Does Management Accounting Information Affect Firm Value? Evidence from the Stock Exchange of Thailand*

Dr. Teerachai Arunruangsirilert, CPA

Lecturer of Department of Accounting,
Thammasat Business School, Thammasat University

ABSTRACT

This study aims to examine effect of management accounting information on firm value. It observes and analyzes data of firms in SET100 index of the Stock Exchange of Thailand for the accounting information of the year 2016. It observes Tobin's Q which is a proxy of firm value before and after publishing of management accounting information through 56-1 report. Results show that management accounting information positively affects firm value, while results do not show relation between quantity of the information and firm value. Results of this study support that a firm should publish its management accounting information on time in order to signal capital market of its value so that it can efficiently reflect its value.

Keywords: Management Accounting Information, Corporate Governance, Firm Value

^{*} I am appreciated for the sponsorship of this research by Thammasat Business School, Thammasat University.

สารสนเทศทางบัญชีบริหารมีผลกระทบต่อมูลค่ากิจการหรือไม่? หลักฐานจากตลาดหลักทรัพย์แห่งประเทศไทย

ดร.ธีรชัย อรุณเรื่องศิริเลิศ

อาจารย์ประจำภาควิชาการบัญชี คณะพาณิชยศาสตร์และการบัญชี มหาวิทยาลัยธรรมศาสตร์

บทคัดย่อ

การศึกษานี้มีวัตถุประสงค์เพื่อศึกษาผลกระทบของสารสนเทศทางการบัญชีบริหารต่อมูลค่ากิจการ การศึกษานี้ได้ สังเกตและวิเคราะห์ข้อมูลของบริษัทในดัชนี SET100 ของตลาดหลักทรัพย์แห่งประเทศไทยสำหรับสารสนเทศทางการ บัญชีสำหรับงวดปีบัญชี พ.ศ. 2559 การศึกษาครั้งนี้ได้วิเคราะห์มูลค่ากิจการผ่าน Tobin's Q ใช่ช่วงก่อนและหลังเผย แพร่ข้อมูลสารสนเทศทางการบัญชีบริหารผ่านทางรายงาน 56-1 ผลการศึกษาพบว่า สารสนเทศทางการบัญชีบริหารมี ผลกระทบเชิงบวกต่อมูลค่ากิจการ ขณะที่ไม่พบความสัมพันธ์ระหว่างปริมาณของสนสนเทศทางการบัญชีบริหารกับมูลค่า กิจการ ผลของการศึกษานี้สนันสนุนให้บริษัทเผยแพร่ข้อมูลสารสนเทศทางการบัญชีบริหารเพื่อส่งสัญญาณไปที่ตลาดทุน ถึงมูลค่าของกิจการ ซึ่งทำให้บริษัทสามารถสะท้อนมูลค่ากิจการของตัวเองได้อย่างมีประสิทธิภาพ

คำสำคัญ: สารสนเทศทางการบัญชีบริหาร การกำกับดูแลกิจการ มูลค่ากิจการ

1. Introduction

Various accounting studies have demonstrated capital markets responsiveness against accounting information since that empirical research has a significant effect on accounting research in the 1960s (Dyckman & Zeff, 2015). Those studies are usually interested in insight into the capital markets response to accounting measurements and disclosures which usually are financial accounting information (Barth et al., 2001). For example, Lam et al. (2013) study the changes in value of financial accounting information among firms. Zhang (2016) examines effect of free cash flow on firm values through consequence of investment in mergers and acquisitions. The main accounting information studies emphasized in financial aspect because the main purpose of financial reports that is to enhance investors make decisions (Omokhudu & Ibadin, 2015).

The extant researches then do not completely explore the effect of accounting information because they emphasize only on financial accounting information. Generally, accounting information comprises financial and managerial parts. The accounting information affecting capital market or firm value does not merely show in financial figures and information in financial reporting, it appears everywhere in management disclosure which is a product of management accounting. In a part of management accounting, it supports and enhances an organization to be successful in its objectives via various techniques (Teerachai & Supasith, 2017). Apart from its supportive

techniques, management accounting information may provide wider and deeper information for stakeholders including capital market to better understand and evaluate firm performance as a result of information symmetry between inside and outside stakeholders. Therefore, management accounting information would have an effect on firm value which is reflected through market response.

Because of lack effect evidence of management accounting information on firm value reflected via capital market, this study gives rise to a research question that "does management accounting information affect firm value?" which is worthwhile to be found out evidence in order to support and reflect firm value through disclosure of management accounting information.

The following section comprises literature review which discusses about accounting information and firm value as well as hypothesis development. Research method section, then, demonstrate methodology of this study including data collection, variable measurement, and model specification. Finally, this article presents findings and discussion which are followed by conclusion.

2. Literature review and hypothesis development

2.1 Accounting information and firm Value

The seminal work of a study of accounting information and firm value is from Ball and Brown (1968). They study a relationship between earnings and stock return. Results from their study give rise to enormous accounting and finance researches

to study about the accounting information and response of capital market. Those studies are usually interested in insight into the capital markets response to accounting measurements and disclosures which usually are financial accounting information (Barth et al., 2001). The financial accounting information is crucial and more literature explores that financial accounting information relates to value (Ball & Brown, 1968; Barth et al., 2001; Beaver, 1968).

The extant researches, however, do not completely explore the effect of accounting information on firm value because they emphasize only on financial accounting information. Accounting information generally comprises financial and managerial parts. Arunruangsirilert (2016) reports that financial accounting information mainly provides information for external users, while management accounting information directly serves for management within an organization. Management accounting information, however, also provides value information for external users through its supporting role in a management process (Atkinson et al., 2001; Siti Zaleha Abdul et al., 2011) so that it can affect firm value as well. Therefore, the accounting information affecting capital market or firm value may not merely show in financial figures and information in financial reporting, it appears everywhere in management disclosure which is a product of management accounting.

2.2 Management accounting information and firm Value

Management accounting has been evolved from cost accounting since the 1940s because the cost accounting framework failed to account for decision analytic framework which had been popular in the 1950s (Shank & Govindarajan, 1989). Following IFAC (1998) framework, management accounting has been developed from cost control to value approach from 1950 to 1995 (Adbdel-Kader, 2006).

Effective management accounting information is one of the important factors for an organization pursuing its goal (Ditkaew, 2013). Strategic information which normally comes from management accounting information can enhance better management decisions (Gupta & Lehmann, 1987) so as to increase their organization value. For example, management can use management accounting information to increase their performance and maintain their organization's competitive advantage in the uncertain environment (Baines & Langfield-Smith, 2003).

An organization can signal good management condition to capital market via management accounting information such as risk management, business analysis, and other information so that the market can positively recognize this information. Capital market can gain benefit from additional information apart from financial accounting information such as disclosure of strategic management information which is a

product of management accounting. Management accounting plays an important role as a strategic information provider because it does not merely provide information to support management decision making and control, it generates crucial information related to strategic management as well.

There is prominently literature supporting positive relation between management accounting usages and firm performance. For example, Mia and Clarke (1999) report that firms have to use various strategic management tools—by the support of management accounting information and techniques—including product diversification, supply chain management, and benchmarking for sustainability in their competitive advantage and performance. Cadez and Guilding (2008) study an integrated contingency model of strategic management accounting and evidence that strategic management accounting usage has a positive effect on firm performance. Mahama (2006) proves that high performance is a result from high cooperation and socialization which

derive from management accounting measurement system (performance measurement system: PMS) as well as Mia and Chenhall (1994) and Mia and Clarke (1999) show that organizations have high performance by applying more board management accounting system (MAS). Literature also shows direct evidence of the positive effect of management accounting information on frim performance (Gul & Chia, 1994; Hoque & James, 2000; Ittner et al., 2003).

As from literature, the relation between management accounting information and firm value shows in a positive way. This study, therefore, raises hypotheses about the effect of management accounting information on firm value as follows and the concept framework of this study appears in figure 1.

H1: The disclosure of management accounting information positively affects firm value.

H2: The more extensive management accounting information publishes, the more value a firm gets.

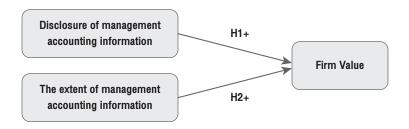


Figure 1 Conceptual framework of the study

This study emphasizes the effect of management accounting information on firm value or performance, but some factors can affect firm value. Firm size, firm age, profit, and corporate governance represent as control variables for this study. Literature shows both negative and positive effects of firm size on firm performance. Black et al. (2006) found that bigger firm size has a negative effect on business growth, while some literatures show a positive effect. Firm size can positively affect firm value as show in the study of Guilding (1999), Libby and Waterhouse (1996), and Merchant (1981) that the use of management accounting which is rather complex accounting technique can support an organization to have higher performance. Relationship between firm age and firm performance is not consensus in

literature. On the one hand, Coad et al. (2013) demonstrate that firms improve with age because older firms have steadily increasing levels of productivity, higher profits, larger size, lower debt ratios, and higher equity ratios. On the other hand, they demonstrate that firm performance deteriorates with age because of lower expected growth rates of sales, profits, and productivity. Beside, profit ratio definitely has a positive effect on firm value (Sucuahi & Cambarihan, 2016) as well as good corporate governance can enhance firm value (Nur'ainy et al., 2013). This study, however, expects all control variables having positively affect firm value because the literature provides more supporting on this view so that all effect directions represent in table 1.

Table 1 Expectation of all effect directions of the variables of the study

Variable	Effect Direction	Reference
Disclosure of management accounting information	+	H1
The extent of management accounting information	+	H2
Profit	+	H1 and H2
Firm size	+	H1 and H2
Firm age	+	H1 and H2
Good corporate governance	+	H1 and H2

3. Research method

This study uses multiple regression analysis to observe reaction phenomena of firm value to disclosure of management accounting information of the financial year 2016 by observing through firms in SET100 in capital market in Thailand—Stock Exchange of Thailand (SET).

3.1 Data collection and variable measurement

This study observes data from 100 firms in SET100 index of SET (declaration date of Jun 16th, 2017) for the period between the date of financial statement of the year 2016 to one week after publishing of management accounting information of each firm. The reason of the scope in SET100 because SET100 can represent capital market in Thailand due to fact that they are high capitalization and liquidity as well as good free float rate. The study collects data of independent variables from secondary sources such as SET database, ELCID system, financial statements, annual reports, and 56-1 reports. For data of a dependent variable, the study collects information from financial statements and EOD files which are published in SET database and a data base of SiamChart (http://siamchart.com/stock/).

For firm value, this study emphasizes on market value so that Tobin's Q ratio suitably represents it. This study calculates Tobin's Q by using market capitalization divided by book value. Market capitalization comes from total number of stocks multiplied by stock price. This study calculates

Tobin's Q for two periods, before and after issuing of management accounting information. Tobin's Q ratio before issuing of management accounting information uses average stock price between the publishing date of financial statements and the date before issuing of management accounting information. For the after issuing of management accounting information, Tobin's Q comes from average stock price of one week after publishing of management accounting information. The reason for using one-week stock price average after publishing date is that this study wants to reduce effect of abnormal return from the market reaction which normally in the first three day period (Bernard & Thomas, 1990). The publishing date of financial statements and 56-1 reports can be searched through ELCID system in the SET database.

This study measures management accounting information (MAI) by using report of the 56-1 report as a proxy. SET requires every firm in Thai capital market to create and publish a 56-1 report within 3 months after the end of accounting period. A 56-1 report consists of various information including management accounting information such as control matters, risk management, and management discussion and analysis (MD&A).

Natural logarithm (In) of total assets of firms, firm years in the capital market, and a word count of a 56-1 report are proxies of firm size, firm age, and extent management accounting information, respectively.

3.2 Model specification and analysis

This study uses multiple regression analysis to observe and analyze effect of management accounting information on firm value. It analyses effect of publishing of management accounting information in order to observe reaction of firm value to the information. The models of the study appear as follows:

$$Tq = \beta_1 Mai + \beta_2 Profit + \beta_3 Fsize + \beta_4 Fage + \beta_5 Cgs$$
 (1)

$$Tq = \alpha + \beta_6 \text{Maiwc} + \beta_7 \text{Profit} + \beta_8 \text{Fsize}$$

$$+ \beta_9 \text{Fage} + \beta_{10} \text{Cgs}$$
 (2)

Tq is Tobin's Q ratio and comes from a ratio of market capitalization to book value of a firm. Mai represents publishing of management accounting information which is a dummy variable. It is equal to 1 if a firm publishes 56-1 report, otherwise 0. Maiwc represents extensive of management accounting information which is measured by using natural logarithm (ln) of total word count of 56-1 report for the year 2016. Fsize represents the extent of a firm which is measured by using ln of total assets as at the end of the period of

the financial statements for the year 2016. This study measures Fage as a firm age by using In of the number of years of a firm in SET. Profit in the models represent a profit ratio. Cgs represents how good of corporate governance of a firm measuring by using corporate governance scoring (CG score) which is equal to 1 if a firm has 4 or 5 CG score, otherwise 0.

4. Findings and discussion

This study analyzes data of 100 firms which is composed of before and after publishing date of management accounting information so that it totally comprises 200 data sets. The result of variable correlation and descriptive data of model 1 demonstrates in table 2.

The result in table 2 shows high correlation among Fsize, Fage, and Cgs. However, only VIF index of Fsize is over 10 (Hair et al., 2010) so that this model excludes Fsize in order to solve the multicollinearity problem. Table 3 shows correlation and descriptive data of model 2. The information does not show any problem of multicollinearity.

Table 2 Correlation and descriptive data of model 1

	Tq	Mai	Profit	Fsize	Fage	Cgs
Tq	1.000					
Mai	0.502**	1.000				
Profit	0.631**	.552**	1.000			
Fsize	0.642**	.700**	.773**	1.000		
Fage	0.561**	.640**	.676**	.922**	1.000	
Cgs	0.579**	.652**	.719**	.926**	.851**	1.000
Mean	3.77	0.50	0.14	11.00	2.38	0.85
SD	3.78	0.50	0.11	1.62	1.11	0.36
Min	0.48	-	-0.12	7.47	_	_
Max	24.23	1.00	0.57	14.90	3.71	1.00

Note * and ** Statistical significant at 0.05 and 0.01, respectively

Table 3 Correlation and descriptive data of model 2

	Tq	Maiwc	Profit	Fsize	Fage	Cgs
Tq	1.000					
Maiwc	279**	1.000				
Profit	.179**	072	1.000			
Fsize	558**	.435**	.006	1.000		
Fage	264**	.041	117*	.418**	1.000	
Cgs	266**	.254**	.000	.240**	.099	1.000
Mean	3.77	9.95	0.14	11.00	2.38	0.85
SD	3.78	0.49	0.11	1.62	1.11	0.36
Min	0.48	8.79	-0.12	7.47	-	_
Max	24.23	11.36	0.57	14.90	3.71	1.00

Note * and ** Statistical significant at 0.05 and 0.01, respectively

This study regresses and analyzes the model 1 (excluding Fsige) and the model 2 as show in table 4. All these two models are significant (F = 0.000) and can explain at 43.60 and 34.70 percent of the variable of model 1 and medel 2, respectively.

Model 1 regression results demonstrate that an independent variable and a control variable (Mai and Profit) from total six variables are significant at 0.05 and 0.01, respectively. Both management accounting information (Mai) and profit ratio (Profit) show positively effect on Tobin's Q (TQ). For model 2 regression results, the extent of management accounting information (Maiwc) does not significantly affect Tobin's Q. Three variables (Profit, Fsize, and Cgs) from all six variables have significant effects on firm value at 0.01, 0.01, and 0.05, respectively. Profit ratio (Profit) positively affects Tobin's Q (TQ), while firm size (Fsize) and good corporate governance (Cgs) negatively affect Tobin's Q.

Regression results can be summarized in table 5 which demonstrates comparison between expectation and results. Evidence from the results supports the first hypothesis (H1), but not for the second hypothesis (H2). Results explores that the disclosure of management accounting information can provide additional firm value for an organization. These evidence is in line with the studies of Cadez and Guilding (2008), Mahama (2006), Mia and Chenhall (1994), and Mia and Clarke (1999).

Table 4 Multiple regression results of model 1 and model 2

	Model 1**	Model 2**
Constant		17.919**
		(3.954)
Mai	1.068*	
	(1.958)	
Maiwc		-0.036
		(-0.071)
Control Variables		
Profit	12.220**	6.144**
	(5.179)	(3.100)
Fsize		-1.208**
		(-7.218)
Fage	0.226	-0.040
	(1.060)	(-0.182)
Cgs	0.583	-1.473*
	(0.904)	(-2.328)
R^2	0.447	0.364
Adjusted R ²	0.436	0.347
SEE	4.006	3.055
F	39.665	22.168
Sig. of F	0.000	0.000

Note * and ** Statistical significant at 0.05 and 0.01, respectively

Table 5 Result summary of variables' effect comparing with expectations

Variable	Expected	Results	Reference
Disclosure of management accounting information	+	+	H1
The extent of management accounting information	+	Non sig	H2
Profit	+	+	H1 and H2
Firm size	+	_	H1 and H2
Firm age	+	Non sig	H1 and H2
Good corporate governance	+	_	H1 and H2

On the other hand, for the second hypothesis (H2), results cannot conclude that higher degree of management accounting information disclosure affects firm value. This phenomenon implies that the market does not recognize the degree of disclosure of management accounting information as much as detail within the content because management accounting information may provide whether good or bad news (Bernard & Thomas, 1990) so that market may react against that news instead of their quantity of content.

Results also demonstrates an effect of profit following the study of Sucuahi and Cambarihan (2016). While firm size and good corporate governance show inversely effect from expectation. This results are reasonable because the samples of this study are mainly larger companies. A bigger firm normally faces slow growth of its business because of its business cycle in the maturity stage as a result that it may decrease in value following the study of Black et al. (2006). For the good corporate governance, results show that market may not recognize good corporate governance

through corporate governance score (CG score). Besides, the better score of corporate governance may have to much more concern in the disclosure guidance—following to the Institue of Director (IOD) who is a composer of CG score—instead of concentration of actually good corporate governance practices or considering in quality aspect.

5. Conclusion

This study demonstrates that an organization can gain benefit from signaling management accounting information to the market so that a firm can increase their value after publishing management accounting information, while the quantity of management accounting information cannot effect firm value. A firm, therefore, should be on time for publishing its management accounting information (in appropriate content and scope) in order to enhance its value. However, limitation of this study appears to be concerned. Results cannot be high generalization because scope of the study is in only the firms in SET100

index of SET and for only one accounting period. Moreover, the proxy of management accounting information which is the 56-1 report may be broad. In the future, researchers can find more appropriate proxies of management accounting information to test with firm value. In addition, this study can enhance generalization by extending to cover multi periods and other capital markets, especially in ASEAN countries.

REFERENCES

- Adbdel-Kader, M. G., Luther, Robert G. (2006). IFAC's conception of the evolution of management accounting. *Advances in Management Accounting*, 15, 229–247.
- Arunruangsirilert, T. (2016). Corporate governance and strategic management accounting: a grounded theory. *Journal of Accounting Profession*, *35*, 34–47.
- Atkinson, A. A., Banker, R. D., Kaplan, R. S., & Young, S. M. (2001). *Management accounting* (3rd ed.). Upper Saddle River, N.J.: Prentice Hall.
- Baines, A., & Langfield-Smith, K. (2003). Antecedents to management accounting change: a structural equation approach. *Accounting, Organizations and Society, 28*(7–8), 675-698. doi: http://dx.doi.org/10.1016/S0361-3682(02)00102-2
- Ball, R., & Brown, P. (1968). An empirical examination of accounting income numbers. *Journal of Accounting Research*, 6(2), 159–178.

- Barth, M. E., Beaver, W. H., & Landsman, W. R. (2001). The relevance of the value relevance literature for financial accounting standard setting: another view. *Journal of Accounting and Economics*, 31(1), 77–104. doi: https://doi.org/10.1016/S0165-4101(01)00019-2
- Beaver, W. H. (1968). The Information Content of Annual Earnings Announcements. *Journal of Accounting Research*, 6, 67–92. doi: 10.2307/2490070
- Bernard, V. L., & Thomas, J. K. (1990). Evidence that stock prices do not fully reflect the implications of current earnings for future earnings. *Journal of Accounting and Economics*, *13*(4), 305–340. doi: https://doi.org/10.1016/0165-4101(90)90008-R
- Black, B. S., Jang, H., & Kim, W. (2006). Does corporate governance predict firms' market values? evidence from korea. *Journal of Law, Economics, and Organization, 22*(2), 366–413. doi: http://jleo.oxfordjournals.org
- Cadez, S., & Guilding, C. (2008). An exploratory investigation of an integrated contingency model of strategic management accounting. *Accounting, Organizations and Society, 33*(7–8), 836–863. doi: 10.1016/j.aos.2008.01.003
- Coad, A., Segarra, A., & Teruel, M. (2013). Like milk or wine: does firm performance improve with age? *Structural Change and Economic Dynamics*, 24(0), 173–189. doi: http://dx.doi.org/10.1016/j. strueco.2012.07.002

- Ditkaew, N. (2013). The effect of accounting information system quality in the effectiveness on internal control and reliable decision making to enhance the performance of Thai industrial firms. *Journal of International Business & Economics*, 13(1), 39–50.
- Dyckman, T. R., & Zeff, S. A. (2015). Accounting Research: Past, Present, and Future. *ABACUS*, 51(4), 511–524. doi: 10.1111/abac.12058
- Guilding, C. (1999). Competitor-focused accounting: an exploratory note. *Accounting, Organizations and Society, 24*(7), 583–595. doi: http://dx.doi.org/10.1016/S0361-3682(99)00007-0
- Gul, F. A., & Chia, Y. M. (1994). The effects of management accounting systems, perceived environmental uncertainty and decentralization on managerial performance: A test of three-way interaction. *Accounting, Organizations and Society, 19*(4–5), 413–426. doi: http://dx.doi.org/10.1016/0361-3682(94)90005-1
- Gupta, A. K., & Lehmann, D. R. (1987). SBU strategies, corporate-SBU relations, and SBU effectiveness in strategy implementation. *Academy of Management Journal*, *30*(3), 477–500. doi: 10.2307/256010
- Hair, J. F., Black, W. C., Babin, B. J., & Anderson, R.
 E. (2010). Multivariate data analysis (7th ed.):
 Prentice Hall.
- Hoque, Z., & James, W. (2000). Linking balanced scorecard measures to size and market factors: Impact on organizational performance. *Journal of Management Accounting Research*, 12, 1–17.

- IFAC. (1998). International management accounting practice statement: management account concepts. NY: International Federation of Accountants.
- Ittner, C. D., Larcker, D. F., & Randall, T. (2003). Performance implications of strategic performance measurement in financial services firms. *Accounting, Organizations and Society,* 28(7–8), 715–741. doi: http://dx.doi.org/10.1016/S0361-3682(03)00033-3
- Lam, K. C. K., Sami, H., & Zhou, H. (2013). Changes in the value relevance of accounting information over time: Evidence from the emerging market of China. *Journal of Contemporary Accounting & Economics*, *9*(2), 123–135. doi: https://doi.org/10.1016/j.jcae.2013.06.001
- Libby, T., & Waterhouse, J. H. (1996). Predicting change in management accounting systems.

 Journal of Management Accounting Research,
 8, 137–150. doi: http://aaahq.org/MAS/JMAR/contents.cfm
- Mahama, H. (2006). Management control systems, cooperation and performance in strategic supply relationships: A survey in the mines. *Management Accounting Research*, 17(3), 315–339. doi: http://dx.doi.org/10.1016/j.mar.2006.03.002
- Merchant, K. A. (1981). The design of the corporate budgeting system: influences on managerial behavior and performance. *The Accounting Review (4)*, 813. doi: 10.2307/247203

- Mia, L., & Chenhall, R. H. (1994). The usefulness of management accounting systems, functional differentiation and managerial effectiveness. *Accounting, Organizations and Society, 19*(1), 1–13. doi: http://dx.doi.org/10.1016/0361-3682(94)90010-8
- Mia, L., & Clarke, B. (1999). Market competition, management accounting systems and business unit performance. *Management Accounting Research*, *10*(2), 137–158. doi: http://dx.doi.org/10.1006/mare.1998.0097
- Nur'ainy, R., Nurcahyo, B., Kurniasih A, S., & Sugihati, B. (2013). Implementation of Good Corporate Governance and Its Impact on Corporate Performance: The Mediation Role of Firm Size: Empirical Study from Indonesia. *Global Business and Management Research: An International Journal*, 5(2–3), 91–104. doi: http://gbmr.ioksp.com/archives.htm
- Omokhudu, O. O., & Ibadin, P. O. (2015). The Value Relevance of Accounting Information: Evidence from Nigeria. *Accounting and Finance Research*, 4(3), 20–30. doi: https://doi.org/10.5430/afr. v4n3p20

- Shank, J. K., & Govindarajan, V. (1989). Strategic cost analysis: The evolution from managerial to strategic accounting. the United States of America: Richard D. Irwin, INC.
- Siti Zaleha Abdul, R., Abdul Rahim Abdul, R., & Wan Khairuzzaman Wan, I. (2011). Management accounting and risk management in Malaysian financial institutions. *Managerial Auditing Journal*, 26(7), 566–585.
- Sucuahi, W., & Cambarihan, J. M. (2016). Influence of Profitability to the Firm Value of Diversified Companies in the Philippines. *Accounting and Finance Research*, *5*(2), 149–153.
- Teerachai, A., & Supasith, C. (2017). Effect of corporate governance characteristics on strategic management accounting in Thailand. *Asian Review of Accounting*, *25*(1), 85–105. doi: doi:10.1108/ARA-11-2015-0107
- Zhang, N. (2016). The effects of anticipated future investments on firm value: evidence from mergers and acquisitions. *Review of Accounting Studies*, *21*(2), 516–558. doi: 10.1007/s11142-016-9353-3

JAP