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# A systematic model for assessing innovation competence of Hong Kong/China manufacturing companies: A case study

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### ABSTRACT

Although having moved to mainland China, Hong Kong manufacturing plus trading industry is still the largest contributor to Hong Kong GDP. However, they are facing great challenges like higher cost, lower value adding, higher pollution, and lower efficiency these years. Many of them have to be closed or moved out of the southern part of China. These companies have recognized the urgency to upgrade them by innovation. This paper reports a research that aims to analyze the innovation competence in Hong Kong manufacturing companies. The project starts with literature review and the development of a conceptual model. A structured interview guide was developed then. The model was used to evaluate the innovation competence of 7 case companies via a training and consultancy program. The literature provides a long list of critical factors or enablers for innovation (Badawy, 2011). However, they are all listed as linear, separate factors. This research proposes a multi-level model for assessing innovation competence which allows researchers to investigate strategic factors, operational factors and innovation process, separately.

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### Introduction

Innovation has been regarded as essential for companies to remain competitive (Pitt et al., 2006). The emergence of innovative products is market-driven. Capturing value is a major challenge facing technology industries. Leveraging technology and innovation is becoming essential in gaining

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competitive advantage. Technology has become the great equalizer among companies and countries. Essential to technology management success is how we manage the innovation process and the development of technology, and technology utilization in business and industry (Badawy, 2010). The implementation of innovation into organization has been a hot topic in innovation research (Tidd et al., 2001). It is agreed that innovation will not happen by chance, the success can only be found if a systematic management is incorporated (Rajiv and Karuna, 2006). Management of innovation is a core process in innovative organization, dealing with environmental scanning, decision making, resource allocation, and project implementation (Badawy, 2010; Tidd et al., 2001; Hultink et al. (2000) observed that research attentions are paid largely on the discussion of single dimension of innovation, especially in the aspects of technological innovation (Ettlie, 2000), product innovation, or market-related innovation (Hargadon and Sutton, 2000). The administrative process is commonly being overlooked in innovation capability. In reality, the success of innovation management requires both technological and administrative side. The isolation of either side would lead to potential failure eventually regarding the existing literature in innovation management; a complete organization-wide view in innovation management capabilities is anticipated (Wong and Chin, 2007). The innovation competence in organizational innovation will be discussed in this paper.

Ever since China 1979s open door policy (Chan et al., 2005), Hong Kong manufacturers have moved their production plant to the Pearl River Delta region (Hobday, 1995). The Hong Kong–China relationship evolved to the “shop” in front being in Hong Kong and the factory behind being in China (Federation of Hong Kong Industries, 2003). Because of the exceptional historical and political background of Hong Kong, it plays an important trading role in foreign companies exploring the Chinese market (TDC Research, 2004). Hong Kong and Pearl River Delta region has been regarded as one of the most significant developing economies in Asia (Federation of Hong Kong Industries, 2003) and a world renowned manufacturing center (Trade Development Council Research Department, 1998).

A survey conducted in 2003 revealed that, allowing multiple mentions, more than 80% of Hong Kong based manufacturers were engaged in the original equipment manufacturing (OEM), 63% in original design manufacturing (ODM), but only 41% in original branding manufacturing (OBM) (Trade Development Council Research Department, 2003). Under OEM mode, organizations gain competencies in manufacturing various goods (Hobday, 1995). However, the value-added function of OEM is limited to production, the involvement of the relatively high returns functions in engineering design, conceptual design, marketing and branding are not covered (Hobday, 1995). OEM mode is facing huge challenges from price competition because of keen competitions in the regions. Their motivation of being innovative is usually connected to improve product quality (Trade Development Council Research Department, 2003), reduce operation costs (The Chinese Manufacturers' Association of Hong Kong, 2003), and be responsive in meeting customers' needs. The focus is mostly related to optimization of overall productivity rather than provision of higher value-added products or delivering their own branding to earn greater profits. According to Trade Development Council studies, HK based OEM manufacturers were less likely to be promising over medium to long term and their prediction of corporate future was relatively pessimistic (Trade Development Council Research Department, 2003).

A recent article from Ming Pao Daily has given an alarm for the OEM manufactures. Mr. Paul Yin, the president of the China Manufacturers' Association of Hong Kong, estimated about 14% of HK based manufacturing companies would collapse in year 2008. He admitted that the golden times for Hong Kong based manufacturing industry had gone. The HK based manufactures should go further to contribute higher value-added products, deliver branding and services (Trade Development Council Research Department, 1998). Innovation competence which is the driving forces of being innovative is essential in this regard. Under the above background, this study was carried out in HK based manufactures to comprehend the actual situation in innovation competence in the industry. It is believed that this empirical result can provide managerial insights to HK based manufacturers to compete in this environment.

This paper records the research that assesses the innovation competence of Hong Kong manufacturing companies. It starts with the development of a conceptual model including strategic enablers, operational enablers and innovation process as well as their interrelationship. Seven case

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