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Acquisition of Experts' Opinions to Explore the Drivers of Business Success in the Construction Industry

Keywords: Business Success, Construction Industry, Entrepreneurship, Constructionpreneurship, Delphi Study, Malaysia

INTRODUCTION

Evidence has pointed that the construction industry is a key sector of every nation's economic growth. However, a nation can only fully benefited from the stimulus that the construction activities brought to its economy if it has an efficient construction industry (Ofori, 2012). Hence, all activities within the construction industry must be performed effectively and efficiently. One way to achieve this is by ensuring the success of entrepreneurs who run the construction business because they are the key players in the industry. Hofstrand (2010) asserted that successful entrepreneurs should have a detailed knowledge of the key factors needed for their success. Indeed, discovering which factors or practices lead to business success and which lead to failure is a primary, and as yet unfulfilled, the purpose of business research (Rogoff et al., 2004).

Understanding the success factors and hence, identifying those factors becomes an important issue for the construction business, and has led to an increasing research effort contributed to this area. Previous studies have gauged the success of construction enterprise from the outcomes of project execution, which emphasized on the effectiveness of project management practices (Toor & Ogunlana, 2008; Elwakil et al., 2009). In this sense, cost, time, and scope were the fundamental elements of business success. A construction enterprise may consider as a success if the executed project meets its completion date or budget or if the end results conform to the original scope. Although it is difficult to separate project success from company success since individual project often represents a significant proportion of an organization's total revenue, nevertheless, an exclusive focus on project-level success criteria only addresses the short-term goals of a construction enterprise (Farinde & Sillars, 2012).

It is argued that too much research attention has paid to grandiose the theory on a project-related success factors, but not enough research has been conducted on corporate issues to determine the long-term success and survival of the construction business. It is suggested that the short-term and long-term goals must be balanced to safeguard the long-term continuity of the business. While at the same time obtaining the short-term results are necessary to provide the foundation for planning the future (de Waal, 2012). Therefore, a construction enterprise must have to better positioning themselves by ensuring all aspects of their business functions remain competitive in order to achieve the long-term business success without ignoring the short-term goals.

One facet of business approach adopted in most industries outside the construction sector to achieve success is that of entrepreneurship. Entrepreneurial attitudes and behaviours are important for companies of all types and sizes in order to prosper and grow (Dess & Lumpkin, 2005; Hitt, 2005; Kraus, 2013). It is

evidence that the construction and entrepreneurship activities are regarded as the fuel to the every nation's economic growth (Filser & Eggers, 2014; Hillebrandt, 2000; Kuratko, 2009; Kraus, 2013; Tijhuis & Fellows, 2011). For that understanding, the construction and entrepreneurship activities constitute a critical component of any nation's economic development. However, very few studies, if any, have explored the applicability of the entrepreneurship perspectives in searching for predictors of success in the construction industry. In most regards, the construction engineering management (CEM) and entrepreneurship literature have evolved separately, with little cross-fertilization within the two. This paper reports the study undertaken in the context of the Malaysian construction industry aims to bridge the gap between the two bodies of literature, by exploring the success indicators for the construction enterprise through the lens of the entrepreneurship perspectives.

THEORETICAL FRAMEWORK

Entrepreneurship is considered as an important driving factor for the long-term business success and survival (Antoncic & Hisrich, 2003; Covin & Selvin, 1991; Filser & Eggers, 2014; Kraus, 2013; Lumpkin & Dess, 1996; Wiklund & Shepherd, 2003;). Indeed, many businesses outside the construction industry are increasingly attempting to foster entrepreneurship in order to explore and exploit business opportunities (Kraus, 2013; Vecchiarini & Mussolino, 2013). It argues that the construction enterprises should also take advantage of what the entrepreneurial mindset brought for the success in business.

Drawing upon the existing theories on the link between entrepreneurship and performance, we developed a theory by identifying four knowledge areas that could contribute to the construction business success: (i) entrepreneurial orientation, (ii) entrepreneurial organization, (iii) entrepreneurial competencies, and (iv) entrepreneurial environment. All of these areas have been studied in many previous studies and may have some validity on their effect to the performance, for examples: entrepreneurial orientation (Antoncic & Hisrich, 2001; Kraus, 2013; Lumpkin & Dess, 1996), entrepreneurial organization (Mokua & Ngugi, 2013; Shahu et al., 2012; Turró et al., 2014), entrepreneurial competencies (Man et al., 2002; Mitchelmore & Rowley, 2013; Shigang, 2011), and entrepreneurial environment (Bakar et al., 2012; Jabeen & Mahmood, 2014; Voiculet et al., 2010).

The important of these knowledge areas in the construction business can be viewed from the following perspectives. First, the nature of construction businesses that compounded with highly competitive and uncertainties highlighted that the construction entrepreneurs must have to focus on entrepreneurial orientation. It refers to the entrepreneurial strategy-making processes that the business must have to achieve a competitive advantage (Vecchiarini & Mussolino, 2013). In this focus, the construction entrepreneurs will be guided to the operational basis of entrepreneurial decisions and actions. Second, success cannot be gained without appropriate entrepreneurial organization. Entrepreneurial organization provides the fundamental for strategic direction to achieve a common goal or set of goals (Robbins & Mathew, 2009). In this sense, a construction enterprise must adapt the appropriate organizational structure and organizational culture because the effectiveness of any strategy can only achieve if it fit with these elements. The assumption is that, if the structure and culture are appropriate, then all processes and relationships within the organization will occur effectively.

Third, entrepreneurial competencies are another aspect that construction enterprise must consider. It is about the capability of the organization to acquiring, using, and developing successful resources for their business purposes, in the specific context in which firm operates (Capaldo et al., 2014). For example, project management competencies are very important in the execution phase of the project's life-cycle. Finally, the entrepreneurial environment is another aspect that needs to be considered. In this regard, a construction enterprise must aggressively scan their external environment to detect, and exploit the opportunity in the marketplace. Environmental turbulence is seen to be strongly influenced business activities, include processes, systems, and strategies (Aldrich & Pfeffer, 1976). Although external

environmental beyond the influence and control of the organization, they actually provide the opportunities. In the context of the Malaysian construction industry, for example, construction enterprise can take advantage of the availability of new policies and development plans. For example, those included in the 11th Malaysia Plan, which recently launched, and set a strategy to acquire the available opportunities. Therefore, a construction enterprise must suit their strategies accordingly to the external environment.

Given the importance of these elements to the construction business performance, we argue that a construction enterprise must adopt the entrepreneurial mindset if they desire to success and survival in their business. In this sense, they should focus on entrepreneurial orientation, enabled by the appropriate entrepreneurial organization, driven by the entrepreneurial competencies, and foundation by the capability to absorb the entrepreneurial environment. Figure 1 illustrated the success indicators for the construction business from the entrepreneurship perspectives.

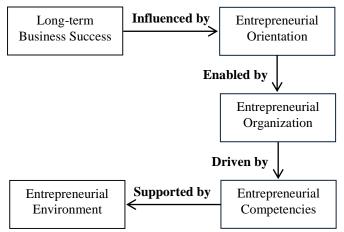


Figure 1: The Construction Business Success Indicators from the Entrepreneurship Perspectives

RESEARCH METHODOLOGY

The exploration of the long-term success indicators of construction business from the entrepreneurship perspectives requires advanced knowledge and experience because it is a new aspect of the CEM literature. It involves in the developing new ideas for the construction business. Hence, we judged that the Delphi study seemed to be an appropriate strategy of inquiry for this study. The Delphi technique is useful for situations where individual judgement to be seized in order to address the lack of understanding along the incomplete state of knowledge (Delbecq et al., 1975; Skulmoski et al., 2007). The Delphi study is the stronger methodologies for a rigorous query of experts and stakeholders, and has increasing used in the CEM research (Hallowell & Gambatese, 2010).

Delphi Technique Overview

The Delphi technique was developed by the RAND Corporation in the 1950's for the United States Air Force sponsored project. It aims to solicit expert opinions about real-world topics that are often subjective. Hence, Delphi concept is particularly useful for a research instrument when there is incomplete knowledge about a problem or phenomenon where there are no 'correct' answers (Skulmosti et al., 2007; Paliwoda, 1983). It uses an iterative feedback technique with a group of experts and concerning to a set of qualitative research methods. It relies on the opinions of individuals who are believed to be experts on the subject under consideration to achieve consensus (Schmidt, 1997). As compared to the traditional surveys, the Delphi method requires participants to expert certification before the survey process begins (Tran et al., 2014).

Delphi Questionnaire

In the first round of a Delphi study, researchers have the choice to use either an open-ended questionnaire or a structured questionnaire or both structured and open-ended questionnaires. The utilized of both approaches is an acceptable and a common practice that frequently found in academic research (Hsu & Sandford, 2007; Kalaian & Kasim, 2012). We adopt a Delphi study with the use of a structured questionnaire in the first round. It is because the entrepreneurship perspectives are rare and new in the CEM research. Participants may provide inappropriate answers if they do not understand well the concepts of entrepreneurship and may leasing to the meaningless of the whole research effort. However, the open-ended questions were also provided at the end of each perspective. This approach was consistent with the recent work of Zou & Moon (2014).

The first round questionnaire consisted of demographic information, experience, qualifications, and other information that would able to confirm the invited participants are experts in the field of study. Twenty three items from the four entrepreneurship perspectives were included in the questionnaire. The content of each section of the questionnaire was explained clearly including the brief description of each of the items asked. The participants were instructed to rate the importance of the items to the construction business success using the importance scale based on a five-point Likert-scale: 1 = no judgment, 2 = very unimportant, 3 = unimportant, 4 = important, and 5 = very important. Participants were also asked to list and describe any other additional items that they think are important and should consider in the evaluation of success indicators in the provided column at the end of every perspective.

Pilot Study

Skulmoski et al. (2007) highlighted the need to pilot a Delphi questionnaire as to improve its comprehension, and to rectify any procedural problems. However, a literature search revealed no clear guidelines about whether to pilot the whole process, each round, or just the initial round. Following the recommended by Clibbens et al. (2012), we employed a pilot study of eight experts for all rounds of the Delphi study in advance of recruiting for the full Delphi study. The participants of the pilot study did not involve in the actual study. All the comments and feedback received from the pilot participants were considered. Therefore, the instrument is considered to be achieved the content validity. Moreover, the used of importance scales for consensus building is to ensure that the measures achieved internal consistency.

Reliability

Although, there was no evidence in the literature indicated the reliability of the Delphi study, nevertheless, an attempt has been made to determine the reliability of the tool being used. We contended that the measurement of the instrument reliability could be possible if the initial round of the Delphi study used the structured questionnaire as the case of this study. Reliability was evaluated using Cronbach's alpha coefficient from the data of the pilot study. Upon analysis, the Cronbach's alpha for the instrument was found as 0.827 or 82.70%, which implies a higher acceptable reliability (Nunnaly and Bernstein, 1994).

Panel Composition and Size

The success of the Delphi study clearly rests on the combined expertise of the participants in the relevant field that make up the expert panel (Powell, 2003). The expert panellists must be experienced professionals who can provide an informed view or expert opinion on the issues being investigated (Nworie, 2011). However, the optimal size of participants in Delphi technique has not been established. As a consequence, there was a varied opinion on the prerequisite panel size. In a summary of Rowe and Wright (1999), for example, the size of a Delphi panel in peer-reviewed studies ranged from a low of three members to a high of eighty. We form a heterogeneous group of four independent panels of eight to fifteen members each. The basis of this decision was that the panel size is congruent with established

methodological norms, and to allow for potential drop-out (Briedenhann & Butts, 2006). It is also small enough to ensure the respondents are all experts in their fields (Pan et al., 1995). The four independent panels were: (i) Contractors/Developers, (ii) Professional consultants (architects, engineers, and quantity surveyors), (iii) Government technical officers, and (iv) Academicians. Also, the selection of panel size is based on purposive sampling on the basis of 'closeness' to the topic under study (Donohoe & Needham, 2009). Therefore, this size was deemed to be sufficient for the composition of highly qualified expert panellists.

Panel Member Qualification

The selection of qualified experts is one of the most critical requirements in the Delphi study. According to Needham & de Loë (1990) the experts must be representative of the industry or sectoral experience that relates to the subject of research. This criterion is measured in terms of demonstrated education and training (natural, social, and engineering sciences), profession and occupation (commerce, education, government, industry), and regional and sectoral affiliation. In the context of this study, first, the experts must be representative of the Malaysian construction industry. Second, the experts must also exhibit recognised authority or sufficient expertise. It is measured in terms of standing within the discipline of the subject under study (academics and researchers), standing within profession sensitive to subject under study (contractors, developers, and professional consultants), and experience with applied management and research (administrators, managers, research analysts). In addition, the findings of Vick (2002) and Simonton (2014) on the development of engineering expertise indicated that engineering experts reach the height of their expertise between career ages of ten and thirty three. Therefore, the requirements for each panel are:

- Have a minimum of 10 years experienced in the construction industry;
- A minimum of a bachelor degree in the fields directly related to the construction industry, from an accredited institution of higher learning (except academician panel);
- At least five years registered as a certified professional engineer, professional architect, professional quantity surveyor, or project management professional (for professional engineering consultant panel);
- At least ten years of experience as the faculty member at an accredited institution of higher learning with research or teaching focus on the CEM, or other subjects related to the construction industry (for academician panel);
- A minimum of a master's degree in the engineering or other fields related to the construction industry, from an accredited institution of higher learning (for academician panel);
- Primary or secondary author of at least three peer-reviewed journal articles on the topic related to the CEM.
- Invited to present at a conference focused on the topic related to the CEM (for academician panel):
- Author and editor of a book or book chapter on the topic related to the CEM.

Delphi Round

The objective of rounds in Delphi study is to reach consensus by reducing variance in responses as to improve precision. It is achieved through the use of controlled feedback and iteration (Hallowell & Gambatese, 2010). Giannarou & Zervas (2014) suggested that the Delphi rounds are open to the choices of the researcher. However, to allow feedback and revision of responses, a minimum of two rounds are required (Christie & Barela, 2005; Mullen, 2003). Indeed, a highly suggestive is from the outcome of Dalkey's et al. (1972) experiment that the answers were more accurate on round two and became less accurate on subsequent rounds. Thus, this study is designed to limit to two rounds of Delphi process only. It aims to eliminate fatigue and time pressure that result in high panel attrition (Mitchell, 1991).

Criteria for Attaining Consensus

One of the aimed of using Delphi is to achieve greater consensus amongst panellists (Rowe & Wright, 1999). Consensus simply means the general agreement on the subjects under investigating (Gunhan & Arditi, 2005). Although the principal aim of the Delphi study is to reach consensus among the experts, a common practice to measure consensus does not exist (Holey et al., 2007). For this study, we had predetermined the criteria to reach a consensus: *median 4 to 5, and 80% or more of respondents rating the indicators within 4 to 5* on the importance scale. The indicators that achieved these criteria are considered to have reached the consensus. These criteria are consistent with the works of Hollander et al. (2013).

Results and Analysis

The final questionnaire was electronically transmitted via email in two rounds of the Delphi process. In Round 1, the questionnaires were sent to thirty nine respondents who have officially agreed to participate and qualified as an expert based on the pre-determined criteria. All the thirty nine experts returned the Round 1questionnaires, represents 100% response rate. In Round 2, experts were given an opportunity to review their rating based on the group mean and median achieved in Round 1. The questionnaires were sent to thirty nine respondents who responded the Round 1 survey. Of thirty nine respondents, thirty six experts returned the questionnaire, representing 92.3% response rate. The three experts who did not respond in Round 2 provided no reasons for doing so. Table 1 summarizes the results emerged from the two iteration rounds.

Table 1: The Importance of Indicator Emerged from the Delphi Rounds

•	Round 1			Round 2		
Indicator	%			%		
	Respons	Importa	Importa	Respons	Importa	Importa
	e	nce	nce	e	nce	nce
	(Score 4	Mean	Median	(Score 4	Mean	Median
	& 5)			& 5)		
E						
Entrepreneurial Orientation:		3.85	4.00	72.2*	3.94	4.00
Autonomy	CC 7*					
Innovativeness	66.7*	4.23	4.00	94.4	4.39	4.00
Risk-taking	87.2	4.00	4.00	94.4	4.28	4.00
Proactiveness	79.5	4.49	5.00	97.2	4.58	5.00
Competitive aggressiveness	94.9	4.08	4.00	89.9	4.19	4.00
Religiosity**	82.1				4.11	4.50
				72.2*		
Entrepreneurial						
Organization:						
Organizational structure	92.3	4.33	4.00	97.2	4.50	4.00
Organizational culture	87.1	4.46	5.00	91.7	4.58	5.00
Entrepreneurial						
Competencies:						
Founder's personal	82.1	4.10	4.00	88.8	4.31	4.00
competencies	94.9	4.36	4.00	94.4	4.44	4.00
Business & management	92.3	4.44	5.00	91.7	4.50	5.00
competencies	89.8	4.31	4.00	94.5	4.47	4.00
Marketing competencies	84.6	4.03	4.00	91.7	4.19	4.00
Technical competencies		3.54	4.00	58.3*	3.58	4.00
Technological competencies	53.9*	3.54	4.00	58.4*	3.56	4.00
Political competencies	33.7	3.34	1.00	30.4	3.30	1.00
1 officer competencies	I	I	1	I	I	I

Social responsibility competencies	59.0*					
Entrepreneurial						
Environment:						
Financial resources	97.5	4.72	5.00	97.2	4.75	5.00
Government policies	92.3	4.31	4.00	91.7	4.28	4.00
Government programs	82.1	4.00	4.00	86.1	4.06	4.00
Entrepreneurial education &	84.6	4.03	4.00	91.7	4.14	4.00
training		3.67	4.00	72.2*	3.81	4.00
Research & development	66.7*	4.08	4.00	83.4	4.14	4.00
transfer	82.0					
Commercial & professional		3.92	4.00	75.0*	3.94	4.00
infrastructure		3.77	4.00	78.4*	3.94	4.00
Internal market openness	71.8*	4.00	4.00	75.0*	3.87	4.00
Physical infrastructure &				100.0	4.42	4.00
services	66.6*			97.2	4.56	5.00
Cultural and social norms	69.2*					
National economy growth**						
National political stability**						
Kendall's Coefficient of	W = 0.492			W = 0.632		
Concordance						

Note: ** New indicators *Did not reach consensus

Entrepreneurial Orientation

In Round 1, under the entrepreneurial orientation, four indicators were achieved consensus: 'Innovativeness', 'Risk-taking', 'Proactiveness', and 'Competitive Aggressiveness'. These indicators indicated the importance median of 4 to 5 and rated more than 80% by the experts as being strongly important or important. In addition, one expert suggested and described one additional indicator that he/she believed as an important indicator in evaluating the entrepreneurial orientation. This indicator was accepted as the sixth indicator of entrepreneurial orientation and named as 'Religiosity':

'Religious beliefs and faiths such as honesty should also consider as the important indicator of the success of construction business as they could minimize the risk of unethical practices within the industry'.

In Round 2, out of six indicators, four indicators were achieved consensus, namely 'Innovativeness', 'Risk-taking', 'Proactiveness', and 'Competitive Aggressiveness'. These indicators indicated the importance median of 4 to 5 and rated more than 80% by the panel experts as being strongly important or important. This result concurred with the result of the Round 1.

Entrepreneurial Organization

In both Round 1 and Round 2, all of the entrepreneurial orientation elements were achieved consensus. The importance median for the indicators fell between 4.0 and 5.0 and more than 80% of the experts rated 'Organizational Structure' and 'Organizational Culture' as both being strongly important or important. Therefore, both of them were achieved consensus.

Entrepreneurial Competencies

In both Round 1 and Round 2, five indicators were seemed to achieve consensus: 'Founder's Personal Competencies', 'Business and Management Competencies', 'Marketing Competencies', 'Technical Competencies', and 'Technological Competencies'. All of these indicators indicated the importance

median 4 to 5 and were rated more than 80% by the experts as being strongly important or important. Therefore, these indicators were attained consensus.

Entrepreneurial Environment

In Round 1, five indicators, namely 'Financial Resources', 'Government Policies', 'Government Programs', 'Entrepreneurial Education and Training', and 'Commercial and Professional Infrastructure' were achieved consensus as rated more than 80% by the panel experts as being strongly important or important and indicated the importance median of 4 to 5. In addition, one expert has been suggested and described two additional indicators that he/she considered as important indicators for evaluation the entrepreneurial environment, and were added as the tenth and eleventh indicators two additional indicators. These indicators were named as 'National Economy Growth' and 'National Political Stability':

'The progress of the national economy is very important to the survival of construction enterprise in which the growth of the nation's economy resulting in increases the demand for construction projects not only by government but also by the private sector. Customers will have purchasing power, and the market value of the projects and services will also increase as a result of the economic progress over time'.

'The political stability of the government is also important to the success of construction business. The stable government normally has the policies in the development of national economies, infrastructures, and societies, as well as lesser risks in doing businesses'.

In Round 2, out of eleven indicators, seven indicators, namely 'Financial Resources', 'Government Policies', 'Government Programs', 'Entrepreneurial Education and Training', 'Commercial and Professional Infrastructure', 'National Economy Growth', and 'National Political Stability' attained the required consensus. They were rated more than 80% by experts as being strongly important or important, and indicated the importance median of 4 to 5.

DISCUSSION

The reaching consensus as recommended by experts after only two rounds of Delphi process is a good indication that all the chosen business success indicators were relevant in addressing the problem that stated in this study. In addition, the Kendall's Coefficient of Concordance, W was positively significant at p < 0.05, and has increased from 0.492 in Round 1 to 0.632 in Round 2. The result suggests that the importance of the selected indicators was not particularly controversial. Although the result indicates the moderate level of consensus (W = 0.632) reached by the Delphi panellists, nevertheless, it was not the result of sharp disagreements over the ranking of particular indicators. The achieved by moderate levels of consensus has provided a reasonable level of confidence in the results of the current study, which consistent with the suggestion of Habibi et al. (2014) and Schmidt (1997).

The important results revealed from the Delphi study is that the expert panellists have perceived eighteen indicators as the important success indicators for the construction business as summarized in Table 2. The ranking was based on the mean values, and if any of the indicators have the same mean, then the percentage of experts' agreement on that particular indicator was used. Of the four success perspectives, entrepreneurial competencies and entrepreneurial environment were the most domain perspectives. Each three indicators of these perspectives included in the top ten of the most important indicators of construction business success, follow by each two indicators from the entrepreneurial organization, and entrepreneurial orientation.

Table 2: The Most Important Indicators of the Construction Business Success

Rank	Indicators	Mean	% of	Perspective	
			Agreement	1	
1	Financial resources	4.75	97.2	Environment	
2	Proactiveness	4.58	97.2	Orientation	
3	Organizational culture	4.58	91.7	Organization	
4	National political stability	4.56	97.2	Environment	
5	Organizational structure	4.50	97.2	Organization	
6	Marketing competencies	4.50	91.7	Competencie	
7	Technical competencies	4.47	94.5	S	
8	Business and management	4.44	94.4	Competencie	
9	competencies	4.42	100.0	s	
10	National economic growth	4.39	94.4	Competencie	
11	Innovativeness	4.31	88.8	s	
12	Founder's personal competencies	4.28	94.4	Environment	
13	Risk-taking	4.28	91.7	Orientation	
14	Government policies	4.19	91.7	Competencie	
15	Competitive aggressiveness	4.19	89.9	S	
16	Technological competencies	4.14	91.7	Orientation	
17	Entrepreneurial education and	4.14	83.4	Environment	
18	training	4.06	86.1	Orientation	
	Commercial and professional			Competencie	
	infrastructure			s	
	Government programs			Environment	
				Environment	
				Environment	

Entrepreneurial orientation has been posited by many scholars as associated positively with firm profitability and growth (Hitt, 2005; Kraus, 2013; Rauch et al., 2009). The existence consensus of findings was consistent with the majority of previous studies that reported a positive relationship between 'Innovativeness', 'Risk-taking', 'Proactiveness', and 'Competitive Aggressiveness' and business performance (Arshad et al., 2014; Putniņš & Sauka, 2013; Shehu & Mahmood, 2014). The results provided evidence of synergies relating to the link of entrepreneurial orientation and business performance. Entrepreneurial orientation is not only strategy-making processes of construction business, but also an ongoing process to achieve a competitive advantage in the hostile business environment such as the construction business is (Vecchiarini and Mussolino, 2013; Zain and Hassan, 2007).

It was surprising to note that 'Autonomy' did not reach the consensus. Thus, in a situation where the owners or founders of construction enterprise lose their autonomy over their business decisions, an effect on performance would expect. However, it is possible that the owners believe the important for all business decisions undertaken as the collective decisions by them and their managers. Another reason on this issue could be due to the fact that people play key roles in nearly aspects of all construction process and management (Abowitz & Toole, 2010). It has implied the need for collaboration among people in the construction organization, even in decisions making process. The finding has consistence with the study of Zain & Hassan (2007) within the Malaysian construction industry who revealed that 'Autonomy' was negatively associated with the growth of construction companies. It also supported evidence offered by Arshad et al. (2014) that no correlation found between autonomy and business performance in Malaysian technology-based SMEs. However, the absence of consensus on 'Religiosity' orientation was not surprising since there were substantial disagreements in the literature on the relationships between the

'Religiosity' and performance. Nevertheless, this finding could be considered to have offered a significant contribution to the construction engineering management literature.

The entrepreneurial organization has been seen by many scholars as a strategic direction that includes renewing products, processes, services, strategies, or even the organization as a whole (Colvin & Miles, 1999). It is the most influence indicators on firm's productivity (Hunter, 2002). In relation to 'Organizational Structure', the finding has been supported the views forwarded by Mokua & Ngugi (2013) where the proper organizational structure could enhance organization's entrepreneurial activities that lead to performance improvement. It also supported the evidence offered by Chen & Lee (2007) that organization structure of a construction enterprise was affecting the performance of specific projects. Indeed, a high correlation was found between the project success and organizational structure (Shahu et al., 2012). In relation to the 'Organizational Culture', the result has supported the findings of Turró et al. (2014) where organization culture appeared to be positively significant and has a direct effect on corporate entrepreneurship. Indeed, Ogbonna & Harris (2000) found that that innovative culture and competitive culture had positively linked to the business performance. It also supported the evidence that organizational culture is one the key indicators of the construction industry performance, among others, in term of trustworthiness and inter-project knowledge sharing (Wiewora et al., 2014), international strategic alliances (Yitmen, 2013), industry mentality (Cheung et al., 2012), and conflict amongst stakeholders (Harinarian et al., 2013).

The entrepreneurial competencies have been seen by many scholars as important factors to the firm's performance and competitiveness (Man et al., 2002), and business success and growth (Mitchelmore & Rowley, 2010; Solesvik, 2012). The findings revealed that five indicators had achieved consensus. It includes 'Marketing Competencies', 'Technical Competencies', 'Business and Management Competencies', 'Founder's Personal Competencies', and 'Technological Competencies'. These indicators associated with the fundamental functions of the existence of construction business. It involves the processes of marketing to acquire or sell the project or product, operation to build the project, and management to manage all the processes involved (Schleifer, 1989); Stevens, 2007).

'Marketing Competencies' is crucial to every construction enterprise that may include the functions of estimating, pricing, bidding, networking, and so on. It emerged the importance of marketing efforts to acquire the projects. The project is the 'commodity' of the construction business, and without the project, construction business does not exist. The operational functions that involve the execution of the project are very important to the construction business. It aimed to ensure the project is constructed accordingly since they have strategic implications on the success and profitability of the business (Jari & Bhangale, 2013). In this regard, 'Technical Competencies' and 'Technological Competencies' are the elements that played the vital roles in the project's execution phases. It may include the factors such as construction knowledge, project management practices, information technology or the use of a new method of construction. The construction business is seen further emphasizes the importance of management aspects to managing all the operational processes within the organization. In this view, 'Business and Management Competencies' are the important aspects of competencies that have implication to the organization performance. Among the important 'Business and Management Competencies' that important to the construction business are strategic management, risk management, human resource management, financial management, and so on.

The 'Founder's Personal Competencies' which highlighted the importance of background characteristics and psychological attributes of the founding entrepreneurs are also the important aspects of the construction business. It supports the view forwarded by Driessen & Zwart (2014) that the greatest determinant of business success is the entrepreneur him/herself. It also supported evidence offered by Baum & Locke (2004) and Che Rose et al. (2006) that entrepreneurs, as the owner-managers, play a prominent role in determining business success. Indeed, the lack of entrepreneurial competencies among

the main founder-owner was the most significant reason for most enterprises failures (Kiggundu, 2002). These findings also corroborated by the findings of Mitchelmore & Rowley (2013) who found that personal competency and, business and management competencies were associated with the business growth. In the context of the construction business, these findings supported the evidence offered by Shigang (2011) who revealed that entrepreneurial capability, marketing, and project management competencies were a significant positive relationship with the overall performance of the construction enterprises.

The absence of consensus on two other indicators, namely 'Political Competencies', and 'Social Responsibility Competencies' were seen to be associated with external indicators that outside the fundamental elements of the construction business. However, the findings are considered to have offered a significant contribution to the literature where there existed substantial disagreements in the literature on the effects of 'Political Competencies' and 'Social Responsibility Competencies' on performance. Some researchers had found the positive relationship while others contradictory.

Economies have long noted that firms that maintain any political connections receive a variety of economic benefits in returns (Blau et al., 2013). In this context, the 'Political Competencies' which represents the used of political connections in securing projects was ignored by most of the experts. However, it is possible that the experts considered that the lobbying efforts were one of the activities of 'Marketing Competencies'. The absence of consensus on 'Corporate Social Responsibility Competencies' had supported the viewed of Iqbal et al. (2012) and Nasieku et al. (2014) that the relationship of corporate social responsibility to the performance was unclear. Indeed, corporate social responsibility activities significantly decrease short-term profitability in certain industries (Inoue & Lee, 2011). Furthermore, the gains expected from corporate social responsibility practices are more in the form of intangible benefits such as image/reputation, recognition, and loyalty benefits, all of which may result in turn of profits. However, these intangible benefits may less necessary for construction business because all of the benefits did not guarantee for securing future projects which become the major objectives of the construction business. It could be true in the manufacturing industry where image or reputation and recognition of the company were able to gain loyal benefits and results in gaining superior income.

The firm's external environment needs to be taken into account when considering the relationship between corporate entrepreneurship and firm performance (Covin & Slevin, 1991; Zahra, 1993). The findings revealed that seven indicators had achieved consensus, namely 'Financial Resources', 'National Political Stability', 'National Economy Growth', 'Government Policies', 'Entrepreneurial Education and Training', 'Commercial and Professional Infrastructure', and 'Government Programs'. The existence consensus on 'Financial Resources', 'Government Policies', 'Government Programs', 'Entrepreneurial Education and Training', 'Commercial and Professional Infrastructure' could be expected. It has collaborated with the evidence forwarded by Ahmad & Xavier (2012) who revealed that these indicators were among the major aspect of success indicators for entrepreneurial development in Malaysia.

With respect to these indicators, the availability of financial support was seen to have the highest consensus among the expert panellists. This finding has been supported the evidence offered by Alkali & Isa (2012) and Shamsuddin et al. (2012) that availability of funds is significantly associated with business performance. Indeed, lack of financial support have been widely reported as the main problem facing entrepreneurs in Malaysia and was apparent in research done in both developed and developing countries (Ahmad & Xavier, 2012). This finding highlights that the availability of 'Financial Resources' is of paramount importance to the construction business. In this sense, construction enterprise may need capital to execute the projects, and it could acquire through internal funds or loans, mortgages, and others from financial institutions.

The needs of consistencies of 'Government Policies' and 'Government Programs' to support entrepreneurial activity are also crucial for the construction business. It can be done by improving 'Entrepreneurial Education and Training' with special emphasis on four perspectives of entrepreneurship theory that have been used in the current study, namely entrepreneurial orientation, entrepreneurial organization, entrepreneurial competencies, and entrepreneurial environment. Moreover, 'Government Policies' and 'Government Programs' could also support entrepreneurial development by providing the 'Commercial and Professional Infrastructure' which accessible to the construction companies.

'National Economy Growth' and 'National Political Stability' were other indicators that have achieved consensus. 'National Economy Growth' and 'National Political Stability' were deeply interconnected. In this sense, the relationship between economic growth and stability refers to the manner in which the political stability of a nation can lead to its economic growth which in turn providing safely and stable business environment. These findings had supported the evidence forwarded by Bazza & Daneji (2013) that the performance of business organization depends heavily on the stability of government. In the context of the construction industry, if the country prospered, then more development projects will exist and resulting in more chances to the construction business.

CONCLUDING REMARKS

This study forwarded eighteen valid indicators under four entrepreneurship perspectives as the predictors of success for entrepreneurs in the construction industry. The findings are considered to have offered a significant contribution to the literature, since this study is the first to use the entrepreneurship perspectives in searching the indicators for the success of the construction business. It could be said to have shed light on a symbiotic relationship between the entrepreneurial activities and business success in the construction industry. It suggests that the entrepreneurial-oriented construction enterprises can position themselves to take advantage of market opportunities. Construction enterprises should consider and adopted the concept of entrepreneurship as a tool for running a business. They should focus and give priority to the indicators if they want to success in their business. Moreover, construction industry policy makers' should also consider the indicators while developing the industry's policies.

We argued that the long-term success of construction business could achieve through the corporate entrepreneurship. Rather than viewing the construction business success from the projects executed outcomes, we hypothesized that the success of the construction business can be derived from entrepreneurial activities implemented within the organization. The results of this study suggests that that entrepreneurship phenomenon was universally applicable to all industries in several and significant ways. However, it needs to be tailored to suit the industry's fundamental differences as to warrant successful application.

It is practical to suggest possibilities for future research. By using this research as a platform, future research efforts should able to support or refute the findings revealed from this study. It is recommended to extend the findings of the current study by conducting an empirical survey of the wider population of the construction organizations. However, it is important to ensure that the respondents well understand the concept of entrepreneurship. It also suggested to replicate the study in cooperating data from wider geographical regions to improve the external validity of the instruments and to substantiate results reported by the Malaysian construction industry. New success indicators could be designed, depending on what have been agreed to be termed as entrepreneurship perspectives to improve the model. For example, it could use the perspectives of entrepreneurial schools of thought consisted of the micro view and macro view of entrepreneurship. It is also interesting to know if the model is universally and could use in other industries.

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