2010

# Subsidiary Entrepreneurship, Strategy Development Processes and Strategic Initiatives

Pamela Sharkey Scott
*Dublin Institute of Technology*, pamela.sharkeyscott@dit.ie

P. T. Gibbons
*University College Dublin*, pat.gibbons@ucd.ie



## Recommended Citation

Sharkey Scott, P., Gibbons, P.T.:Subsidiary Entrepreneurship, Strategy Development Processes and Strategic Initiatives. Frontiers of Research in International Business: organizational Form and Function in the 21st Century:11th Annual International Business Research Forum, Fox Business School, Philadelphia, April 10, 2010

**JOURNAL OF INTERNATIONAL MANAGEMENT**

# Subsidiary Entrepreneurship, Strategy Development Processes and Strategic Initiatives

**Pamela Scott [a], and Patrick Gibbons [b]**
**[a] Faculty of Business, Dublin Institute of Technology, Dublin 2, Ireland**
**Ph: (353) 1402 3239, Fax: (353) 1402 7198; Email: pamela.sharkeyscott@dit. ie**
**[b] Smurfit School of Business, University College Dublin, Co. Dublin, Ireland,**
**Email: pat.gibbons@ucd.ie, Ph: (353) 1716 8816**

Key Words

Entrepreneurship

Initiative

Strategy Development Process

Subsidiary

MNC

[a] Corresponding author.

**Abstract**

MNCs gain competitive advantage through leveraging initiatives generated by their subsidiary networks. Yet we continue to have limited understanding of the complex conditions which promote initiatives. By integrating the subsidiary entrepreneurship literature and strategy development theory, we argue that the subsidiary's approach to strategy development mediates the relationship between entrepreneurship and strategic initiative generation. We test our propositions on data generated from surveying the total population of Irish subsidiaries of foreign MNCs. Our findings confirm that an entrepreneurial subsidiary's engagement in formal strategy development makes it better at generating strategic initiatives. This evidences the need for headquarters to encourage both subsidiary entrepreneurship and strategy development if they are to optimise the contribution from their subsidiary operations.

**1.0 Introduction**

A key premise of MNC related literature is that individual subsidiaries, through exposure to their idiosyncratic network of relationships and local opportunities can pro-actively generate strategic initiatives (Bartlett and Ghoshal, 1989; Ghoshal and Bartlett, 1990; Johnson and Medcof, 2007). The MNC then exploits this subsidiary contribution through its ability to transfer these initiatives across its dispersed operations to create a competitive advantage (Boehe, 2007; Ghoshal and Bartlett, 1990;Gupta and Govindarajan, 2000; Kostova and Roth, 2003; Williams, 2009). From a subsidiary management perspective, initiatives also serve to improve the unit's reputation and influence within its MNC (Ambos et al, 2010), and the enhanced bargaining power in resource negotiations with headquarters (Mudambi and Navarra, 2004) reduces the risk of closure or relocation of its activities.

Subsidiary strategic initiatives have been defined as 'entrepreneurial undertakings that … allow the subsidiary to tap into new opportunities' outside of the parent's home country (Ambos et al, 2010, pp. 2), capturing often autonomous 'under the radar' (Delany, 2000) development of products, technologies and international business activities by subsidiary operations (Birkinshaw, 1997). Studies to identify pre-requisites for subsidiary generation of strategic initiatives have primarily focused on the direct influence of contextual factors (Andersson et al, 2007; Birkinshaw, 1997; Cantwell and Mudambi, 2005, Johnson and Medcof, 2007; Williams, 2009). While entrepreneurship is associated with a broad range of contribution in the mainstream entrepreneurship literature (Anderson et al, 2009; Brown et al, 2001; Burgelman, 1984; Covin et al, 2006), the relationships is assumed yet largely untested in the subsidiary literature (Birkinshaw, 1997; Young and Tavares, 2004). However, of potentially greater managerial importance than empirically validating this relationship, is the need to achieve a greater understanding of the influence of subsidiary activities on the entrepreneurship / initiative generation relationship.

Prompted by recent explorations of the relationship between entrepreneurship and other 'organisational phenomenon' (Dess et al, 2003; Covin et al, 2006; Anderson et al, 2009), we argue that a critical management routine (Papadakis et al, 1998), strategy development activities influences how entrepreneurship translates into the generation of strategic initiatives. We contend that subsidiary strategy development activities (subsidiary generation of strategy for their unit independently of headquarters as referred to by Boehe, 2007; Cantwell and Mudambi, 2005; Dorrenbacher and Gammelgaard, 2006; Dorrenbacher and Geppert, 2009; Taggart, 1998), influences the benefits of entrepreneurship, particularly the generation of strategic initiatives. This knowledge gap merits explicit examination as MNCs rely on their international networks to supplement home country knowledge and develop strategic initiatives which can be utilised across the organisation (Almeida and Phene, 2004; Andersson et al, 2007; Gnyawali et al, 2009). It also responds to calls for research to adopt an interdisciplinary perspective as it investigates how subsidiary entrepreneurial opportunity seeking behaviour combines with advantage seeking through critical routines (Papadakis et al, 1998). Most importantly this study generates explicit insights for managers on how a fundamentally important management practice, their strategy development activities, combines with subsidiary entrepreneurship to influence their unit's contribution to the MNC.

This paper firstly empirically validates the relationship between entrepreneurship and strategic initiative generation, an assertion which is ubiquitous in the literature but lacking empirical validation (Young and Tavares, 2004). It then explores how strategy development activities intervene in the entrepreneurship / initiative generation relationship. Our analysis demonstrates that entrepreneurial subsidiaries which engage in formal strategy development are better at generating strategic initiatives. This is (to our knowledge) the first time that the impact of subsidiary's strategy development activities on subsidiary contribution has been assessed, despite the wide acceptance of strategy development as a critical aspect of organizational management and 'among the main means through which management choice is actually effected' (Papadakis et al, 1998, pp. 116). Most importantly, for both theory and practice, this study provides initial evidence of the potential impact of any move from federal MNC structures to a 'global factory' (Buckley, 2009) approach incorporating centralised decision making and reducing local discretion for subsidiary management. If the erosion of federal MNC structures impacts subsidiary ability to engage in strategy development, we contend that it will also affect the potential of entrepreneurial subsidiaries to contribute to the organisation through strategic initiative generation. Finally, aside from its potential for theory development, this area is particularly relevant to practitioners as understanding how approaches to strategy development influence the benefits of subsidiary entrepreneurship is critical to protecting and developing their unit within the MNC.

The next section of this paper provides the theoretical views of subsidiary position within the federative MNC, and the theoretical impact of a shift to the MNC *global factory* style operation for subsidiary entrepreneurship, strategy development processes, and initiative generation. Section 3 builds on this conceptual background to develop specific arguments for a mediating role for strategy development. Section 4 describes the research methodology while Section 5 presents and analyses the findings obtained from a survey targeting all the foreign subsidiaries of MNC in Ireland. Finally we discuss the implications of our findings for both theory and practice.

## 2.0 Conceptual Background

*2.1 Federal MNCs*

The evolution of International Business theory demonstrates two contrasting perspectives on the current position and future role of MNC subsidiary units. The federative view perceives MNCs as heterarchies (Andersson et al, 2007; Mudambi, 2008), with headquarters gently leading its 'national' subsidiaries, and exploiting their access to new knowledge, ideas and opportunities (Andersson et al, 2002).The competitive advantage of the MNC is derived from its subsidiary network (Bartlett and Ghoshal, 1989), as it promotes organisational learning 'from local systems of innovation, using and integrating local resources and competencies, and generally introducing a heightened level of dynamism into the parents's MNC",(Mudambi and Navarra, 2004, pp. 387). The primary theoretical dilemma within this perspective is how headquarters can guide and harvest subsidiary potential within the MNC organisational structure while restraining opportunistic behaviour and restraining the bargaining strength of powerful subsidiaries (Holm and Sharma, 2006; Kotabe and Mudambi, 2004; Mudambi and Navarra, 2004; Watson O'Donnell, 2000).

An emerging alternative perspective proposes that the federal structure of the MNC, if it ever existed to any great extent, is threatened by escalating headquarters control (Buckley and Ghauri, 2004). This is facilitated by disintegrating trader barriers (Mudambi, 2008) combined with developing information and communication technology (ICT) capabilities (Boehe, 2007; Yamin and Sinkovics, 2007). This allows value chains and inter-unit relationships to be controlled and co-ordinated across both subsidiaries and national borders (Mudambi, 2008). It also facilitates greater outsourcing of those activities which headquarters deems as peripheral or less profitable (Boehe, 2007). Perhaps the most notable consequence of disaggregating value chains is the reduction of the relevance of the 'national' or miniature replica subsidiary (Birkinshaw, Omar and David, 2001) embedded in host country and nearby markets. This implies that an MNC's 'subsidiary' in a particular host country may comprise several separate departments, each individually addressing a different part of the value chain, or of numerous value chains, with as many reporting lines operating independently of each other. The essence and implications of this new MNC organisational structure have led to the vision of the MNC as a *global factory* (Buckley, 2009).

*2.2 Implications of Global Factory Structures*

The emergence of these conflicting perspectives prompts a wider debate as to whether any shift to a *global factory* (Buckley, 2009; Buckley and Ghauri, 2004) should concern the MNC and subsidiary managers. Under the federal structure, the ability of subsidiaries to access knowledge, ideas and opportunities underpins their value in generating initiatives for diffusion and exploitation across the wider organisation (Andersson et al, 2002), stimulating the 'constant reinvention' required to succeed in the global environment (Birkinshaw, 1997; Birkinshaw et al, 1998). Subsidiary entrepreneurship plays a critical role in driving this reinvention and generating initiatives (Birkinshaw, 1997). We propose that MNC subsidiaries will display a similar tendency to individual independent organisations and vary in their level of entrepreneurship, as captured by their 'entrepreneurial orientation' which incorporates dimensions of risk taking, pro-activeness and innovativeness (Covin and Slevin, 1989; Covin et al, 2006), and ranges along a continuum from extremely conservative to very entrepreneurial (Barringer and Bluedorn, 1999).

In examining theoretical models of how organisations benefit from entrepreneurship, we identified initial explorations of how critical organisational elements translate the benefit of entrepreneurship into firm performance and strategic learning (Covin et al, 2006; Anderson et al, 2009). Developing these insights in a subsidiary context, we argue that a critical management routine (Papadakis et al, 1998), *strategy development activities*, influences the entrepreneurship / initiative relationships or how entrepreneurship translates into the generation of strategic initiatives. We contend that subsidiary strategy development activities (subsidiary generation of strategy for their unit independently of headquarters as referred to by Boehe, 2007; Cantwell and Mudambi, 2005; Dorrenbacher and Gammelgaard, 2006; Dorrenbacher and Geppert, 2009; Taggart, 1998), facilitates entrepreneurial subsidiaries to generate strategic initiatives. This knowledge gap merits explicit examination as MNCs rely on their international networks to supplement home country knowledge and develop strategic initiatives which can be utilised across the organisation.

While the possible repercussions of MNC structural changes on the ability of the subsidiary to be entrepreneurial are outside the scope of this paper (see Birkinshaw, 1997, for an analysis of contextual facilitators of subsidiary entrepreneurship), we anticipate that a shift from a federal configuration would negatively impact subsidiary engagement in strategy development. It is now widely acknowledged, although to the best of our knowledge, as yet untested, that subsidiaries engage in strategy development (Cantwell and Mudambi, 2005; Dorrenbacher and Geppert, 2009; Taggart 1998). Clearly, subsidiary strategy is developed within the constraints of MNC ownership but it captures the potential for subsidiary managers to use their 'strategic discretion' in response to changing circumstances (Birkinshaw, 1997; White and Poynter, 1984). We argue that any diminution on strategy development activities at the subsidiary level may also endanger realisation of the benefits of subsidiary entrepreneurship.

A shift to disaggregating value chains may provide the MNC overall with operational flexibility (Buckley and Ghauri, 2004, Mudambi, 2008), but may also erode the location bound advantages stimulating local learning and responsiveness, which can be leveraged across the organisation (Gnyawali et al, 2009). Most importantly, it may restrict a subsidiary's capacity to view its activities and contribution to the MNC in totality in the way facilitated by the miniature replica unit. Even if the MNC maintains subsidiaries as distinct entities there is no doubt that ICT enabled access to current, detailed operational and strategic data can facilitate greater headquarters' control and co-ordination of both what happens within the subsidiary and its internal and external relationships. This has negative consequences for both subsidiary autonomy and initiative taking (Yamin and Sinkovics, 2007). However, while the degree of change may not be as radical as the *global factory* predicts there is a strong need to understand the potential implications of any reduction in the nature and activities of subsidiary units.

Inherent in a subsidiary's ability to engage in developing plans and alternatives is the unit's definition as a strategic entity, sufficiently bounded and delineated within its organisation and its environment, and responding to local events and opportunities. As noted by Boehe (2007, 490), the federative structure implies 'relatively autonomous subsidiaries, each with its own organisational or strategic goals and self-contained (not directly interdependent) activities". The degree of subsidiary responsibility and autonomy will vary, as some may operate with a narrow range of value activities (Dorrenbacher and Gammelgaard, 2006; Roth and Morrison, 1992), for example only executing marketing or manufacturing activities (Bartlett and Ghoshal, 1986). While acknowledging the variation, the literature consistently assumes that subsidiaries operate with a specific mandate (Birkinshaw and Hood, 1997; Delaney, 1998; Taggart, 1998) and some degree of decision making ability (Boehe, 2007; Dorrenbacher and Gammelgaard, 2006; White and Poynter, 1984). In contrast, the *global factory* style MNC reduces the organisation's presence in a location to units comprising disconnected strands of value chains, controlled and co-ordinated by a remote headquarters (Buckley, 2009). Based on the implicitly negative impact of such a migration on subsidiary strategy development activities, we explore its implications for the ability of subsidiaries to contribute to the MNC. In particular, we examine if subsidiary engagement in strategic planning facilitates the benefits of entrepreneurship in generating strategic initiatives.

We propose firstly that entrepreneurial subsidiaries generate strategic initiatives, and then that those entrepreneurial subsidiaries who engage in strategy development are better at generating initiatives which can be exploited by the MNC. If engaging in strategy development enhances a subsidiary's ability to generate initiatives, then it is critical that subsidiaries engagement in strategy development is facilitated by the MNC. From a managerial perspective, as subsidiaries which contribute more are likely to have their charter (MNC assigned activities and business responsibilities) maintained and extended gain (Birkinshaw and Hood, 1998; Delany, 2000), insights into how they can enhance the benefits of subsidiary entrepreneurship through their strategy development approaches are particularly valuable.

**3.0 Hypotheses Development**

*3.1 Subsidiary Entrepreneurship and Strategic Initiative Relationship*

The growing acceptance of corporate entrepreneurship (Brown et al, 2001) compels both academics and practitioners to recognise its benefits in driving responses to the demands and opportunities within their particular environment, as 'firm specific advantages...continually obsolesce and have to be regularly renewed' (Buckley and Casson, 1998, pp. 28). Corporate entrepreneurship can lead to the redirection of strategy in response to environmental opportunities, continual redefinition of organisational boundaries and eventually to reconceptualising of strategic domains (Barringer and Bluedorn, 1999; Burgelman, 1983; Covin and Slevin, 1991; Kuratko et al,1990). Miller (1983, pp. 770) argues that entrepreneurial behaviour is not an individual or small firm phenomenon, as it can 'be performed by entire organisations which are decentralised', occurring at and across all levels of the corporation (Zahra, 1993), regardless of scale (Quinn, 1985). We propose that entrepreneurship can be observed at the subsidiary level, and that units will vary in the level of entrepreneurship exhibited, as captured by their entrepreneurial orientation.

The three dimensions of entrepreneurship, pro-activeness, risk taking and innovativeness (Covin and Slevin, 1988; 1989) are all implicitly associated with the experimentation (Lumpkin and Dess, 1996) and exploration (Covin and Slevin, 1991). For example, Lumpkin and Dess (1996: 142) refer to the impact of the innovativeness dimension on a 'firm's tendency to engage in and support new ideas, novelty, experimentation' which Zahra (1999, pp. 169) asserts results in 'pioneering the development of new products, processes and services'. Entrepreneurship, and particularly the pro-activeness dimension implies to pre-empting competitors which when combined with risk taking inherently implies entry into 'novel business arenas' (Anderson et al, 2009), new business models, and new strategic approaches or initiatives.

Entrepreneurship within a decentralised or federal structure recognises the potential for a subsidiary unit's idiosyncratic experience in its local environment and how it is embedded with in its particular network to potentially enables it to make a unique contribution to the MNC (Gnyawli et al, 2009). While initiatives at the firm level are likely to be reflected in growth or financial position, we suggest that for subsidiaries it also involves strategic actions or initiatives which improve the subsidiary's standing or role within the MNC, and can be exploited across the organisation to create competitive advantage (Andersson et al, 2007; Birkinshaw, 1997; Cantwell and Mudambi, 2005, Williams, 2009).

*Hypothesis 1: There is a positive relationship between subsidiary entrepreneurship and strategic initiative generation.*

*3.2 Entrepreneurship, Strategy Development and Initiative, Direct and Mediating Relationships*

The complexities attaching to subsidiary behaviour arise from its operation within two specific contexts; the internal MNC market comprising customer, supplier and network relationships with sister subsidiary and headquarters, and an external business context encompassing customers, suppliers, networks and broader institutions (Birkinshaw et al, 2005). Within both these contexts it must operate under the control and co-ordination of headquarters, as headquarters ultimately determines strategy for the overall MNC. However, within the overall strategy cascading down from the centre, it is accepted that federal structures permit sufficient latitude for subsidiaries to develop specific unit strategies to meet these complex contextual demands, and to achieve local responsiveness and exploit opportunities within their unique multifaceted environments (Birkinshaw, 1997; Cantwell and Mudambi, 2005; Dorrenbacher and Gammelgard, 2006). However, we have little knowledge of the strategy development activities within subsidiaries or their implications for subsidiary contribution to the MNC (Dorrenbacher and Geppert, 2009). This critical gap is problematic as MNCs rely on the contributions generated by their international networks to supplement home country knowledge and develop new more creative perspectives on activities (Andersson et al, 2002).

We argue that subsidiary strategy development activities will influence the relationship between *subsidiary entrepreneurship* and the creation of strategic initiatives. As an entrepreneurial orientation captures an organisation's 'underlying philosophy, which tends to flavour the overall decision making framework of …management', (Miles and Arnold, 1991, pp. 49) and as the essence of strategy is effecting management choice (Papadakis et al, 1998) under increasingly turbulent environmental conditions, we propose that the effectiveness of subsidiary entrepreneurship as represented by the level of strategic initiative generation will by influenced by subsidiary strategy development activities. The potential commonalities between entrepreneurship and strategic management are already identified in the literature (Covin et al, 2006; Lumpkin and Dess, 1996; Lyon et al, 2000). For example, Anderson et al (2009: 220) describe entrepreneurial orientation as a 'strategic construct that captures a firm's strategy making practices, management philosophies and firm level behaviours'.

Complimenting investigation of the direct entrepreneurship / initiative relationship with exploring mediating effects may help achieve a better understanding of the complex tensions between subsidiary opportunity seeking and advantage seeking, and the significance of routines within the subsidiary in facilitating entrepreneurship. Identifying the associations between these factors will increase awareness of the impact in any erosion in the subsidiary's potential to develop strategy. From a managerial perspective, our study will demonstrate the role of strategy development activities in delivering the benefits of subsidiary entrepreneurship. In selecting variables for examination we identified four critical elements in the literature which would influence the entrepreneurship / initiative generation relationship in specific context of subsidiary operations. These comprise; *HQ Constraints* on subsidiary strategy development as subsidiary entrepreneurship is associated with subsidiary autonomy to make decisions independently of its parent (Birkinshaw et al, 1998) and some discretion or decision making capacity is implicit in the development of subsidiary strategy, subsidiary engagement in *Formal Planning* as the critical strategy development activity, the role of *Powerful Political Groups* in subsidiary decision making as organisations are 'political arenas' and powerful groups drive strategic decisions (Bailey et al, 2000) and the expected role of subsidiary leadership in implementing an entrepreneurial strategic vision (Heller, 1999) as represented by the *Visionary CEO* construct.

*HQ Constraints.* Entrepreneurship is associated with freedom to act and to respond to market opportunities, which implies flexibility and responsiveness to changing circumstances (Birkinshaw, 1997; Covin and Slevin, 1989, 1991; Lumpkin and Dess, 1996). Implicit in entrepreneurship is the ability to be pro-active, to actively seek markets, new products and novel ways of selling them, initiate competitive actions, to be bold (Covin and Slevin, 1991). This implies a closeness to your external network, particularly your competitors and their potential response to your actions, a market knowledge (Andersson et al, 2009) that provides an instinctive ability to judge when to initiate initiatives and their likelihood of success. We argue that it is implicit that such knowledge is only acquired through an on the ground knowledge from the grass roots up. This after all was the rationale for the MNC structure in the first place, to access dispersed markets, resources, knowledge and capabilities (Bartlett and Ghoshal, 1989; 1990; Boehe, 2007). This leads to the expectation that there will be a negative relationship between subsidiary entrepreneurship and headquarters imposition of constraints on subsidiary strategy development.

While it is argued that ICT will enable headquarters access to subsidiary networks (Yamin and Sinkovics, 2007), it is unlikely that this would fully compensate for the grass roots knowledge that proximity provides (Audretsah and Feldman, 1996; Jaffe et al, 1993). In addition, Golden (1992) argues that the competence of 'Prospector' or more entrepreneurial type units is particularly enhanced by having control over their planning processes enabling them to respond quickly to change within dynamic environments. Similarly, we expect that restraints on subsidiary potential to create strategy will inhibit its ability to initiate responses to fast disappearing market opportunities. We argue that this will diminish the effects of subsidiary entrepreneurship in generating strategic initiatives.

*Hypothesis 2.1: There is a negative relationship between subsidiary entrepreneurship and HQ Constraints on subsidiary strategy development.*

*Hypothesis 2.2 HQ Constraints on subsidiary strategy development negatively mediates the relationship between subsidiary entrepreneurship and strategic initiative generation.*

*Formal Planning.* Entrepreneurship is associated with the ability to be responsive to changing opportunities and to exploit unexpected potential and prospects. We propose that entrepreneurial units will be more likely to engage in formal planning as they will evaluate alternative courses of action when exploring potential market opportunities. Entrepreneurship has formerly been considered as more suited to incremental approaches due to its association with dynamic markets requiring greater responsiveness (Andersson et al, 2007; Covin and Slevin, 1991). However, we argue that while entrepreneurship involves risk taking, it is does not imply reckless, so risks must be routinely evaluated and measured. Evaluation requires information which is associated with environmental scanning and the other procedural activities inherent in a formal approach (Barringer and Bluedorn, 1999). While there is an argument that the act of stating a strategy encourages management's adherence to the plan (Mintzberg, 1994), we propose that stating a strategy does not imply that it will not be adapted to meet changing circumstances and evolving opportunities, but that there will be a defined route and destination. Continuous searching for new ways of gaining competitive advantage is fundamental to strategy development (Barringer and Bluedorn, 1999), which compliments the perspective of entrepreneurship as driving change (Lumpkin and Dess, 2001), challenging the status quo, acting on new opportunities (Covin and Slevin, 1988) and converting an idea into a strategic reality (Subramaniam and Venkatraman, 1999). We suggest that entrepreneurial units will be more likely to engage in formal planning as they will implicitly and proactively engage in evaluating and scanning activities.

Barringer and Bluedorn (1999: 424) support the notion that 'entrepreneurial behaviour does not imply an abandonment of the rational-deliberate 'scan-formulate-implement-evaluate' approach to planning. What entrepreneurial behaviour does imply is that the pace of this process must be accelerated and made more flexible because the essence of entrepreneurship is capitalising on environmental change'. We suggest that entrepreneurial subsidiaries which engage in formal planning will be more likely to generate strategic initiatives through the exploration of alternative approaches. Menon et al, (1999) contend that the generation of alternatives which is associated with a formal planning style allows managers to better assess the value and viability of the available options. Similarly, Kohli and Jaworski (1990) suggest that the market responsiveness inherent in entrepreneurship requires continuous collection of strategic information, which is also associated with formal strategic planning. The pro-activeness, risk taking and innovativeness critical to entrepreneurship will drive exploration of alternatives and engage the subsidiary in their realisation. We argue that entrepreneurial subsidiaries are less entrenched in their modes of behaviour and less constrained in generating 'strategic options' (Miller, 1993), leading Ireland et al, (2001) to suggest that the ability to be creative to maximise the benefit of resources is a core entrepreneurial function. As being creative is often more by design than pure chance, we propose that when entrepreneurial subsidiaries adopt a methodical approach to examining strategic alternatives they are more likely to trigger initiatives.

*Hypothesis 3.1: There is a positive relationship between subsidiary entrepreneurship and formal planning processes.*

*Hypothesis 3.2 : Formal planning processes mediate the relationship between subsidiary entrepreneurship and strategic initiative generation.*

*Power of Political Groups*. To date the effects of politics within MNCs has been considered in terms of the dynamics between headquarters and subsidiaries (Mudambi and Navarra, 2004), or between sister subsidiaries. There is, as far as we could confirm, an absence of empirical studies investigating the effects of dominant coalitions within the subsidiary, and specifically how the presence and influence of these powerful political groups may impact subsidiary entrepreneurship. The political dimension captures the need to recognise that decisions are often the outcomes of negotiations and compromises between various influential groups. These groups are formed from coalitions with shared objectives in pursuit of their own self interest (Bailey et al, 2000). Entrepreneurship implies that employees have a certain freedom of decision making (Burns and Stalker, 1961) and entrepreneurial organisations are more likely to attract strong minded, creative people than their conservative counterparts. We suggest that such units are more likely to encourage the development of powerful coalitions, and that whether entrepreneurial actions result in strategic initiatives will depend on the alignment of these initiatives with the dominant coalition within the subsidiary.

The presence of strong coalitions suggests that strategic initiatives generated by the subsidiary will reflect the interests of the dominant political group. Bailey et al (2000, pp. 153) observe that 'the level of influence these stakeholders [the political groups] are able to exercise is conditional upon the organisation's dependency upon such groups'. Reid (1989) purports that the existence of strong powerful coalitions fails to stimulate innovation, whereas power sharing, similarly to the participative, sharing approach of an entrepreneurial posture, promotes collaboration, information sharing and acceptance of new ideas (Kanter, 1983). In addition, strong coalitions are associated with an aversion to risk taking, as existing powerful groups are reluctant to risk any change in their power balance. This may restrict the number of strategic alternatives considered to those which serve their narrow frame of reference. For example, the responsiveness to new information and opportunities inherent in entrepreneurship (Grinstein, 2008) may be restrained if it is outside of the interests of the dominant coalition. We propose that powerful coalitions within the subsidiary can hamper change and embed the unit within existing approaches even if there is an appetite for change.

*Hypothesis 4.1: Hypothesis 3.1: There is a negative relationship between subsidiary entrepreneurship and the Power of Political Groups.*

*Hypothesis 4.2: The Power of Political Groups negatively mediate the relationship between subsidiary entrepreneurship and strategic initiative generation.*

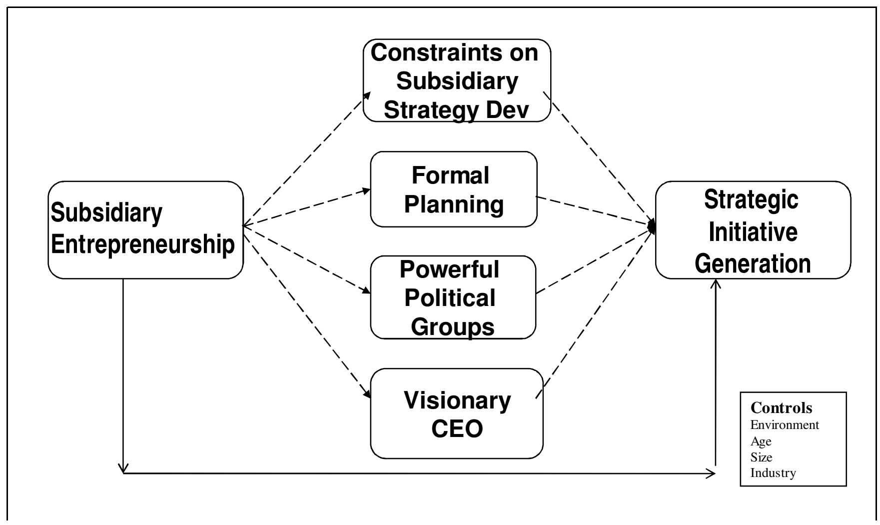
*Visionary CEO.* At the organisation level, senior managers and particularly the CEO are responsible for entrepreneurial leadership and for defining the firm's purpose and strategies, to be 'the purveyors of the entrepreneurial vision' (Heller, 1999). A strong vision which encourages organisational members to 'buy-in' is regarded as critical to delivering the benefits of entrepreneurship (Hanks and McCarrey, 1993; Heller, 1999). The findings of Barringer and Bluedorn's (1999: 436) empirical study are 'supportive of the general notion that employee participation at all levels is an essential part of the entrepreneurial process'. At the subsidiary level, an entrepreneurial subsidiary also implies strong visionary leadership combined with a participative management style (Birkinshaw et al, 1998: Kanter, 1985; Pinchott, 1985). As employee participation and consultation is an essential tenet of the successful pursuit of entrepreneurship (Burgelman, 1983; Sathe,1988), it is expected that entrepreneurial subsidiaries will attract and , encourage CEOs who embrace this management approach (Dess, et al, 1997), A strong visionary CEO is also required to drive implementation of an entrepreneurial strategy.

*Hypothesis 5.1: There is a positive relationship between subsidiary entrepreneurship and a Visionary CEO.*

*Hypothesis 5.2: A Visionary CEO mediates the relationship between subsidiary entrepreneurship and strategic initiative generation.*

These proposed relationships are summarised in Figure 1 below.

**Figure 1 - Mediated Relationships between Subsidiary Entrepreneurship, Strategy Development Process and Strategic Initiative Generation**




## 4.0 Method

*Sample and Data Collection*

The entire population of over 1,100 subsidiaries of MNCs located in Ireland was targeted for this study. On the basis of a focus group and pre-test results, and similarly to other studies of subsidiary behaviour (for example, Holm and Sharma, 2006) the Managing Director was selected as the key informant. A comprehensive data base was developed based on the website of Ireland's National Development Agency, Industrial Development Authority Ireland. A random sample of subsidiaries was contacted to ensure that contact details were accurate and up to date.

The design and administration of the mail questionnaire followed the 'tailored design method' of Dillman (2000). The success of this approach is reflected in the profile of respondents, as all have general manager / director titles, and a response rate of 24% which compares favourably to the average top management survey response rate (Hult and Ketchen, 2001). While this response reduces the probability of non response bias (Weiss and Heide, 1993), standard tests confirmed an absence of significant differences between early and late respondents on a range of characteristics.

The draft questionnaire was pre-tested by an expert group comprising both experienced commercial managers and academics. Seven point Likert scales (anchored at 1= 'not at all' and 7 = 'to a very large extent') were utilised throughout. To increase content validity existing measures were utilised and modified where necessary to reflect the subsidiary as the unit of analysis, and amendments were assessed by the expert group. To reduce the issue of acquiescence or the 'tendency to agree with attitude statements regardless of content' (Podsakoff et al, 2003, pp. 883), reverse scoring was utilised. In addition, to avoid over-justification issues, respondents were unaware of the relationships under investigation. Harman's (1978) single factor test was used post hoc to test for common method variance. As results indicate that no dominant factor accounted for the majority of the total variance (Menon et al, 1996), common method variance was not considered to be an issue.

*Measures*

An initial analysis of the responses on all of the variables provided no indication of a restriction of range problem in the data. The shape of the distribution of the variables was then tested for normality by calculating values for skewness and kurtosis (Hair et al, 1998). The results indicate that all of the distributions for the measures can be assumed to be normal at the 99% confidence level. Little's test showed that the data was Missing Completely at Random (MCAR). Although the level of missing data was low, the EM algorithm was used in SPSS to impute missing data. Summary statistics including means, standard deviations and Cronbach Alphas, along with correlation coefficients are provided in Table 1. As can be seen the alpha coefficients for the multi item scales are generally in excess of the minimum 0.70 levels required (Nunnally and Bernstein, 1994). The correlation coefficients were initially reviewed for indications of multi-collinearity effects, but as none of the correlations co-efficients reach above 0.50 the level of inter-correlations is acceptable (Papadakis et al, 1998).

< Please insert Table 1 here>

All items were subject to principal component analysis with Varimax rotation in advance of hypotheses testing. The results as presented in Table 2 show that all items loaded cleanly on their intended construct with the exception of the innovativeness aspect of the entrepreneurship scale. This loaded as a separate construct to the other two dimensions, risk taking and pro-activeness. However, given the strong theoretical support for the additive nature of the entrepreneurial scale (Covin et al, 2006) and its established use (for example, Covin and Slevin, 1989; 1991; Lee et al, 2001; Lumpkin and Dess, 1996; Miles and Arnold, 1991) it is acceptable to proceed with combining the three dimensions, into a single measure of entrepreneurship.

< Please insert Table 2 here>

*Strategic Innovation Generation.* A three item scale, was adapted from Birkinshaw et al, (1998) to capture the range of strategic initiatives which can be undertaken by the subsidiary, from competing for internal opportunities to product development. The respondent was requested to measure the items over the previous 5 years.

*Entrepreneurship.* A nine item scale, was adapted from Covin and Slevin's (1989) entrepreneurial orientation scale to suit the subsidiary level of analysis. As noted above, this widely accepted scale captures the dimensions of innovativeness, pro-activeness and risk taking. Higher level scores indicate an entrepreneurial rather than a conservative orientation.

*HQ Constraints:* The scale items developed by Bailey, Johnson and Daniels (2000) as capturing restraints on firm level strategy development were adapted to suit the subsidiary level of analysis, to capture the constraints imposed by headquarters on development of subsidiary level strategy by the unit itself.

*Formal Planning.* The original scale suggested by Bailey et al (2000) was adapted to relate specifically to the development of subsidiary level strategy, and captures the subsidiary's approach to scanning and developing plans. A higher score indicates more systematic analysis and rigorous consideration of alternatives.

*Powerful Political Groups.* Bailey et al's, (2000) five items measure the influence of political groups on bargaining, negotiation and compromise were adapted to suit the subsidiary level of analysis.

*CEO Vision.* This measure reflects the consensus in the literature that the strategy development process is often driven by a strong leader (Dess et al, 1997), particularly in entrepreneurial organisations (Heller, 1999). The original five item measure developed by Bailey et al, (2000) was reduced to three items, to reduce redundancy and repetition, as suggested by the expert panel. The relatively low alpha of 0.61 (below the level of 0.80 achieved by the scale developers) indicates that the scale may require further adaptation to be fully suited to the subsidiary CEO.

*Control Variables.* There are three control variables, subsidiary size, age and environmental dynamism. *Size*, measured as the total number of employees within the subsidiary, was log transformed to overcome any skewness in data. Similarly, *subsidiary age*, the number of years the subsidiary existed, was log transformed. Research has demonstrated the strong influence of the *external environment* of an organisation on the existence and stimulation of entrepreneurship (Covin and Slevin, 1991; Karagozoglu and Brown, 1988; Russell, 1999), indicating the necessity for its inclusion as a control variable. The level of environmental turbulence was operationalised using Menon et al, (1999) market related measures, reflecting the degree of change in market competition, opportunities and the rate of change in product technology.

**Analytical Techniques**

Direct and mediating effects were tested using regression modelling. We adopted Baron and Kenny's (1986, pp. 1173) definition of a mediator as a 'third variable which represents the generative mechanism through which the focal independent variable is able to influence the dependent variable of interest', and their three step process to test for mediation: Step 1, establishes a relationship between the independent variable, *entrepreneurship* and the dependent variable, *strategic initiatives*. Step 2 considers the relationship between *entrepreneurship* and each proposed *mediating variable* (for example, entrepreneurship and formal planning). Step 3 then measures the effects of *entrepreneurship* and each of the proposed *mediating variables* and *initiative*. This step effectively controls for the effect of posture and demonstrates the influence of the mediating variable.

In assessing the results of the regressions, Baron and Kenny (1986) argue that the independent variable, entrepreneurship must affect the dependent in the first step, the mediator variable in the second equation, and then thirdly the mediator must affect the dependent variable in the third equation while controlling for the influence of the independent variable. For a mediating relationship to be evidenced, the absolute size as well as the significance of the co-efficients is critical (Baron and Kenny, 1986) and the effect of the independent variable must be less in the third equation than in the second equation, and in the predicted direction.

**4.0 Results**

Table 3 presents the regression results for Step 1 of Baron and Kenny's 1986) method – establishing the relationship between the independent variable, entrepreneurship and the dependent variable, strategic initiatives. Model 1 represents the control equation, while the predictor variable is included in Model 2. The relationship between entrepreneurship and initiative generation provides strong support for Hypothesis 1.

< Please insert Table 3 here>

Step 2 then considers the relationship between entrepreneurship and each proposed mediating variable, as presented in Table 4. These results demonstrate a strong negative relationship between *entrepreneurship* and HQ *Constraints on* subsidiary strategy development and *political groups* as predicted, and a positive relationship with *formal planning,* supporting hypotheses 2.1, 3.1 and 4.1. However, the relationship between CEO participative style and entrepreneurship is neither significant nor in the hypothesised direction, so there is no support for Hypothesis 5.1 or 5.2.
< Please insert Table 4 here>

The results from Step 3 which measures the effects of entrepreneurship and the proposed mediating variables on initiative are presented in Table 5.
< Please insert Table 5 here>

While we have confirmed that *entrepreneurship* has a negative effect on HQ *Constraints* on subsidiary strategy development*,* Hypothesis 2.2 which proposes that HQ *Constraints* on subsidiary strategy development negatively mediates the relationship between subsidiary entrepreneurship and strategic initiative generation is not supported. This implies that even if the subsidiary is constrained from determining its own strategy it will not impact the relationship between entrepreneurship and the generation of initiatives.

Model 10 confirms hypothesis 3.2 that a formal approach to planning transforms the relationship between entrepreneurship and strategic initiatives. For a mediating relationship to be evidenced, the absolute size as well as the significance of the co-efficients is critical (Baron and Kenny, 1986) and the effect of the independent variable must be less in the third equation then in the second equation, and in the predicted direction. For example, the co-efficient for entrepreneurship was positive and significant (beta = 0.33, $p<.01$, Model 8) in the first equation), positive and significant in the second equation (beta = 0.25, $p<.05$, Model 4), and positive but smaller in the third equation (beta = 0.28, $p <.05$, Model 10) when the effect of formal planning was also positive and significant (beta = 0.16, $p < .05$, Model 10). In addition, the significant influence of the mediating variable, planning (beta = .16, $p <.05$) confirms that the result did not arise due to multi-collinearity between the independent and the mediating variables. As advised by Noble et al (2002, pp. 40) ‘if the coefficient for the mediating variable is non-significant in the fourth regression (regressing initiative on formal planning) but significant in the third regression, then we conclude that the effect of the mediating variable on the dependent variable in the third regression is a spurious one, due to multi-collinearity among the mediating variable and the independent variables’. Compliance with these requirements confirms that subsidiaries which engage in formal planning are better at generating strategic initiatives which has potentially strong implications for how subsidiaries should be managed.

Model 11 demonstrates that *powerful political groups* fail to meet the requirements for mediation as defined by Baron and Kenny (1986). For a mediating relationship to be evidenced, the absolute size as well as the significance of the co-efficients is critical (Baron and Kenny, 1986) and the effect of the independent variable must be less in the third equation than in the second equation, and in the predicted direction. While Model 5 demonstrates that entrepreneurship directly reduces the power of political groups, Model 11 shows that the effects of entrepreneurship is augmented positively by political coalitions indicating a more complex relationship warranting further exploration.

**5.0 Discussion**

The purpose of this study was to advance theory by exploring how the subsidiary entrepreneurship / initiative generation relationship is facilitated by subsidiary strategy development activities. Our investigation demonstrates the importance of what happens with the subsidiary, as it represents the initial attempt to explore the effects of a key routine, strategy development processes on subsidiary contribution to the MNC. We show that formal planning at the subsidiary level of analysis is directly correlated within initiative generation. More importantly however, our investigation demonstrates that an entrepreneurial subsidiary which engages in formal strategic planning is better at generating strategic initiatives.

The study confirms the critical importance of both promoting entrepreneurship within the subsidiary and encouraging it to engage in strategy development. Results also support the value of proximity to local markets and networks (Boehe, 2007), and by extension, we would tentatively argue, the maintenance of the subsidiary as a self contained entity, able to ‘join the dots’ in a bigger picture and contribute to the MNC by developing strategies to exploit its local knowledge and resources. If MNC competitive advantage lies in its ability to harness the local knowledge and initiatives of global operations, then there are inherent danger for both headquarters’ and subsidiary manager in any shift to a *global factory* structure that undermines subsidiary 'strategic discretion' (Birkinshaw, 1997; White and Poynter, 1984).

Demonstrating the interaction between entrepreneurship, strategy development and creation of initiatives extends our understanding of what happens within the subsidiary. As the essence of strategy is contributing to competitive advantage through management practices (Papadakis et al, 1998) this tenet is now confirmed at the level of the individual subsidiary. It is not just that entrepreneurial subsidiaries generate initiatives, but that entrepreneurial subsidiaries which develop formal strategies are better at generating initiatives: they combine acting entrepreneurially with thinking strategically. By demonstrating how advantage seeking combines with opportunity seeking behaviour, we add to our understanding of how entrepreneurship and strategic management theory can be integrated within the MNC context. Future studies may address the wider benefits of subsidiary engagement in strategy development, for example how original and creative elements of subsidiary strategy may be utilised to adapt and re-energise MNC strategies to build competitive advantage across the group.

As far as we could confirm, this is the first time that the influence of powerful coalitions within the subsidiary has been considered. The strong correlation between powerful groups and initiative generation tentatively suggests that dominant coalitions may be effective at delivering on initiatives. This may be because the strategic initiatives generated are in line with the objectives of the dominant groups within the subsidiary. However, the negative relationship between entrepreneurship and the power of coalitions suggests that entrepreneurial subsidiaries may actually be more cohesive and inclusive than their conservative counterparts. Given that the predicted negative mediating relationship is not supported by the data, further investigation is needed to provide meaningful indications of the influence of subsidiary political groupings.

This study also provides initial indications that even where headquarters constrains subsidiary strategy development these these may not inhibit the unit from developing its own plans. This supports anecdotal indications (Delany, 2000) that subsidiary strategy cascades down from headquarters and must then be manipulated to reflect the subsidiary management's objectives. Subsidiaries, regardless of headquarters' plans for their development are constantly seeking 'an edge' to consolidate and develop their position within the MNC, but that often these attempts are kept 'below the radar' of headquarters (Delany, 2000).

Perhaps the non significant findings in relation to the influence of the CEO's participative style is particularly surprising given the acknowledgement both within the practitioner and academic literature that subsidiary management are critically aware of the role of initiatives in competing effectively in both domestic and global markets (Ireland and Hitt, 1999), and for maintaining their position within the MNC. We suggest that while their intentions may be strong, operation within a triple helix of environments; their immediate unit, the MNC and its complex network of subsidiaries, and the local business environment dilutes the impact of their management style, even in entrepreneurial subsidiaries.

*Limitations.*

This study has several limitations which may be addressed by further studies, including the effect of specific host country characteristics which may make Ireland - a peripheral location with a small, open economy - differ from other host countries. As a research instrument, a questionnaire also falls short of a sophisticated temporal study (Murray et al, 1995), a factor which may be particularly relevant given the dynamic nature of entrepreneurship. The use of existing measures has advantages in terms of validity, but resulted in the need to adapt firm level measures to the subsidiary unit of analysis, and (although comprehensively reviewed) such adaptations may still not be entirely appropriate for application to subsidiary structures. There may also be other factors not captured by the study which influence the relationships under examination: for example, our theoretical framework does not incorporate organisational structures and other inter-related contingency factors. In addition, a micro level study of what happens within the subsidiary could provide further insights into unit strategy development processes.

While the data showed no indications of common method variance during testing, the danger of relying on a single informant may (to some extent) result in the subsidiary's entrepreneurship being an 'artifact' of the individual respondent's own entrepreneurial orientation (Lyon et al, 2000). However, this approach appears to be a particular feature of research into both entrepreneurial and international activities. There is also significant potential for feedback loops within our proposed framework, which future research may also address: for example, subsidiary initiative may itself be an antecedent to aspects of subsidiary entrepreneurship (such as innovativeness). Future studies in this area may also wish to empirically investigate the impact of other subsidiary routines or broader contextual variables, for example, on subsidiary entrepreneurship.

*Managerial implications.*

From a headquarters' perspective our study demonstrates the importance of entrepreneurship and the need for the organisational context to promote the development of risk taking, pro-active and innovative behaviour within subsidiaries.

Demonstrating the importance of management practices that support and reinforce subsidiary entrepreneurship. Opportunities arise from both within and outside the group, if focused internally like the global factory implies then will fail to recognise and exploit the potential in subsidiary local environment. Need to extend the subsidiary opportunity horizon rather than constrain it if it is to benefit from the multiple perspectives and knowledge bases of its subsidiary network.

Headquarters management can then differentiate between those subsidiaries which are generating high levels of initiative and non contributing subsidiaries and tailor their management skills and resources accordingly.

Our findings also clearly demonstrates that even when HQ restricts the ability of a subsidiary to develop a specific strategy for its unit and restrains the unit's strategic choices, that entrepreneurial subsidiaries will continue to generate strategic initiatives. However, the surprising finding that entrepreneurial organisations engage in formal strategic planning indicates that the process of considering alternatives may be the critical link between entrepreneurship and strategy development.

A greater understanding of the influence of contextual factors or more directly, subsidiary strategic posture on the subsidiary's strategy development process provides headquarters management with the potential to increase their ability to manipulate and control the level of independent strategy development which their subsidiary can employ. For example, constraints on subsidiaries may be set at a level to inhibit or promote independent subsidiary strategy development. The potential links between subsidiary strategy development and the performance and success of the subsidiary should give rise to interesting possibilities in terms of patterns of compensation and senior management motivation. This broad empirical examination of subsidiary strategy development processes should provide key insights into the level of planning and strategic development undertaken by subsidiary managers, and the impact of headquarters' constraints on this process, an area previously overlooked by both the academic and practitioner literature. A richer understanding of the internal operations and activities of the subsidiaries of MNCs should support headquarters' efforts to maximise the potential benefits from resource allocation, managerial attention and organisational commitment to its foreign operations.

Basic resources are generally available regardless of location in the developed world (Dunning, 1992) rendering any individual subsidiary potentially vulnerable to relocation of its activities. The identification of contextual factors which can be manipulated to potentially reduce relocation or closure risk should be of significant interest to subsidiary managers. The technological capacity to electronically transmit the end product renders its point of origination of minimal importance to the MNC in terms of market delivery. This increases the importance of any element which positively differentiates a subsidiary in terms of a relocation decision potentially critical.

A subsidiary's ability to contribute through recognising opportunities and innovating to meet them provides a further defence from the relocation of its activities. The MNC's commitment to a foreign operation may be determined by its capacity to convert resources and to innovate new goods (Dunning, 1992) and the 'sticky' nature of particular resources in terms of reduced transferability (Szulanski, 1995). While the generation of position protecting initiatives may be outside a subsidiary's specific charter and often they are not given their deserved eminence (Dunning, 1995), initiatives are generally accepted as positive contributions and should enhance the MNC's view of the subsidiary, and its potential to add value.

From both a headquarters and a subsidiary manager perspective, our study highlights the potential of political power groups within the subsidiary to hamper initiative efforts. Other aspects of powerful coalitions which may be of interest from both a theoretical and practitioner perspective include their impact on knowledge transfer within the MNC and on the subsidiary's strategic direction and willingness to embrace change.

Demonstrating the contribution of what happens within the subsidiary highlights the potential dangers of a shift towards the *global factory* structure (Buckley, 2009). Subsidiary managers may be criticised for their vested interest in maintaining their subsidiary as a distinct entity (Birkinshaw, 1997) rather than as a compilation of replaceable cogs in an array of disaggregated value chains. However, we have demonstrated the value of subsidiary contribution to the MNC arising from both entrepreneurship and strategy development. This indicates that what happens within the subsidiary may be more complex and have even more elaborate consequences for the MNC than previously considered.

The growing acceptance of entrepreneurship (Brown, Davidsson and Wiklund, 2001) compels both practitioners and academics to recognise the benefits of combining strategic or advantage seeking behaviour, and entrepreneurial or opportunity seeking behaviour within MNCs (Hitt et al, 2001).

While advantage seeking behaviour relates to the MNC's ability to manage its subsidiaries 'dispersed capabilities' (Brush et al, 2001, pp. 65), opportunity seeking behaviour involves nurturing the potential of subsidiaries to seek, recognise and exploit opportunities (Subramaniam and Venkatraman, 2001). The knowledge, capabilities and innovations developed through recognising and exploiting opportunities can then be diffused across the organisation to generate sustainable competitive advantage (Almeida and Phene, 2004; Bartlett and Ghoshal, 1989; Eisenhardt and Martin, 2000; Frost, 2001; Hedlund, 1986; Kim, Park and Prescott, 1999; Teece et al, 1997). The integration of opportunity seeking and advantage seeking behaviour constitutes the application of strategic entrepreneurship within the MNC.

**References**


Almeida, P., Phene, A. 2004. Subsidiaries and knowledge creation: the influence of the MNC and host country on innovation, Strategic Management Journal 25, 847-864.

Anderson, B, Covin, J. Slevin, D.P., 2009. Understanding the relationship between entrepreneurial orientation and strategic learning capability: An empirical investigation, Journal of Strategic Entrepreneurship 3, 218-240.

Andersson, U., Forsgren, M., Holm., U., 2002. The strategic impact of external networks: subsidiary performance and competence development in the multinational corporation, Strategic Management Journal 23, 979-996.

Andersson, U., Forsgren, M., Holm., U., 2007. Balancing subsidiary influence in the Federative MNC: A business network view, Journal of International Business Studies 38, 802-818.

Audretsch, D. B. and Feldman, M. P. 1996. R&D spillovers and the geography of innovation and production. American Economic Review 86, 630-40.

Bailey, A., Johnson, J., Daniels, K.,2000. Validation of a Multi-Dimensional Measure of Strategy Development Processes, British Journal of Management 11, (2), 151-162.

Baron, R. M, Kenny, D.A.,1986.The Moderator-Mediator Variable Distinction in Social Psychological Research: Conceptual, Strategic, and Statistical Consideration, Journal of Personality and Social Psychology 51. (6), 1173-1182.

Barringer, B.R., Bluedorn, A.C., 1999. The relationship between corporate entrepreneurship and strategic management, Strategic Management Journal 20 (5), 421-444.

Bartlett, C., Ghoshal, S., 1989. Managing Across Borders: The Transnational Solution. Harvard Business School Press, Boston.

Bartlett, C., Ghoshal, S., 1989. Managing Across Borders: The Transnational Solution. Harvard Business School Press, Boston.

Birkinshaw, J. M., 1997. Entrepreneurship in Multinational Corporations: The characteristics of subsidiary initiatives, Strategic Management Journal 18 (3), 207-229.

Birkinshaw, J, Hood, N.,1998 Multinational Subsidiary Evolution: Capability and Charter Change in Foreign Owned Subsidiary Companies, Academy of Management Review 23, (4), 773-795.

Birkinshaw, J., Hood, N., Jonsson, S.,1998. Building Firm-Specific Advantages in Multinational Corporations: The role of Subsidiary Initiative, Strategic Management Journal 19, 221-241.

Birkinshaw, J., Hood, N., Young. S., 2005. Subsidiary Entrepreneurship, internal and external competitive forces, and subsidiary performance, International Business Review 14, 227-248.

Bocke, D.M., 2007. Product Development in MNC subsidiaries: Local linkages and global interdependencies, Journal of International Management, 23, 488-512.

Brown, T. E., Davidsson, P., Wiklund, J., 2001. An operationalization of Stevenson's conceptualization of entrepreneurship as opportunity based behaviour, Strategic Management Journal 22, 953-968.

Buckley, P. J., 2009. Internalisation thinking: From the multinational enterprise to the global factory. *International Business Review* 18**,** 224-235.

Burgelman, R, A., 1983. A Model of the Interaction of Strategic Behaviour, Corporate Context, and the Concept of Strategy, Academy of Management Review 8, (1), 61-70.

Burgelman, R, A., 1984. Designs for Corporate Entrepreneurship in Established Firms, California Management Review 26 (3) 154-156

Burns, T., Stalker, G., The Management of Innovation, Tavistock, London, UK.

Cantwell, J., Mudambi, R., 2005. MNE Competence-Creating Subsidiary Mandates, Strategic Management Journal 26, 1109-1128.

Covin, J. G., Green, K.M., Slevin, D. P., 2006. Strategic Process Effects on the Entrepreneurial Orientation – Sales Growth Relationship, Entrepreneurship Theory and Practice Jan, 57-81.

Covin, J. G., Slevin, D. P., 1988. A Conceptual Model of Entrepreneurship as Firm Behaviour, Entrepreneurship Theory and Practice 16, 7-25.

Covin, J. G., Slevin, D. P.,1989. Strategic Management of Small Firms in Hostile and Benign Environments, Strategic Management Journal 10, 75-87.
Covin, J. G., Slevin. D. P., 1991. A conceptual model of entrepreneurship as firm behaviour, Entrepreneurship Theory and Practice Fall, 7-25.
Delany, E., 2000, Strategic Development of the Multinational Subsidiary through Subsidiary Initiative Taking, Long Range Planning 33, 220-244.
Dess, G., Lumpkin, G. T., Covin, J.G., 1997. Entrepreneurial strategy making and firm performance: tests of contingency and configurational models, Strategic Management Journal 18 (9), 677-695.
Dillman, D. A. 2000. How pre-notice letters, stamped return envelopes, and reminder postcards affect mailback response rates for census questionnaires, Survey Methodology 21, 1-7.
Dorrenbacher, C., Gammelgard, J., 2006. The effect of micro-political headquarters-subsidiary negotiations on the product, market and value added scope of foreign owned subsidiaries, International Journal of Management 27**,** 100-112.
Dorrenbacher, C., Geppert, M., 2009. A micro-political perspective on subsidiary initiative-taking: Evidence from German-owned subsidiaries in France. European Management Journal 27, 100-112.
Ghoshal, S., Bartlett, C. ,1990. The multinational corporation as a network: perspectives from inter-organizational theory, Academy of Management Review 15, 603-625.
Gnyawali, D, Singal, M., Mu. S., 2009. Knowledge ties among subsidiaries in MNCs: A multi-level conceptual model, Journal of International Management 15, pp. 387-400.
Hair, J.F. Anderson, R. Tatham., Black, W., 1998, Multivariate Data Analysis, Fifth Ed, New Jersey, Prentice Hall International.
Hanks, S.H. , McCarrey, L.R., 1993, Beyond survival: reshaping entrepreneurial vision in successful growing ventures, Journal of Small Business Strategy (Spring), 1-12.
Harman, B.H. 1978, Modern Factor Analysis, 3rd edition revised, Chicago, University of Chicago Press.
Hedlund, G., 1986. The hypermodern MNC: A heterarchy?, Human Resource Management 25 (1), 9-36.
Heller, T., 1999. Loosely coupled systems for corporate entrepreneurship: Imagining and managing the innovation project / host organisation interface, Entrepreneurship Theory and Practice, 24 (2), 25-31.
Hewett, K., Roth, M.S., Roth, K., 2003. Conditions influencing head quarters and foreign subsidiary roles in marketing activities and their effects on performance, Journal of International Business Studies 34, 567-585.
Holm, U., D., Sharma, D., 2006, Subsidiary marketing knowledge and strategic development of the multi-national corporation, Journal of International Management 12, 47-66.
Hult, G.T., Ketchen, D.J., 2001. Does market orientation matter?: A test of the Relationship between positional advantage and performance, Strategic Management Journal 22, 899-906.
Hurley, R. F., Hult, G.T., 1998. Innovation, Market Orientation and Organisational Learning: An Integration and Empirical Examination, Journal of Marketing 62 July, 42-54.
Ireland, R. D., Hitt, M.A., Camp, M.S., Sexton, D.L., 2001. Integrating entrepreneurship and strategic management actions to create firm wealth, Academy of Management Executive 15 (1), 49-63.
Ireland, R. D., Hitt, M.A., 1999. Achieving and maintaining strategic competitiveness in the 21st century: the role of strategic leadership, Academy of Management Executive 13 (1), 43-57.
Jaffe, A. B., Trajtenberg, M. , R. Henderson, 1993. Geographic localization of knowledge spillovers as evidenced by patent citations, *Quarterly Journal of Economics*, 108, 577.
Karagozoglu, N., Brown, W. B., 1988. Adaptive Responses by Conservative and Entrepreneurial Firms, Journal of Product and Innovation Management 5, 257-268.
Khandwalla, P. N., 1977, The design of Organisations, Harcourt Brace Jovanovich, New York.
Kotabe, M., Mudambi, R., 2004. From markets to partnerships and hierarchies to coalitions: perspectives on the modern multinational corporation. Journal of International Management 10, 147–150.

Lee, C, Lee, K., Pennings, J.M., 2001. Internal capabilities, external networks, and performance: A study on technology-based ventures, Strategic Management Journal 22, 615-640.
Lumpkin, G.T., Dess, G. G., 1996. Clarifying the entrepreneurial orientation construct and linking it to performance, Academy of Management Review 21, 135-172.
Lumpkin, G.T., Dess, G. G., 2001. Linking two dimensions of entrepreneurial orientation to firm performance; The moderating role of environment and industry life cycle, Journal of Business Venturing 16, 429-451.
Lyon, D.W, Lumpkin, G.T., Dess, G.G., 2000. Enhancing Entrepreneurial Research: Operationalizing and Measuring a Key Strategic Decision Making Process, Journal of Management 26, 1055-1085.
Menon, A. Bharadwaj, S.G., Howell, R., 1996. The quality and effectiveness of marketing strategy: effects of functional and dysfunctional conflict in intra organisational relationships, Journal of Academy of Marketing Science 24 (4), 299-313.
Menon, A. Bharadwaj, S.G., Adidam, P.T., Edison, S.W. 1999, Antecedents and Consequences of Marketing Strategy Making, A Model and a Test, Journal of Marketing 63, (2), 18-31.
Miller, D., 1993. Configurations Revisited, Strategic Management Journal 17 (7), 505-512.
Miles, M.P., Arnold, D.R., 1991, The Relationship Between Marketing Orientation and Entrepreneurial Orientation, Entrepreneurship Theory and Practice 15 (4), 49-65.
Mudambi, R., 2008. Location, Control and Innovation in knowledge intensive industries, Journal of Economic Geography 8, 669-725.
Mudambi, R., Navarra, P., 2004. Is knowledge power? Knowledge flows, subsidiary power and rent-seeking within MNCs, Journal of International Business Studies 35, 385-406.
Murray, J.Y., Kotabe, M., Wildt, A.R., 2002. Strategic and financial performance implications of global sourcing strategy: A contingency analysis, Journal of International Business Studies 26 (1), 181-202.
Noble, C.H., Sinha, R.K., Kumar, A., 2002, Market orientation and alternative strategic orientations: A longitudinal assessment of performance implications, Journal of Marketing 66 (4), 25-40.
Nunnally, J.C., Bernstein, I.H., 1994, Psychometric Theory, McGraw Hill: New York.
Papadakis, V.M., Lioukas, S., Chambers, D., 1998. Strategic Decision-Making Processes: the role of management and context, Strategic Management Journal 19, 115-147.
Papadakis, V.M., Barwise, P., 2002. How much do CEOs and Top Managers Matter in Strategic Decision-Making, British Journal of Management 13 (1), 83-96.
Pinchot, C., 1985. Intrapreneuring, Harper & Row, New York.
Podsakoff, P. M., MacKenzie, S.B., Lee, J., Podsakoff, N.P., 2003. Common method variance biases in behavioural research: a critical review of the literature and recommended remedies, Journal of Applied Psychology 88 (5), 879-903.
Russell, R. D., 1999. Developing a process model of intrapreneurial systems: A cognitive mapping approach, Entrepreneurship Theory and Practice 23 (3), 65-84.
Sathe, V.,1985. Managing an entrepreneurial dilemma: Nurturing entrepreneurship and control in large corporations, Frontiers of Entrepreneurship Research, pp. 636-656.
Taggart, J. H. 1998. Strategy shifts in MNC subsidiaries, Strategic Management Journal 19, 663-681.
Watson O'Donnell, S., 2000. Managing foreign subsidiaries: Agents of Headquarters or an interdependent network, Strategic Management Journal 21, 525-548.
Weiss, A.,Heide, J.B., 1993, The Nature of Organizational Search in High Technology Markets, Journal of Marketing Research 30, (2), 220-233.
White, R.E., Poynter, T.A., 1984, Strategies for foreign-owned subsidiaries in Canada, Business Quarterly, Summer, 59-69.
Young, S., Tavares, A.T., 2004. Centralisation and autonomy: Back to the future, International Business Review 13 (2), 215-237.
Zahra, S. A. 1993, A conceptual model of entrepreneurship as firm behaviour: A critique and extension, Entrepreneurship Theory and Practice 18, 5-21.

**Table 1, Summary Statistics**

| | | Mean | SD | Alpha | 1 | 2 | 3 | 4 | 5 | 6 |
|---|---|---|---|---|---|---|---|---|---|---|
| 1 | Entrepreneurship | 4.38 | .99 | 0.84 | 1.00 | ** | | | | |
| 2 | Strategic Initiative | 3.15 | 1.49 | 0.70 | .378** | 1.00 | | | | |
| 3 | Constraints on Strategy | 2.67 | 1.44 | 0.81 | -.207** | .090 | 1.00 | | | |
| 4 | Formal Planning | 4.37 | 1.28 | 0.87 | .264** | .238** | -.030 | 1.00 | | |
| 5 | Power of Political Groups | 2.88 | 1.22 | 0.86 | 0.04 | .210** | .385** | .045 | 1.00 | |
| 6 | Visionary CEO | 4.06 | .99 | 0.61 | -.014 | -.010 | .078 | .053 | .145* | 1.00 |

** Correlation is significant at the 0.01 level (2-tailed).
* Correlation is significant at the 0.05 level (2-tailed).

**Table 2, Principal Component Analysis Results**

| | Component | | | | | | |
|---|---|---|---|---|---|---|---|
| | Formal Planning | Political Groups | EO – Proactive And Risk | HQ Determ Strategy | Strategic Initiatives | EO Innovative-ness | CEO Vision |
| EO INV R&D Technol Leader | | | .198 | | .446 | **.514** | |
| EO INVNew Lines | .166 | -.117 | .190 | -.124 | | **.782** | |
| EO INV Dramatic Prod Change | .124 | | .385 | | | **.745** | |
| EO Pro Initiates actions | .138 | | **.547** | -.294 | | | -.229 |
| EO Pro Introduce Change | .164 | | **.540** | -.193 | .322 | .237 | |
| EO Pro Undo the Competitors | | | **.783** | | | | |
| EO Risk High risk appetite | | | **.789** | | .181 | .189 | |
| EO Risk Bold Actions | | .137 | **.750** | | .104 | .223 | |
| EO Risk Aggressive explt of ops | .162 | | **.777** | | | .197 | .143 |
| INAT Products Past | | .151 | .117 | | **.598** | .450 | |
| INAT Bids Past | | | .101 | | **.754** | -.156 | |
| INAT Activities Past | .118 | | .196 | | **.784** | | |
| SC INT Options Ltd | | .188 | | **.855** | | -.111 | |
| SC INT Growth Ltd | | .300 | | **.818** | .103 | | |
| SC INT Innovations Ltd | | .112 | -.164 | **.793** | | | |
| SC INT HO Imp Strategy | | .120 | | **.589** | -.159 | | -.350 |
| CEO decides | | | | | -.120 | | **.870** |
| CEO vision | | | .103 | -.109 | | | **.835** |
| PL Detailed Plans | **.761** | -.118 | | -.109 | | .154 | |
| PL Precise Procedures | **.850** | | | | | .122 | |
| PL Search Procedures | **.864** | | | | | | |
| PL Alternatives | **.831** | | .145 | | | | |
| PL Evaluations | **.887** | | | | | | |
| PL Analysis | **.770** | | .159 | | .107 | | .167 |
| ORG Compromise | | **.788** | .107 | | | | |
| ORG Power Groups | | **.775** | .101 | .283 | | -.116 | |
| ORG Bargaining | | **.772** | | .199 | | | |
| ORG Group Interests | | **.842** | | | | | |
| ORG Sponsors | | **.792** | | | | | |

**Table 3. Regression Analysis Results, Entrepreneurship and Strategic Initiative Generation**

| | Model 1 | Model 2 |
|---|---|---|
| ***Control Variables*** | | |
| Log Subsidiary Size | 1.05*** | 1.01*** |
| Log Subsidiary Age | -.83** | -.75** |
| Environmental Dynamism | .41*** | .26** |
| ***Predictor Variable:*** | | |
| Entrepreneurship | | .33** |
| Model R2 | 0.32 | 0.35 |
| Adj R2 | 0.31 | 0.33 |
| Model F | 23.98*** | 20.10*** |

N=207. Standardized Coefficients Reported.
+ p<0.10, *p<.0.05, **p<.0.01, ***p<.0.001

**Table 4. Proposed Mediating Variables and Entrepreneurship and Strategic Initiative Generation**

| | Model 3 | Model 4 | Model 5 | Model 6 |
|---|---|---|---|---|
| | ***Constraints on Subsidiary Strategy*** | ***Formal Planning*** | ***Powerful Political Groups*** | ***Visionary CEO*** |
| ***Control Variables*** | | | | |
| Log Subsidiary Size | .40* | .04 | .15 | .10 |
| Log Subsidiary Age | -.19 | .20 | -.67** | -.27 |
| Environmental Dynamism | -.05 | .14 | .24* | .24** |
| ***Predictor Variable:*** | | | | |
| Entrepreneurship | -.31** | .25* | -.19+ | -.15 |
| Model R2 | 0.07 | 0.09 | 0.09 | 0.05 |
| Adj R2 | 0.05 | 0.07 | 0.06 | 0.03 |
| Model F | 3.31** | 3,94** | 3.79** | 2.21+ |

N=207. Standardized Coefficients Reported.
+ p<0.10, *p<.0.05, **p<.0.01, ***p<.0.001

**Table 5. Proposed Mediating Variables and Entrepreneurship and Strategic Initiative Generation**

| | Model 7 | Model 8 | Model 9 | Model 10 | Model 11 | Model 12 |
|---|---|---|---|---|---|---|
| ***Control Variables*** | | | | | | |
| Log Subsidiary Size | 1.05*** | 1.01*** | 1.0*** | 1.10*** | 0.98*** | 1.01*** |
| Log Subsidiary Age | -.83** | -.75*** | -.69** | -.81** | -.60** | -.81** |
| Environmental Dynamism | .41*** | .26** | .28** | .23** | .19* | .23** |
| ***Predictor Variables:*** | | | | | | |
| Entrepreneurship | | .33** | .34*** | .28** | .38*** | .34** |
| HQ Determination of Strategy | | | .07 | | | |
| Formal Planning | | | | .16* | | |
| Powerful Political Groups | | | | | .22** | |
| CEO Vision | | | | | | -.07 |
| Model R2 | 0.32 | 0.35 | 0.37 | 0.37 | 0.38 | 0.36 |
| Adj R2 | 0.31 | 0.33 | 0.34 | 0.34 | 0.36 | 0.34 |
| Model F | 23.98*** | 20.10*** | 17.03*** | 17.17*** | 17.9*** | 16.8*** |

N=207. Standardized Coefficients Reported.
+ p<0.10, *p<.0.05, **p<.0.01, ***p<.0.001