

Chapter 5

A Research Model for Open Innovation: Synthesizing Opportunities and Challenges Surrounding SMEs

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ABSTRACT

With the advent of innovative technologies and long the setting of entrepreneurship development philosophy, context and business handling have been transformed from being traditional to innovative. Depending on diversity and nature of the transformation, innovation has been shifted from closed peripheries to open dimension. Looking at the immense benefits, ranging from small entrepreneurs to corporate to multinational, business houses are adopting various innovation techniques. However, the road to innovation, despite being a paradigm shift is not smooth and ready for many, particularly the small and medium enterprises (SMEs) who mainly deal with the clients at the outer peripheries of the social circle. Moreover, there is a research gap within the context of SME development through open innovation strategies. This chapter intends to initiate a research model for carrying out research on the development of SMEs through utilization of open innovation strategies. Along these contexts it has tried to synthesize aspects of opportunities and challenges surrounding SMEs development utilizing open and collaborative approaches. To set the research model, the paper has developed an innovation opportunity framework, both at the policy level and at the entrepreneur level. To validate the research hypothesis, the chapter hints at carrying out a three phase survey comprising selected SMEs.

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INTRODUCTION

Business establishments have come to realize the importance of innovation for survival in a world of global competition (Hage, 1999; Sullivan, 1998). Furthermore, it has long been recognized that small and micro businesses have a vital role to play in the economy (Stanworth & Gray, 1991) with small business accounting for 99.6% of all businesses in the UK and an estimated 3.7 million active businesses in 1998. Collectively, small and medium enterprises (SMEs) are responsible for 65% of employment and 57% of Gross Domestic Product within the UK (Madsing, 1997; Tonge, 2001). (There is no single agreed definition of a SME. A variety of definitions are applied among OECD and APEC economies, and employee number is not the sole defined criterion. SMEs are considered to be non-subsidiary, independent firms which employ less than a given number of employees.) The scenario is the same in other European countries. SMEs account for over 99.8% (the EU-26 average, first 26 countries under the European Union) of all firms in Cyprus, Greece, Italy, Portugal, and Spain (European Commission, 2008; Keupp, Lhuillery, Garcia-Torres, & Raffo, 2009).

SMEs in Europe accumulates to 23M€ (23 million Euros) investment market that account for 99% of all businesses and represent 2/3 of the total employment (Renaud, 2008). But, in spite of being key contributor to the global economy accounting for approximately 50% of local and national GDP (Gross Domestic product), 30% of export, and 10% of FDI (Foreign Direct Investment) most of the SME communities are lagging behind promoting their products at the national level and at the global level (OECD, 2006). A number of publications have highlighted these situations (De Jong, Vanhaverbeke, Kalvet, Chesbrough, 2008; European Commission, 2008; MacGregor, Bianchi, Hernandez, & Mendibil, 2007; Maes, 2009; Moore, 2006; Van de Vrande, de Jong, Vanhaverbeke, & de Rochemont, 2009)

and numerous cases can be cited (Landabaso, 2010; Lemola, & Lievonen, 2008; Lindermann, Valcárcel, Schaarschmidt, & von Kortzfleisch, 2009; OECD, 2008a, 2008c) to support them.

The burgeoning nature of global competition and the rising trend in research and development (R&D) expenditures lead entrepreneurs, especially SMEs, to embrace open innovation strategies collaborating with external partners, such as suppliers, customers, consumers, supply chain partners, universities, researchers, other companies, and individuals. In a complex and highly competitive global market, entrepreneurs have to innovate to survive and grow. To innovate and develop commercially viable products and services, SMEs need to explore issues of opportunities and challenges in this open paradigm of innovation (Herstad, Bloch, Ebersberger, & van de Velde, 2008; OECD, 2008a). This paper looks into the opportunities and challenges that SMEs are facing for their growth, operation, and development surrounding open innovation strategies.

To set the theory, before going to the background, this section discusses on concepts of innovation and open innovation, where relationships of SMEs with these two parameters are being focused. As the main thrust of this chapter, later on, it looks into various opportunities and challenges in relation to open innovation and they have been categorized through a vertical literature review. Intention is there to emphasize on the most influential and original works in this field.

Conceptualizing Innovation

The term innovation means a novel way of doing something (McKeown, 2008). It may refer to incremental, radical, and revolutionary changes in thinking, products, processes, or organizations (Schumpeter, 1934). Innovation then could be defined as the creation, development, and implementation of a new product, process, or service, aiming at improving efficiency, effectiveness, or competitive advantage (Chesbrough, 2003a; 2006;

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