.

Proudlock, M.B., Phelps and P. Gambler, 1999. "IT adoption strategies: best practices guideline for professional SMEs". Journal of small business and enterprise development, 6(30): 240-252.

Smith, J., 1999. "Information Technology in Small & Medium Business: Establishing the Basis for a Management Information System", Journal of Small Business and Enterprise Development, 6(4): 326-340.

Thong, J.Y.L., 1999. "An Integrated Model of Information Systems Adoption in Small and Medium Enterprise", Journal of Management Information System, 15(4): 187-214.