“The Influence of the Board of Directors on Corporate Entrepreneurship – A Study of Australian Commercial Banks”

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ABSTRACT

Corporate entrepreneurship, the establishment of new businesses or the renewal of existing ones by an organisation, is increasingly recognised as necessary for a company’s ongoing competitiveness and growth.

There are many factors that are likely to influence a company’s commitment to corporate entrepreneurship that are worthy of research. Of these, one that is likely to have significant impact is the role of the board of directors. This leads to the research question “How does a board of directors influence a company’s corporate entrepreneurship?”

This question is addressed in two stages. Firstly, the mechanisms through which boards influence corporate strategy are explored by addressing the question “How does a board of directors influence a company’s corporate strategy?” Second, the answer to this question is used as a starting point for exploring “How do a board’s characteristics influence its corporate entrepreneurship?”

A case study methodology was adopted with a sample comprising directors from purposively selected publicly listed Australian commercial banks. The data comprised interviews with company directors and published material. Interviews were conducted using a standard interview protocol developed from an a priori specification of construct. The interview data was coded and analysed using qualitative data analysis software and then triangulated with the published material to confirm its validity.

The research shows that boards play a significant role in a company’s choice of strategy. They appoint a chief executive who has views that are consistent with their own. They provide guidelines to management to assist its development of a strategic plan that they will be willing to approve. They assess the performance of the management team by monitoring the implementation of this plan.
As the basis for most board decisions is not codified, they are made on the basis of a board’s shared judgement. Since boards aim to represent shareholders, their objective is that their decisions will reflect the wishes of the company’s shareholders. While this is a practical objective, the data shows that directors are unsure of shareholder priorities. The solution to this dilemma is for boards to assume that if shareholders buy shares in a conservative bank that pays high dividends and seldom innovates, they would like it to remain so.

In the particular case of corporate entrepreneurship, a board’s support depends on it having a shared attitude that corporate entrepreneurship is desirable and a shared perception that it is feasible. A shared attitude that corporate entrepreneurship is desirable appears to be a long-term board value. A shared perception that entrepreneurship is feasible appears to be based on the board’s view as to management’s capabilities.
ACKNOWLEDGEMENTS

My experience is that completing a doctoral dissertation requires self-belief, perseverance and the support of those closest to you. In my case, it was the third of these that was the most important.

I am particularly aware how demanding my journey has been on my family. I thank them for their unwavering support, and more importantly for their love.

Deborah, thank you for your patience and your belief. I know it hasn’t been easy. Thank you for keeping bread on our table, you made this doctorate possible. I love you and am proud to be your husband.

Perhaps the most enjoyable and rewarding aspect of this project was that I was able to work from home while my three daughters were finishing their school years. Stephanie, Virginia and Madeleine, you are wonderful people, I am very proud of your achievements and I continue to be amazed by your adventuress. Thank you for tolerating your eccentric father’s quest.

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The thoughtfulness of my grandfather, Bill Gavan Duffy, played a significant part in my finishing this project. Hopefully, one day, I can play a similar role for my own grandchildren.

Finally, I must acknowledge the contribution of my supervisor Murray Gillin. I am grateful to Murray for his wisdom, his counsel, his encouragement, and his patience. Murray has taught me far more than how to complete a PhD. He is a great man.
DECLARATION

This thesis contains no material which has been accepted for an award of any other degree or diploma, except where due reference is made in the text of the thesis. To the best of my knowledge this thesis contains no material previously published or written by another person except where due reference is made in the text. Where work is based on joint research or publications, the relevant contributions of the respective authors is disclosed.

Signed: . . . . . . . . . . . . . . . . . . . . . . . . . . . . .

Dated: . . 23rd September 2010. . . . .
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CHAPTER 1 – INTRODUCTION

“Entrepreneurship is studied for a variety of reasons, but the overriding reason for current interest in the topic is the widespread belief that entrepreneurship activity stimulates general economic development as well as the economic performance of individual firms” (Covin and Slevin 1991 p.9).

* * *

1.1 RAISON D’ÊTRE

Why do people take on challenges such as climbing Mount Everest, sailing around the world single-handed or competing in a marathon? A response of “Because it was there,” leads to the question, “But why this mountain?” Perhaps, “I was looking for something, and it seemed like a good idea at the time.”

Why did it seem like a good idea to devote years of my life to exploring a dimension of how corporate entrepreneurship works? I guess it seemed like a good idea at the time. Fortunately, the journey has been rewarding, far more so than I ever expected.

Following is a summary of the personal journey that has led me to this point. I include it to provide an understanding of my motivations for undertaking this project and the reasons for my interest in companies, boards and entrepreneurship.

My journey began in 1954. My father was an ophthalmologist with a passion for business that he inherited from his father. My mother was the daughter of a central banker whose passion for nursing morphed into a life devoted to her husband and children.
We sat together for dinner each night at a long wooden table where we consumed large amounts of meat and discussed the affairs of the day. The conversation was free flowing. From memory, we talked about business and the stock market. We were well-off, we imagined that everyone was well-off.

At the start of my penultimate year of school, I decided to follow my father's footsteps and study medicine. It was an attractive choice, my father enjoyed his work, and was successful both professionally and financially. I was admitted to medical school by the barest of margins. My parents were very proud. Was this a career that matched my strengths and aspiration? Time would tell.

Medicine, while interesting, was never a passion. The end result was disappointing exam results, and the medical faculty suggesting that my time would be better spent elsewhere.

Occasionally you have to ask yourself “what do I really want to do?” In my case, I was determined to complete a university degree, but was not sure in what field. One option was the study of physiology and biochemistry. This was quickly rejected for not being particularly interesting. Another option was to study engineering - it felt right. I applied on the spot and was accepted within a week.

Engineering fitted with my skills and aspirations, in particular there was an opportunity for innovation. It captured my imagination and I graduated with honours.

After graduation, my first position was a field engineer role with a construction company working on the installation of offshore oil platforms and pipelines in Australia, Indonesia, Malaysia and Brazil. This job involved managing the technical aspects of construction projects in ways that would maximize profits. Success demanded the development of innovative engineering solutions.

A transfer to Singapore led to my being involved in the preparation of tenders for major construction projects. My success depended on developing innovative approaches to
the construction methods employed and the contractual terms offered. A construction company lives or dies on the strength of its innovation.

After completing an MBA at Harvard Business School, I spent four years at McKinsey & Company working on strategy studies for Australia's largest mining company and one of its largest banks. At the end of each study, the findings were presented to the clients’ main boards of directors and feedback was received. Both boards were clearly seeking innovative solutions.

Post McKinsey, I was invited to manage the turnaround of a fish farming business that had accumulated debt of A$2 million and was losing A$500,000 each year. The attraction of this offer was the opportunity to be a chief executive in an entrepreneurial environment. While the challenge was welcome, the reality is that no matter how good the jockey, some horses can never win races. After a year, with accumulated debt having increased to $2.5 million and no likelihood of future profits, the board of the business asked me manage its liquidation.

Six months later, one of Australia's largest manufacturing companies invited me to join a team that would undertake a strategic review of the company. The mandate for the review was to develop strategies that would enable it to continue the high growth it had enjoyed over the previous decade.

The strategic review took six months and was presented to the main board of directors. Its objective was to develop a growth strategy for the company, which at the time had very high market share in all of its market segments. The final report recommended domestic diversification and international expansion. The report did not address the competitiveness of the company in these markets. The board and the company’s senior management did not question this issue and accepted the report’s recommendations.

After the strategy project was completed, I was assigned to develop a growth strategy that the chief executive of the company's largest division would present to the main board of directors. The chief executive recognised that the division’s growth would
have to come from overseas markets and adopted an international growth strategy. This decision was supported by his belief that the company’s strong domestic performance showed that it had the skills required to compete internationally. Three years later, the division’s international businesses were sold after the board assessed that they were unlikely to meet their performance objectives.

The completion of the strategic plan led to the chief executive of the company’s trading division inviting me to work with him on the identification and management of potential acquisitions, and their integration into the existing operations. Together we managed the acquisition of businesses, based in USA, Norway, New Zealand and Korea, that in aggregate increased the sales of the division from A$200 million to over A$500 million. The success of the acquisitions led to me serving on the boards of companies based in Australia, New Zealand, USA, and Norway. Subsequently, the parent company decided that although we had succeeded in establishing the foundations for a viable international trading business, the initial profitability of the business was insufficient to justify their continuing support for the strategy.

After my corporate role ended, I identified the opportunity to establish an online ‘home and garden superstore’ and with the support of several high profile investors established ‘eHardware.com.au.’ While, over 6 months, this business established itself as the leader in its market, it was unable to generate sufficient momentum to justify its ongoing existence. The board of eHardware had no option but to close and liquidate the business.

eHardware's investors had provided a high profile board, many of whom had experience on the boards of large publicly listed companies. They were appreciative of the entrepreneurial nature of the company and realistic as to the risks involved and the uncertainty associated with business forecasts. The closure of the business, following the expenditure of millions of dollars, was completed professionally and without malice.
Where to next? A chance enquiry led to me teaching entrepreneurs at the Australian Graduate School of Entrepreneurship, reading the entrepreneurship literature, and having many new conversations with students, academics and entrepreneurs.

When you like university teaching and are stimulated by a field of study, you start to think about doctoral studies. When the right supervisor emerges, you accept the challenge and start looking for a topic.

A consequence of my experience as a high level management consultant, a company director and as CEO of a company operating at the leading edge of technology and entrepreneurship is that I bring to this study, a belief in the importance of business to the economy, and of the part played by entrepreneurship and innovation in its success. These beliefs are the product of what I have learned on my journey. They represent the starting point for this study.

1.2 PERSPECTIVES

1.2.1 Introduction

The starting point for this study is an appreciation of the relevance of entrepreneurship as a driver of change and economic growth. Such growth is essential as “only the creation of new businesses can provide jobs on a sufficient scale in a society with a shrinking industrial labour force” (Swedberg 2000 p.8).

The establishment of new businesses by existing organisations is described as Corporate Entrepreneurship. It is seen as “as a source of competitive advantage and as a path to higher levels of financial and non-financial performance” (Ireland et al. 2006 p.10).

However, while there are many examples of successful corporate entrepreneurship, many companies abandon their commitment to it, so that it is recognised as
“particularly exposed to top management turnover and economic downturns” (Bouchard 2002 p.2).

There are many factors that are likely to influence a company’s commitment to corporate entrepreneurship that are worthy of research. Of these, one that is likely to have a significant impact is the role of the board of directors. This leads to the research question “How does a board of directors influence a company’s corporate entrepreneurship?”

A high level review of the literature shows a paucity of theory as to how boards influence corporate strategy (i.e. the mechanisms boards employ) and how a board’s characteristics influence an organisation’s corporate entrepreneurship. This study explores these issues.

The research is grounded on four perspectives. The first comprises observations that the researcher brings to the study from his personal journey; the second is a comparison of the behaviours of boards of privately owned and government owned businesses by Ludwig von Mises, that was first published in 1920; the third is an analysis of the relationship between board characteristics and exploration success of mining companies that was undertaken in 1975; while the fourth is an approach that has been used to understand the motivations of individual entrepreneurs. These are discussed in turn.

1.2.2 Personal Experience of Corporate Entrepreneurship

My observation about companies, boards and entrepreneurship are a product of the journey I have described above. They can be summarised:

- Companies need to act entrepreneurially if they are to achieve long-term growth.

- Companies must innovate if they are to sustain a competitive advantage.

- Boards play a major role in a company’s choice of strategy.
- Boards are knowledgeable about entrepreneurship.

- Corporate entrepreneurial initiatives are often abandoned.

### 1.2.3 Socialism and Corporate Entrepreneurship

Ludwig von Mises provided a perspective on the role of boards in an article that was published in 1920, and republished in *Collectivist Economic Planning* which was edited by a Nobel Laureate, Friedrich von Hayek in 1935. The objective of the article was to challenge socialism. This was done from several perspectives, one of which was that the motivations of the board and management in a socialist system precludes any incentive to be entrepreneurial (Mises 1935).

Mises (1935) observed that while supporters of socialism believe that “*directors would not work less satisfactorily for society than shareholders*” (p.116), experience has shown that this is not the case.

> “It is now universally agreed that the exclusion of free initiative and individual responsibility, on which the successes of private enterprise depend, constitutes the most serious menace to socialist economic organisation” (Mises 1935 p.116).

He argued that the boards of organizations with private shareholders have an incentive to operate in the best interest of an organization’s shareholders and that without such incentives, the board of government owned business has no motivation to reform and improve an organization, with the effect that they become “*a dead limb in the economic organism*” (Mises 1935 p.118).

Mises (1935) noted that attempts to recreate a managerial environment that was similar to that of a privately held company by introducing financial incentives had not succeeded, and attributed the difference in behaviour to changes in the outlook of the individuals.
“[W]ith his entry into communal activity he ceases to be a merchant and becomes as much the bureaucrat as any other placeman in the public employ” (Mises 1935 p.120).

While Mises’s conclusion that the boards of government owned enterprises do not manage as entrepreneurially as boards of privately owned enterprises appears generally to have stood the test of time, it is not grounded on a theoretical framework that explains how boards work. That is, while Mises observes that boards of government owned organizations behave differently to privately owned organizations, he does not suggest a mechanism through which this occurs.

1.2.3 Boards and Exploration

Exploration and entrepreneurship are similar in that both involve investments with a high degree of uncertainty. In the case of mining exploration, only a small percentage of drill-holes will lead to substantial finds. In the case of entrepreneurship, only a small percentage of new businesses will be successful. Therefore, the boards of mining companies and entrepreneurial companies are faced with choices offering comparable risk-return profiles.

A study exploring the relationship of board attitudes to exploration success was undertaken by McKinsey & Company in 1975. This study identified a relationship between board attitudes and exploration success as follows:

“The McKinsey contention is that companies answering yes to these questions will be more successful in exploration than those answering no.

Board Leadership:
1. Does the board take a significant leadership role in exploration rather than treat it as a ‘down-the-line’ technical function?
2. Do the board develop and communicate a powerful and believable rationale for exploration?
3. Do the board evidence strong commitment to exploration through spending patterns and organisational relationships?

These findings suggest that board attitudes impact exploration success and leads to the hypothesis that a similar relationship might exist between board attitudes and entrepreneurship.

1.2.4 Board Entrepreneurial Motivation

While early entrepreneurship researchers believed that entrepreneurial behaviour was a consequence of factors such as personality traits, demographics or attitudes, recent researchers have shown that less than 10% of the variance in behaviour could be explained by such factors (Krueger and Carsrud 1993).

Krueger and Carsrud (1993) and Krueger (1993) showed that a more reliable predictor of entrepreneurial behaviour is an ‘intentions’ model based on the perceptions of the potential entrepreneur with respect to the attractiveness of entrepreneurial behaviour, the social norms about entrepreneurial behaviours and the perceived feasibility of entrepreneurial behaviour.

Understanding the entrepreneurial motivations of a board presents a greater challenge than understanding those of an individual entrepreneur. Whereas and individual’s motivations will be a product of one person’s attributes, a board’s motivations will be a product of the individual attributes of its members and those of the board as a whole including its group dynamics, shared attitudes and perceptions.

This observation leads to the suggestion that an ‘intentions’ model may be useful for understanding how a board of directors is motivated.
1.3 OBJECTIVES AND MOTIVATIONS

The aim of this project is to address a gap in the literature by exploring “How does a board of directors influence a company’s corporate entrepreneurship?”

This question will be addressed in two steps. Firstly, the mechanism through which a board influences corporate strategy will be explored by addressing the question “How does a board of directors influence a company’s corporate strategy?” The answer to this question will provide a framework for exploring “How do a board’s characteristics influence corporate entrepreneurship?”

Theory developed by this research will guide regulators, leaders of boards, and shareholders, as to the mechanisms whereby a board encourages the adoption of a particular strategy and the board characteristics that influence a board’s choice of an entrepreneurial strategy. This knowledge will be valuable in situations where stakeholders seek to develop and implement a more (or less) entrepreneurial strategy.

The research aims to develop insight on a range of associated issues that are important for the development of public policy and strategies for the management of boards. These include:

- How do boards gather the knowledge required to manage companies?
- How do boards determine shareholder preferences?
- How do boards influence a company’s development and choice of strategy?
- How do a board’s characteristics influence a company’s entrepreneurship?

While previous research has explored the relationship between board characteristics and company performance, the literature review will confirm there is a paucity of information that explains the mechanisms by which this occurs.

Second, the research will determine how a board’s characteristics influence whether it supports corporate entrepreneurship, by addressing the question “How does a Board of
Directors influence a Company’s Corporate Entrepreneurship?” This question represents an important gap in the literature, given a board’s responsibility for a company’s management means that it should influence whether a company adopts an entrepreneurial strategy to ensure the company’s long-term growth and viability.

The resultant theory will assist those who seek to influence board behaviour, including corporate regulators, shareholders and board leaders. In particular, such theory will assist development of approaches to board management that will increase the likelihood of corporate entrepreneurship. As well, it will provide a basis for future research.

1.4 KEY CONCEPTS

This research project is built on five literatures: entrepreneurship, the firm, corporate entrepreneurship, the board of directors, and entrepreneurial potential and intentions.

An exploration of the entrepreneurship literature provides a basis for characterising entrepreneurs and understanding the process of entrepreneurship. This exploration leads to ‘entrepreneurship’ being defined as:

*The innovative reallocation of resources to achieve a preferred outcome.*

This leads to ‘Entrepreneurs’ being defined as:

*Individuals, either on their own or inside organisations, who manage this reallocation, whether they control these resources or not.*

The literature defines a firm as a system of relationships between suppliers and customers that is established and coordinated by an entrepreneur, to reduce transaction costs below what would be incurred with individual relationships.
The corporation emerged to replace the entrepreneur at the nexus of the firm to allow 
the introduction of additional shareholders while providing them with the advantages of 
limited liability.

The separation of the ownership and the control of the corporation that occurred from 
the start of the 20th Century was recognised as a barrier to entrepreneurial behaviour by 
firms. This recognition, combined with the subsequent acknowledgement that firms 
needed to be entrepreneurial if they were to prosper, led to the realisation that models 
for the management of corporations needed to be revised to accommodate what has 
become known as corporate entrepreneurship

The definition of entrepreneurship provides a basis for defining ‘Corporate 
Entrepreneurship.’

Corporate entrepreneurship is the process whereby an individual or a group of 
individuals, in association with an existing organisation, makes an innovative 
reallocation of organisational or productive resources, to either grow or renew 
that organisation.

Five forms of corporate entrepreneurship can be distinguished and the relationship of 
the form employed by an organisation to its entrepreneurial ambitions and experience 
can be shown. The construct ‘Entrepreneurial Orientation’ can be used to characterise 
the extent of a firm’s entrepreneurship, and is used to assess the relationship between 
entrepreneurship and performance.

The literature on the Board of Directors presents the rationale for their existence, the 
options for their design, the functions they perform, and their impact on company 
performance. Alternate perspectives as to the responsibilities of the board can be related 
to the roles that boards play. The attributes that characterise boards are shown to be an 
unreliable predictor of a firm’s performance.

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Krueger and Brazeal’s (1994) *Entrepreneurial Potential and Intention* construct provides a framework for predicting entrepreneurial behaviour by individuals. It relates an entrepreneur’s perceptions of the desirability of entrepreneurship, perceptions of the feasibility of entrepreneurship and their propensity to act entrepreneurially to a construct labelled entrepreneurial potential. This construct with the occurrence of a precipitating event is found to be a reliable predictor of entrepreneurial intentions.

In the absence of theory as to how a board influences corporate entrepreneurship, Krueger and Brazeal’s (1994) construct is suggested as a framework for addressing the relationship between the perspectives and attitudes of an organisation’s board of directors and that organisation’s entrepreneurship.

### 1.5 OVERVIEW OF DOCUMENT

This study uses the literatures relating to entrepreneurship, the firm, corporate entrepreneurship, the board of directors, and entrepreneurial potential and intention as a starting point for developing theory that explains how boards influence corporate entrepreneurship. It adopts a case study approach to identify the mechanisms used by boards to influence corporate strategy and to determine how the characteristics of a board of directors relate to the presence of corporate entrepreneurship in organisations.

Chapter 2 of this document reviews five areas of the literature that are related to this question and uses them to develop two tentative constructs that can be used as starting points for the development of theory. The areas of the literature that are reviewed are entrepreneurship, the firm, corporate entrepreneurship, the board of directors, and entrepreneurial potential and intentions.

While researchers are interested in entrepreneurship because of its impact on economic growth and in turn, the creation of new jobs, they have been unable to reach agreement as to how to define it and therefore the boundaries to research in the field.
This review explores the literature that characterises the process of entrepreneurship and the entrepreneur. The exploration provides a basis for defining entrepreneurship as an act that involves an innovative reallocation of resources, and an entrepreneur as a person who manages entrepreneurship regardless of whether they control the resources involved.

The structure, role and workings of the firm are explored. This exploration leads to the ‘firm’ being characterised as a system of relationships with either an entrepreneur or a corporation at its nexus.

The review observes that the accelerating pace of industrial development has increased the importance of entrepreneurship for firm survival and growth. In parallel, the evolution of the corporation centric firm has increased the separation of its ownership and control with the result that managerial incentives for entrepreneurial initiatives have been weakened. The dynamics of this interaction are explored.

Corporate entrepreneurship is recognised as a potential strategy for organisational growth and performance improvement. A theoretical underpinning for defining corporate entrepreneurship is provided and the forms it takes are identified. The basis on which a company adopts a form of corporate entrepreneurship is shown to depend on an organisation’s corporate entrepreneurship ambitions and experience. A framework for evaluating the extent of an organisation’s corporate entrepreneurship is developed.

The board of directors has ultimate responsibility for an organisation’s management and as such for its strategic direction. The role and impact of boards is explored, how they are structured, the functions they perform, and how they affect company performance. The use of board attributes to characterise boards and their relationship to board performance is reviewed.

Entrepreneurial potential and intentionality constructs have been shown to be a useful predictor of entrepreneurial behaviour. The use of these constructs for the analysis of
the entrepreneurial event, their theoretical underpinnings, the characteristics of their components, and their application to understanding the behaviour of entrepreneurial teams is reviewed.

The final section of the literature review draws on the previous sections of this literature review to show that while an organisation’s board of directors is responsible for the development, implementation and performance of that organisation’s corporate entrepreneurship strategy, there is a gap in the literature as to how a board actually fulfils this responsibility.

The suitability of using an intentionality model to explore the relationship between the perspectives and attitudes of an organisation’s board of directors and the entrepreneurial behaviour of that organisation is explored. A tentative construct based on Krueger’s model of entrepreneurial potential that explains the relationship between board perceptions and attitudes, and corporate entrepreneurship is developed.

Chapter 3 presents the methodology that will be used for the research. The methodology is developed using a critical realist perspective that acknowledges the presence of ‘real’ structures and mechanism that link the ‘empirical’ characteristics of the board with ‘actual’ board actions and the results of those actions.

The research question is addressed in two stages. The first stage addresses the mechanisms whereby boards influence corporate entrepreneurship, while the second addresses the impact of board characteristics. For each stage, using an approach described by Eisenhardt (1989), an ‘a priori specification of construct’ is used to design the sampling and analytical processes used for the study.

A case study methodology is adopted with the sample comprising directors from purposively selected publicly listed Australian commercial banks. Case data comprised interviews with company directors and externally sourced company data. Directors were interviewed using a standard interview protocol developed from the a priori specifications of construct. The data was coded and analysed using qualitative data.
analysis software with codes developed from the a priori specifications of construct. The interview data was triangulated with externally sourced data to confirm its validity.

Chapter 4 presents the findings from the two stages of the research. The first part explores the mechanisms by which external factors influence the board’s views and those by which the board influences a company’s behaviour, while the second part explores how a board’s characteristics influence a company’s behaviour.

Chapter 5 presents the study’s conclusions, its implications and limitations, and suggests directions for future research. The mechanisms employed by boards of the sample companies to influence their management’s choice of strategy are identified and shown to be a consequence of a board’s perspective as to its role and its aspirations, culture and values.

Board Corporate Entrepreneurial Potential (BCEP), which is defined as an assessment of a board’s growth aspirations, willingness to accept entrepreneurial risk, attitude as to the desirability of corporate entrepreneurship, perception as to its feasibility for the company, and the level of its engagement with management, is shown to be a reliable and stable predictor of the entrepreneurial intentions of a company’s management.

The implications of these findings are discussed, including their relevance to managerial best practice and the development of public policy.
1.6 PUBLICATIONS

Publications generated in the course of the development of this thesis are reported here. A considerable amount of the work presented here, first appeared in these publications:


CHAPTER 2 - LITERATURE REVIEW

“[L]iterature reviews in the context of postgraduate study may be defined in terms of process and product. The process involves the researcher in exploring the literature to establish the status quo, formulate a problem or research enquiry, to defend the value of pursuing the line of enquiry established, and to compare the findings and ideas of other with his or her own. The product involves the synthesis of the work of other in a form which demonstrates the accomplishment of the exploratory process” (Bruce 1994 p.218).

2.1 INTRODUCTION

This literature review serves two purposes. Firstly, it serves as a vehicle for its author to develop an in-depth knowledge of the literature relating to a specific domain of academic research, that is, boards and corporate entrepreneurship. Second, it provides a basis for developing a priori specifications of constructs for the detailed analysis as to how such a relationship between boards and corporate entrepreneurship might work.

2.2 ENTREPRENEURSHIP

“[E]veryone is an entrepreneur only when he actually ‘carries out new combinations,’ and loses that character as soon as he has built up his business, when he settles down to running it as other people run their businesses.” (Schumpeter 2000 p.60)
2.2.1 Concept of Entrepreneurship

Entrepreneurship is an observed phenomenon that is of interest to researchers because of its role as a driver of economic growth, job creation and competitiveness in global markets (Kuratko and Audretsch 2009). It involves reallocating resources to a new use that produces a preferred outcome.

Entrepreneurship is a planned behaviour. It is not the product of unconscious and unintended antecedents, but rather is a “conscious and intended act” that is “aimed at either creating a new venture or creating new values in existing ventures” (Bird 1988 p. 442).

Over several hundred years theoreticians have studied entrepreneurship with a view to understanding its characteristics and the factors that lead to its occurrence.

Richard Cantillon as well as being recognised as a founder of the field of economics (Schumpeter 1914 as cited by Hayek 1985; Higgs 1892; Jevons 1959), is credited with being the first to describe the concept of entrepreneurship (Higgs 1959). While the term “entrepreneur” is believed to be derived from the French word “entreprendre,” which was in use as early as the 12th century (Hoselitz 1951 as cited by Long 1983), it was Cantillon’s writing around 1730, that first described the concept and explained the economic role of the entrepreneur (Swedberg 2000).

Cantillon would today be described as an investment banker. He profited by identifying investment opportunities, recruiting investors and retaining a share of their profits. He understood the risks and returns associated with trading, having watched large amounts of money being made and lost by investors in volatile markets. This understanding enabled him to make large profits by taking positions against those of his investors (Murphy 1989).

Around 1730, Cantillon wrote *Essai sur la Nature du Commerce en Général* (1959). His motivation for writing this text is unclear, however as it includes large parts of his defence against charges of usury brought by unhappy clients (Higgs 1892), his likely
objective, at least in part, is believed to have been to explain the difference between profits made from usury and those that he made as a reward for accepting the financial risk associated with complex transactions (Murphy 1989).

Cantillon’s *Essai* shows his first hand knowledge of financial markets and commodity trading. He recognises the risk involved in market transactions and identifies the entrepreneur as the person who shoulders this risk. Cantillon sees the entrepreneur as one of the central actors in a market economy who in broad terms is defined as someone who acquires goods or services at a certain price in order to sell them at an uncertain and hopefully higher price in the future. A consequence of this uncertainty is that the entrepreneur makes a profit (or loss) of uncertain magnitude (Cantillon 1959).

Cantillon, as a banker, focuses on the financial risks borne by an entrepreneur that are associated with operational decisions (Hébert and Link 2006). He does not recognise the entrepreneur’s role as an innovator, an implementer, or as an initiator of economic change. The recognition that an entrepreneur plays these roles was left to subsequent theorists.

In the decades following Cantillon’s death, the new field of economics flourished, initially through the work of Francois Quesnay and his followers, and then through that of Adam Smith.

Quesnay, who had read Cantillon’s work, was a French physician who proposed that economics be treated as a science and modelled to show the relationship of an economy’s outputs and inputs. Quesnay published a detailed text presenting his economic theories, the *Tabléau Économique* in 1759 which subsequently led to the formation of a school of economists known as the Physiocrats (Eltis 2002).

The Physiocrats built on Quesnay’s work to expand Cantillon’s concept of entrepreneurship, whereby the entrepreneur, as well as being the bearer of uncertainty, innovates and organises the production of new goods and services (Long 1983).
The Physiocrats assumed that humans act rationally and follow the course of action that has the greatest utility (Neill 1949). This assumption, that the entrepreneur does not perform a distinct function but behaves as a ‘rational’ person, is central to physiocratic analysis as it allows the development of predictive models. An environment where the outcome is uncertain would not allow this simplification.

An Inquiry into the Nature and Causes of the Wealth of Nations, published by Adam Smith in 1776, is regarded by many as laying the foundation for modern economic theory. Smith, who was familiar with the work of Cantillon, made a further simplification, beyond that made by Quesnay and the Physiocrats, by not distinguishing between the roles of the entrepreneur and the capitalist. Whereas Cantillon’s entrepreneur acts to rectify discrepancies between demand and supply, Smith assumes this is a consequence of free market forces. This approach, was adopted by virtually all the other leading contemporary English economists, whereby they regarded “production and the investment of capital as a more or less automatic process, involving no decision making and certainly no risky judgement or imagination of any kind” (Blaug 2000a p.78).

Quesnay, the Physiocrats and Smith’s financial models were recognised as providing a new and rational approach to economics and recognised as “an attack against the principles and practices of mercantilism.” (Rima 2000 p.88)

While it is likely that Smith understood Cantillon’s work, his decision to ignore the risk-taking entrepreneur, minimises the complexity of his analysis and enabled him to provide an analysis that was more useful than that provided by the mercantilists.

John-Baptiste Say is credited with reintroducing the entrepreneur into economic thought (Rothbard as cited by Sechrest 1999). Whereas Smith ignored the role of the entrepreneur by assuming that the typical merchant or small industrialist fulfilled the roles of capitalist, entrepreneur and manager, Say observed that larger companies were typically owned by independent shareholders and managed by individuals who performed an entrepreneurial function so that the roles of entrepreneur and capitalist...
were distinct (Redlich 1949). This observation led Say (2001) to expand Cantillon’s concept of entrepreneurship to include the actions required to combine the different elements of production into a profitable enterprise (de Montoya 2000).

Say (2001) assigns two key roles to the entrepreneur. Firstly, the entrepreneur arranges the funding that is required for the new venture. Second, the entrepreneur administers the new venture. As the entrepreneur typically contributes part of a venture’s required funding, Say observes that the entrepreneur shares the risk of the venture.

While Say does not refer to the entrepreneur’s role as an innovator, Schumpeter suggested that as the role of Say’s entrepreneur exists “only when the factors are combined for the first time” (Schumpeter 2000, p. 59) innovation is implied.

The ‘marginal revolution’ in the 1870s, was based on the proposition that productive agents in a competitive economy would be rewarded according to the ‘increment of output’ they produced, and is seen as ushering in the era of neoclassical economics (Blaug 2000a).

Léon Walrus, who was a central figure in the marginal revolution, published his General Equilibrium Theory in 1874 in *Elements of Pure Economics*. This theory links demand and supply by proposing that markets will tend to circular flows, as prices for goods and services will change in response to imbalances between demand and supply. It represents a valuable contribution to economics as it allows many practical questions, such as those regarding the effects of price controls and minimum wage laws to be answered (Blaug 2000a; Kirzner 1997; Schumpeter 2000).

Although Schumpeter (1933) described Walras as the “*Greatest of all Economists*” (p. 9) for his development of General Equilibrium Theory, he came to the view that Walras’s view of economics as a circular system that only changes when external influences, such as an increase in population or a new invention, forced it to react and move to a new equilibrium, was restrictive (Swedberg 2000).
Schumpeter instead proposed that the economic system also reacted to internal factors and developed theory that explained the role of such factors in the economic system (Schumpeter 1937 as cited by Swedberg 2000). Schumpeter argued that all truly important changes in the economy are initiated by an ‘entrepreneur,’ and work through the business cycle until a new equilibrium is achieved. Starting with this premise, Schumpeter proposed a totally new economic theory with the entrepreneur as its centrepiece (Swedberg 2000).

Schumpeter (2000) proposed that economic development is a consequence of the redeployment of economic resources to a new use that will “produce other things, or the same things by a different method” (Schumpeter 2000, p. 51). He defined the redeployment of an economic system’s “existing supplies of productive means” as a “new combination” (p. 53).

Schumpeter (2000) suggested that there are five types of new combinations: (1) the introduction of a new product to an existing market; (2) the introduction of a new method of production for an existing product; (3) the supply of an existing product to a new market; (4) the introduction of a new source of raw materials for an existing product; and (5) the reorganisation of an existing market.

He gave considerable attention as how funds are provided for new combinations. Firstly, he observed that in a circular system the required funds cannot come from thrift (that is by abstaining from consumption), as when a system is in equilibrium there are neither surplus funds nor an incentive to save. Instead, Schumpeter proposed that funding for new combinations must come either from credit generated by the banking system or from the reinvestment of the profits of earlier new combinations (Schumpeter 2000).

Schumpeter labels the process of carrying out of new combinations as ‘enterprise’ and the individuals who carry out the process as ‘entrepreneurs.’ In contrast to classical economists from Smith to John Stuart Mill, he distinguishes entrepreneurs from capitalists and in contrast to neoclassical economists including Marshall and Walras, he
distinguishes entrepreneurs from managers (Schumpeter 2000). At the same time, Schumpeter recognises that the entrepreneur, may also serve as the capitalist who funds a new venture and as the manager who organises it. He views these as functional roles, and suggests a person may switch between them as a business evolves. (Blaug 2000a).

As an economist, Schumpeter focuses on the causes of economic development. While he acknowledges that some growth will come from ‘continuous adjustments’ he proposes that meaningful economic development requires disruptive innovation, that is, the carrying out of new combinations. Schumpeter’s entrepreneurs are innovators who are ‘carrying out new combinations’ that will lead to economic development (Schumpeter 2000, p.51).

Schumpeter specifically distinguishes innovators from inventors. Whereas the product of the inventor is the discovery of new technical knowledge, innovators are those who are responsible for the ‘introduction of new technical methods, new products, new sources of supply and new forms of industrial organization’ (Blaug 2000a, p.83). Schumpeter observes that many innovations will not be associated with an invention and similarly, many inventions will not result in an innovation. “As long as they are not carried into practice, inventions are economically irrelevant” (Schumpeter 2000, p.66).

Ludwig von Mises and Friedrich Hayek, of the Austrian school, shared Schumpeter’s view that the Walrus general equilibrium model did not offer a satisfying theoretical framework for understanding what happens in market economies albeit for different reasons. Whereas Schumpeter saw the entrepreneur as initiating change from within the economic environment, Mises relied on the entrepreneur’s superior knowledge of market imperfections and her ability to recognise profit opportunities. Hayek likewise suggested that a market must lack knowledge about future events, such as consumer demand, if entrepreneurship is to exist. Consequently entrepreneurship creates new knowledge through a process that Kirzner (1997) subsequently described as ‘entrepreneurial discovery’ (Kirzner 1997; Swedberg 2000).
Frank Knight is credited with attempting to “square neo-classical thought with a theory of entrepreneurship” (Swedberg 2000 p.19). Knight distinguished between the objective probability of ‘risk’, which can be calculated and that of ‘uncertainty’ that can never be known. Knight’s view that an entrepreneurial profit is a gain from handling uncertainty is developed in ‘Risk, Uncertainty & Profit’ (1921), “The only risk which leads to profit, is a unique uncertainty resulting from an exercise of ultimate responsibility which in its very nature cannot be insured nor capitalized nor salaried” (Knight (1921) as cited by Herbert & Link as cited by Blaug 2000a p.71). Knight’s theories are consistent with those of both Schumpeter and Mises as uncertainty is associated with both the viability of an innovation and the existence of disequilibrium.

The subsequent development of chaos theory and quantum mechanics provide a framework for understanding Knight’s concepts of risk and uncertainty. In both frameworks, risk is a product of insufficient knowledge while uncertainty arises when it is impossible to predict the future.

“While chaos chance probability emerges because of the enormity of the facts pertaining to a phenomenon, quantum uncertainty probability occurs because a particle is not a certain, localized fact to start with”(Khalil 1997 p.30).

Vesper proposed that “entrepreneurship is the creation of new organizations” (1982, as cited by Gartner 1988 p.26). The focus of this definition is to characterise entrepreneurship as a process as opposed to Schumpeter’s characterisation of entrepreneurship as an act. That is, Vesper’s starting point is that entrepreneurship is “something one does” while Schumpeter’s is that an entrepreneur is “who one is” (Gartner 1988).

A consequence of Vesper’s approach is that entrepreneurship can be treated as a behaviour that occurs at one or more stages of an organization’s existence as opposed to as a state of being. The effect of this is to change the focus of the field to studying the behaviours that lead to entrepreneurship, as opposed to the act itself.
This approach has an inherent limitation in that it ignores the reality that an individual can be entrepreneurial without establishing a new organization, or alternatively can establish a new organization without being entrepreneurial. For example, an existing organization might reallocate its resources to a new product within an existing entity, or a new organization might be established to takeover an existing operation.

This can be contrasted with Schumpeter’s definition of entrepreneurship, which focuses on the reallocation of resources for a desired outcome, as opposed to the behaviours that are required to achieve such a reallocation. That is, entrepreneurship is primarily about an outcome, as opposed to the route to that outcome.

The theoreticians who established the field of entrepreneurship were economists who identified the phenomenon by its economic impact and characterised it by its association with risk taking, organization and innovation. Some authors have subsequently expanded the bounds of the field to include the conceptualisation of entrepreneurship as a social movement with the phenomenon identified as having the same characteristics, but broadened to include its non-economic impact. This has led to concepts such as moral entrepreneurship, political entrepreneurship, criminal entrepreneurship, social entrepreneurships and environmental entrepreneurship (Swedberg 2000).

In this study, a definition that is based on Schumpeter’s is used

“Entrepreneurship is the innovative reallocation of resources to achieve a preferred outcome.”

Entrepreneurship is deliberately defined as an act. It does not require that the resources that are reallocated are economic, or that the preferred outcome is an economic benefit.

This definition does not require that entrepreneurship is successful, only that the entrepreneur intends to achieve a specific outcome. The uncertainty associated with entrepreneurship necessitates experimentation and with it the possibility of failure.
2.2.2 The Entrepreneur

2.2.2.1 Definition
The range of descriptions of what entrepreneurs do, mirrors the range of descriptions of entrepreneurship itself.

Cantillon (1959) described an entrepreneur as an individual who buys or produces goods at a certain price without certainty as to the price at which they will be sold. The entrepreneur accepts market risk with the objective of making a profit.

The Physiocrats, notably Quesnay and Bandeau, expanded the entrepreneur’s role to include the organizing and managing of production and marketing with the aim of maximising profits (Long 1983). Bandeau stressed that an entrepreneur needed to be clever and knowledgeable and to be willing “to operate rationally by using the most productive methods” (Bandeau as cited by Long 1983 p.48).

J. B. Say (2001) identified three functional roles in an economy, the proprietor who also fills the role of the entrepreneur, the capitalist who provides funds, and the labourer who performs work, and observed that these roles can be filled by the same individual.

Within this context, he describes the role of proprietor/entrepreneur as being to estimate probable demand, organise funding and manage the establishment and operation of new ventures. To do this, a proprietor/entrepreneur must be prepared to bear risk, albeit with the expectation of an appropriate return, and must have the skills and knowledge required to evaluate, and if appropriate exploit an opportunity.

Schumpeter (2000) identified the entrepreneur first and foremost as an innovator:

“It is the carrying out of new combinations that constitutes the entrepreneur”
(p.58).
He designated as entrepreneurs, those who orchestrate new combinations, regardless of their role in the economy or their management responsibilities. In particular, he designated company employees “who actually fulfil the function by which we define the concept” (Schumpeter 2000 p.58) as entrepreneurs. Therefore someone is an entrepreneur while they are actually “carrying out new combinations” (p.51), and not while they are merely operating an established business, as in such circumstances they are not fulfilling the entrepreneurial function. Schumpeter’s entrepreneur is therefore continuously making decisions that involve uncertainty (Swedberg 2000).

Schumpeter (2000) considered that his characterisation of the entrepreneurs was similar to Say’s, in circumstances where an entrepreneur was establishing an innovative venture. In situations where an individual was arranging funding and managing a venture that did not involve innovation, perhaps construction of housing, the two definitions would not be consistent.

Friedrich Hayek (1945) postulated that while central planning theoretically provides the most efficient solution to a problem, the reality is that central planners can never have the unique local knowledge that is necessary to develop such a solution. Instead, it is possession of local knowledge, about such things as local demand and resource availability, that gives entrepreneurs a competitive advantage in the identification of opportunities to reallocate resources.

He was critical of what he believed to be Schumpeter’s position that an independent entrepreneur could possess all the knowledge required to identify an opportunity. Instead, Hayek postulated that new solutions required interactions between groups of people each of whom provided knowledge about part of the solution.

Risk, Uncertainty and Profit by Frank Knight (1921) distinguishes between insurable risk and uncertainty, and argues that entrepreneurs are those who are able to make decisions in the face of uncertainty, as opposed to those who possess unique knowledge. The role of the entrepreneur is then to generate profits by predicting the outcome of uncertain situation, with an entrepreneur’s success depending on the reliability of her
predictions. Entrepreneurs who make more reliable predictions in the face of uncertainty will be more successful. Managers, on the other hand, are not required to take responsibility for the correctness of their judgement.

A consequence of Knight’s argument is that the entrepreneur can profit despite entering markets where there is perfect competition or long run equilibrium. In both of these situations the entry of the entrepreneur creates uncertainty, as the entrepreneur has to guess the price at which goods will sell. Accordingly, an entrepreneur’s judgement can lead to a windfall gains or losses (Blaug 2000a).

An alternative approach to understanding decisions involving risk is labelled the ‘expected-utility’ hypothesis. This approach which proposes that “choices among alternatives involving risk can be explained by the maximization of expected utility” (Friedman and Savage 1948 p.281), was developed by Neumann and Morgenstern, who argued that an individual’s decision whether to choose a particular option is a consequence of the combination of their assessment of the probabilities of possible outcomes, with an individual’s desire to maximize the utility of their decision (Neumann and Morgenstern as cited by Friedman and Savage 1948).

While utility analysis is recognised as a useful approach for explaining the basis of decisions involving risk, such as gambling, it is based on the assumption that the risk taker can assess the probability of each available option and the associated returns, and will make decisions based on a combination of this assessment and a personal preference as to the utility of alternate strategies (Friedman and Savage 1948).

The assumption that the risk taker can assess the probability of each available option avoids Knight’s concept of uncertainty. That is, it is based on a premise that the “probabilistic characteristics of the task are well defined” (Slovic and Lichtenstein 1971 p.671) with individuals making decisions on the basis of their assessment of utility.

While a utility approach offers a useful framework for analysing decisions involving risk, the assumption of probabilistic certainty is in conflict with the definition of
entrepreneurship that is used here. That is, an entrepreneur’s choices are seen as being driven by their assessment of uncertainty as opposed to their assessment as to the attractiveness of alternate risk profiles.

A similar characterisation to Knight’s was postulated by Ludwig von Mises, who characterised an entrepreneur as someone who has an ability to anticipate uncertain events, such as the future price of products. (Swedberg 2000).

The implication of this characterisation is that entrepreneurs do not profit because they are particularly clever or talented, but rather because they are ‘more clever’ or ‘less clumsy’ than their competitors. Hence, an entrepreneur’s profits will reflect her judgement as compared to that of other entrepreneurs (Mises 2000).

An enterprise centric perspective was adopted by Edith Tilton Penrose (1995), who identified an entrepreneur as someone whose role in a management team is to identify and exploit opportunistic ideas for the expansion of the enterprise (Long 1983). Penrose distinguished her entrepreneur to Schumpeter’s, who was operating from the perspective of the economy as a whole.

The construct proposed by Israel Kirzner (1997) has the entrepreneur providing an equilibrating force through the identification of arbitrage opportunities that smooth out market imperfections (Long 1983). Through this process of ‘entrepreneurial discovery,’ entrepreneurs gradually but systematically increase the awareness of market participants, thereby driving prices, output and input quantities and qualities, towards the values consistent with equilibrium (seen as the complete absence of sheer ignorance). Effectively, the entrepreneur pushes the economy towards equilibrium.

After an arbitrage opportunity has been identified, Kirzner considers that the task becomes one of professional management. Hence, Kirzner’s entrepreneur is an “opportunity identifier as opposed to an organization builder” (Long 1983 p.54).
A review of theories of the entrepreneur, described by Knight, Hayek, Kirzner, and Schumpeter, led Mark Casson (2003) to observe that while they emphasised different aspects of entrepreneurship, “on the whole their similarities are more significant than their differences” (Casson 2003 p.215).

This review led to Casson proposing a proposed a functional definition of the entrepreneur, that he proposed was a synthesis and extension of the earlier theories.

“[A]n entrepreneur is someone who specializes in taking judgemental decisions about the coordination of scarce resources” (Casson 2003 p.20).

The rationale of this definition is that entrepreneurs must make decisions based on an their perceptions as opposed to analysis. This distinction necessitates that the entrepreneur is an individual, as only individuals can make decisions. Accordingly, team decisions, must be made by individuals in those teams.

Whereas Schumpeter considers that someone is an entrepreneur only while they are fulfilling the function, Casson specifies that an entrepreneur is someone who specialises in making such decisions and thus has an ongoing competitive advantage in doing so.

Casson (2003 p.20), like Schumpeter regards the entrepreneur as an agent of economic change whose focus is the decision about, as opposed to the implementation of, change. While his choice of the words ‘scarce resources’ was intended to limit the field of study to that usually identified as economic, Casson observes that his definition can readily be expanded to include fields such as military and political entrepreneurship (Blaug 2000b p.85).

A review of recent literature (e.g. Chiles et al. 2007; Eckhardt and Shane 2003; Shane and Venkataraman 2000; Swedberg 2000) shows that the literature discussed above represents a common staring point for characterising the entrepreneur. The perspectives of these authors with respect to the role of the entrepreneur, the risks taken by the
entrepreneur, and the origin of the entrepreneur’s opportunities are summarised in Table 2.1.

<table>
<thead>
<tr>
<th>Author (Citation) (Original Publication)</th>
<th>Role of Entrepreneur</th>
<th>Risk taken by Entrepreneur</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cantillon (1959) (Circa 1730)</td>
<td>Sells for uncertain price</td>
<td>Market risk</td>
</tr>
<tr>
<td>Quesnay &amp; Bandeau (Long 1983) (Circa 1760)</td>
<td>Organises and supervises production</td>
<td>Execution risk</td>
</tr>
<tr>
<td>Say (2001) (Circa 1810)</td>
<td>Organises funding and production</td>
<td>Execution and market risk</td>
</tr>
<tr>
<td>Schumpeter (2000) (Circa 1910)</td>
<td>Implements a new combination</td>
<td>Not relevant</td>
</tr>
<tr>
<td>Knight (1921) (Circa 1920)</td>
<td>Identifies opportunities</td>
<td>Uncertainty</td>
</tr>
<tr>
<td>Hayek (1945) (Circa 1945)</td>
<td>Identifies innovative opportunities</td>
<td>Not relevant</td>
</tr>
<tr>
<td>Kirzner (1997) (Circa 1974)</td>
<td>Identifies arbitrage opportunities</td>
<td>Not relevant</td>
</tr>
</tbody>
</table>

TABLE 2.1 ROLE OF THE ENTREPRENEUR

This table highlights that entrepreneurs are associated with change while showing there is a range of views with respect to the entrepreneur’s role, the extent of the risk they bear, and the origin of the opportunities they pursue.
The middle column of the table highlights how the role of the entrepreneur has evolved over time. The original theorists in the field regarded the entrepreneur as an individual who created an opportunity, thereby disturbing the equilibrium of the market, (e.g. Cantillon, Say, Schumpeter) while more recent theorists have reduced the entrepreneur’s role to identifying and facilitating an opportunity that may be pursued by others (e.g. Hayek, Kirzner, Casson).

Similarly the right column of the table shows how theorists’ views with respect to the risk born by entrepreneurs have evolved. While the original theorists in the field (e.g. Cantillon, Quesnay and Say) were of the view that the entrepreneur was the bearer of entrepreneurial risk, starting with Schumpeter theoreticians (other than Mises) have recognised that while entrepreneurship involves risk, it is not necessarily carried by the entrepreneur and is often carried by another party.

The majority of these theorists have recognised that an entrepreneur either originates or recognises a new opportunity. The notable exception to this is Hayek, who proposed that that entrepreneurs coordinate knowledge development by groups of individuals.

There is also a divergence of views as to whether entrepreneurs identify opportunities that upset the prevailing market equilibrium or if they identify arbitrage opportunities that restore market equilibrium. Swedberg (2000) suggested that from a practical point of view, that this is not an important issue.

“Similarly, it is totally uninteresting, from the perspective of practical entrepreneurship, whether the activities of the entrepreneur should be understood as restoring an equilibrium (Kirzner) or as disturbing an equilibrium (Schumpeter) . . . . . What is much more relevant is to figure out what this ‘ability’ consists of, how to develop it, and how to spot it (Swedberg 2000 p.21)
In Section 2.2.1 of this document, entrepreneurship was defined as “the innovative reallocation of resources to achieve a preferred outcome.” In this context, an entrepreneur is the individual who causes this to happen, for as long as that individual is actually doing so. Whether an entrepreneur personally accepts the risks associated with entrepreneurship, and the source of the opportunity will vary from situation to situation.

While the entrepreneur recognises and exploits entrepreneurial opportunities that involve risk, it is not relevant whether the entrepreneur shares this risk or not. This is notably the case with respect to corporate entrepreneurship.

The above analysis provides the basis for the definition of ‘entrepreneur’ that is adopted for this project:

“Entrepreneurs are individuals, either on their own or inside organizations, who manage this reallocation, whether they control these resources or not.”

2.2.2.2 Characteristics

2.2.2.2.1 Overview

A consequence of entrepreneurship being seen as playing a major role in economic development is that the personal characteristics of entrepreneurs are of interest. In particular, researchers have sought to determine if the possession of particular characteristics will determine an entrepreneur’s success (Stevenson and Jarillo 1990).

Research in this area can be identified as belonging to one of three streams. Firstly, theorists have explored the impact of personality traits such as: risk-taking (Cantillon 1959; Knight 1921), creativity (Schumpeter 2000) or need for achievement (McClelland 1961 as cited by Shane et al. 2003) on entrepreneurial behaviour and success; second, the impact of personal capabilities such as intuition (Schumpeter 2000), creativity (Schumpeter 2000), access to resources (Say 2001), organisation and management of production (Long 1983; Say 2001), and knowledge of the world and business (Say 2001); and third, that of individual perceptions of the feasibility of entrepreneurial
behaviour (Bandura 1977; Krueger and Brazeal 1994) and of the desirability of entrepreneurial behaviour (Krueger and Brazeal 1994).

2.2.2.2 Personality Traits
Researchers who explored the relationship between personality traits and entrepreneurship found that while there was an overwhelming perception that entrepreneurs are different to non-entrepreneurs, it is not possible to develop a psychological profile of the entrepreneur. Gartner (1985) suggested that this was because the differences among entrepreneurs, and among their ventures, are substantial. This led him to suggest that future research needed to focus on homogeneous subsets within the entrepreneurial universe. That is, research should not focus on the ‘average’ entrepreneur.

Shane et al. (2003), in a review grounded on the explicit assumption that “all human action is the result of both motivational and cognitive factors” (p.258) argued that the attributes of entrepreneurs influence their decisions and in particular “human motivation plays a critical role in the entrepreneurial process” (p.258).

A subsequent meta-analysis undertaken by Rauch and Frese (2007) showed that generalized self-efficacy, proactive personality, innovativeness, and achievement motives are each predictors of specific entrepreneurial behaviours. This led to the observation that the attributes of a particular entrepreneur could determine the parts of the entrepreneurial process to which they were suited.

While the identification of particular traits associated with entrepreneurship may enable potential entrepreneurs to be identified, this information is likely to be of limited use as such individuals will also be suited to other occupations. For example, an individual with a high need for achievement will be able to satisfy this need through many career choices, for example, a career in microsurgery. However the information may be useful to confirm the suitability of individuals who have self-selected and in particular to identify the parts of the entrepreneurial process that they are either suited or not suited to.
In the context of corporate entrepreneurship, personality traits may dictate whether particular employees are suitable for corporate entrepreneurial roles.

### 2.2.2.2.3 Personal Capabilities

While the personal capabilities that are required of an entrepreneur will vary with the definition of entrepreneurship that is adopted and the part of the entrepreneurial process being considered, most are recognised as being the same as those that are required by general managers.

Specific capabilities that have been identified as particularly relevant to entrepreneurs are the identification and evaluation of opportunities (Haynie et al. 2009; Shane and Venkataraman 2000; Witt 2007), decision-making in the face of uncertainty (Casson 2003; Knight 1921; Schumpeter 2000) and the ability to recruit investors (Say 2001; Schumpeter 2000).

The occurrence and success of entrepreneurial opportunities depends on their identification and evaluation by entrepreneurs. The exploitation of a particular opportunity depends on it being discovered by an entrepreneur who has the required knowledge, is attracted to the opportunity, has access to social networks that will provide the required information, and has the ability to identify new means-ends relationships. If there is an absence of potential entrepreneurs with these characteristics, the opportunity will not emerge (Eckhardt and Shane 2003; Haynie et al. 2009; Shane and Venkataraman 2000; Witt 2007).

Schumpeter (2000) proposed that entrepreneurs depend on intuition, which he defined as *the capacity of seeing things in a way which afterwards proves to be true, even though it cannot be established at the moment, and of grasping the essential fact, discarding the unessential, even though one can give no account of the principles by which this is done”*(p.64).
Similar concepts were described by Knight (1921), Kirzner (1997) and Casson (2003) who proposed that entrepreneurs have a superior ability to make decisions in the face of uncertainty, to predict the future, and to make judgemental decisions.

More recently, Mitchell et al. (2005) suggested intuition may be associated with “the beginning of new market learning or the drawing of unique conclusions about markets and the ability of venture managers, creativity and innovation, the discerning of necessary entrepreneurial inputs, the improvement of competitiveness, opportunity recognition, improved organizational performance, and rapid or more efficient decision making” (p.657).

In the context of entrepreneurship, ‘intuition’ has been defined as “a process by which information normally outside the range of conscious awareness is immediately sensed and perceived as certainty of knowledge or feeling about some thing distant or yet to happen” (Gillin et al. 2007 p.2).

While the dominant view is that the foundation of intuitive knowledge is an aggregation of past experience provided by the subconscious mind, there is also a view that it is based on nonlocal communication between an individual and the environment. The interest in the second view is driven by its potential as an explanation for the success shown by serial entrepreneurs. While research has shown some support for nonlocal intuition, it is still at a pilot stage (Bradley et al. 2010; Gillin et al. 2007).

Two of the founders of the field Say (2001) and Schumpeter (2000) recognised the importance of entrepreneurs being able to attract investors “the only man he has to convince or to impress is the banker who is to finance him” (Schumpeter 2000 p.67).

Contemporary research has provided support for their recognition of the importance of the entrepreneur for attracting investors. For example, research exploring the investing patterns of 74 UK based angel investors published by Mason and Harrison (2002) found that 53% of those surveyed “will consider relaxing their investment criteria in certain circumstances, notably where the entrepreneur/management team has high credibility,
confirming other evidence that angels place much greater weight on the ‘jockey’ than on the ‘horse’ (p.281).

A key attribute of the personal capabilities of entrepreneurs is that individuals, as opposed to groups, display them.

“Only individuals can take decisions; corporate bodies only arrive at decisions by aggregating votes. Individuals in committee make strategic decisions on how to influence other people’s voting and on how to vote themselves; it is these decisions that are entrepreneurial, not the decisions of the committee as a whole” (Casson 2003 p.20).

Accordingly, individuals identify entrepreneurial opportunities, make an intuitive judgement as to their viability, and then work to recruit other members of their organisation.

The implication of this is that a group of people, such as a board or a committee, cannot be a substitute for an individual entrepreneur, but rather must accommodate individual entrepreneurs.

While the literature has been unable to identify specific capabilities that will allow the prediction of who will be a successful entrepreneur, it does suggest that the capabilities described above will enhance the performance of entrepreneurs. However, not all individuals who have these capabilities will become entrepreneurs, and individuals who do not have these capabilities may still succeed as entrepreneurs.

2.2.2.2.4 Individual Perceptions

Krueger and Carsrud (1993) developed and validated intentionality models that showed that a potential entrepreneur's perceptions of entrepreneurial feasibility and entrepreneurial desirability were a reliable predictor of their entrepreneurial intentions. The nature, use and validity of intentionality models is discussed in Section 2.6 of this literature review.
2.2.2.3 Motivation

Research into the motivation of entrepreneurs has followed two approaches. The first approach rationalises that the benefits of entrepreneurial behaviour are psychological and sociological while the second rationalised that they are financial.

Researchers who conceptualise entrepreneurship as a psychological characteristic of individuals, describe entrepreneurs using such terms as “creativity, daring and aggressiveness,” while others who conceptualise it as a sociological characteristic of individuals, regard it as something dependent on personal motivations “that may be enacted by individuals in different social positions” (Wilken 1979 p.58 as cited by Stevenson and Jarillo 1990).

The second approach conceptualises entrepreneurship as an economic function that is performed by entrepreneurs who are motivated by economic self-interest where the individual is “largely motivated by a desire to possess wealth” (Knight 1921 p. 151).

The economic view was initially developed by the early entrepreneurship theorists, who, as economists, rationalized that entrepreneurs were primarily motivated by potential profits. For example, Cantillon described entrepreneurs as individuals who buy at a fixed price in anticipation of selling at a higher price (Cantillon 1959), while Say (2001) described entrepreneurs as individuals who establish new ventures in anticipation of potential profits.

While both of these approaches can be, and are, explored independently of the other, the reality is that they are linked:

“Consumption and status can, however, can be bought using the income generated by entrepreneurial activity”(Casson 2003 p.21).
Schumpeter (2000), despite being trained as an economist, adopted a similar view and proposed that entrepreneurs were primarily driven by sociological needs including “the will to found a private kingdom,” “the will . . . to succeed,” and to experience “the joy of creating” (Schumpeter 2000 p.70).

He noted that while with the accumulation of personal wealth may be a key driver of the first of these, for the other two, although it may be a consequence, it is not. Hence, he proposed that while financial motivations will drive some entrepreneurs, non-financial stimuli is required for others. Schumpeter does not identify these stimuli but instead suggests that they may be identified by “detailed observations of the psychology of entrepreneurial activity” (Schumpeter 2000 p.71).

As discussed in the previous section, the validity of psychological or sociological traits as an antecedent to entrepreneurship is questioned, as it is extremely difficult to link particular psychological or sociological traits causally to patterns of complex behaviour, such as entrepreneurship, and that at most, “one could speak of correlates or antecedents of particular kinds of entrepreneurial behaviour” (Stevenson and Jarillo 1990 p. 20).

As Stevenson & Jarillo (1990) observed, while researchers can characterise entrepreneurship as a behaviour that is carried out by individuals, they have been unable to establish a causal link between an individual’s psychological and sociological characteristics and such behaviour. Instead researchers have shown that entrepreneurs react to a range of motivations that reflect a particular opportunity and environment.

2.2.3 The Entrepreneurial Process
The previous sections of this section discuss what entrepreneurship is and the entrepreneurs who are responsible for its existence. This section builds on these discussions by exploring how entrepreneurial opportunities come into existence, the identification of entrepreneurial opportunities, the evaluation of entrepreneurial opportunities, and the modes of exploitation of entrepreneurial opportunities.
An entrepreneurial opportunity is the result of a process described as *entrepreneurial discovery*. They occur when an ‘entrepreneurial mind’ recognises that a resource is not being put to its ‘best use’ as products made from that resource can be sold for a higher price at another location, at another time or in another form than those products currently made. This occurrence is likely to be a consequence of new technologies, market inefficiencies, and political, regulatory and demographic changes. (Drucker 1985, Shane and Venkataraman 2000; Witt 2007).

The discovery process will continue as ongoing changes to elements of the value chain will produce new information that shows that the existing allocation of resources has become inefficient (Casson 2003; Eckhardt and Shane 2003).

The existence of opportunities also requires that entrepreneurs hold different beliefs about a resource’s value to those of other potential users of that resource. The source of an entrepreneur’s beliefs will either be the product of a personal assessment, or a consequence of new information (Shane and Venkataraman 2000).

Realisation of an opportunity will depend on an entrepreneur, but not all entrepreneurs recognising that it exists and has value. Such recognition will depend on an entrepreneur having the information necessary to identify an opportunity and the cognitive skills needed to evaluate it. Access to the necessary information about an opportunity is likely to require that the entrepreneur is able to combine her own unique information with the unique information held by other individuals. Success will depend on being the first entrepreneur to complete such a synthesis, as wide recognition of an opportunity will eliminate the opportunity for profit (Casson 2003; Shane and Venkataraman 2000).

After identifying a potential opportunity, an entrepreneur must evaluate whether the investment of resources is likely to produce a beneficial outcome. This evaluation process cannot determine with certainty whether a business will generate profits as the evaluation depends on an assessment of uncertainty. An opportunity will be exploited when an entrepreneur expects that value generated by the opportunity will be sufficient
to compensate for the opportunity cost, the resulting lack of liquidity and the uncertainty borne. The potential entrepreneur’s expectation “appears to be a function of the joint characteristics of the opportunity and the nature of the individual” (Casson 2003; Shane and Venkataraman 2000 p.222).

Entrepreneurs, when evaluating opportunities, will consider the expected value of the opportunity, projected demand levels, industry profit margins, position in technology life cycle, density of competition, cost of capital and the experience of other entrants. Their evaluation will be influenced by their personal characteristics including their optimism, entrepreneurial experience, alternative opportunities, financial capacity, extent of social network, and access to required expertise (Shane and Venkataraman 2000).

As the evaluation of opportunities is influenced by the personal circumstances and biases of the potential entrepreneur the reliability of analysis is questionable. This may explain why the failure rates for new businesses are substantial (Dunne et al. 1988).

Individuals who decide to exploit opportunities may be independent of, or part of, established organizations. Once a decision is made, an opportunity will be exploited either within a new firm created to exploit the opportunities or within an existing firm. While it is often assumed that individuals who are independent of existing organizations discover opportunities, and that these opportunities are exploited in new firms that are established for the purpose, this is often not the case. Individuals who are not associated with an established organization may sell an opportunity they have discovered to an established firm, and individuals who discover opportunities while they are part of an established firm may pursue that opportunity within that firm or in a new firm (Shane and Venkataraman 2000).

The organizational mode selected for the exploitation of an opportunity is likely to be influenced by the nature of the opportunity, the organization required, and whether there are enforceable intellectual property rights. In particular, entrepreneurship is likely to occur in a firm established for the purpose when large individual incentives are
required; when there are low barriers to entry; when there is high level of uncertainty; and when exploitation of an opportunity will be damaging to a firm’s existing business. It is more likely to occur in an established firm if that firm will enjoy advantages because of its scale, first movement, its position on the learning curve, or if it has complementary assets; when intellectual property can be protected; and in situations where it is difficult for independent entrepreneurs to obtain financing. (Shane and Venkataraman 2000).

The entrepreneurial process, as described, revolves around individuals. Individuals are required to collect the information, to discover opportunities, to identify them, to evaluate them, and to secure the resources required for their exploitation.

When an opportunity is identified and the required resources have been secured, an opportunity will be exploited either by an existing firm or by new firm that has been established for the purpose.

2.3 THE FIRM

“The firm is a unit of control. As such it is not very different from a household. Households control the uses of the goods they own in much the same way as do firms, albeit on a smaller scale” (Casson 2003 p.161).

2.3.1 Characterisation

A ‘firm’ can be characterised as a system of relationships that come into existence when an entrepreneur determines that efficiencies can be obtained through the replacement of market transactions with a system whereby the entrepreneur coordinates the relationships between the suppliers of goods and services. The structure of the generic firm is illustrated in Figure 2.1 (Coase 1937).
FIGURE 2.1  ELEMENTS OF THE ENTREPRENEUR CENTRIC FIRM

The economic function of a firm is to acquire and organise human and other resources to profitably supply goods and services to the market (Penrose 1995).

In the absence of a firm, a customer establishes separate relationships with each of the factors of production. For example, people seeking to build houses will have contracts with suppliers of labour and construction materials. The entrepreneur sees the cost savings that will be achieved by establishing a firm that has ongoing relationships with each supplier and shares these relationships with its customers. The entrepreneur profits by eliminating the costs a customer would incur in negotiating and concluding a separate contract for each exchange transaction that would be required were the firm not to exist. Suppliers of goods and services join the firm in anticipation of higher profits than they would receive if they operated independently (Fama 1980). The firm must maintain this efficiency as, if it does not offer a lower price than an open market structure, customers will choose to bypass the firm and transact directly with supplier (Coase 1937).

The entrepreneur is motivated by her ownership of her firm: “The entrepreneur’s selfish use of her property – her effort to make a profit and accumulate wealth – results in the
best possible allocation of resources and the maximization of all citizens’ wealth and happiness” (O’Kelley 2006 p. 758). Research exploring the motivation of entrepreneurs presented in the previous section of this literature review, suggests that the entrepreneur’s ambitions may include the accumulation of non-financial wealth.

The progressive development of corporation law gave entrepreneurs the option of incorporation and with it three advantages – limited liability, transferability of ownership and a vehicle for coordination of multiple shareholders. With incorporation, the legally constituted organization replaces the entrepreneur as the central entity that contracts with the factors of production. This entity, called a company or a corporation, has shareholders who agree to provide funding in exchange for a share of the future profits of the firm as illustrated in Figure 2.2.

![Figure 2.2: Elements of the Corporation Centric Firm](image)

**FIGURE 2.2 ELEMENTS OF THE CORPORATION CENTRIC FIRM**

The corporation is distinct to the firm. It is a legal fiction that serves as a nexus for a set of contracting relationships among the individuals who are part of the firm.
Shareholders are similar to the other factors of production; they supply a product or service, in their case funds, and in exchange receive a share of the firm’s profits. If funds required for production can be provided at a lower price through the open market, customers will look for alternative structures that allow this to be achieved.

Frank Knight (1921) proposed that the role of the firm is to enable entrepreneurs to employ other people. In a firm, an employee agrees to accept directions from another for a guaranteed wage. The firm assumes the risk of guaranteeing the employee’s wages, as the firm is confident that the production of the employee will be of greater value than the wages paid. Hence, the corporation can be characterised as the entrepreneur.

2.3.2 The Closely-Held Firm

Firms have existed since ancient times when entrepreneurs first employed people or bought goods in anticipation of a future sale. Entrepreneurs established firms when they anticipated that doing so would enable them to undertake projects more economically than they could as individuals.

The structure of the firm evolved with the requirements of the entrepreneur. In particular, the capital needs of business created by the Industrial Revolution was driven by entrepreneurs who identified opportunities and established new firms that enabled them to secure funding. The economic system gave them the freedom to do this, as it anticipated their actions would lead to the optimal allocation of resources. However, despite the availability of simple corporate structures, venture funding typically came from the profits that the entrepreneur or the entrepreneur’s family had made on an earlier venture. Where firms required funding beyond what an individual entrepreneur could provide, the entrepreneur recruited partners who brought additional funding and in many cases management resources to the firm (Mokyr 1999; O'Kelley 2006).

The economic system allowed few firms to achieve great size. Most began life as small ventures, which if they survived their early years, struggled along or grew at a rate governed by the ability of their founding entrepreneur and perhaps that entrepreneur’s
children. In time, these firms languished into obscurity and disappeared (Marshall 1920 as cited by Stigler 1950).

2.3.3 The Early Modern Corporations

The emergence of the railroads during the late 1820s created the demand for larger and more complex organisational forms. While the resulting companies in the United States were initially established by special charter, general laws to allow their incorporation were enacted, in many US states, by the late 1840s. These laws specified that shareholders were responsible for the election of directors and had to approve any changes in the corporate charter. They often provided that the management of the business was the responsibility of the directors, or the directors and the officers. In time, case law saw the courts accept the assignment of broad discretionary powers to the board of directors. Shareholder consent was not needed for most management actions, and boards were assigned many of the powers they had been ceded to the managers of the business (Chandler 1977 as cited by Williamson 1981; Wootton and Roszkowski 1999).

The development of the publicly held corporation and of capital markets led to waves of merger activity between 1879 and 1903 that consolidated hundreds of US industries. These consolidations led to the formation of over 300 industrial corporations that accounted for over 15% of all manufacturing employees and plants. While merged firms enjoyed scale advantages and market share in excess of 50%, their owners faced the challenge of managing a large organization, often unsuccessfully (Caves et al. 1984). Livermore (1935 as cited by Caves et al. 1984) concluded that 43% of these mergers ended in outright failure.

These consolidations were associated with a shift from widely dispersed ownership of industry to an economy dominated by widely held corporations. While the modern corporations provided a means of funding large projects, they threatened individual entrepreneurship as widely dispersed ownership led to ownership being separated from control. Effectively shareholders of the corporation, despite their theoretical right to
appoint directors, had ceded management authority to their directors and officers and were powerless (O'Kelley 2006).

The extent of this separation of ownership and control had occurred was documented by Berle and Means, who predicted that it ‘would steadily envelope a greater share of industrial property and wealth’ (Berle and Means as cited by O'Kelley 2006 p.759).

Although capitalism had produced unprecedented economic growth, and an associated increase in living standards, its success produced an “atmosphere of almost universal hostility to its own social order” (Schumpeter 1976 p. 143).

In parallel, the horrors of the First World War, the Russian revolution and the Great Depression led to widespread belief that “something was fundamentally wrong with the world” (Hobsbwam 1975 as cited by O'Kelley 2006 p.760).

Such concerns led to socialist governments in many parts of Europe, inheriting “a social and economic system that would not function except on capitalist lines.” This necessitated that these governments “administer capitalism” if they were to achieve their socialistic aims (Schumpeter 1976 p.364) by establishing additional controls over the management of the corporations.

2.3.4 Alternative Models for the Corporation

In the United States, in 1932 the academics Adolph Berle and Gardiner Means “asserted that the quasi-public corporation, and the corporate system of which it was a part were new institutions that compete with and threaten to supplant the modern state as the dominant form of social organization” and “concluded that the corporation should now be analysed as a social organization, and with a view to determining how managers’ power shall be constrained for the public good” (O'Kelley 2006 p.761).

Berle and Means proposed that there were three ways that society could respond to its concern. It could seek to restore the controlling role of the shareholder, it could rely on corporate managers’ sense of individual morality and public duty, or it could regulate to
make the interests of both managers and shareholders subordinate to those of the community.

While most jurisdictions sought to follow the third path, there was not a common view as to how this should be done. Generally, one of three approaches was followed, the manager-orientated, the labour-orientated and the state-orientated. Although each of these had attractions to those seeking an alternative to the unfettered capitalism seen at start of the 20th Century, by the end of that century, they were generally accepted as inferior to models where companies are managed for the benefit of their shareholders (Hansmann and Kraakman 2000).

The failure of these approaches has driven a global consensus towards a firm model that is close to that of the pre-corporate firm incorporating shareholder primacy. Hansmann and Kraakman (2000) refer to this as the “standard shareholder-orientated model” of the corporate form (or “the standard model”).

2.3.5 The Standard Shareholder-Orientated Model

The standard shareholder-orientated model of the corporate form recognises that while companies should be organised and operated to serve the interests of society as a whole, corporate managers are strongly accountable to shareholder interests and in direct terms are only accountable to those interests. As a result, the role of corporate law is to specify the rights and obligations of the providers of funds (e.g. shareholders, debt-holders and creditors), while constituencies other than the providers of funding are expected to rely on laws developed for society as a whole. For example, the rights of individuals and society are protected by laws such as those relating to employment, anti-discrimination and protection of the environmental. (Hansmann and Kraakman 2000)

Hansmann and Kraakman (2000) identified three reasons why the standard shareholder-orientated model can be recognised as being superior to the alternatives listed above. Firstly, it provides a means for shareholders to protect their interests; second, the economic performance of jurisdictions where it operates is superior to ones with a
different mode; and third, its more efficient structure leads to firms having a lower cost of capital.

While the standard model in its pure form is still not accepted in many jurisdictions, the general recognition of the role of new business in job creation and the associated change to a radical pro-market ideology that took place with the coming to power of Thatcher and Reagan and the collapses of communism, and Asian state corporatism, has led to increasing recognition of the importance of corporate success and with it the standard model (Swedberg 2000).

### 2.3.6 Ownership and Control of the Firm

The passing of the UK Joint Companies Act and similar laws in other jurisdictions during the 19th Century provided a vehicle for dispersed ownership of firms. The impact of this was that by the 1930s, the ownership of a large proportion of industry had passed to widely held large publicly traded corporations. While initially these corporations were closely held by their founders and a small group of wealthy citizens, the emergence of a public shareholder class and the growth of pension and mutual funds since the beginning of the 20th Century has led to the wide diffusion of ownership. (Hansmann and Kraakman 2000; O'Kelley 2006).

An impact of this transition is that ownership changed from the historic arrangement whereby entrepreneurs both owned and managed companies to one where shareholders had become so numerous and dispersed that they were no longer willing, able or interested in managing the corporations they owned (Margotta 1989). As a result, theoreticians sought a new framework for understanding the relationship between ownership and control.

In 1921, the economist Frank Knight proposed that the apparent separation of control was illusory and that the modern corporation represented a reasonable approximation of the classical entrepreneur. He argued that an entrepreneur is required to resolve the uncertainty associated with the management. Shareholders, though company boards, exercised control by their selection of the ‘entrepreneur’ (Knight 1921; O'Kelley 2006).
In 1932, Adolph Berle and Gardiner Means proposed that the proper working of the free market system depended on the traditional logic of profits, whereby entrepreneurs would ensure the optimal allocation of resources to maximise profits. This led them to assert that the emerging separation of ownership and control was threatening the free enterprise system as the large quasi-public corporations that were emerging, were driven by a desire to increase the power of their management. This argument was subsequently labelled the Berle-Means Paradigm (O'Kelley 2006).

The implication of the Berle-Means Paradigm was that with separation of ownership and control, the economic and political power of firms increases while the returns generated for shareholders become inferior to those generated by entrepreneur-managed firms. The firm effectively evolves to being a social organization under the control of independent managers (O'Kelley 2006). This finding has stood the test of time:

“The substantial bulk of academic research since Berle and Means supports this proposition: separation of ownership and control does adversely affect the performance of the firm” (Burnham 1992 p.48).

Since the 1980s, a range of factors led to advocates of free markets, individualism, and the elimination of government regulation, recapturing political and intellectual control in America, England, and, within a decade most of the first-world countries” (Hobsbawm 1994 as cited by O'Kelley 2006). These included: an increase in public ownership through the growth of pension and mutual funds, a recognition of the advantages enjoyed by international competitors without social responsibilities, and a global swing away from government intervention in markets (Burnham 1992; O'Kelley 2006).

In the late 1970s, *Nexus-of-Contracts* became the dominant paradigm for modelling corporation law. This paradigm evolved from the work of R.H. Coase (1937), Jensen & Meckling (1976) and Eugene Fama (1980) and views the firm as a set of relationships whereby each of its members are motivated by self interest.
As a result, the firm in itself does not have an “objective function” or a “social responsibility,” such things are the domain of the individuals who participate in the firm’s relationships.

The Nexus-of-Contracts paradigm assumes that management is motivated by self-interest as is specified by the terms of their employment. The paradigm does not recognise a role for the entrepreneur as management and risk bearing are treated as naturally separate functions within the set of contracts comprising the firm. Instead, management is viewed as rational in its reaction to its environment (Fama 1980).

The bearers of risk neither participate nor seek to participate in the management of the firm. Instead they rely on independent managerial labour to maximize the value of their investments. Management is then charged with overseeing the contracts between the factors of production so as to ensure the viability of the firm (Fama 1980).

The Nexus-of-Contracts Paradigm postulates that management is motivated by signals from the managerial labour market and the capital market. That is, managers are motivated by their desire to “choose policies for the firm which will provide the most positive signals to the managerial labour market,” which will include signals as to the performance of the firm provided by the capital markets (Fama 1980 p.293).

An implication of the Nexus-of-Contracts Paradigm is that, in the absence of an entrepreneurial role, the firm does not have the means to make decisions in the face of uncertainty. Instead there is an assumption of perfect competition supported by perfect knowledge of the competitive environment (O’Kelley 2006). The role of managers is thus reduced to that of administrators performing a routine function. Accordingly, the Nexus-of-Contracts paradigm conflicts with Knight’s (1921) central thesis that firms exist as a vehicle for resolving uncertainty and are managed by entrepreneurs.

An extension of the Nexus-of-Contracts Paradigm based on Knight’s work is described by O’ Kelley (2006) as Theory of Entrepreneur Primacy. O’Kelley’s proposal is that the
corporation is the artificial *sole proprietor* at the centre of the firm with its managers carrying out the function of the classic entrepreneur. The corporation depends on the manager of the firm bearing risk and exercising control. While this is the case where a manager is a major shareholder of the company, this is often not the case. Knight’s solution was to propose that it is not essential that the manager is a major shareholder, as separation of ownership and control is illusory and companies are managed by individuals who are “motivated to act as real entrepreneurs and in the best interests of the corporation” *(O'Kelley 2006 p.771)*.

These arguments suggest that there are three situations where the management of a corporation will be motivated to behave entrepreneurially. Firstly, managers will be motivated to behave entrepreneurially in situations where they own a meaningful share of a company’s equity, that is a share with the potential to produce greater rewards than their manager’s compensation for employment. Second, they will be motivated to behave entrepreneurially in situations where contractual incentives replicate the benefits of equity ownership and third, in situations where they are motivated by non-financial factors. Whereas the first of these situations is the product of a direct link between ownership and control, the second and third depend on the actions of a company’s shareholders, most likely through the its board, to recruit and provide incentives to entrepreneurial managers.

### 2.3.7 Determinants of Firm Success

The modern firm evolved in response to the funding and organizational needs of large businesses that emerged as a consequence of the industrial revolution. Typical of the first firms were the railroad companies formed during the early 18th Century. These firms required funds and managerial resources beyond what any individual or partnership could contribute *(Wootton and Roszkowski 1999)*.

Individuals contribute funding to firms in anticipation of higher returns for a given level of risk that they could otherwise earn. While initially their choices were limited, the development of sophisticated capital markets over the course of the 20th Century has
given investors access to an enormous range of investment opportunities and the ability to evaluate the options they are offered.

The return on investment generated by a firm depends on the extent of its competitive advantage, the extent to which it is implementing a value creating strategy that is not simultaneously being implemented by any of its current or potential competitors (Barney 1991). A firm’s competitive advantage is a product of the state of competition in its industry and its ability to compete in that industry.

Porter (1979, 2008) showed that the state of competition, and hence the profitability of an industry, depends on the collective strength of five basic forces: the threat of new entrants, the bargaining power of suppliers, the bargaining power of customers, the threat of substitutes, and the rivalry amongst existing competitors. While this represented a valuable contribution, it is based on the simplifying assumptions that firms within an industry are identical in terms of the resources they control and the strategies they pursue and that should resource heterogeneity develop, resource mobility will lead to a restoration of resource homogeneity (Barney 1991).

An alternative view of a firm’s ability to compete within an industry questions these two assumptions and instead proposes that firms within an industry may be heterogeneous with respect to the strategic resources they control, and that these resources may not be perfectly mobile across firms, thus making long lasting heterogeneity possible. Firms can accordingly gain a competitive advantage through their possession and exploitation of specific tangible and intangible resources that are not possessed by their competitors (Barney 1991; Wernerfelt 1984).

A firm’s strategic resources will include its human resources and in particular its management resources. An implication of this is that the extent of a firm’s entrepreneurial talent will determine its ability to grow via the identification and exploitation of new business opportunities or via the acquisition of other companies (Penrose 1995).
A firm can therefore possess a ‘sustainable competitive advantage’

“[W]hen it is implementing a value creating strategy not simultaneously being implemented by any current or potential competitors and when those other firms are unable to duplicate the benefits of this strategy” (Barney 1991 p.102).

If a competitive advantage cannot be duplicated, it will be sustained until an unanticipated change in an industry’s structure makes what was a source of sustained competitive advantage, no longer valuable and hence no longer a source of competitive advantage. This change constitutes what Schumpeter describes as a new combination, leading to the event being labelled by some authors as a ‘Schumpetarian Shock’ (Barney 1991).

Fiol (2001) proposed that it may no longer be possible to gain a sustainable competitive advantage based on a particular set of core competencies, so that the skills/resources of organisations and the way they are used must constantly change, to create continuously changing temporary advantages. Furthermore she noted that such changes might need to be revolutionary as adaptive changes may be insufficient for successful competition.

This view is supported by indicators that show that the pace of business change has increased over the last century. For example, the corporate life expectancy of companies has fell from 65 years in the late 19th or early 20th Century to around 15 years in the 1990s (Foster and Kaplan 2001).

The impact of this faster pace of change is that any periods where a firm enjoys a sustainable competitive advantage are likely to be short-term in nature and “punctuated by frequent disruptions” (D’Aveni 1994 as cited by Volberda 1996 p.359).

As a result, firms can no longer compete on the basis of their core competencies, but instead must rely on their capability to adapt by continuously identifying and developing new strategies that create a temporary disequilibrium (Volberda 1996).
Foster and Kaplan’s (2001) analysis of the situation led them to propose that increasingly, if companies are to survive, they must adopt what Schumpeter described as “Creative Destruction” and adopt the processes seen in the capital markets whereby they are built for discontinuity and are constantly remade. In Schumpeter’s words

“This process of Creative Destruction is the essential fact about capitalism. It is what capitalism consists in and what every capitalist concern has got to live in” (Schumpeter 1976 p.83).

While Schumpeter wrote before the rate of change had accelerated to its current level, he proposed that a firm’s competitiveness depended on its ability to make the changes required to compete in a continuously changing environment. The current pace of change and the continuous emergence of new companies support this assessment.

2.4 CORPORATE ENTREPRENEURSHIP

2.4.1 Definition

While entrepreneurship has long been recognised as leading to the establishment of new ventures that coordinate ‘new combinations of productive means,’ the concept that established organisations might need the practices of independent entrepreneurs to both remain competitive and grow is relatively recent.

Schumpeter (2000) recognised that entrepreneurship occurred in established organisations and described how it is achieved when a ‘dependent employee’ who performs the function of the independent entrepreneur, as opposed to that of a manager who role he saw as to “merely operate an established business” (Schumpeter 2000 p.58).

The terms corporate entrepreneur and corporate entrepreneurship were introduced by Lewis (1937) in the 1930s. He described a corporate entrepreneur as a person who bore
part of an organisation’s uncertainty in exchange for a share of its profits (Lewis 1935, 1937). He distinguished a corporate entrepreneur from someone who worked for a fixed salary who he described as “solely a labourer” (Lewis 1937 p.538).

This usage of the term, corporate entrepreneurship, was consistent with Schumpeter’s description of entrepreneurship, with corporate entrepreneurship being regarded as similar to independent entrepreneurship, except that it occurred in a corporate environment. However, Lewis departs from Schumpeter’s usage, in that he does not view corporate entrepreneurs as innovators. Instead, reflecting Knight’s (1921) contribution, he views them as bearers of uncertainty.

While Lewis’s focus on the individual entrepreneur offered the advantage that it allowed research to be grounded by work on individual entrepreneurship, the resulting theory was inherently limited as it ignored the factors that created an organisational environment where entrepreneurship would flourish. Subsequent research has addressed this limitation and produced many models of corporate entrepreneurship. Ireland et al. (2009) suggested that models found in the entrepreneurship and strategy literature could be allocated to one of five groups.

The first group, which focuses on the ‘process’ of entrepreneurship, is exemplified by Burgelman (1983b) and Miller (1983). Burgelman (1983b) described corporate entrepreneurship as “autonomous strategic behaviour” involving interactions between operational level “product champions” and middle level “manager champions,” focused on generating new combinations which he defined as typically being “the result of interlocking entrepreneurial activities of multiple participants” (p.1349), while Miller (1983) proposed that an entrepreneurial firm was one that “engages in product-market innovation, undertakes somewhat risky ventures, and is first to come up with ‘proactive’ innovations, beating competitors to the punch” (p.771).

The second group focuses on the evidence of corporate entrepreneurship. Guth & Ginsberg (1990) proposed that if the characterization of entrepreneurship, based on Schumpeter’s (2000) view, is the carrying out of new combinations, then in large and
complex organisations, corporate entrepreneurship should include any decisions that are made, or actions that are taken, that result in new combinations of an organisation’s resources. Accordingly, corporate entrepreneurship includes such decisions as changes in strategy that alter the pattern of resource allocation. This characterization provided the basis for identifying corporate entrepreneurship as encompassing two types phenomena – the birth of new businesses within existing organisations and “the transformation of organisations through renewal of the key ideas on which they are build, i.e. strategic renewal” (Guth and Ginsberg 1990 p.5).

The third group, evolved from theory developed by Covin and Slevin (1991) and Lumpkin and Dess (1996), and adopted by Ireland et al. (2009), characterises entrepreneurship by the antecedent behaviours that lead to new entry. These are identified as risk taking, innovativeness, proactiveness, competitive aggressiveness and autonomy and are discussed further in Section 2.4.4 of this document.

The fourth group, exemplified by Hornsby et al (1993), focuses on “organizational and individual characteristics that led to intrapreneurial behaviour” (p.29). The model suggests that new ventures will be established when a precipitating event occurs in an organisational environment that supports entrepreneurial behaviour where there are potential corporate entrepreneurs.

The final group, described in a review of the field of corporate entrepreneurship by Dess et al. (2003), views the role of corporate entrepreneurship as being to induce and cultivate organisational learning so as to develop organisational capabilities. In this model, the four forms of corporate entrepreneurship conceptualised by Covin and Miles (1999) (Sustained regeneration, organisational renewal, strategic renewal and domain redefinition) are seen as leading to organisational learning that produces new knowledge and competitive advantage.

Definitions that distinguished independent entrepreneurship and corporate entrepreneurship were proposed by Sharma and Chrisman (1999). These definitions were deliberately broad so as to incorporate the definitions of other theoreticians.

“Independent entrepreneurship is the process whereby an individual or group of individuals, acting independently of any association with an existing organization, create a new organization.

Corporate entrepreneurship is the process whereby an individual or a group of individuals, in association with an existing organization, create a new organization or instigate renewal or innovation within that organization” (Sharma and Chrisman 1999 p.18).

In this context, Sharma and Chrisman described (strategic) renewal as

“Strategic renewal refers to the corporate entrepreneurial efforts that result in significant changes to an organization’s business or corporate level strategy or structure. These changes alter pre-existing relationships within the organization and its external environment and in most cases will involve some sort of innovation. Renewal activities reside within an existing organization and are not treated as new businesses by the organization”(Sharma and Chrisman 1999 p.19).

This definition, however, does not provide a mechanism whereby top management can initiate or encourage corporate entrepreneurship. Instead, the role of top managers is limited to responding to the initiatives of others. Top management does not initiate corporate entrepreneurship.

In contrast, the opportunity for top management to initiate corporate entrepreneurship was highlighted by Stevenson & Jarillo (1990, 1986), Guth and Ginsberg (1990) and Day (1994). Stevenson & Jarillo recognised that while it is individuals who carry out entrepreneurship, companies can have an entrepreneurial spirit, and that it is the role of top management to maintain and nurture this spirit. While they ignored the possibility
of top management taking actions to build an entrepreneurial spirit, such a course of action is clearly possible. Similarly, Guth and Ginsberg (1990) observed that top management “may significantly influence the frequency and success of entrepreneurial effort in the firm” (p.6), and Day (1994) found that there are examples of what she describes as upper management and dual-role champions playing a major role in the creation of corporate ventures, where a dual-role champion is simultaneously a product champion and an organisational sponsor. In particular, Day found that a corporate top-management driven process occurred 20% of the time and that the dual-role champion’s combination of knowledge plus power led to dual-role championing being “positively related to radically innovative ventures” (Day 1994 p.168). These views regarding the importance of organisational culture for corporate entrepreneurship are widely shared. (e.g., Covin and Slevin 1991; Kanter 1982; Wolcott and Lippitz 2007).

The impact of culture on corporate entrepreneurship creates an opportunity for an organisation’s top management to stimulate entrepreneurship by manipulating a firm’s culture and organisation systems to induce individuals to act in a more entrepreneurial way (Birkinshaw 2003). Such a manipulation is an extension of Guth and Ginsberg’s (1990) concept of strategic renewal, as adopted by Sharma and Chrisman (1999), which refers to top management decisions that produce new combinations of an organisation’s tangible resources. While actions that lead cultural change are not in themselves a new combination of tangible resources, if the intended result is an environment that leads to entrepreneurial behaviour by middle or front-line managers, then in the same way that strategic renewal is considered to be corporate entrepreneurship, these actions should also be considered to be corporate entrepreneurship.

A key issue in developing a definition of corporate entrepreneurship is the role of innovation. While Schumpeter (2000), Miller (1983), Burgelman (1983a), and Guth and Ginsberg (1990) regard it as central, Sharma and Chrisman (1999) instead regard innovation as a “sufficient condition for entrepreneurship but not a necessary one” (p.18), so that “it is preferable to treat innovation as an entrepreneurial act rather than as the only act that makes the occurrence of entrepreneurship possible” (p.18).
Sharma and Chrisman (1999) adopt this approach as conventional definitions of entrepreneurship are difficult to apply in situations where the consequences of an act, such as adopting a new organisational form or a new process, do not result in a product that can be sold or consumed. While excluding innovation from the construct of corporate entrepreneurship provides a convenient solution to this difficulty, two consequences warrant doing so being challenged. Firstly, it suggests that all new ventures constitute corporate entrepreneurship regardless of whether innovation is involved. That is, the establishment of a new venture might constitute corporate entrepreneurship, independent of the venture’s purpose. For example, it is questionable whether establishing a venture that replaces an existing venture constitutes entrepreneurship. Second, defining entrepreneurship as the completion of the act, as opposed to the act itself, whether it is the establishment of a new venture or completion of a strategic renewal excludes unsuccessful attempts to do the same thing. If entrepreneurship is defined as an act, as opposed to an outcome, definitions of entrepreneurship will provide for unsuccessful initiatives.

In Section 2.2.1 of this document, entrepreneurship was defined as “the innovative reallocation of resources to achieve a desired outcome.” This definition represents a starting point for developing a definition for corporate entrepreneurship.

A broader definition of innovation than is used for independent entrepreneurship is proposed. Whereas the focus of independent entrepreneurship is innovations that add value to an external market, corporate entrepreneurship, by its nature, also includes innovations that add value to an organisation internally. For example, a new ‘internal combination’ may lead to a more efficient organisational form or process. Innovation in this context is defined in Schumpeterian terms as the introduction of new technical methods, new products, new sources of supply and new forms of industrial organisation, where the innovation may be new to the company as opposed to the market as a whole.

Entrepreneurship, and hence corporate entrepreneurship involves actions aimed at a desired outcome. Neither requires the desired outcome, rather they are defined by the
act of making a new combination with the objective of the desired outcome. These new combinations may or may not lead to the desired outcome.

Corporate entrepreneurs who make new combinations will generally seek either one, or both, of organisational growth and improved competitive position. Their initiatives may or may not be successful.

Corporate entrepreneurship initiatives can be classified as belonging to one of two types. The first type involves a new combination of productive assets such as the establishment of a new venture or the allocation of assets to a new activity. Corporate entrepreneurs who are ‘front-line champions’ typically lead these initiatives. These champions are typically middle and product managers, though as shown by Day (1994), they may also be upper-level managers. This type is labelled front-line corporate entrepreneurship.

The second type of initiative involves high-level changes to the organisation that are designed to encourage front-line entrepreneurship, such as changes to the organisation’s structure or its culture. Corporate entrepreneurs who initiate such changes are likely to be upper level managers. This type is labelled top-down corporate entrepreneurship.

The following definition of corporate entrepreneurship is proposed. It specifies that corporate entrepreneurship is an innovative process, and provides for both top-down and front-line entrepreneurship:

Corporate entrepreneurship is the process whereby an individual or a group of individuals, in association with an existing organization, make an innovative reallocation of organisational resources, to either grow or renew that organization.

In the context of corporate entrepreneurship, ‘innovative’ is characterised as relating to introduction of new products, technical methods, sources of supply, and forms of industrial organisation in either an external market or in the internal corporate
environment. An innovative reallocation of organisational resources may involve new combinations of either the tangible or the intangible assets of the organisation.

2.4.2 Forms
Corporate entrepreneurship initiatives can be characterised as belonging to one of five forms: External Corporate Venturing, Internal Corporate Venturing, Intrapreneurship, Strategic Renewal, and Cultural Renewal. The first three of these can be characterised as **Front-line Corporate Entrepreneurship**, while the remaining two can be characterised as **Top-down Corporate Entrepreneurship**. Front-line corporate entrepreneurs, whose closeness to an organisation’s existing and potential markets allows them to identify opportunities, drive Front-line Corporate Entrepreneurship. Senior managers, who aim to encourage entrepreneurial behaviour, drive Top-down Corporate Entrepreneurship.

The success of a corporate entrepreneurship initiative depends on its promoters overcoming the resistance of management to the “acceptance of new technological ideas, even good ones” (Schon 1963 p.82). Such resistance is desirable as it presents a barrier to the organisation “perpetually and fruitlessly shifting gears” (p.82).

Schon (1963) proposed that a **champion** is required if a major innovation is to be successful, and suggested two strategies that would support such champions. The first of these he described as ‘the establishment of a pilot operation,’ comprising a small team led by a product champion, that would manage innovations through their preliminary development and promote them through the informal channels of an organisation. The second was the establishment of a new division, loosely related to the existing corporate structure, which would likewise be led by a product champion.

Front-line corporate entrepreneurship involves strategies that mirror those suggested by Schon. It seeks to overcome organisational resistance to change by replicating the environment and culture of independent start-ups through stand-alone ventures or by supporting environments where managers are encouraged to behave in an entrepreneurial way. These managers can come from any level of an organisation (Day
The establishment of stand-alone ventures is labelled *Corporate Venturing* (Biggadike 1979) while the practices of individual employees behaving entrepreneurially is labelled *Intrapreneurship* (Pinchot 1985). The distinction between corporate venturing and intrapreneurship is not always clear as the champion who leads a corporate venture is sometimes identified as an *Intrapreneur* (Day 1994).

*Corporate Venturing* is the creation of a business venture, by an established organisation, that is separated from the existing organisation and is either autonomous or semi-autonomous to the organisation’s mainstream business. The new venture may follow from or lead to innovations that exploit new markets, or new products or both (Sharma and Chrisman 1999). The structure and conduct of corporate ventures evolved during the 1970s as organisations sought to create an environment, where business managers could grow businesses, that was similar to that in a independent venture, while at the same time allowing the new business access to the organisation’s existing resources (Ansoff and Brandenburg 1971; Block 1982; Burgelman 1984).

Decisions as to how much to invest, and how much autonomy to give a particular venture are likely to be make at the top level of the organisation. Such decisions can result in a new venture being embedded within an existing organisational unit, reporting directly to top management, or established as an independent venture with its own board. Corporate ventures can accordingly be described as *Internal Corporate Ventures* or *External Corporate Ventures* depending upon whether the venture resides within or outside the existing organisational entity (Sharma and Chrisman 1999).

*External Corporate Ventures* are new ventures that operate at arms-length from the existing organisational entity as semi-autonomous or autonomous organisational entities that involve external parties in an equity or non-equity relationship (Schildt et al. 2005; Sharma and Chrisman 1999).

They are established through a range of mechanisms including joint ventures, spin-offs and venture capital initiatives. The relationship with the established organisation can
either be formal, for example, via board representation, or informal, such as via a mentoring relationship (Sharma and Chrisman 1999).

Research has shown that independent new ventures reach profitability twice as quickly and end up twice as profitable as internal corporate ventures. The reason for this was hypothesised as being because many organisations do not have the required experience and skills in-house, and are unable to provide a new venture with the required support whereas external corporate ventures have venture partners with the compensating skills required to avoid some of the obstacles (MacMillan et al. 1986).

The downside of this approach is that an external corporate venture will have less access to the resources of its shareholder organisations and may have trouble maintaining long-term support from those organisations (Burgelman 1983b).

Conversely, an advantage of an external corporate venture’s independence from its shareholder organisations is that if its shareholders become disenchanted with the venture, its independence allows it to seek funds from external sources.

*Internal Corporate Ventures* are organisational entities that operate within an existing organisation (Sharma and Chrisman 1999). They are established in recognition that mature organisations have inherent barriers to entrepreneurship that discourage individual initiative, integrated solutions and flexibility. Conversely, internal corporate ventures encourage corporate entrepreneurship by giving the managers of a venture the autonomy, motivation and resource discipline required for effective entrepreneurship (Bouchard 2002).

Internal corporate venturing can be an integral and continuous part of the strategy making process. If so, they will be a result of strategic decisions by top management to establish a source of strategic renewal for the organisation that will enable the organisation to meet its growth objectives. However, if as is often the case, top management treats an internal venture as “insurance against poor mainstream business prospects” (Burgelman 1984 p.43) they are unlikely to work well and are likely to be
Intrapreneurship involves an organisation’s employees behaving entrepreneurially. It refers to situations where individual managers champion new product ideas and, if necessary, bypass an organisation’s bureaucratic barriers. While the term intrapreneurship was introduced by Pinchot (1985), the concept was similar to what had been described as the objective of product and innovation champions (Covin and Miles 1999).

Pinchot (1985) created a large amount of interest in the concept with his work Intrapreneuring. While the focus of that book is how an individual can behave entrepreneurially within a corporate environment, it also provides some guidelines as to how management can encourage entrepreneurial behaviour within an organisation. Pinchot challenges employees to identify an opportunity, build institutional support, form cross functional teams and then establish a new intraprise, while he encourages management of the organisation to step back and allow the intrapreneurs in the organisation to follow such a path:

While Pinchot sees the new business as being established within an existing organisation, he does not address whether a new business should be structured as an internal stand-alone venture. Using Pinchot’s definitions as a starting-point, an intraprise and a corporate venture can be distinguished by whether the new venture is managed as a separate entity.

The two other forms of corporate entrepreneurship relate to establishing firm wide environments that are conducive to entrepreneurship. These can be categorised as top-down corporate entrepreneurship. The first of these, strategic renewal involves changes to an organisation’s strategy or structure that produce a new combination of an organisation’s assets. The second, cultural renewal, involves changes to a firm’s culture and organisations systems to induce individuals to act more entrepreneurially.
A definition of strategic renewal was provided by Sharma and Chrisman (1999) in their review of corporate entrepreneurship:

“Strategic renewal refers to the corporate entrepreneurial efforts that result in significant changes to an organization’s business or corporate level strategy or structure. These changes alter pre-existing relationships within the organization or between the organization and its external environment and in most cases will involve some sort of innovation. Renewal activities reside within an existing organization and are not treated as new businesses by the organization” (Sharma and Chrisman 1999 p.19).

The provision that strategic renewal need not involve innovation conflicts with the definition of corporate entrepreneurship that has been adopted for this study whereby strategic renewal is characterised as involving innovation, while that renewal without innovation is labelled ‘strategic reorganisation.’

A similar construct to strategic renewal using the term Bringing the Market Inside was described by Birkinshaw (2003). He described the use of structural changes to encourage entrepreneurial behaviour and referred to the adoption of practices used by “Silicon Valley” firms including spin-offs and corporate venture capital operations to promote entrepreneurship. Similarly, Hamel (1999) described strategic renewal as using structure to introduce entrepreneurship in the face of cultural barriers, while Phan et al. (2009) proposed that strategic renewal should include business model reconstruction.

Cultural renewal refers to a top-management led entrepreneurial change that produces an ‘entrepreneurial’ culture that permeates an entire organisation’s outlook and operations. Such a culture is necessary to foster the collaboration and teamwork required if an organisation’s middle managers are to contribute to successful innovation (Kanter 1982). The concept has had other labels including ‘entrepreneurial management,’ ‘entrepreneurial posture,’ ‘entrepreneurial orientation,’ ‘firm level
entrepreneurship,’ ‘entrepreneurial transformation,’ and ‘entrepreneurial strategy making’ (Birkinshaw 2003; Covin and Miles 1999).

Similarly, corporate entrepreneurship was described by Covin and Slevin (1991) as a behaviour that should be managed at a firm-level “through the creation of particular organizational strategies, structures, systems and cultures so that the entrepreneurial process can be viewed as much less serendipitous, mysterious, and unknowable” (p.8).

The implementation of a permanent change in culture that leads to increased middle management innovation and entrepreneurship is likely to require a high level of commitment by senior management over a long period (Birkinshaw 2003). While many organisations attempt such a change, the reality is that the long time frames required for a cultural change to become permanent makes such a change difficult to implement in light of the variations in financial performance and the changes in an organisation’s management that will occur over the period that such a change is being embedded (Bouchard 2002).

### 2.4.3 Progression

The five forms of corporate entrepreneurship require different levels of organisational skill and commitment, in terms of *Administrative linkages* (reporting relationships, planning-budgeting jurisdiction and the like), as well as *operational linkages* (lateral, work related, and professional) (Burgelman 1983b p.1362) for their success.

Consequently, an evolutionary path for corporate entrepreneurship can be mapped out that reflects how as an organisation gains experience, builds skills and increases its commitment it is able to progress to the more demanding forms of corporate entrepreneurship with potentially greater benefits.

The starting point for corporate entrepreneurship is that corporate management must perceive there is a need for entrepreneurship in the organisation’s development. (Burgelman 1983b).
If corporate management has such a perception, but is concerned that the organisation has few entrepreneurial skills, it may seek to build skills while limiting its exposure to entrepreneurial initiatives, by investing in external corporate ventures that rely on the skills of other parties for their success (MacMillan et al. 1986). Although some companies, for example Nokia and Intel, have been very successful following this approach, this strategy is often unsuccessful. Success appears to depend on having the required skills and clear objectives (Campbell et al. 2003).

The top management of an organisation that has confidence in its ability to manage entrepreneurial initiatives may take actions to encourage entrepreneurial behaviour by its front-line staff. Examples of such actions, described as strategic renewal, include provision of additional ‘slack’ in front-line resources, recruiting entrepreneurial front-line staff, introducing incentives that encourage entrepreneurial behaviour, or agreeing to sponsor projects that have been proposed by front-line entrepreneurs. Strategic renewal is likely to be irregular and will only occur if management is confident that the organisation has the skills required to identify and exploit opportunities. Strategic renewal does not lead to management initiating corporate entrepreneurship, rather it creates an environment where there is capacity for corporate entrepreneurship (Burgelman 1983a).

DuPont’s Market Driven Growth Program is an example of strategic renewal. Senior management established this program to facilitate the identification and development of growth opportunities. The program does this by providing front-line employees with the resources and skills required to develop and present business plans for senior management approval (Wolcott and Lippitz 2007).

Management’s willingness to initiate strategic renewal depends on it being confident that front-line staff have the skills and motivation to generate proposals, and that senior managers have the skills to evaluate those proposals and manage the development of new businesses. If this confidence does not exist within the organisation, management can acquire the required skills from its external corporate ventures or by recruiting managers who have worked in unrelated entrepreneurial ventures.
Strategic renewal may lead to *intrapreneurship* by front-line managers who respond to top-down encouragement by identifying opportunities and establishing new businesses. Pinchot (1985), who introduced the term intrapreneurship, described intrapreneurs as individuals who started new ventures within an existing organisation. While he proposed that intrapreneurs would be prepared to work around organisational barriers to initiate corporate entrepreneurship, he recognised the reality that ongoing intrapreneurship needs the support of top management.

The establishment of an *internal corporate venture* requires that top-management agrees to the establishment of a new entity and the commitment of company resources to that entity. This implies a higher level of commitment than for intrapreneurship and will require top-management confidence that the organisation has the skills required to manage such a venture. Successful intrapreneurship will contribute to this confidence.

A senior management team that believes that ongoing corporate entrepreneurship and innovation is required for an organisation’s corporate survival might pursue *cultural renewal*. This strategy, as illustrated by Whirlpool’s experience (Hamel 2006a), involves major changes to the company’s management processes and corporate culture, and may require a change program running over five or more years (Hamel 2006b).

Figure 2.3 illustrates this evolution. If the senior management of an organisation increases its commitment to entrepreneurship and in parallel the organisation builds the required entrepreneurship skills, it will be able to access the more demanding forms of corporate entrepreneurship.
This progression is not always successful. Organisations attempting to grow by entering new business often fail because they mismanage the venturing process; they are too risk-adverse; their cultures are inappropriate; they fail to provide sufficient incentives; and they involve the wrong managers (Campbell and Park 2004).

2.4.4 Characterization
While the description of forms of corporate entrepreneurship assists identification of the actors involved and the type of actions they take, it does not show the decision-making styles, methods and practices they employ. That is, it reflects what is done rather than how it is done (Lumpkin and Dess 1996; Wiklund and Shepherd 2005).

A focus of entrepreneurship research has been to characterize the processes, practices and decision-making activities associated with corporate entrepreneurship. The extent of corporate entrepreneurship can then be estimated by assessing each of these characteristics. Such a characterization is useful as it allows the relationship of entrepreneurship to performance to be investigated (Lumpkin and Dess 1996).
Research reported by Miller and Friesen (1978) related environment, organisation and strategy-making characteristics to the performance of 81 firms. In this study, 11 strategy-making variables were identified as useful for explaining corporate adaptive behaviour. Three of these, analysis, risk taking and proactiveness were associated with successful *entrepreneurial conglomerates*, while product-market innovation, proactiveness of decisions, expertise and consciousness of strategy, were associated with successful *innovators*.

Subsequently, Miller (1983) operationally defined ‘entrepreneurial orientation’ (EO) by characterizing corporate entrepreneurship as a uni-dimensional construct encompassing a composite weighting of ‘innovativeness,’ ‘risk-taking’ and ‘proactiveness,’ and developed a scale for their measurement (Covin and Slevin 1989). These dimensions have subsequently been identified and used consistently in the literature (Rauch et al. 2009).

“‘Innovativeness’ is the predisposition to engage in creativity and experimentation through the introduction of new products/services as well as technological leadership via R&D in new processes. ‘Risk taking’ involves taking bold actions by venturing into the unknown, borrowing heavily, and/or committing significant resources to ventures in uncertain environments. ‘Proactiveness’ is an opportunity-seeking, forward looking perspective characterized by the introduction of new products and services ahead of competition and acting in anticipation of future demand” (Rauch et al. 2009 p.763).

An alternative construct, also labelled ‘entrepreneurial orientation’ was developed by Lumpkin and Dess (1996) from their review of the literature. This construct adds ‘autonomy’ and ‘competitive aggressiveness’ to the three characteristics adopted by Miller (1983), and is a multi-dimensional construct. As such it is not essential that any one of the five characteristics is present (Rauch et al. 2009).
“‘Competitive aggressiveness’ is the intensity of a firm’s effort to outperform rivals and is characterized by a strong offensive posture or aggressive responses to competitive threats. ‘Autonomy’ refers to independent action undertaken by entrepreneurial leaders or teams directed at bringing about a new venture and seeing it to fruition” (Rauch et al. 2009 p.763).

The difference in the definitions of entrepreneurial orientation presented by Miller (1983) and Lumpkin and Dess (1996) is a consequence of differences in how they characterise entrepreneurship. Lumpkin and Dess’s (1996) starting point is that “the essential act of entrepreneurship is new entry”( p.136), while Miller (1983) takes a broader view that entrepreneurship is “the process by which organizations renew themselves and their markets”( p.770). That is, while Lumpkin and Dess characterise entrepreneurship by its outcome, Miller considers it to be a process.

A comparison of these approaches to characterizing entrepreneurship shows that Lumpkin and Dess (1996) propose a multi-dimensional construct to characterize actions producing a specific outcome, while Miller (1983) proposes a uni-dimensional construct to characterize a broadly defined process.

Miller’s approach is supported by a review of 23 prominent studies on the entrepreneurial orientation construct published by Kreiser et al. (2002). This review showed that most researchers (19) adopted a uni-dimensional construct, while only a small number (2) used a multi-dimensional construct. The analysis also showed that the dimension of risk taking was included 18 times, proactiveness 18 times, innovation 20 times, centralisation twice, while nine other dimensions including the characteristics included by Lumpkin and Dess (1996), autonomy and competitive aggressiveness, were only included once.

A different conclusion was reached following a study of over 1000 firms operating in six countries by Kreiser et al.(2002). This study showed strong empirical support for a multidimensional construct with the sub-dimensions of innovation, proactiveness and risk taking, and led its authors to question the validity of the earlier work by Miller.
(1983) and Covin and Slevin (1989) that suggested that the three sub-dimensions of the entrepreneurial orientation measure co-vary with one another. It also showed that incorporating the two additional characteristics proposed by Lumpkin and Dess into the entrepreneurial orientation construct offered little advantage over the three characteristics proposed by Miller (1983).

Covin et al. (2006) observed that there is empirical support for both the uni-dimensional construct of entrepreneurial orientation proposed by Miller and the multi-dimensional construct proposed by Lumpkin and Dess. They suggested that the reason for this is differences in what the authors define as an entrepreneurial firm. They observed that while Miller “reserved the label of ‘entrepreneurial’ for firms that are concurrently risk taking, innovative, and proactive” (p.80), Lumpkin and Dess characterised a firm as entrepreneurial if it was “high on ‘some’ dimensions, but not necessarily high on any particular dimension” (p.80). Consequently, while “Miller originally proposed the construct of EO as a formative construct, i.e. as a construct that cannot be decomposed into its constituent elements (because in doing so, the construct ceases to exist)” (p.80), Lumpkin and Dess described it as a multi-dimensional construct.

The implication of this analysis is that the choice of entrepreneurial orientation construct for a particular situation will depend on the definition of entrepreneurship that applies to that situation. For this study, corporate entrepreneurship is defined as follows:

*Corporate entrepreneurship is the process whereby an individual or a group of individuals, in association with an existing organization, make an innovative reallocation of organisational resources, to either grow or renew that organization.*

Accordingly, as this definition of corporate entrepreneurship specifies that it is a process that is by definition innovative, as “firms which pursue corporate entrepreneurship are proactive by definition” (Zahra and Covin 1995 p.47), and as any innovative reallocation of resources is likely to necessitate risk-taking, the most
appropriate characterization of entrepreneurship is Miller’s uni-dimensional construct whereby entrepreneurship is characterized by innovation, proactiveness and risk-taking.

2.4.5 Relationship with Organisational Performance

2.4.5.1 Overview
While academic interest in corporate entrepreneurship has been driven by its promise as a means of revitalising companies and improving their financial performance through the birth of new businesses and strategic renewal (Guth and Ginsberg 1990; Zahra 1991), the need to determine how entrepreneurship and performance are related has long challenged researchers (Rauch et al. 2004; Zahra and Covin 1995).

The difficulty they face is a consequence of five significant challenges that complicate the relationship between corporate entrepreneurship and firm performance: characterising the extent of a firm’s corporate entrepreneurship, establishing causality, determining how the relationship varies over the long term, identifying and measuring the consequences of corporate entrepreneurship, and identifying moderating factors.

2.4.5.2 Extent
While studies before the 1990s adopted a range of approaches to characterize the extent of corporate entrepreneurship including an ‘entrepreneurial posture scale’ and the ‘measurement of R&D spending’ (Zahra and Covin 1995), the adoption by Zahra and Covin (1995) of Miller’s (1983) broadly defined operationalisation of corporate entrepreneurship, subsequently labelled entrepreneurial orientation, led to an accepted standard that has been widely adopted as “a viable instrument for capturing firm-level entrepreneurship” (Wiklund 1999 p.38).

This was confirmed by the findings from a meta-analyses of 51 studies by Rauch et al. (2004; 2009), that explored the relationship between entrepreneurial orientation and firm performance, and the influence of the three dimensions of entrepreneurial orientation characterised by Miller (1983) and the two characterised by Lumpkin and Dess (1996) on the efficiency of the construct.
Rauch et al.’s (2009) meta-analysis supported the design of entrepreneurial orientation as a uni-dimensional construct, and that its three dimensions (innovation, risk-taking, and proactiveness) are of equal importance. However, it was unable to confirm support for a multi-dimensional construct incorporating the additional dimensions proposed by Lumpkin and Dess, as there were not enough studies in the sample using this construct for the required analysis.

The structure of Rauch et al.’s (2009) study highlights the inherent limitation associated with using Miller’s (1983) model of entrepreneurial orientation construct to characterise corporate entrepreneurship. The key focus of the study was to confirm the relationship between entrepreneurial orientation construct and firm performance. Once this was done the relationship of the individual dimensions of the entrepreneurial orientation construct were related to firm performance. That is, corporate entrepreneurship was characterised using the entrepreneurial orientation construct, the impact of corporate entrepreneurship was determined by relating entrepreneurial orientation to firm performance and then, the component dimensions of the entrepreneurial orientation construct were validated by measuring their relationship with performance. Essentially corporate entrepreneurship was characterised by a construct with specific components, and then the components of the construct were revised to maximize the impact of the construct. By way of contrast, this limitation does not apply to the Lumpkin and Dess (1996) model as corporate entrepreneurship is defined independently of the construct.

Rauch et al.’s (2009) study highlights that while consensus is being reached as to the construct of, and scales for the measurement of entrepreneurial orientation, there is still debate about its relationship to performance. Furthermore, the observation is made that while a large number of studies have found that businesses that adopt a more entrepreneurial orientation perform better, other studies have been unable to find a significant link or have found an association with poor performance. Essentially they mirror the earlier concerns of Wiklund (1999).
Despite the success and popularity of Miller’s and Covin and Slevin’s operationalization, this measurement scale has its weaknesses. Researchers disagree on how to label the scale and what type of concept it really represents. This is probably because the actual items represent a mix of past behaviours and current attitudes” (Wiklund 1999 p.38).

2.4.5.3 Causality

The second challenge has been to determine the nature of the relationship between performance and corporate entrepreneurship. That is, does corporate entrepreneurship lead to improved performance, or do companies with superior performance adopt entrepreneurial behaviour because of increased resource availability and security (Rauch et al. 2009).

There is also the possibility that both entrepreneurial orientation and firm performance are consequences of another organisational factor, for example corporate strategy (Zahra and Covin 1995).

2.4.5.4 Long-term Impact

The reliance of a majority of studies exploring the relationship between corporate entrepreneurship and company performance on a ‘snapshot’ of a firm’s entrepreneurial orientation and a short-term assessment of an organisation’s performance is potentially flawed as longer term analysis is required as “we do not know if EO affects performance over an extended period of time or if it is a ‘quick fix’ where performance is temporarily affected” (Wiklund 1999 p.37). In particular, this may ignore the reality that in many cases an entrepreneurial investment will have a long-term horizon, and that the extent of entrepreneurial commitment and financial outcome may need longer term evaluation if the relationship between them is to be understood (Zahra and Covin 1995).

The long-term nature of the relationship was supported by Zahra and Covin’s (1995) finding from a study of 109 medium and large US companies that “the strength of the relationship tends to grow over time” (Zahra and Covin 1995 p.55).
There is also the possibility that corporate entrepreneurial initiatives may be abandoned prematurely. Clearly, in such cases, the data that is collected can only reflect actual, and will ignore potential outcomes (Zahra and Covin 1995).

2.4.5.5 Performance Measurement

Researchers also face the challenge that it may not be possible to measure the performance impact of a corporate entrepreneurship initiative, as performance is a multidimensional construct that in some cases may not be available, while in others may not be measurable.

The multidimensional nature of the construct means that corporate entrepreneurship may produce a favourable outcome on some dimensions and an unfavourable outcome on others, so that research focusing on a single dimension may not recognise the overall impact (Lumpkin and Dess 1996).

The research also needs to recognise that the objective of a corporate entrepreneurial initiative may be non-financial. For example, the owners or managers of a business may be motivated by a desire to improve the reputation of the firm by building goodwill (Lumpkin and Dess 1996).

In other situations, research may be distorted by owners who are prepared to provide a snapshot of firm performance are reluctant to share the longer-term picture (Wiklund 1999).

Despite, or perhaps because of, the recognition of these challenges, many studies have relied on measures of performance for which information is easy to gather as opposed to offering a meaningful measure of performance (Wiklund 1999).

Overall, the literature recognises that it is difficult to identify and obtain the performance information required to accurately assess a firm’s corporate entrepreneurship initiatives. This suggests that the quality of some findings is questionable.
2.4.5.6 Moderators

The fifth challenge is the impact of “third variables” on the corporate entrepreneurship – performance relationship. Such variables cause moderating effects, mediating effects, independent effects and interaction effects (Lumpkin and Dess 1996). They are likely to be important as in the magnitude of the correlation between entrepreneurial orientation and performance that is found across studies is beyond that which could be explained by sampling error (Rauch et al. 2009).

Factors that have been shown to moderate the relationship between entrepreneurial orientation and performance relationship include: Organisation structure and degree of vertical integration (Lumpkin and Dess 1996); measures of success, type of criterion, type of EO assessment, size of business, technological intensity, and national culture (Rauch et al. 2004; Rauch et al. 2009); strategic process considerations (Covin et al. 2006); learning orientation (Wang 2008); strategic behaviour (Moreno and Casillas 2008); and availability of funding and environmental stability (Frank et al. 2010).

2.4.5.7 Implications

The research provides considerable evidence that company performance is associated with entrepreneurial orientation with the association being moderated by an organisation’s internal and external context. That is, entrepreneurial orientation by itself is not sufficient for a company to achieve superior performance. The research suggests that the success of a company’s entrepreneurship will be influenced by many factors including whether the organisation’s external environment is dynamic or hostile and whether the organisation's internal environment is characterized by such things as autocratic management, access to resources, has strategic process that are conducive to entrepreneurship, or has a learning orientation.

A review of the recent literature shows that models explaining the relationship between entrepreneurial orientation and performance relationship are progressively increasing in complexity. Researchers continue to look for new relationships that can be identified by analysing the available databases in new ways. While their discoveries lead to more
complicated models that are supported by statistical analysis showing a superior fit to those previously used, the value of such work is questionable.

The ultimate conclusion is predictable, the impact that entrepreneurial orientation has on performance will be shown to depend on the specific circumstances being investigated and will be relevant to businesses in an identical circumstance. The usefulness of such models is clearly limited by our ability to find identical circumstances in a field where few situations are alike.

Perhaps, the presence of an entrepreneurial orientation is similar to the presence of an independent entrepreneur. An entrepreneur’s presence can influence but cannot guarantee the performance of a new venture as success is dependent on a myriad of internal and external factors and is uncertain. Similarly, while research shows that improved company performance is associated with an entrepreneurial orientation, the cause of such performance is uncertain, as it too is dependent on a myriad of internal and external factors.

In conclusion, the association between corporate entrepreneurship and performance is murky. The existence of corporate entrepreneurship as indicated by an entrepreneurial orientation is associated with superior performance. However, as corporate performance is dependent on many internal and external factors including entrepreneurial orientation, entrepreneurial orientation is of limited value for predicting performance in an individual case.

2.5 THE BOARD OF DIRECTORS

"Most of the work done by a board takes place in the privacy of the boardroom. That is where directors among themselves and with management, offer advice, access proposals, and make decisions. Rarely, if ever, does any information on how the
members contribute as individuals or work together as a group escape to the world outside” (Carter and Lorsch 2003 p.163).

2.5.1 Background

The board of directors of a corporation is a group of people who are legally responsible for the management of the corporation on behalf of its shareholders. Generally, a board does this by delegating the day-to-day management of the company to executives, whose performance it monitors (Millstein and MacAvoy 1998).

Company law, stock exchange regulations and articles of association typically require that companies have boards, and specify how boards should operate. For example, there are provisions that boards have a minimum number of members, meet on a regular basis, report to shareholders, and have a minimum number of directors who are independent of management (Hermalin and Weisbach 2003).

The board is the formal representative of the shareholders. Its objective is to ensure that management’s decisions are aligned with the interests of the shareholders. Boards generally achieve this through commonly accepted standard activities that are designed to ensure that they fulfil their responsibilities to shareholders including: approving the company’s strategy, plans and budgets, and monitoring its performance against them; approving major capital transactions; ensuring accuracy and transparency of financial statements; managing selection, ongoing evaluation and succession of the CEO; managing senior executive compensation; ensuring compliance with statutory obligations; and managing the board’s performance and membership (Carter and Lorsch 2003 p.60).

While boards of directors are a product of regulation, there is evidence that boards generate value beyond fulfilling an organization’s need to satisfy regulatory requirements. Firstly, their existence predates regulations requiring their existence; second, boards are generally much larger than required by law; and third, there are no examples of jurisdictions that have eliminated boards (Hermalin and Weisbach 2003).
Despite the perception of agreement as to board activities and responsibilities, Carter and Lorsch (2003) suggest that in reality a board’s interpretation of its role will be a product of its history and traditions and the individual views of its members. They observe that as these may not reflect a board’s current circumstances, a board’s choice of its role may be inconsistent with a company’s needs.

While legally, individual directors are elected to the board by shareholders, the separation of ownership and control that occurred over the first half of the 20th century led, in many jurisdictions, to managerial dominance of boards. This situation, which led to a “collegial relationship” between management and the board, survived until the mid 90’s when the growth in cross-border capital flows, combined with investor crises, led to global pressure for improved corporate governance. In response, the boards of large publicly traded companies evolved from being managerial rubber stamps to being active and independent monitors of management performance (Carter and Lorsch 2003; Millstein and MacAvoy 1998).

Despite these prescriptions for better governance, there remains a need to understand the determinants of board success, so that boards can be designed in ways that encourage behaviour that has a positive impact on corporate performance. Consequently, the focus of research on boards is to understand the perspective of company directors, the roles adopted by boards and how these perspectives and roles are linked to performance.

The challenge facing researchers is that because of board secrecy and the nature of board processes it is not possible to measure a board’s behaviour or the extent to it performs its roles. As a result, the breadth of research into boards has been limited by pragmatic decisions to focus on those board attributes that are expected to reflect director perspectives and board roles that can be measured.

2.5.2 Perspective
While the board of a start-up company that is owned by its founding managers and those who have invested in it, usually has a clear sense of shareholder expectations and
therefore the role of the board, this is unlikely to be the case for the directors of a large, established public company. “It is easy to get a list of a company’s fifty largest shareholders, but that is not the same as understanding whether they have common investment goals” (Carter and Lorsch 2003 p.72).

In the absence of shareholder guidance, a board’s view of its role will depend on its perspective. If a board’s perspective is that its role is purely to satisfy its legal obligations, its role will be clear. However, as most boards see themselves as having a broader role than corporate governance, their perspective will be broader than that specified by their legal obligations.

Six board perspectives are commonly identified in the literature, agency theory, stewardship theory, resource dependence theory, class-hegemony theory, managerial-hegemony theory, and stakeholder theory (Hendry and Kiel 2004; Hung 1998; Stiles and Taylor 2001; Zahra and Pearce 1989). They are addressed in turn:

- **Agency Theory**, which is predicated on the belief that individuals act on the basis of economic self-interest, is one of the more widely accepted of the six perspectives (Lynall et al. 2003; Muth and Donaldson 1998; Zahra and Pearce 1989).

Under this perspective, the board of directors is seen as solving the agency problem that exists between diffuse shareholders who are unable to control management and management who may be biased towards its own self-interest. While this problem could in theory be addressed using contracts, the question would then arise as to who would design and manage such contracts to ensure an optimal relationship (Hermalin and Weisbach 2003):

Zahra and Pearce (1989) identified three shortcomings with an agency theory perspective. Firstly, the perspective assumes that CEOs will put self-interest ahead of shareholder interest; second, there is a lack of support for the assumption that directors do a credible job monitoring CEO and senior executive performance; and
third, the absence of evidence that boards are involved in the development of strategy.

These shortcomings are consistent with Daily et al.’s (2003) observation that there is no evidence that boards are being designed to meet the prescriptions of agency theorists. That is, if boards were to adopt an agency theory perspective, they would be active in strategy development and control.

- **Stewardship Theory** regards managers and directors as “stewards” as opposed to the self-interested economic rationalists of agency theory. It recognises that individuals are motivated by non-financial needs such as “the need for achievement and recognition, the intrinsic satisfaction of successful performance, respect for authority and the work ethic” and that individuals “when confronted with a course of action seen as personally unrewarding, may comply based on a sense of duty and identification with the organization” (Muth and Donaldson 1998 p.6).

If a stewardship perspective is adopted, the appointment of executive directors is favoured as the combination of executive’s personal commitment and knowledge of the business should lead to effective management and with board taking an active strategy role (Muth and Donaldson 1998).

Stewardship theory is criticized because it ignores the impact of board dynamics, the perceptions of individual members and the effect of leadership. That is, “it does not reflect the interplay of power, conflict, and ideology” (Hung 1998 p.107).

- **The Resource Dependence** perspective assumes that directors provide a company with skills, credibility and access to business networks. It is grounded in sociology and organizational theory and views boards as having a broader role than provided by the legalistic perspective.

The perspective suggests that the relationships created and enhanced by the board assist the company by enhancing the firm’s legitimacy and by sourcing knowledge
and resources required for the company to achieve its financial and operational goals. Research on interlocking directorates, one example of resource dependence, shows that they reduce uncertainty, enhance the status of the firm, and can reduce transaction costs (Lynall et al. 2003; Zahra and Pearce 1989).

Theoretically, the effectiveness of a board, within this perspective, will depend on: the characteristics of the prevailing external environment, where a company is in its lifecycle, and whether the firm is a for-profit or a not-for-profit firm. This dependence limits the credibility of this perspective as a board may lose its ability to contribute as the environment evolves or as the company matures (Lynall et al. 2003; Zahra and Pearce 1989).

- The Class Hegemony perspective, also labelled Institutional Theory, suggests that the role of the board is to ensure that company actions are consistent with societal norms. According to this perspective, boards decisions about CEO selection and compensation will be influenced by the values of the general and investor communities (Lynall et al. 2003).

Class Hegemony, although ideologically attractive to some groups, has limited support as it does not address how the board can increase the wealth of shareholders, it is not based on actual corporate governance practices, and it ignores changing patterns of ownership whereby broadly held institutions own a large part of firms (Zahra and Pearce 1989).

- The Managerial Hegemony perspective, labelled by Zahra and Pearce (1989) as the Legalistic Perspective, provides that companies are dominated by management and that the board’s role reflects its legal responsibilities as specified by a company’s constitution and corporate law.

Stiles and Taylor (2001) identified four arguments that support this perspective. Firstly, the separation of ownership and control transferred the power to manage the firm from shareholders to management; second, only managers have the intimate
knowledge required to control a firm; third, management’s dependence on shareholders for growth funding has decreased; and fourth, management has significant influence, if not control, over director and CEO appointments.

The utility of this perspective is questioned at one extreme by research that shows that boards do not always fulfil their legally mandated responsibilities, and at the other, by examples of boards having a higher level of involvement than dictated by their legal obligations (Zahra and Pearce 1989). The viability of this perspective is also challenged by higher concentrations of ownership and interlocking directorships (Stiles and Taylor 2001).

- A Stakeholder Perspective assumes that boards adopt a “pluralistic approach,” as they represent the interests of the various members of the ‘firm’ including “employees, customers, suppliers, stockholders, banks, environmentalists, government” (Hung 1998 p.106). While this perspective has broad political appeal, it is widely recognised as being impractical for company management (Sternberg 1997).

While each of these perspectives has supporters, the recognition that other perspectives have theoretical and empirical merit has led to the view that a range of perspectives should be accommodated in any integrative model (Lynall et al. 2003; Zahra and Pearce 1989).

Lynall et al. (2003) proposed that a board’s perspective depends on how far along Quinn & Cameron’s (1983) four stage model of the organizational lifecycle a company is, when its board is established, as a board’s perspective will be a consequence of the power levels of the CEO and the organization’s financiers that occur at each stage. Using this framework, boards established during the entrepreneurial stage will reflect the social network of the CEO or the external financiers; boards established during the collectivity stage will reflect resource dependence needs of the CEO or those of the institutional environment; and boards established during the formalization and control stages will reflect the resource dependence needs of the CEO, or will serve as agents to
the external investors. An implication of this analysis is that if a board’s membership is stable it may be operating with perspectives that reflect when the board was formed rather than the needs of the organisation (Lynall et al. 2003).

2.5.3 Role
Zahra & Pearce’s (1989) analysis of board perspectives led to the identification of three important board roles: control, service, and strategy, and showed their relevance to each perspective. While a board will fill all three roles, its view as to the relative importance of each will then depend on the board’s perspective, or its mix of perspectives.

- The control role involves the board monitoring the performance of the company and management by reviewing financial results and management’s reports to ensure corporate growth and protect shareholder’s interests (Carter and Lorsch 2003; Zahra and Pearce 1989). This role is likely if the perspective of the board is management hegemony.

- The service role involves the board offering the CEO and management advice and counsel based on the board’s experience and wisdom. Management has the option of either accepting or ignoring such advice as opposed to when the board gives an instruction (Carter and Lorsch 2003; Zahra and Pearce 1989). This role is likely if the board has a resource dependency or stewardship perspective.

- The strategic role involves the board in major decisions relating to such issues as CEO employment, senior executive compensation, capital structure and major investments. It is likely if a board has an agency perspective. (Carter and Lorsch 2003; Zahra and Pearce 1989).

An alternative construct by Hung (1998) identified six roles linking, coordinating, control, strategic, maintenance, and support, and associated each with a specific board perspective. Specifically, linking is associated with resource dependency, coordinating with stakeholder theory, control with agency theory, strategic with stewardship, maintenance with class hegemony, and support with managerial hegemony. Hung, like
Zahra and Pearce (1989), concluded that boards fill multiple roles and are likely to operate under more than one perspective.

2.5.4 Attributes

A board’s attributes will determine how it will undertake its roles and ultimately how it will influence company performance (Zahra and Pearce 1989).

Zahra and Pearce (1989) identified four interrelated attributes namely composition, characteristics, structure and process.

- Board composition denotes its size, outsider representation and minority representation. Board size refers to the number of directors. Outsider representation refers to the proportions of directors that are ‘insiders’ or ‘outsiders.’ Insiders include current and former managers and major shareholders and have a bias towards advancing management’s interests. Outsiders, who are independent of management and do not have such vested interests, in theory will seek to protect the shareholder’s interests by monitoring the performance of management. Minority representation refers to the status of ethnic minorities and the representation of females on the board. Representatives of minorities are presumed to reflect the values of society at large, as well as those of shareholders (Zahra and Pearce 1989).

- Board characteristics are the attributes that distinguish a board as a group. They consist of the individual director’s backgrounds and the personality of the board entity. Specific attributes of the director’s backgrounds that can be measured include their age, education, values, experience and connections (Zahra and Pearce 1989). These characteristics are a product of each director’s history and choices and are dependent on the make-up of the board at a particular time. Personality refers to the distinct styles or modes of operation of a board as whole, as opposed to the individual or collective characteristics of its directors. It reflects a board’s disposition to focus on internal business issues as opposed to external ones; the level of the board’s independence from management influence; and the extent of the board’s vested interest in the firm’s success. Board personality is believed to be
more enduring than the characteristics of individual directors and is thought to only change with a significant change in board composition (Zahra and Pearce 1989).

A board’s characteristics will influence whether it is a ‘watchdog’ or a ‘pilot’. That is, a board can take either a hands-on or a hands-off role in the management of the company (Carter and Lorsch 2003).

- **Structure** refers to the board’s use of committees, the flow of information with and among directors and whether the roles of CEO and Chairman are separate or combined. Its importance is a consequence of its potential impact on director’s decision-making and the board’s interaction with the CEO. (Zahra and Pearce 1989). Board Committees are responsible for most of a board’s work and as such, they are used by some authors as indicator of the functioning of the board (Adams et al. 2008). Flow of information is an assessment of a board’s access to the managerial information that directors require if they are to contribute meaningfully to a firm’s decision making (Zahra and Pearce 1989). Such access is controlled by the CEO (Aram & Cowan 1983 as cited by Pearce and Zahra 1991). **Type of board leadership** refers to the role of the CEO in the management of the board, and in particular, whether the CEO is also the chairman of the board. The issue is complicated in that while the chairman leads the board, the CEO reports to the board.

- **Process** describes a board’s approaches to gathering information, building knowledge and making decisions (Carter and Lorsch 2003). The frequency and length of meetings is a measure of the time invested in the company by the members of its board. The CEO-board interface influences board processes and communications with management. The CEO has incentives to control the board’s processes to ensure her ongoing employment and the maximization of her benefits. Directors have incentives to maintain their independence so that they can monitor the performance of, and if necessary replace, the CEO (Hermalin and Weisbach 2003). Level of consensus among directors is an assessment of a board’s tendency to reach a common position on the decisions they are faced with. Formality of
board proceedings will influence the issues addressed by the board, the discussion about those issues and how decisions are made. Board self assessment is the process whereby directors evaluate the performance of their peers and the board as a whole.

2.5.5 Board Impact on Performance  
2.5.5.1 Overview  
A key aim of research on boards is to understand how they impact corporate performance. Ideally, research will identify board attributes that impact performance so that the optimal board can be designed for a particular situation.

Hermalin and Weisbach’s (2003) published a framework for describing the direct and indirect relationships between board attributes and firm performance as shown in Figure 2.4. The four relationships are labelled 1, 2, 3, & 4. The arrowheads in the figure show the causality predicted by theory.

![FIGURE 2.4 IMPACT OF BOARD COMPOSITION](image)

Research investigating the impact of board attributes on company performance has explored the direct links between board attributes and performance, and the indirect
links whereby board attributes influence board actions that are in turn expected to influence firm performance.

Research exploring the direct links between the various board attributes and performance is reviewed in Sections 2.5.5.2, 2.5.5.3, 2.5.5.4, & 2.5.5.5, while research exploring indirect links is reviewed in Sections 2.5.5.6 and 2.5.5.7.

2.5.5.2 Composition and Performance
A large body of research has explored whether board size, outsider representation or minority representation influence company financial performance. While many relationships have been proposed, most, if not all, have been challenged by contradictory findings and causality has generally not been established.

For example, while Dalton et al.’s (1999) meta-analysis and Certo et al.’s (2001) review of the literature both supported a positive relationship between board size and firm performance, their findings are only partially supported by Coles et al.’s (2008) analysis of 8,165 firms which shows that while for simple firms smaller boards were associated with financial performance, for complex firms (such as large firms, diversified firms and high-debt firms) larger boards were associated with financial performance.

The proposed relationship was also questioned by analysis suggesting that board structure is endogenous (Adams et al. 2008). That is, boards are designed by their members in response to what they perceive as a firm’s needs. Board size is then a product of a decision by the board as to whether the benefit derived from adding directors with additional skills will outweigh any consequential deterioration in a board’s monitoring performance. For this reason, the value of any conclusion as to the optimal size of a board is questionable.

In aggregate, there are conflicting findings as to the optimal size for boards. While research suggests that smaller boards are better for the performance of a board’s
monitoring role, it also suggests that boards benefit from having directors that provide specialist advice.

Similarly, there are conflicting findings from research investigating the benefits of *outsider representation* on boards. For example, Daily and Dalton’s (1992) review of the literature identified conflicting results with studies that (a) showed that boards dominated by insiders had better financial results, (b) showed that boards with a higher percentage of outsiders have better financial results, and (c) failed to develop any systematic relationship. Subsequently, Dalton et al.’s (1998) meta study of 54 empirical studies indicated that there was little support for a systematic relationship between the proportion of external directors and financial performance; Coles et al. (2008) showed that the financial performance of complex firms, such as large, diversified or highly geared firms, benefits from larger boards with more outside directors who provide advice and expertise, while the financial performance of firms for which specific knowledge is important, such as R & D intensive firms, benefits from having inside directors; and Adams et al. (2008) suggested that while research has not shown a clear relationship between outsider representation and performance, this may be because the relationship is difficult to measure either as a consequence of the timing of external director appointments or a factor of the way that external directors add value.

In aggregate, while in many situations there may be a relationship between outsider control of a board and performance, evidence for such a relationship is not conclusive. The absence of such evidence leads to two scenarios. Either the design of extant research does not allow the relationship to be proved, or the impact of whether a director is internal or external may be immaterial when compared to other board attributes.

Many potential economic benefits from *minority representation* have been conceptualized. It may promote a better understanding of the marketplace; it may encourage creativity and innovation; it may lead to more effective problem solving; it may enhance corporate decision-making by broadening the perspective of senior managers; it may promote more effective global relationships; and it may reduce the...
costs associated with integrating a company’s workforce (Campbell and Mínguez-Vera 2008; Carter et al. 2003; Zahra and Pearce 1989).

There are also arguments that greater diversity may harm firm performance. Board diversity may lead to conflicts that damage board effectiveness; may lead to a less altruistic board member; and may result in a more risk adverse board (Campbell and Mínguez-Vera 2008).

Findings exploring the linkages between board diversity and corporate performance have been mixed. For example, Zahra and Stanton (1988 as cited by Carter et al. 2003) could not find a statistically significant relationship between the percentage of ethnic minority directors and financial performance; Shrader et al.’s (1997) study of the 200 largest US firms by market value, showed an inverse correlation between the percentage of women on a firm’s board and its financial performance; Carter et al. (2003) analysed a sample of 638 members of the US Fortune 1000 and found a statistically significant positive relationship between firm performance and the presence of women or minorities on the boards of directors; and Erhardt et al. (2003) analysed a sample of 117 companies from survey data collected by Fortune magazine and showed that “executive board of director diversity was positively associated with both return on investment and return on assets” (p.107).

Campbell and Mínguez-Vera (2008) summarized the previous research as inconclusive and mostly based on US data. They noted that while the majority of US studies identified showed a positive association between female directors and performance, female directors may be appointed in response to calls for greater diversity rather than to improve board performance. Their review of non-US studies identified four Scandinavian studies that did not find any relationship between female directors and performance and one that showed a negative relationship. They proposed that the ambiguity in the studies they reviewed might be explained by the legal and institutional contexts applying in different countries, different methodologies and other unobserved factors.
While theory has predicted that larger boards and increased outsider representation will be related to firm performance, the predicted relationship is not supported by empirical research. Several reasons have been postulated as to why this relationship has not been shown. Firstly, boards are endogenous, that is they react to their environment, in this case firm performance. The variables of interest can be considered to be endogenous as while the board can influence the performance of the company, the board can also be influenced by the performance of the company.

Second, the universal solutions sought by research are unlikely. The optimal board size and optimal level of outsider board representation is likely to vary for more reasons that can be compensated for by research design.

Third, if a board is assumed to be in equilibrium with its environment, changes to its characteristics and to firm performance will be a consequence of environmental changes influencing both, so that board characteristics will only influence firm performance when the system is out of equilibrium. If a situation is treated as out of equilibrium, then it is assumed that a change in a dependent variable causes a change in performance. If conversely, it is treated as being in equilibrium, then some external factor will have caused the change in the dependent variable as well as the change in performance (Hermalin and Weisbach 2003). In situations where board attributes change infrequently, there is a strong argument that the board is in equilibrium. If this is assumed to be the case, relationships between board attributes and performance will be difficult to establish. An analyst’s decision to treat empirical results as equilibrium or out of equilibrium phenomena creates interpretations of analysis that may be drastically different. Hermalin and Weisbach provided the following example:

“[O]ne of the most consistent empirical relationships regarding boards of directors is that board size is negatively related to firm profitability. The out of equilibrium interpretation of this finding says that limits on board size should be encouraged, or perhaps even mandated. In contrast, the equilibrium interpretation of this result implies that some other factor is causing both board

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size and profitability, so that such regulation would be at best useless and possibly counterproductive” (Hermalin and Weisbach 2003 p.8).

Zahra and Pearce (1989) observed that while there was a scarcity of evidence linking board composition to performance, there was strong evidence that board composition influences board characteristics. This led them to propose that researchers should focus on the impact of other board attributes, rather than look for direct links between composition and board performance.

2.5.5.3 Characteristics and Performance
Researchers have sought to identify the characteristics of individual directors and the board as a whole that influence financial performance two ways. The first of these is to determine the influence of characteristics that may be related to performance including a board’s skills, perspective, independence, or influence. The second has been to identify the common characteristics of boards in specific industry segments (Zahra and Pearce 1989).

The disposition of a board to focus on either internal or external issues is a distinct element of its personality and will require a significant change in the composition of the board or in directors’ backgrounds before it can change (Zahra and Pearce 1989). As the pace of such change is likely to reflect changes to the dominant coalition, it is likely to be slow.

A review of prior research by Zahra and Pearce (1989) showed that while there was theoretical support for links between board characteristics and company performance, there was limited empirical support. Ferris et al. (2003) explored whether director ‘busyness’ impacted firm performance. They analysed panel data relating to 23,673 directors at 3190 firms. They found that “firm performance has a positive impact on the number of board seats subsequently held by a director” (p.1109), and that there was “no evidence that multiple directors shirk their responsibilities to serve on board committees” (p.1110).
These findings were challenged by the subsequent findings of Fich and Shivdasani (2006), who analysed the boards of 508 ‘Forbes 500’ companies over seven years, and found that ‘busyness’ of directors is negatively associated with company performance. The difference between the two sets of findings was explained by several factors. Firstly, the studies use different measures of firm performance; second, the studies use different regression models; and, third the studies employ different concepts of busyness. The existence of the competing views ensures that there is no agreement as to whether there is a positive, negative or any association between busyness and performance.

An investigation into how the characteristics of members of the dominant coalition of a company’s board are related to a company’s performance showed that characteristics of directors were different for growth, turbulent and declining industries across nine dimensions. These included director’s upbringing, education, experience, age, beliefs, attitudes, and firm tenure. While this investigation did not show a relationship between director characteristics and company performance, it did show that those designing boards believe that the desired characteristics of board members will depend on the economic situation of a company (Norburn 1986).

The research presented above shows that while there is some evidence of association between board characteristics and firm performance, there is little for causality. In cases where an association is established, it is generally applicable to specific circumstances and cannot be generalised. Accordingly, the value of each set of findings is limited because of the uniqueness of specific business environments and the boards that serve them. Each board faces its environments with characteristics that are a product of its history and its reaction to the situation at hand. Therefore, it is unlikely that prescriptive board characteristics can be identified.

2.5.5.4 Structure and Performance

Zahra and Pearce (1989) suggested that research showing that board structure is a "potentially important predictor of corporate financial performance" that should be
“interpreted with caution” as it is based on a small number of studies that tend to “overemphasize one or a few dimensions of board structure” and do not provide “rich information on how board structures influence board decision styles” (p.322).

Klein (1998) found positive relationships between the percentage of inside directors on finance and investment committees and financial performance, and that firms significantly increasing the number of inside directors on these committees have significantly better financial performance than those decreasing the number of inside directors. These findings were questioned by Adams (2008) who noted that causality cannot be confirmed as decisions to establish committees or to appoint directors to committees may be a consequence of financial performance as opposed to a cause of it, and that firms in general are unlikely to be able to achieve performance improvement simply by rearranging their committee memberships.

Hayes et al.’s (2004) analysis of 499 S&P 500 firms explored the relationship between the existence of committees, their membership and firm performance. His findings showed minor relationships, for example, the existence of a human resource committee is negatively associated with performance and the fraction of outside directors serving on each committee is not related to performance. The absence of any association with key committee dimensions or any evidence of causality suggests that contributions from this line of research may be limited.

While there is a strong theoretical basis for the relationship between information flow and board performance, there is an absence of empirical research exploring this relationship. This absence reflects the difficulty of determining what information is required to make decisions and then measuring its provision.

A large amount of research has focused on the CEO-board relationship, as it is the key determinant of information flow. Presumably this is driven by the simplicity of the concept, general interest in the relationship, and the availability of data.
Studies exploring the impact on performance of Chairman – CEO duality, comprising a meta-study by Dalton et al. (1998) and a study of 748 IPOs by Certo et al. (2001) showed no evidence for a relationship, while an analysis of 638 Fortune 1000 firms, by Carter et al. (2003), showed that duality has a negative impact on IPO pricing. The failure of research to suggest a mechanism that explains the relationship between duality and performance reflects the inconsistency in the theoretical relationships that have been proposed. It also reflects the reality that boards as endogenous entities will compensate for the advantages or disadvantages associated with separate or combined CEO and board roles.

In aggregate, the failure of researchers to find significant evidence of association between board structure and firm performance has led to the conclusion that structure by itself is unlikely to have a material impact on performance.

2.5.5.5 Process and Performance

Studies exploring the relationship between process and performance are few in number and inclusive in their findings. For example, Zahra and Pearce (1989) observed that only a small number of empirical investigations into the impact of board processes had been reported and that these were limited in scope.

Zahra and Pearce (1989) suggested that the low number of investigations into board processes was explained in part by the difficulty in gaining access to boards to observe their decision making processes over time and that this difficulty was likely to continue.

An exploration of the CEO – board interface by Pearce and Zahra (1991) showed an association between board power type and company performance. Participative boards, those with high levels of board and CEO power were associated with the highest level of company performance, while proactive boards, statutory boards and caretaker boards each were associated with progressively lower levels of performance. The study also found that less powerful boards had lower outsider representation and less expertise, while powerful boards had a higher number of women directors. However, as the study was unable to establish causality, the possibility remains that these attributes were a
consequence of board power as opposed to a cause. Attributes were also identified that did not show any relationship with board power, these included board size, number of outsiders and the extent of minority representation (Pearce and Zahra 1991).

Similar findings were reported by Zajac and Westphal’s (1996) research which supported the proposition that the CEO’s power relative to the board’s power, influences whether the board appointed a CEO who was demographically similar to her predecessor. Causality could not be established, as a company’s performance will impact both the power of its CEO and the likelihood that its board will decide to change CEO characteristics.

A survey of board involvement in corporate strategy at 179 US credit unions by Siciliano (2005) showed that while boards generally participate in a management centred strategic planning process, their involvement in the strategic planning process is associated with poorer performance, whereas their involvement in strategic decision-making is associated with better performance.

The failure of research to validate direct links between board attributes and firm performance (Relationship 4 in Figure 2.4) has led to the propositions that the absence of direct links may reflect the nature of the board’s roles, and that indirect links may be more feasible (Hermalin and Weisbach 2003).

2.5.5.6 Attributes and Board Actions
Research exploring links between board attributes and board actions (Relationship 1 in Figure 2.4) is premised by a general expectation, a product of the poor performance of management dominated companies in the 1970s and 1980s, that board activism would positively impact performance (Relationship 2) (Millstein and MacAvoy 1998).

The desire to test the impact of board activism created a demand for measurements that would show its extent. As attempts to do this by observing and recording board behaviour were rejected by most if not all boards, researchers were forced to identify board attributes they believed were acceptable surrogates for board activism. Millstein
and MacAvoy suggested that these comprised (1) board leadership that was independent of management, (2) periodic meetings of the independent directors without management, and (3) formal rules or guidelines for the relationship between the board and management (Millstein and MacAvoy 1998).

A review of empirical studies that explored the relationship between board characteristics and board actions (Relationship 1 in Figure 2.4) by Hermalin and Weisbach (2003), found that they “appeared to indicate” (p.17) that board characteristics are important predictors of board actions, and observed that “board composition and size appear to affect the quality decisions on CEO replacement, responses to a hostile takeover, adoption of a poison pill, and the design of CEO compensation” (p.17).

While Hermalin and Weisbach (2003) concluded that size and composition are conceivably correlated with a board’s independence, and therefore by implication with its activism, they suggested that in the absence of an adequate theoretical interpretation, the confirmation of a causal relationship was not possible.

2.5.5.7 Board Actions and Performance

Millstein and MacAvoy (1998) reviewed research that explored the relationship between board activism and corporate performance in a sample of large companies. Companies were identified as having active governance if they indicated they had adopted substantially all of the governance guidelines developed by General Motors (See Millstein and MacAvoy 1998 p.1289), or displayed at least one of Millstein and MacAvoy’s (1998) surrogates for active board behaviour listed in Section 2.5.5.6 of this document.

The research showed a positive association between active governance and company performance. However, while there was an expectation that an activist board should lead to improved performance by addressing the inherent agency problem created by the separation of ownership and management, this was not supported by clear empirical evidence (Millstein and MacAvoy 1998).
The challenge in proving the relationship between board actions and corporate performance centres on four issues. Firstly, as corporate performance is determined by complex and interrelated strategic, managerial and organizational factors, the positive effect of board activism cannot be distinguished from other factors (Millstein and MacAvoy 1998). In particular, the infrequent occurrence of certain board actions will make relationships difficult to identify. Second, as board activism is a recent phenomenon there is a scarcity of relevant historical data (Millstein and MacAvoy 1998). Third, the cause of board actions may be endogenous to a company. That is, they may be a reaction of the company to its performance, as opposed to being a cause of its performance (Adams et al. 2008). Fourth, empirical investigation of board actions requires a level of access to boards that is rarely given (Zahra and Pearce 1989).

Accordingly, while there is a strong theoretical support for the impact of board actions on corporate performance and an association between these has been shown, causality has not been established and the nature of the relationship is such that it may not be established in the future. The reality is that board activism is only one of the factors that influences company performance and its connection is complex.

2.5.5.8 Consolidation

The findings from research into the board’s impact on performance through direct and indirect links show many contradictions. While there is only limited evidence for an association between board attributes and firm performance, a strong association is suggested between board attributes and board actions (Hermalin and Weisbach 2003).

Hermalin and Weisbach (2003) suggest that this contradiction reflects the difficulty of showing how board actions impact firm performance. While it is relatively easy to show how board actions impact the company, it is difficult to establish their impact on performance. For example, while the consequences of a decision to appoint a new CEO are obvious, it is difficult to show how such an appointment impacts performance.
There is also a strong argument that, except for during times of crisis, boards exist in a state of equilibrium, as changes to board membership are infrequent and generally managed by the existing membership. Therefore, any changes to its attributes are likely to be in response to changes in its environment as opposed to internal factors.

A review of research exploring the relationship between board attributes and firm performance, by Gabrielsson and Huse (2004), proposed that research could be categorised into four groups depending upon whether there is a *contingency focus*, which is described as “an emphasis on the context, seeing the board as an open system, including a broader stakeholder perspective and the board’s interaction with the environment” (p.13), and whether there is a *behavioural focus* which is characterized as “a focus on the actors, processes and decision making” (p.13). This categorisation is illustrated in Figure 2.5.

![Figure 2.5 Characterisation of Board Performance Studies](image)

**FIGURE 2.5 CHARACTERISATION OF BOARD PERFORMANCE STUDIES**

Studies that have neither a contingency nor a behavioural focus are characterized as “*input-output studies*” or as “*black box studies*” (Gabrielsson and Huse 2004 p.13) at the board is treated as a black box between input and output. These studies constitute 78% of the 127 studies identified by Gabrielsson and Huse (2004), who consider that
they are a consequence of junior faculty seeking a large number of publications requiring minimal data collection and involving simple analysis. These studies include those where the dependent variable is the number of board members, CEO duality, ratio of insider to outside directors, and board member stock holdings. The results from such studies are generally recognised as “ambiguous or weak” (Gabrielsson and Huse 2004 p.12).

Gabrielsson and Huse (2004) described contingency studies as those that investigated how a firm’s internal and external environment and the relative power of its stakeholders influences the selection, composition and interlocks of a board’s membership, and its governance structures.

They comprise 10% of the 127 studies exploring board performance identified by Gabrielsson and Huse (2004). These studies conclude that a board’s actions are influenced by the firm’s environment.

If the board is assumed to be part of an equilibrium solution linking shareholders and management (Hermalin and Weisbach 2003), the recognition that it is influenced by its environment provides an alternate mechanism for associations identified by input-output studies. That is, as environmental factors may produce changes in both the independent and the dependent variable, an association between input and output variables may be a consequence of environment rather than a direct link.

Gabrielsson and Huse (2004) described behavioural studies as those that explored the “actors, processes, decision making, relationships, and interactions inside and outside the boardroom” (p.21). They comprise 13 of the 127 studies exploring board performance identified by Gabrielsson and Huse (2004), who “emphasize that even though formal regulations and policies are necessary, these issues are not sufficient to fully understand effective corporate governance” (p.21).

While most of these studies rely on questionnaires, their focus, combined with the barriers created by the practices of board secrecy mean that qualitative methodologies
involving board members are also required to progress research in this area. This requirement is likely to have deterred many researchers from working in this area.

The findings from research in this area lead to further questions as to the validity of input-output studies. If a key determinant of board performance is the behaviour of individual members, input-output studies should be moderated to reflect board behaviour. Clearly this is difficult to do.

Gabrielsson and Huse (2004) described evolutionary studies those that “explore the system in which governance is embedded as well as the power and attributes of internal and external actors in and around the boardroom” (p.22). They identified two evolutionary studies out of 127 studies that explore board performance. The first of these studies focused on relational dynamics in and around the boardroom and the relationships between coalitions of internal and external stakeholders, while the second describes how external forces in the 1990s have led to a change in director rhetoric. Gabrielsson and Huse concluded

“The studies in this evolutionary research stream indicate that studies of boards of directors should not be separated from studies of power in institutions and society at large, hence, recognising the need to consider boards as open systems that are subject to change and development over time” (p.23).

Their analysis highlights the immaturity of research into relationships between board attributes and board performance. While a large amount of research has looked for direct relationships between easily measured concrete variables, such as board size, and board performance, the lack of success of these studies combined with the early findings of contextual and behavioural studies suggest that it may not be possible to empirically validate the likely relationships.

These observations suggest that attempts to show how board attributes influence firm performance have made little progress for four reasons:
Firstly, as a board of directors is an endogenous entity in that it evolves to meet what it sees as the needs of the firm, researchers will always be faced with a “chicken and egg” situation. That is, does firm prosperity lead to more board independence or does board independence lead to firm prosperity.

Second, a board of director is in equilibrium with its environment. Accordingly, many changes to a firm’s performance will be caused by external events that will also impact board attributes. Following these changes a new equilibrium will evolve. Hence a paradox is created, does poor performance simultaneously lead to changes in the board and changes to the CEO, or does poor performance lead to changes in the board which in turn lead to changes in the CEO.

Third, as each board and each director has unique attributes and faces unique challenges the existence of a set of board attributes that is suitable for a particular group of companies is unlikely. For example, the presence of one or two outstanding directors on a board may have more influence than all of the other characteristics considered.

Finally, changes in company performance that result from slowly changing board attributes and infrequent board actions will lag those inputs by an indeterminate amount. For example, a board’s decision to approve a particular strategy may impact a firm’s performance after six months, two years or five years. As the size of this lag will vary, it is difficult, if not impossible for researchers to model the relationship between attributes or actions, and performance.

Just as it is extremely difficult to establish a causal link between the psychological or sociological traits of individuals and the patterns of a complex behaviour, such as entrepreneurship (Stevenson and Jarillo 1990), so too, it is difficult to establish a causal link between the many attributes of a psychologically and sociologically complex entity such as a board of directors and the complex patterns of management that determine company performance.
2.6 ENTREPRENEURIAL POTENTIAL AND INTENTION

“Entrepreneurs are made, not born. They are made through a perception-driven enactive process that begins with forging a potential for entrepreneurship.” (Krueger and Brazeal 1994 p.102).

2.6.1 Background
In Section 2.2.2.2 Characteristics of the Entrepreneur, research that explored the relationship of personal characteristics to entrepreneurial behaviour was reviewed. Three types of characteristics were considered: personality traits, personal characteristics and individual perceptions.

The first two types were found to be poor predictors of entrepreneurial behaviour, as the characteristics that were associated with entrepreneurship were also associated with other occupations. As well, where characteristics were associated with a particular entrepreneur, the association did not serve as a predictor of that entrepreneur’s success.

This section of the literature review focuses on the third type of characteristic – individual perceptions. Its focus is on perceptions of the feasibility of entrepreneurial behaviour and those of the desirability of entrepreneurial behaviour and uses an intentions model to explore their impact on entrepreneurial behaviour.

2.6.2 Intentions-Based Models
While some behaviour is initiated by unconscious and unintended factors, entrepreneurial behaviour is a conscious and intended act. For this reason, the source of intentions and their role in entrepreneurial behaviour is of interest (Bird 1988).

Intentions-based models explain the nature of the processes underlying intentional behaviour. They are based on the premises that behaviour is best predicted by
intentions, that intentions are best predicted by specific attitudes, and that specific attitudes are a product of exogenous influences (Krueger and Carsrud 1993). The basic intentions-based process model is depicted in Figure 2.6.

FIGURE 2.6 THE BASIC INTENTIONS-BASED PROCESS MODEL

An individual’s behavioural intentions are an indication of “his willingness to engage in various behaviours with respect to or in the presence of a given person or object” (Fishbein and Ajzen 1972 p.495).

Exogenous influences are the product of another person’s actions or the impact of the environment, while intentions are specific to a person and context. Intentions-based models assume that endogenous variables impact behaviour by either producing attitude changes or by moderating the relationship between intentions and behaviour, but not by directly influencing intentions or behaviour (Krueger and Carsrud 1993).

Empirical research by Shepherd et al. (1988) and Ajzen (1991) provided strong support for the underlying assumptions of these models. Shepherd et al.’s meta-analysis 87 studies found strong correlations, firstly for the relationship between intentions and behaviour, and second for the relationship between attitudes and social norms, and intentions; while Ajzen identified four studies that showed a strong relationship between intentions and actions and 16 studies that showed a strong relationship between the impact of attitudes, subjective norms and perceived behavioural control on intentions.
A person’s attitude towards a behaviour “refers to the degree to which a person has a favourable or unfavourable evaluation or appraisal of the behaviour in question” (Ajzen 1991 p.188). As such, it is hypothesized to be “a function of salient information, or beliefs, relevant to the behaviour” (Ajzen 1991 p.188). A person’s attitudes can be expected to be a product of their external environment.

Ajzen’s ‘Theory of Planned Behaviour,’ as depicted in Figure 2.7, is an extension of the basic intentions-based models (Krueger and Carsrud 1993). This theory postulates that three distinct motivational factors influence an individual’s intention to perform a specific behaviour: attitude towards the behaviour, social norms and perceived behavioural control. The first two of these motivations relate to the perceived desirability of the behaviour, while the third relates to the perceived feasibility of the behaviour (Ajzen 1991).

The theory of planned behaviour also postulates that behaviour is influenced jointly by intentions and perceived behavioural control. Ajzen (1991) offered two reasons why there is a direct link between perceived behavioural control and behaviour. Firstly, the effort extended by an individual to achieve a planned behaviour is likely to increase with perceived behavioural control, and second, a measure of perceived behavioural control is likely to be a substitute for actual behavioural control as it will depend on an individual’s assessment that he or she has access to the required resources and the required situational competence (Ajzen 1991; Krueger and Carsrud 1993).
In contrast to earlier models, the theory of planned behaviour has the advantage that it does not assume that individuals have complete volitional control over their behaviour. Instead it assumes that behaviour depends jointly on intentions and perceived behavioural control (Ajzen 1991).

The model was supported by Ajzen’s (1991) review of 12 studies that showed “that the combination of intentions and perceived behavioural control permitted significant prediction of behaviour” (p.186), and his review of 16 studies that showed “that a considerable amount of the variance in intentions can be accounted for by the three predictors in the theory of planned behaviour” (p.189) and that “the addition of perceived behavioural control to the model led to considerable improvements in the prediction of intentions; the regression coefficients of perceived behavioural control were significant in every study” (p.189). These reviews led Ajzen (1991) to conclude that there is strong support for the theory of planned behaviour.
In parallel to Ajzen’s research, in 1982 Albert Shapero (1980) described a paradigm that was subsequently labelled by Krueger and Carsrud (1993) as “Shapero’s model of the entrepreneurial event” (p.320). The model as depicted by Krueger and Carsrud is shown as Figure 2.8.

**FIGURE 2.8 SHAPERO’S MODEL OF THE ENTREPRENEURIAL EVENT**

The model assumes that entrepreneurship is a behaviour that is performed by individuals who regard it as credible and who follow an entrepreneurial course of action as a consequence of a *displacement* (labelled a precipitating event by Krueger and Carsrud (1993)). As well, the model shows that ‘credibility’ depends on an individual perceiving that entrepreneurial behaviour is both desirable and feasible, and having the “psychological attributes,” (Shapero 1980 p.13) (labelled “propensity to act” by Krueger and Carsrud), required for entrepreneurial behaviour. Shapero (1980) proposes that: an individual’s perception of desirability will be determined by social and cultural factors, feasibility will depend on access to the required “advice, consultation, education and finance” (p.19), and psychological attributes will be an individual predisposition.
Krueger (1993) tested Shapero’s model, using path-analysis of a sample of 126 upper level university students, and found strong support for the application of intentions-based process models to entrepreneurial activity. In particular, he showed that perceptions of feasibility and desirability, and propensity to act are significant antecedents of entrepreneurial intentions, that the breadth of prior exposure to entrepreneurship was significantly associated with perceived feasibility, and that the positiveness of prior experiences is significantly associated with perceptions of desirability (Krueger 1993).

The validation of Shapero’s model for entrepreneurial behaviour allowed Krueger and Carsrud (1993) to adapt the theory of planned behaviour to entrepreneurial behaviours as depicted in Figure 2.9.

**FIGURE 2.9 ADAPTATION OF AJZEN’S MODEL OF THE ENTREPRENEURIAL EVENT**
The robustness of this model was demonstrated by Krueger and Carsrud (1993) who showed that there was conceptual support for the relationship between entrepreneurial intentions and behaviour, the relationships between an individual’s perceptions of desirability and feasibility and their entrepreneurial intentions; and the relationship between exogenous factors and these attitudes. While the authors did not provide empirical proof for the model, they proposed that it provides a useful framework for developing and evaluating new theories of entrepreneurship.

This model provided a foundation for Krueger and Brazeal (1994) to develop the construct of Entrepreneurial Potential which they describe as the pre-existing preparedness to accept a personally attractive opportunity that presents itself. The model is depicted in Figure 2.10.

**FIGURE 2.10  MODEL OF ENTREPRENEURIAL POTENTIAL**

As Krueger and Brazeal (1994) situate Shapero’s model within the context of the dominant entrepreneurial intentions-based process model, they are combining an empirically validated model, that is widely accepted by cognitive psychologists, with a model that has been developed through observation. Then, having established the validity of the model by the prior validation of its constituent constructs, they are able to apply it to the analysis of a range of issues.
The model postulates the importance of “providing an environment congenial to creating potential entrepreneurs” (Krueger and Brazeal 1994 p.99) and that the key to encouraging entrepreneurship is the identification and establishment of policies that increase both the perceived desirability and the perceived feasibility of entrepreneurial behaviour. These policies, combined with the required tangible resources lead to a nutrient-rich environment for entrepreneurship. Krueger and Brazeal note however, that it may not be possible to increase a potential entrepreneur’s propensity to act.

The model leads to the suggestion that entrepreneurial behaviour in a corporate environment will require “that top management demonstrate commitment to a philosophy of risk taking, proactivity, and innovative behaviours” (Krueger and Brazeal 1994 p.101), and nurtures a supportive culture and formal programs.

2.6.3 Perceived Venture Desirability
Krueger and Brazeal (1994) combined constructs developed by Ajzen (1991) and Shapero (1980) to propose perceived venture desirability as reflecting an individual’s intrinsic interest in launching a new venture, and their perception of what the important people in their lives would think about them doing so. The construct is an amalgam of the constructs that Ajzen used in the theory of planned behaviour, attitude toward the behaviour and subjective norm and the construct Shapero’s incorporated in his paradigm of the entrepreneurial event, perceived desirability. Further, Krueger and Brazeal propose that, in a corporate setting, perceived venture desirability will be a function of a potential entrepreneur’s perception of the beliefs of top management and their colleagues, and the compensation package devised by management.

An individual’s attitude toward a behaviour is the degree to which a person views the behaviour in question as favourable or unfavourable. It was described by Ajzen (1991) as a subjective norm as is it is dependent on an individual’s perception of social pressure to perform or not perform a behaviour.
Within this context, Shapero (1980 p.14) described *perceptions of desirability* as an individual’s attitude with respect to forming a new venture, and proposed that such attitudes will be influence by an individual’s family, the actions of their peers, the impact of their work experience, their membership of ethnic groups, the impact of life changes, and the involvement of mentors. These perceptions will be strong if individuals perceive that the outcomes for entrepreneurial behaviour are mostly positive and if they reside in an environment where the culture and support systems are favourable. Individuals who work for a company where entrepreneurial behaviour is practiced and encouraged, are more likely to perceive that entrepreneurial behaviour is desirable (Brännback et al. 2007; Krueger and Brazeal 1994).

### 2.6.4 Perceived Venture Feasibility (Perceived Venture Self-Efficacy)

The construct of *perceived venture feasibility* is developed from Ajzen’s (1991) concept of *perceived behavioural control* and Shapero’s (1980) construct of *perceived feasibility* (Krueger and Brazeal 1994).

Ajzen (1991) defined *perceived behavioural control* as the “perception of the ease or difficulty of performing the behaviour of interest” (p.183), and observed that the perception may be different to reality as it will be will be influenced by the availability of resources and opportunities. He described it as similar to the construct of *perceived self-efficacy* that Bandura defined as “the conviction that one can successfully execute the behaviour required to produce the outcomes” (Bandura 1977 p.193).

*Perceived self-efficacy* was found by Bandura (1997) to have a significant impact on behaviour as it determines an individual’s attitude, and accordingly the amount of effort that will be invested and for how long it will be invested. As such, it is essential for intentional human actions, as individuals will only accept challenges, if there is a possibility that they will be successful.

As an individual’s self-efficacy depends on their personal cognition, it will depend on their knowledge of the opportunity, and their prior experiences. Individuals who have limited information about what is required, or about the environment in which it is
required, will have lower self-efficacy. Conversely the self-efficacy of individuals: who have previous accomplishments, decided that they are able to perform a task they have seen others perform, been led into believing they can perform a specific task, or are emotionally aroused, will be higher (Ajzen 1991; Bandura 1997).

A perception of feasibility will also depend on an individual’s self-assessment that an opportunity is desirable, that they have the required “advice, consultation, education and finance” (Shapero 1980 p.19), and by implication the necessary skills and knowledge, to undertake a particular venture. A perception of desirability is a pre-requisite for a perception of feasibility, as without it, feasibility is unlikely to be considered (Shapero 1980).

Self-efficacy will also affect an individual’s assessment of the risk associated with a venture as it will increase the perceived benefit while decreasing the perceived threats, thereby changing the perception of a venture’s risk. Consequently, self-efficacious individuals will see career and venture opportunities as more attractive (Bandura 1997; Krueger and Brazeal 1994; Krueger and Dickson 1994).

Bandura (1997) extended the concept of self-efficacy to the concept of perceived collective efficacy in recognition that people existing in families, communities, organizations, social institutions and nations do not operate in isolation but have a “shared belief in [their] conjoint capabilities to organize and execute the courses of action required to achieve given levels of attainments” (Bandura 1997 p.477) where this type of efficacy is created and transmitted through “social modelling, incentive systems, personnel selection practices, staff development activities, the way in which jobs are structured, and relative success in the marketplace” (p.476).

Collective self-efficacy is recognised as important is it influences the success of group activities, such as sporting teams and those seeking to influence political processes or achieve social reform, as “it is highly likely that collective self-efficacy enforces social norm and low collective self-efficacy can decrease high personal self-efficacy as to ultimately inhibit action” (Brännback et al. 2007 p.75). However, while collective
efficacy is determined by a group’s membership, it is distinct from the individual beliefs of those members, and instead arises though group interaction and a learning process whereby the group collectively acquires information about each other, their task, the context and any prior activities (Gibson 1999). In the context of venture creation, an organisation’s collective efficacy requires that potential entrepreneurs are taught the required competencies and provided with opportunities to “try their wings at running an independent project or existing entrepreneurial ventures for channelling innovation and entrepreneurship” (Krueger and Brazeal 1994 p.100), while potential entrepreneurs rely on collective-efficacy to provide credible models of critical behaviours and psychological and emotional support (Bandura 1997; Brännback et al. 2007; Krueger and Brazeal 1994).

Conversely, in a corporate setting where organisational obstacles originating from top management, such as a lack of commitment to innovation, impatience, and unrealistic expectations, combine and lead to a lack of top management support, corporate managers, who appear to have the requisite skills and knowledge to start a new venture, will come “to believe that the ‘best’ behaviours are those that represent the status quo, further reducing their self-efficacy for more innovative behaviours” (Krueger and Brazeal 1994 p.98), thereby causing them to not believe that they are capable of doing so (Krueger and Brazeal 1994).

2.6.5 Propensity to Act
Shapero (1980) recognised that there “is the individual with no evident reason for change who opts to make a major shift in life path” (p.9). He proposed that ‘psychological attributes’(p.13) might help explain why individuals who come from similar backgrounds, and are equally displaced, may respond to an entrepreneurial opportunity differently. The key attribute was subsequently labelled by Krueger (1993) as a ‘propensity to act,’ and defined as an individual’s disposition to act upon their decisions to establish ventures, “the volitional component of intentions (‘Will I actually do it?’)” (p.9).
The underlying basis of a propensity to act was interpreted by Krueger (1993) as being an individual’s “desire to gain control through taking action” (p.9). In support of this interpretation, Krueger cited research by Burger (1985) that links persistence of achievement related behaviour to an individual’s preference for having control over life events, that is, a ‘desirability of control.’ Subsequently, Krueger theorised that an individual’s propensity to act on opportunities could influence her intentions either directly, or indirectly by moderating the link between her perceptions of desirability and feasibility and her intentions. Krueger’s investigation of this relationship, via a study of 126 upper-division business students, showed that propensity to act is positively associated with entrepreneurial intentions and suggested that it may moderate the relationship between perceptions of feasibility and desirability and entrepreneurial intentions. This finding was supported by Krueger’s analysis of the relationship.

“If propensity to act is very low, attitudes may be less predictive of intentions and action. If propensity to act is high, then taking action should more likely be seen as desirable and feasible and experiences may have a greater impact on attitudes. This argues that propensity to act might be better viewed as a moderating influence than a direct antecedent” (p.9).

While propensity to act was conceptualized by Shapero (1980) as a stable personality characteristic, Krueger and Brazeal (1994) proposed “we can train individuals to behave more autonomously. We can teach self-management skills; we can teach skills at coping with adversity; we can visibly reward initiative taking (including unsuccessful initiative taking)” (p.98). Empirical research supporting this theory has not been identified.

Krueger and Kickul (2006) suggested that the construct entrepreneurial intensity, defined as “the degree to which entrepreneurs are willing to exert maximum motivation and effort towards the success of their venture,” (p.10) is conceptually similar to Shapero’s (1980) propensity to act. This suggestion explained their adoption of the entrepreneurial intensity (EI) scale, which was included in the Entrepreneurial Research Questionnaire (EPQ) developed by Pistrui et al. and implemented in a variety of
research studies in the United States, Central America and Eastern Europe, to test the impact of entrepreneurial intensity as a moderator of the relationship between perceptions of feasibility and desirability and entrepreneurial intentions. (Gundry and Welsch 2001; Krueger and Kickul 2006; Pistrui et al. 1998).

Research involving a study of 528 Scandinavian and Russian university students showed that the impact of entrepreneurial intensity as a moderator of the relationship between perceptions of feasibility and desirability, and entrepreneurial intentions depended on whether the entrepreneur was an ‘intuitive’ as opposed to an ‘analytic’ according to an assessment using the Cognitive Style Index (CSI) developed by Allinson and Hayes (1996). In particular it showed that entrepreneurial intensity is associated with intentions for intuitives but not for analytics, who the study suggested are likely to depend mainly on whether they perceive that a course of action is feasible, presumably having previously decided that it is desirable (Krueger and Kickul 2006).

While Krueger and Kickul (2006) do not address the relevance of cognitive style to entrepreneurship, the observation that entrepreneurs rely on intuition for decision-making, as they deal with uncertainty, suggests that the will be intuitives and that entrepreneurial intentions, and by association propensity to act, will be a moderator of the relationship between perceptions of feasibility and desirability and entrepreneurial intentions.

### 2.6.6 Precipitating Events

Albert Shapero’s (1980) model of the entrepreneurial event proposed that the relationship between entrepreneurial intentions and entrepreneurial behaviour is moderated by the occurrence of a displacement, described by Krueger and Carsrud (1993) as a ‘precipitating event that triggers the actual intended behaviour.’ He observed that while at one extreme “there is the individual with no evident reason for change who opts to make a major shift in life path” (Shapero 1980 p.9), in the majority of cases, an individual’s change in direction is dependent on new forces overcoming the “inertia that drives human behaviour until something interrupts or displaces that inertia” (Krueger and Brazeal 1994 p.93), and that “it takes a powerful force in a new
direction or the summation of many detracking forces before an individual is pushed or consciously opts for a major change of life path” (p.9).

Displacements leading to entrepreneurial action are likely to be a consequence of positive or negative forces, and of these, negative forces are the more likely. Strong forces include becoming a political or economic refugee, voluntary or forced termination of employment, mid-life crisis, a change of situation (e.g. voluntary migration, end of military service, release from prison), or the encouragement of another party. While subjective conditions, such as facing a fortieth birthday might stimulate entrepreneurial behaviour, the typical precipitating event is more likely to be a significant displacement with an individual choosing the behaviour that is expected to lead to the best of the available outcomes. The choice of entrepreneurial action will depend on the individual perceiving entrepreneurial action to be both desirable and feasible and having a propensity to act, that is, the individual has entrepreneurial intentions (Krueger 2000; Krueger and Brazeal 1994; Shapero 1980).

2.6.7 Application of Model to Organizations

Jelinek and Litterer’s (1995) observed that traditional organization theory is based on a ‘static deterministic paradigm’ that is not useful for explaining how people behave in entrepreneurial organizations. This led them to theorise that a cognitive paradigm that combined individual sense making and collective decision processes would provide a better understanding how individuals work together while simultaneously supporting corporate entrepreneurship and coordinating complex activities. Similarly, Krueger and Dickson (1994) observed that managers’ behaviours and decisions are likely to be influenced by their perceptions of their firm’s competence to control processes and outcomes.

In response to these observations, a social cognition perspective was used by Shepherd and Krueger (2002) to adapt the intentions-based model from the domain of individual entrepreneurship to corporate entrepreneurship, and to propose that the commonly accepted antecedents of entrepreneurship were related to a group’s, as well as to an individual’s, entrepreneurial behaviour. This adaptation provides a theoretical basis for
arguing that if a team is to support an entrepreneurial intention, it must perceive that establishment of a venture is both feasible and desirable.

A team’s perception of venture desirability is defined as “the degree to which a team has a favourable or unfavourable evaluation of the potential entrepreneurial outcomes” (Shepherd and Krueger 2002 p.173). It can be increased by endogenous factors including: organisational buy-in, the presence of venture champion – as these will lead to corporate norms supporting entrepreneurial behaviour; a corporate desire to satisfy customer needs – as this will reduce uncertainty; or a team perception that the net value of any rewards for entrepreneurial behaviour will exceed the cost of any punishments that will be a consequence of the behaviour (Shepherd and Krueger 2002).

A team’s perception of venture feasibility is related to both the individual self-efficacy of its members and the collective (sometimes called group) efficacy of the team (Shepherd and Krueger 2002), where group efficacy is defined as “a group’s shared belief in its conjoint capabilities to organize and execute the courses of action required to produce given levels of attainments” (Bandura 1997 p.477).

Group efficacy is believed to be independent of the individual demographics and self-efficacy of a group’s members (Gibson 1999). It “forms as group members collectively acquire, store, manipulate, and exchange information about each other and about their task, context, process, and prior performance” (p.138), and as a result will “vary among groups with equal skills, abilities and resources” (p.138). This relationship was operationalised by Shepherd and Krueger (2002) who proposed that group efficacy will be increased by: a team’s perception of organisational buy-in; the presence of sponsoring champions; a record of prior entrepreneurial experience; supportive organisational routines; and the recognition of a team’s entrepreneurial skills by its organisational champions and mentors.

The impact of group efficacy on team dynamics and therefore team effectiveness depends on the level of task uncertainty.
“When task uncertainty was high, team members worked independently, and collectivism was low, group efficacy was not related to group effectiveness. In contrast, when task uncertainty was low, team members worked interdependently and collectivism was high, the relationship between group efficacy and group effectiveness was positive” (Gibson 1999 p.138).

Effectively a team’s entrepreneurial effectiveness will depend on either the individual efficacy of its leader towards entrepreneurial behaviour, or the collective efficacy of the team depending upon whether the type of entrepreneurial behaviour is perceived as involving high or low uncertainty. That is, if a venture is perceived to be high risk, if it is to proceed, it is likely to require leadership by an individual champion with high self-efficacy; whereas if it is perceived as low risk, the collective efficacy of the team will provide the required support.

While Shepherd and Krueger (2002) characterised group perceptions of feasibility and desirability and explored their origins and their impact on entrepreneurial intentions, they did not address the concept of a team’s propensity to act or the role of precipitating events in a team’s initiation of entrepreneurial behaviour.

While conceptually, a ‘group propensity to act’ is a likely requirement if a team is to influence entrepreneurial intentions, the entrepreneurship literature is silent on the nature of such a construct, and its relationship with entrepreneurial intentions. The development of such a construct will require theory that identifies and explains the nature of shared attributes that are distinct from those of individual group members, in the same way that social cognition theory has been used to develop a shared mental model of team beliefs that is distinct from the beliefs of individual team members.

Similarly, the relationship between precipitating events and the entrepreneurial behaviour of groups has attracted little attention in the entrepreneurship literature. In particular, while team behaviour is seen to be influenced by precipitating events such as market pressure or by executive encouragement, the importance of precipitating events to entrepreneurial behaviour has not been established.
2.7 BOARD INFLUENCE ON CORPORATE ENTREPRENEURSHIP

“In sum, organizations wishing to tap the entrepreneurial potential of their employees ultimately must demand that top management demonstrate commitment to a philosophy of risk taking, proactivity, and innovative behaviours” (Krueger and Brazeal 1994 p.101).

2.7.1 Background
In section 2.2 of this literature review, ‘entrepreneurship’ is defined as the ‘innovative reallocation of resources to achieve a preferred outcome,’ and characterised it as being carried out by ‘entrepreneurs’ who are ‘individuals, either on their own, or inside organisations, who manage this reallocation, whether they control these resources or not.’

While the consequences of these entrepreneurs’ decisions to reallocate resources are uncertain, and there is always a possibility that resources may be lost as a result of their decisions, it is not essential that they share the financial risk of there being a loss. The entrepreneurs’ role is to control the allocation of resources, whether she owns the resources being allocated is irrelevant.

Entrepreneurship is important because it drives societal change including economic development. Entrepreneurs reallocate resources to what they believe to be more productive uses. The consequential increases in productivity, potentially lead to higher profits for businesses and higher standards of living for communities (Covin and Slevin 1991).

Entrepreneurs establish firms to reduce transaction costs and capture value. They do this by replacing individual contracts between the factors of production and their end
customers with a set of ongoing relationships that have the entrepreneur at their focal point (Section 2.3.1).

A company is a legal fiction that replaces the entrepreneur in a firm so that its operations can be owned and financed by multiple shareholders, all of who will have limited liability. A company’s viability will depend on the expectations of its existing and potential shareholders, as these will determine its ability to attract funds both at the time of its establishment and on any occasions when additional funding is required. As shareholders are likely to be motivated by financial returns, their assessment of viability will depend on their belief that the company has a competitive advantage that will lead to acceptable returns (Section 2.3).

The competitive advantage of a company will depend on its possession and exploitation of tangible and intangible resources that are not possessed by its competitors. This advantage is described as sustainable if other companies are not able to duplicate its benefits. It will be lost if a competitor introduces a ‘new combination’ whereby advantages previously enjoyed by the company are lost (Section 2.3.7).

Corporate entrepreneurship is defined in Section 2.4.1 as ‘the process whereby an individual, or a group of individuals, in association with an existing organisation, make an innovative reallocation of organisational resources, to either grow or renew that organisation.’ A company’s long-term success relies on its introduction of new combinations, that is, corporate entrepreneurship.

A board of directors is appointed, although not necessarily chosen, by shareholders to represent their interests, and by implication to maximise the value of their investment, while ensuring a company’s long-term viability and compliance with relevant laws and regulations. A consequence of the board’s responsibility for ongoing company performance is that it may need to encourage an entrepreneurial strategy (Section 2.5).

While research has attempted to link board attributes to firm performance, its results are inconclusive. The reality is that it is extremely difficult to establish a causal link
between the many attributes of a psychologically and sociologically complex entity such as a board of directors and the complex patterns of management that determine firm performance (Section 2.5.5.7).

Individual entrepreneurs are motivated by a combination of sociological needs and financial desires (Section 2.2.2.3), and characterised by their perception that particular entrepreneurial ventures are personally feasible and desirable (Section 2.6.2). Entrepreneurial teams, including those operating in a corporate environment, will have a shared perception as to the feasibility and desirability of a venture that is distinct to the perceptions of the individual members of the group (Section 2.6.7).

The focus of the current study is to explore how a board of directors influences one aspect of a company’s performance, its corporate entrepreneurship. This requires that it addresses two questions, firstly, how does a board influence corporate strategy and second, what influences this relationship in the particular case of corporate entrepreneurship.

2.7.2 Board Influence on Strategy

While the board of directors is recognised as being responsible for maximising a company’s shareholder value and by implication for ensuring that its corporate strategy supports this objective, content-analysis of 150 articles published in 23 journals published between 1972 and 2007, shows that there is no consensus as to how this occurs (Pugliese et al. 2009).

Pugliese (2009) suggested that this research can be allocated to three chronological periods, each with distinct characteristics. The first period, 1972 – 1989, is characterised by a focus on board involvement in the development of corporate strategy. While the research in this period analysed the desirability and form of such involvement, it was distinguished by a lack of consensus as to its effectiveness. This led to a subsequent research focus on the relationship between board characteristics and company performance (Pugliese et al. 2009).
The second period of research, 1990 – 2000, is characterised by the use of “input-output” studies for analysing the relationship between board characteristics and structure (for example, board size, CEO duality, outsider ratio) and strategic outcomes such as acquisitions, corporate restructuring and entrepreneurship.

A large number of studies were published during this period. They produced a range of findings, which were described as providing “mixed evidence of relationships between board characteristics and strategy” (Pugliese et al. 2009 p.300) that were of questionable value. For example, Judge and Zeithaml (1992) found that board involvement is associated with financial performance and increases as an organisation ages; Fried et al.(1998) found that the board involvement of VC backed companies was high regardless of organisational age; Hoskisson et al. (2002) found that “outside director degree of representation had a positive relationship to external innovation” (p.712); while Zahra et al. (2000) suggested that increased outsider representation was negatively associated with corporate entrepreneurship.

Pugliese’s observation was supported by Huse’s (2000) review of 91 empirical studies published between 1952 and 1995 that investigated the boards of directors of SMEs and concluded, that despite increased attention, the knowledge about such boards remains fragmented.

“The reviews above illustrate that studies about the board of directors have been characterized by the use of samples from large US firms, multivariate analyses of secondary data, and a multitude of studies on the impact of board composition on company performance, but few significant results have been found” (p.273).

Huse (2000) observed that as researchers were tending to undertake studies that relied on easy to access issues and samples, and used research methods that were acceptable to common journals, there was a “bias in mainstream research about directorates with respect to samples, issues and methods”(p.284), that will only be resolved when studies “open the black-box between board composition and company performance” (p.284)
and explore the factors that influence the role of directors. He proposed this would require more diverse samples, including responses from people in various board positions, and knowledge building about boardroom dynamics and processes.

A similar conclusion was reached by Pugliese et al. (2009), that during the 1990 - 2000 period, research was dominated by Input-Output analysis of US samples and produced “mixed evidence of relationships between board characteristics and strategy” (p.300). He suggested that this failure of research to identify board characteristics associated with corporate performance, led to an increased focus on the impact of behavioural and cognitive dimensions of the board on performance.

The third period of research, 2000 – 2007, is characterised by a sharp increase in the number of papers that adopted behavioural and cognitive approaches to understanding how boards participate in strategic decision-making. These papers explored boards involvement in all phases of strategic decision-making and their interaction with management. Scholars identified, but did not resolve, the conflict between director’s roles of monitoring (independence) and strategy development (involvement) roles (Pugliese et al. 2009). Papers by Gani and Jermias (2006), Gabrielson (2007) and Zahra et al. (2009), illustrate the evolution of theory that explores board influence of corporate strategy.

Gani and Jermias’s (2006) review of the literature showed that while support for the agency theory based argument ‘that domination of boards by independent directors would lead to more effective monitoring’ was believed to have driven the increase in the proportion of independent directors over the previous two decades, it was not supported by the research that explored the relationship between board independence and firm performance. This observation led Gani and Jermias to propose that the relationship would depend on context, and to explore it across a sample of 109 large manufacturing firms that were pursuing either a strategy of cost efficiency or a strategy of innovation. The comparison showed that the relationship between board independence and performance is moderated by whether a company is pursuing a
strategy of cost reduction or a strategy of innovation. However, they noted that the relationship might be moderated by other variables including a sample’s industry sector.

An exploration of how boards influence the commitment of chief executives to take an entrepreneurial posture by Gabrielson (2007) showed that boards can have a significant influence in the “value-creating potential” of companies by encouraging strategies that involve change and innovation. The study identified two approaches to conceptualising the board-performance relationship. The mainstream approach was labelled the ‘board demographic approach’, while the alternate approach, which is supported by ‘a small but growing number of scholars’ was labelled the ‘board behavioural approach’ (2007).

The board demographic approach assumes that a board’s performance, and by implication company performance, is a function of the resources and relationships brought to the boardroom by individual directors. The alternative board behavioural approach assumes that because boards face complex situations, rely on a small number of face-to-face meetings and are severely time constrained, the director’s task is such that their interactions with each other may not reflect demographic expectations and “makes them particularly vulnerable to interaction difficulties” (Gabrielson 2007 p.519).

Gabrielson (2007) analysed a sample of 175 medium-sized Swedish manufacturing companies and found that while board behaviour, including a board’s involvement in decision control and the strategic decision making process, were associated with a CEO’s commitment to an entrepreneurial posture, board demographics, including board size and the proportion of external directors, were not. He also found that board demographics were not a reliable predictor of board behaviour.

These findings led Gabrielson (2007) to conclude that “the traditional board demographic measures cannot explain a CEO’s commitment to an entrepreneurial posture” (p.526), while board involvement in the strategic decision making process is
associated with CEOs being “more inclined to promote entrepreneurial undertakings with the aim of increasing the long-term value of the company” (p.519).

Zahra et al.(2009) observed that while most board research has focused on “the monitoring and control function of boards, emphasizing the protection of shareholders’ interests” (p.250), boards also have a role they described as “directors’ entrepreneurial function in assisting and guiding managers in conceiving ways to create wealth”(p.250). This led them to argue that boards of ‘threshold’ companies (companies that are moving across the threshold from their start-up phase to the more ‘professional management’ stage of their organisational life cycle) have a responsibility to both protect existing shareholder wealth and to create new wealth by encouraging corporate entrepreneurship.

These examples support Pugliese’s (2009) conclusion that while the board of directors is increasingly recognized as having a significant impact on corporate strategy, research has yet to develop a clear view as to how boards achieve this. Accordingly, Pugliese suggests that exploring the relationship between boards and strategy “still provides a very promising and challenging research agenda” (p.302), and that the development of theory will require that researchers will need to “open the black box of board research” (p.302) and develop an understanding of board dynamics and processes if they are to develop meaningful theory.

While the observation, that research has yet to develop a clear view as to how boards contribute to corporate strategy, specifically relates to corporate strategy, the same observation can be made with respect to the how boards influence corporate entrepreneurship strategy, as corporate entrepreneurship potentially represents a significant component of corporate strategy.

2.7.3 Board Influence on Corporate Entrepreneurship

The challenge faced by researchers seeking to determine how board attributes influence corporate entrepreneurship is similar to that faced by researchers seeking to identify the antecedents of individual entrepreneurship. Just as researchers have been unable to
identify particular traits that distinguish entrepreneurs from their peers, it is unlikely that researchers can identify a board characteristic or structure that is a reliable predictor of entrepreneurial behaviour.

The use of intentionality models to predict an individual’s intention to establish a venture by assessing their perceptions of the desirability and feasibility of entrepreneurship, and their propensity to act (Section 2.6) provides a framework for developing models to predict entrepreneurial behaviour in organisations.

Krueger (Section 2.6.7) proposed that corporate entrepreneurship was dependent on an individual perceiving that it is a desirable and feasible strategy for the corporation, and that these perceptions were dependent on top management demonstrating its “commitment to risk-taking, proactivity and innovative behaviours” (Krueger and Brazeal 1994 p.101). The use of this construct to explain the basis of entrepreneurial intentions in a corporate environment, leads to the suggestion that it may be useful for understanding the intentions, and ultimately the influence of a company’s board of directors on its entrepreneurial behaviour. That is, the perceptions and attitudes of an overseeing group of individuals, such as the members of a board, may influence the signals sent by that group to other individuals who are dependent on it for guidance. For example, if the board of a company perceives that entrepreneurship is desirable, this perception may impact on management’s perception of desirability.

A board has particular characteristics that distinguish it from a randomly selected group of people. Firstly its members, including the managing director, are likely to have been selected on the basis their views are compatible with those of the existing members and they are willing to conform to an existing culture; second, the chief executive determines what information is supplied to the board; and third, a board will work to reach consensus (Adams et al. 2008; Carter and Lorsch 2003). As a result, a board is likely to develop common attitudes and perceptions as to whether the financial markets will appreciate an entrepreneurial strategy and whether such a strategy will be beneficial for the careers of the individual members of the board.
2.7.4 Development of Tentative Constructs

Tentative (a priori) constructs have been developed, to suggest mechanisms whereby a board influences a company’s strategy, and to suggest how a board’s attitudes and perceptions, and its propensity to act are linked to a company’s entrepreneurial intentions. These tentative constructs can be used as the starting point for exploring how boards influence corporate entrepreneurship.

Carter and Lorsch (2003) provided a list of standard board responsibilities (See Section 2.5.2) from which the following responsibilities were identified as likely to impact board and management’s development of company strategy. These are
- approving the company’s strategic plan and then monitoring its performance against that plan. Three tasks will be involved: (1) reviewing the strategic plan that has been developed by management, (2) authorising management to adopt that plan, and (3) monitoring management’s progress against the plan.
- managing the membership of the board. This will be achieved through internal reviews of board and member performance, and management of changes to the board’s membership. The process will influence the board’s attitudes and preferences, and through these, the board’s strategic choices.
- managing the chief executive. The selection, appointment and monitoring of the chief executive will have a significant impact on the company choice of strategy.

The board processes that are postulated to influence strategy are accordingly: reviewing corporate strategy, monitoring company performance, reviewing board performance, selecting and appointing new members to the board, appointing the chief executive, and monitoring the chief executive’s performance. In turn, these processes are postulated to interact with management’s developing of company strategy, executing strategy; and monitoring company performance.

The analysis in Section 2.7.3 leads to the proposition that a board might have entrepreneurial potential that is analogous to that of the individual entrepreneur, and that a construct similar to the model of entrepreneurial potential described in Section 2.6.2 and depicted in Figure 2.10, can be used to describe board entrepreneurial
potential and its relationship with company’s corporate entrepreneurship intentions and behaviour.

Whereas an individual will have a perception whether her peers will regard her establishment of an entrepreneurial venture conforms to social norms, and whether doing so will be personally beneficial (Section 2.6.3), a board of directors needs to reach a consensus as to whether corporate entrepreneurship is beneficial for the company and for the board itself. The board equivalent to an individual’s perception of desirability is postulated to be a shared attitude as to the desirability of corporate entrepreneurship that requires that a board has shared growth aspirations for the company. This attitude is postulated to be functions of long-term board attitudes and contemporary knowledge of the board’s members as to the expectations of the market and shareholders. A board’s growth aspirations are expected to influence its attitude as to the desirability of entrepreneurship.

In the same way that an entrepreneur’s perception of feasibility reflects her assessment of her ability to establish a new venture (Section 2.6.4), a board of directors is postulated to share a perception as to whether a company has the required skills and resources required for corporate entrepreneurship. This shared perception will be based on the board’s first-hand experience of the company as a whole and its staff as individuals.

While an individual has a propensity to act, an active board of directors is postulated to proactively engage with management to encourage preferred behaviours. A board that chooses to be reactive to management’s initiatives is expected to have less influence over a company’s corporate strategy than one that is more engaged with management.

Section 2.5.2 discussed the characterisation of boards by their perspective. A board’s characterisation will determine what it sees as its role and the extent of its engagement with management. For example, if a board adopts a ‘management-hegemony’ perspective, it will limit itself to a control role that involves monitoring the performance of the company, whereas if a board has an ‘stakeholder’ perspective, it will view part of
its role as being to assist management to develop strategy, and to provide the management with advice and counsel. Therefore, a board’s level of engagement can range from ‘hands-off’ to ‘involved.’ At one extreme a hands-off board would limit its involvement to the selection and appointment of the chief executive, and the ratification of the company’s accounts. At the other extreme, an involved board would take an active role in the development of strategy and in the provision of instruction to management.

The tentative construct includes a board characteristic labelled ‘board corporate entrepreneurial potential’ that is an adaptation of Krueger and Brazeal’s ‘entrepreneurial potential.’ If a board has an attitude that corporate entrepreneurship is desirable for the company, perceives that it is feasible for the company, and is prepared to engage with management to encourage its implementation, it will be characterised as having board corporate entrepreneurial potential.

The tentative board entrepreneurial potential construct postulates that the attitudes and perceptions, and propensity to act, of a company’s board of directors are linked to the same or similar characteristics of its management team, and that these characteristics influence management’s entrepreneurial intentions. The specific management attributes are postulated to comprise its growth aspiration, its attitude as to the desirability of corporate entrepreneurship, its perception as to the feasibility of corporate entrepreneurship and its propensity to act. A management team that has these attributes will be described as having management corporate entrepreneurship potential.

If a company has board and management entrepreneurial potential, the occurrence of a precipitating event will lead to management having corporate entrepreneurship intentions and the initiation of corporate entrepreneurship.

The tentative constructs that are described here are used as the starting point for developing theory as to how a company’s board of directors influences corporate entrepreneurship. The methodology that is employed for the investigation and the findings from the investigation are presented in the next chapters of this document.
CHAPTER 3 – METHODOLOGY

“Until the early 1800s, only philosophers and religious scholars who engaged in armchair speculation studied or wrote about human behaviour. The classical theorists made a major contribution to modern civilization when they argued that the social world could be studied using science. They contended that rigorous systematic observation of the social world, combined with careful, logical thinking, could provide a new and valuable type of knowledge about human relations” (Neuman 2006 p.80).

3.1 BACKGROUND

The literature review identified a scarcity of theory as to how a board of directors influences corporate entrepreneurship. The aim of this study is to develop knowledge about how this relationship works.

This scarcity of theory is a consequence of four factors. Firstly, boards are complex entities comprising people, each with their own knowledge, skills, attitudes, and beliefs, who need to agree how an organisation should be managed.

Second, the relationship, between boards and company strategy, is complex as it is influenced by a large number of interdependent variables, many of which are difficult to measure, including the composition of the board, the culture of the board, the resources of the firm, the structure of the marketplace and the nature of the firm’s competition.

Third, most boards of directors operate behind a veil of secrecy so that individual directors are reluctant to share the reasons for their decisions or even the mechanisms they have employed to reach decisions.
Fourth, directors and senior managers may delegate the completion of surveys to members of staff.

The first two of these factors, in particular, reflect that entrepreneurship is a social, as opposed to a physical, science. As such, the study of entrepreneurship shares a characteristic common to all social sciences, that is, there are a large number of variables that can influence the outcome. While researchers can either measure, or perhaps fix, a number of these, there will always be others that they will either remain ignorant of or will choose to ignore.

3.2 PHILOSOPHICAL CONTEXT

3.2.1 Background
A challenge in analysing the relationship between the board and its impact on entrepreneurship is to adopt a philosophical approach that caters for a relationship between a social world that must be interpreted and a real world that can be measured. That is, a situation where the flat ontologies, interpretivism and positivism, are limited in their value by their focus.

“In the case of entrepreneurship research, it has long been recognized that investigations restricted to a single strata (e.g. explanations based on efforts to isolate the psychological traits of ‘successful’ entrepreneurs) are likely to prove unsatisfactory” (Blundel 2007 p.53).

This study has adopted ‘Critical Realism,’ “one of the more widely cited social theoretic paradigms” (Blundel 2007 p.49), as it provides a credible paradigm for analysing the relationship between a company’s board of directors and its entrepreneurship.

Critical realism distinguishes between three domains of reality, “the empirical (experience and impression), the non-empirical actual (events and states of affairs), and
the non-actual or, metaphorically, the ‘deep’ [also referred to as ‘real’] (structures, mechanisms, posers, and tendencies)” (Lawson 1995 p.13).

In so doing, it provides a middle way for social science research that avoids the limitations of both positivist and interpretivist analysis (Blundel 2007). This enables the analysis to “reconcile the richness, complexity and sheer variety encountered in [the] concrete social world” (Sayer 2000 as cited by Blundel 2007) and to identify “new and non-reducible properties of the network itself, including its structural form, causal powers and the mechanisms through which these are exercised” (Blundel 2007 p.52).

Critical realism is recognised as being particularly applicable for entrepreneurship research as it provides a vehicle whereby case analysis can go beyond ‘sheer association’ (Blundel 2007). Specifically, “it provides a basis for theoretically informed abstraction . . . with more explicit specifications of causality in the processes that it describes” (Blundel 2007 p.66).

There are two inherent limitations associated with critical realism. Firstly, while it is useful for developing theory, it cannot be used to prove theory. Second, the explanations produced using critical realism may only be relevant to particular circumstances, and may not be generally applicable. Despite these limitations, critical realism is recognised as a valuable tool for the development of entrepreneurship theory (Blundel 2007).

3.2.2 Ontology

Critical realism views reality as consisting of three ontologically distinct (i.e. separate and different) domains: the ‘actual,’ the ‘empirical’ and the ‘real’ (Blundel 2007).

The ‘actual’ domain is that in which events occur, irrespective of whether they have been observed. The inclusion of unobserved events distinguishes this domain from a positivist reality that only includes events that are observed (Blundel 2007). The actual domain comprises the actions initiated by the board and management and the results of those actions.
The ‘empirical’ domain comprises “the world of human experiences and knowledge of events” (Blundel 2007 p.52). The empirical domain comprises the beliefs, perceptions and attitudes of directors both individually and as a board.

The ‘real’ domain comprises “(irreducible) structures, mechanisms, powers, and tendencies that, although perhaps not directly observable, nevertheless underlie actual events and govern or facilitate them”(Lawson 1995 p.13). These emerge “when the properties of different strata combine, these new objects are emergent in the sense of possessing new properties – structures, causal powers and mechanisms – that depend upon, but cannot be reduced to, those of their constituents” (Blundel 2007 p.53). The real domain explains the relationship between the beliefs, attitudes and perceptions of the directors and the board, their actions and the results of their actions.

Critical realism recognises that the causal powers of social objects are not exercised ‘mindlessly,’ rather they display the characteristics of a (self-conscious) sense of meaning, interpretation and intent (Blundel 2007). That is, the beliefs, attitudes and perceptions of the board and of management, not only influence, but are also influenced by their actions and the consequences of those actions.

“The implication is that social scientists need to engage in a so-called ‘double-hermeneutic’, generating explanatory knowledge about phenomena that are themselves ‘knowing’, in contrast to their natural science counterparts, whose subject matter is ‘unknowing’” (Blundel 2007 p.55).

3.2.3 Epistemology

Critical realism proposes that the three domains of reality, the ‘actual,’ the ‘empirical’ and the ‘real,’ require distinct types of knowledge to be recognised (Blundel 2007; Lawson 1995).

The actual domain comprises objects that can be observed. While it has evolved from the positivist view that knowledge of objects depends on our experience of them (e.g., a
firm’s assets), it also provides that objects may exist that people have not observed (Blundel 2007; Lawson 1995). A firm’s resources and its intellectual property are examples of actual objects.

The *empirical* domain comprises experiences and impressions. It is made up of events that cannot be observed, so that our knowledge of them depends on either “*direct experience or the accounts of human actors*” (Blundel 2007 p.53). Knowledge about this domain, in common with interpretivism, depends on the interpretations of the researchers conducting the study and of the individuals being studied (Gioia and Pitre 1990). In particular, knowledge of a board’s attitude towards entrepreneurship depends on the interpretation of a researcher.

The *real* domain comprises ‘*structures,*’ ‘*mechanisms*’ and ‘*causal powers,*’ that exist independently of our knowledge of events and experiences, where structure refers to the way an object is constituted, causal power refers to the things an object is able to do, and mechanisms refers to the way that causal powers are exercised. These phenomena cannot be observed and can be described as being ‘*far from transparent*’ as the phenomena itself may be influenced by the “*('self conscious) sense of meaning, interpretation and intent*” of the subject matter (Blundel 2007). The relationship between a board’s attitudes and a company’s strategy constitutes a real mechanism.

Knowledge of the real domain requires that researchers interpret the structures and mechanisms that are capable of producing events (Blundel 2007), “*it cannot be measured or counted, and hence there is always a an interpretive or hermeneutic element in social science*”(Sayer 2000 as cited in Blundel 2007).

The objective of the current study is to identify “*those structures and mechanisms that are jointly responsible for producing or conditioning some identified phenomena of interest*”(Lawson 1995 p.13).
3.2.4 Methodological Implications

The challenge of critical realism is that structures and mechanisms belonging to the real domain cannot be identified through inductive or deductive analysis (Blundel 2007). Instead, critical realism relies on ‘retroduction’ to discern structures and mechanisms that explain the observed relationships.

Retroduction requires the researcher to analyse observed processes and then develop theory as to the underlying real structures. That is, it “involves a type of scientific generalization that is concerned with the isolation of fundamental structures whose powers can be said to act ‘transfactually’ (i.e. continuing to exist, even though their operations may not be manifested at the level of events or observations” (Blundel 2007 p.55).

Blundel (2007) provided guidelines for using retroduction as a methodology:

- The research should draw on multiple sources of qualitative and possibly quantitative data.

- Case selection should be guided by the requirements of analytical rather than empirical generalization. That is, cases will be selected to “explore and to clarify the necessary and contingent relationships between structures” (Blundel 2007 p.56).

- The researcher should “incorporate the accounts of human actors, not simply in their own terms, but as part of the search for the ‘rules’ that constitute these accounts” (Blundel 2007 p.56).

- “[T]he study itself proceeds through several iterations, with the researchers moving repeatedly between more concrete and more abstract activities in order to refine their explanation” (Blundel 2007 p.57).
The result is a research process that is “moving concurrently on two tracks, one of which is ‘up in the clouds’, and concerned with abstraction and theoretical conceptualization, while the other is ‘down to earth’, engaged in the idiosyncratic details of the case material” (Blundel 2007 p.57).

3.3 A PRIORI SPECIFICATION OF CONSTRUCT

3.3.1 Background
As research projects, by their nature, must focus on the relationships between a small number of variables, researchers need to identify those attributes, and the relationships between them, that are most likely to be relevant to the phenomena being investigated (Eisenhardt 1989).

In this study, using an approach suggested by Eisenhardt (1989), a priori specifications of construct were used as the starting point for identifying attributes to be studied, and for choosing and implementing a methodology that explored the relationships between those attributes.

The a priori specifications of construct, used in this study are based on theoretical propositions identified in the literature. They are tentative constructs as opposed to testable propositions (Eisenhardt 1989).

The research question was addressed in two stages. While the literature suggests that a board’s attributes including its structure and its processes will determine how it is informed and how it interacts with management, it is silent as to how these mechanisms work and in particular the role of a board’s characteristics including what Zahra & Pearce (1989) describe as its personality. The first stage of the research focused on these mechanisms, and in particular on the external factors that influence a board and those through which the board influences management.
The second stage relates to how a board’s characteristics, and in particular its attitudes, perceptions and culture, influence a company’s behaviour. The initial focus of this study is the attributes identified by Krueger and Brazeal (1994) in their model of ‘entrepreneurial potential.’ They are a board’s attitude as to the desirability of corporate entrepreneurship, its perception as to feasibility of corporate entrepreneurship and the level of its engagement in a company’s management.

3.3.2 Board Operations
A board is essentially a group of people who are responsible for the management of an organisation. Its actions are likely to be a function of its directors’ knowledge and its processes, including its interactions with the organisation’s management.

A board’s main sources of information will be the knowledge gathered by the directors individually and that which is provided to the board by the company’s management.

A board’s processes, including how it manages its membership, how it makes decisions and how it relates to management, will in some cases be codified and in others adopted. Company law, market regulations, the company’s articles of association, or its constitution will determine a board’s codified processes, while the board itself will select processes that are adopted.

The literature review led to the identification of following processes as mechanisms that influence the board’s actions and its relationship with management.

Board Processes:
1. Review of company strategy
2. Monitoring of company performance
3. Review of board performance
4. Selection and appointment of new directors
5. Review of the chief executive performance
6. Appointment of the chief executive
Management Processes

1. Development of company strategy
2. Implementation of company strategy
3. Monitoring of company performance

The literature and the corporate experience of the researcher was used to develop an ‘a priori specification of a construct’ that links these processes. The construct, which links the five board processes and the three management processes listed above, is shown in Figure 3.1.

This construct was used as the starting point for the exploration of how board mechanisms work in the context of corporate entrepreneurship.

FIGURE 3.1 A PRIORI CONSTRUCT - BOARD OPERATIONS
3.3.3 Board Entrepreneurial Potential

A tentative construct, based on Krueger and Brazeal’s (1994) model of entrepreneurial potential, was developed. This construct shows the characteristics expected to influence the board, those expected to influence management and the links between these characteristics.

The board characteristics expected to influence corporate entrepreneurship comprise a board’s aspirations for company growth, its attitudes as to the desirability of corporate entrepreneurship for the company, its perceptions about the feasibility of entrepreneurial behaviour by the company, and the level of its engagement with management. The management characteristics expected to influence corporate entrepreneurship comprise management’s aspirations for growth, its attitudes about the desirability of corporate entrepreneurship for the company, its perceptions about the feasibility of entrepreneurial behaviour by the company and its propensity to act. The likely linkages between the board and management characteristics include those where one party was expected to influence the other, and others where the board and management were expected come to a shared view.

The resulting ‘a priori specification of a construct,’ is represented by Figure 3.2. It suggests how the factors are linked to a company’s entrepreneurship. (The labels associated with each node are not sequential, as for consistency they match those used in the final construct.)
3.3.4 Application of A Priori Specification of Construct
The two a priori specifications of constructs described above served as starting points for the investigation. They influenced the choice of methodology, and were used to develop an interview protocol and to develop the procedures and starting-codes that were used for the analysis.
3.4 CASE STUDY METHODOLOGY

3.4.1 Background

“The case study is preferred in examining contemporary events, but when the relevant behaviors cannot be manipulated. The case study relies on many of the same techniques as a history, but it adds two sources of evidence not usually included in the historian’s repertoire: direct observation of the events being studied and interviews of the persons involved in the events” (Yin 2003 p.7).

This section provides background to the use of a case study methodology. It explains why it is an appropriate methodology for this study and provides an overview of how the methodology was applied in this project.

3.4.2 Characterisation of Case Study

A case study is an empirical inquiry that investigates a contemporary phenomenon within its real-life context, especially when the boundaries between phenomenon and context are not clearly evident” (Yin 2003 p.13). A case study involves “understanding the dynamics present within single settings” to develop descriptions, test theory or generate theories that are likely to be novel, testable and empirically valid (Eisenhardt 1989)

A case study involves the collection and analysis of data from multiple sources using triangulation to achieve convergence. Where possible, case studies are designed using previously developed theoretical propositions as a guide (Yin 2003).

Theory is developed from the cases studied. Using definitions described by Yin (2003) where the findings from one or more cases are used to predict similar results in a subsequent case, a literal replication is established. Where the findings predict contrasting results for predictable reasons, a theoretical replication is established. Ideally, a study will achieve literal and theoretical replication across several cases. This allows the theoretical framework to be generalised to the analysis of similar cases.
3.4.3 Choice of Case Study Methodology

Case studies are appropriate in ‘technically distinct situations’ where there are ‘many more variables of interest than data points’ (Yin 2003 p.13). They have an advantage in situations where “a ‘how’ or ‘why’ question is being asked about a contemporary set of events, over which the investigator has little or no control” (p.9), when the objective is “to explain the presumed causal links in real-life interventions that are too complex for the survey or experimental strategies” (p.15). The recognised disadvantage of the methodology is that the theory that is developed may be overly complex, or at the other extreme narrow and idiosyncratic (Eisenhardt 1989).

The focus of this project is to understand the mechanisms that frame the relationship between the board of directors and corporate entrepreneurship. That is, it aims to generate theory as to ‘how’ the board of directors influences a company’s corporate entrepreneurship.

A company’s board of directors is a group of individuals who are jointly charged with managing a company. Its decisions and the processes it employs to make decisions are be influenced by a large number of factors relating to the individual directors, the board as a whole, the company and the competitive environment. The choice of a case methodology to analyse the relationship between a company’s board of directors and its corporate entrepreneurship, enabled the researcher to undertake what Yin (2003) described as an holistic analysis that considers the many variables involved.

3.4.4 Design of Study

Yin (2003) described the design of case studies in terms of the relationship between the research question, data collection, data analysis, and the conclusions reached:

“[A] research design is a logical plan for getting from here to there, where here may be defined as the initial set of questions to be answered, and there is some set of conclusions (answers) about the these questions. Between ‘here’ and
‘there’ may be found a number of major steps, including the collection and analysis of relevant data” (p.20).

The analytical challenge is to design a process that will build new theory that will generate propositions for future research.

“[T]heory building research is begun as close as possible to the ideal of no theory under consideration and no hypothesis to test. Admittedly, it is impossible to achieve this ideal of a clean theoretical slate. Nonetheless, attempting to approach this ideal is important because preordained theoretical perspectives or propositions may bias and limit the findings. Thus, investigators should formulate a research problem and possibly specify some potentially important variables, with some reference to extant literature. However, they should avoid thinking about specific relationships between variables and theories as much as possible, especially at the outset of the process” (Eisenhardt 1989 p.536).

The initial design of this study will be shaped by the a priori specifications of constructs described in the previous section of this chapter. These constructs are what Eisenhardt (1989) describes as tentative and should be distinguished from propositions that are to be tested.

“Although early identification of the research question and possible constructs is helpful, it is equally important to recognise that both are tentative in this type of research. No construct is guaranteed a place in the resultant theory, no matter how well it is measured” (p.536).

The analytical process will follow that described by Eisenhardt (1989) and represented by Figure 3.3.
FIGURE 3.3  ANALYTICAL PROCESS

The first step of the process was the development of a priori specification of constructs based on themes identified by the literature review. These constructs served as a starting point for the selection of cases, the development of an interview protocol, and the selection of codes for the first cut analysis of data.

Data collection for each case comprised semi-structured interviews of company directors using a standard interview protocol (See Section 3.6.2), which was supplemented by company publications and publicly available analysis about the companies. This additional data was designed to ensure construct validity by allowing what Yin (2003) describes as ‘data triangulation’.
The number of cases studied was dictated by the realities of gaining access to companies combined with the need to limit the scope of the project, as opposed to the specific requirements of theoretical saturation:

“[I]deally, researchers should stop adding cases when theoretical saturation is reached” (Eisenhardt 1989 p.545).

“In practice, theoretical saturation often combines with pragmatic considerations such as time and money to dictate when case collection ends. In fact, it is not uncommon for researchers to plan the number of cases in advance” (Eisenhardt 1989 p.545).

Eisenhardt (1989) proposed that theoretical saturation could be achieved if researchers prepared between 4 and 10 cases, while Yin (2003) proposed that a properly designed multiple case study required 6 – 10 cases of which 2 - 3 would be literal replications while 4 - 6 would pursue different patterns of theoretical replication.

The scale of the project was limited by the researcher’s ability to gain access to the boards of directors of suitable companies in the project timeframe. The researcher was able to gain the access required to develop detailed cases at four companies and found this to be sufficient to develop theory. The researcher was also able to gain access to two additional companies, albeit on a more limited basis, to validate the findings. The procedures adopted to select and sample cases are described in the section below titled ‘Sampling: Purposeful Selection of cases.’

The nature of the project dictated that the researcher personally conduct all of the interviews, prepared the transcriptions and analysed the data. While this may have limited the perspective of the investigation and resulted in less confidence in its findings, it ensured that the researcher gained the familiarity required for cross-case comparison and consistent interpretation of the data across cases. It also ensured that discoveries made during one interview were developed during subsequent interviews.
(Eisenhardt 1989). The procedures adopted for data collection and analysis are described later in this document.

3.5 PURPOSEFUL SELECTION OF CASES

3.5.1 Background
The research employed a case study methodology that used data from six companies each of which constituted one case. Companies were purposefully selected for theoretical reasons. Six companies were selected with the expectation that three or four would provide literal replication while the balance would provide theoretical replication.

3.5.2 Sampling Objectives
The design of the study required the selection of companies that are managed by independent boards and are similar in terms of their underlying businesses and management. To achieve this aim, companies were selected that could be characterised as follows

- They have boards with a high level of independence from management. This is likely where executive directors make up a small proportion of a board’s membership. This characteristic makes it more likely that the board is a distinct entity that is prepared to make decisions that may not be supported by management.

- They have boards that are not representing specific shareholders of the company. This ensures that a board does not have a conflict between the interests of specific shareholders and their responsibility to the shareholders in general.
- They have boards with a separate chairman and chief executive. This makes it more likely that the board has practical, as well as theoretical control, over the management of the company.

- They are of similar scale thereby minimising scale effects.

- They operate similar businesses thereby minimising industry effects,

- They serve similar markets and are regulated by similar laws thereby minimising the impact of the regulatory environment.

- They are not a sample of convenience, that is, they have been selected because they belong to a chosen demographic rather than because they are accessible.

As well, companies were selected on the basis that their chairman agreed to the company being involved. This required that the chairman, or a former chairman, of the board and at least one director, or former director, was prepared to be interviewed.

3.5.3 Selection Process

The first selection criterion for the sample was that it would comprise large listed public companies as these companies typically have professional boards with a long tradition of independence from management. As well, such companies are under the ongoing scrutiny of research analysts employed by brokers and business journalists, and their financial records, annual reports and announcements are readily available.

The second criterion for the sample was that the companies selected be Australian companies. While this choice was made primarily for logistical reasons, it offered two advantages. Firstly, the companies in the sample are subject to a common regulatory environment, and second, the roles of chairman and chief executive are likely to be separate. The downside of choosing an Australian sample is that the findings may not be directly applicable to other domiciles.
The third criterion for the sample was that the companies selected would be demographically similar, but with some variance in their entrepreneurial behaviour. The first group of companies considered was the ten largest Australian listed public companies by market capitalisation. While this group of companies satisfied the three criteria, they were recognised as being a diverse group in terms of industry segments and the markets they serve.

The consideration of these companies, led to the observation that four of them were Australian commercial banks, and to the decision to select a sample of publicly listed Australian commercial banks, ideally comprising the four main banks and two or three smaller banks. The four major banks were targeted because of their similarity and their dominance of the sector. The decision to include a selection of smaller national (as opposed to regional) banks was driven by the expectation that they might be more entrepreneurial.

An examination of the proposed sample showed that it satisfied the objectives listed above:

- The boards of Australian banks have a high level of independence from management. In all cases the number of executive directors did not exceed 25% of the board membership.

- Australian banks are all widely held. In all cases, none of the individual directors has a significant interest.

- The boards of Australian banks have separate chairman and chief executives.

- The four largest Australian banks each have a market capitalisation in excess of A$50 billion. While the smallest national bank has a market capitalization of around A$2 billion, it can still be classified as a large company.
The banks that were selected for the sample operate similar businesses. Their annual reports show that they operate national retail branch networks and offer a full range of retail services including lending, deposit taking, electronic banking, credit cards and foreign exchange. They offer these services to all segments of the market.

The banks that were selected operate in Australia and are subject to Australian company law and Australian Stock Exchange regulations.

3.5.4 Gaining Access
The success of the investigation depended on being able to gain appropriate access.

“[A]ccess difficulties have been and remain a source of constraint in studying ‘managerial elites’” (Kakabadse et al. 2006 p.135).

“When a sampling strategy has been decided upon, the researcher encounters the more practical problem of negotiating access to particular cases” (Neergaard 2007 p.269).

The strategy for approaching directors was developed with the help of former chairman of a large Australian listed public company. He advised that access to most boards would be difficult to achieve without a personal introduction, and that the extent and scope of each company’s involvement would depend on that introduction and the chairman’s reaction.

The mechanics of each introduction, the resulting level of access and the implications for the project are described below. (The banks are each identified by a number, as all communications with them were on the basis that their anonymity would be preserved.)

Bank 1
The corporate affairs group of Bank 1 replied to a letter to the chairman and advised that the bank would not participate in the study. A subsequent direct
approach to a director of the bank known to the researcher resulted in a formal introduction to the chairman. Following this introduction, the chairman agreed to participate in the study and recommended the study to other directors.

Bank 2
A director of the Bank 2, who had previously worked with the researcher, contacted the chairman of Bank 2 and recommended that he participate in the study. The chairman subsequently agreed to participate and recommended participation to other directors.

Bank 3
The researcher approached the chairman of Bank 3 via a mutual alumni association. While the chairman was receptive to the request, he was reluctant to encourage participation by members of Bank 3’s board as the institution was going through a rebuilding phase. He subsequently agreed to support an alternative approach whereby a former chairman and former members of the board would participate. The former chairman who had previously met the researcher agreed to participate and recommend other former directors.

Bank 4
The chairman of Bank 4 was approached via a friend whose father had been a former director. The chairman of Bank 4 was enthusiastic about the opportunity to participate in the study and encouraged other board members to do likewise.

Bank 5
The Bank 1 director, who introduced the researcher to the chairman of Bank 1, also endorsed the project to the chairman of Bank 5. The chairman of Bank 5 agreed to participate in the study.
Bank 6
A former chairman of Bank 6 was approached via a mutual alumni association. He agreed to participate in the project. The current chairman of Bank 6 was not approached, as the researcher could not identify an appropriate introduction.

In each case, the researcher relied on an existing relationship to gain access to a chairman or past chairman of the relevant bank.

The researcher was confident that none of these Chairman felt any pressure to be involved other than a desire to contribute to a research project being undertaken by a researcher that they either knew or had been introduced to.

All of the Chairman that interviewed, by the nature of their positions, are ‘Captains of Industry.’ As such, they are very self-confident and are quite prepared to reject any proposal that is not on acceptable terms.

The research recognises that former chairman and directors being interviewed may have a tendency to embellish and justify the histories of their involvement. Where possible, their recollections have been confirmed using other sources of information.

3.8.5 Generalisation of Results
As the study, by design, comprises a ‘small purposeful sample,’ the applicability of its findings to a broader context is unclear.

“It is a feature of qualitative studies that they are context dependent and not representative of a larger universe, neither do they allow generalization across time and space” (Neergaard 2007 p.271).

Despite its inherent limitation, the sample provides a starting point for analogous or theoretical generalization across the banking and the Australian listed company sectors.
3.6   DATA COLLECTION

3.6.1   Selection and Recruitment of Interviewees

In each case the chairman’s assistance was obtained to identify directors who have the tenure required to make a useful contribution, and to arrange their participation.

The chairman’s suggestion that a particular director participate in the project was not expected to compel a director to participate, as directors are generally experienced executives who view themselves responsible to the shareholders as opposed to the chairman of the company.

Directors, who agreed to be interviewed, were sent a letter that provided background to the project (See Appendix 4), a copy of the ‘Interview Protocol’ (See Appendix 5) and a ‘Disclosure and Informed Consent’ form (See Appendix 6). Directors were asked to schedule 45 – 60 minutes for the interviews.

3.6.2   Interview Protocol

The ‘Interview Protocol’ provided for the interviewee to be asked questions about 1) the extent of entrepreneurship and innovation at the bank, 2) the board and CEO’s management of entrepreneurship and innovation at the bank, 3) the extent to which the bank’s culture is entrepreneurial, and 4) the drivers of the bank’s corporate culture.

While the Interview Protocol was specifically developed for the study, the researcher did not follow it prescriptively, but rather used it to guide the discussion.

“The protocol’s questions, in essence, are [the interviewer’s] reminders regarding the information that needs to be collected and why. In some instances, the specific questions also may serve as prompts in asking questions during a case study interview; however, the main purpose of the protocol’s questions is to keep the investigator on track as data collection proceeds”(Yin 2003 p.74).
The interviewer aimed to have a free flowing conversation that addressed the topics listed in the Interview Protocol, recognising that a tightly structured discussion was not a realistic objective.

“For interviewing key persons, you must cater to the interviewee’s schedule and availability, not your own. The nature of the interview is much more open-ended, and an interviewee may not necessarily cooperate fully in answering the questions” (Yin 2003 p.72).

3.6.3 Procedures for Recording and Storage of Data
Interviews were recorded using solid-state digital recorder and transferred to CD-ROM. The interviews were transcribed for analysis using qualitative data analysis software. The transcripts of the interviews will not be published. The interviews and transcripts will be stored in a secure location in accordance with Swinburne University of Technology policy and will only be available for examination by individuals who are party to Swinburne University of Technology research protocols.

The thesis and subsequent publications will not identify the participating companies or individuals. Comments that are published will not be attributed to particular participants or banks. Care will be taken to ensure that it will not be possible to identify participants or their contributions.

Codes have been used to disguise the identities of the participants in the transcripts and qualitative data analysis. The researcher holds the key for these codes.

3.7 DATA ANALYSIS

This section addresses the challenge described by Eisenhardt (1989) that researchers often fail to communicate their methods of analysis, with the result that a huge chasm often separates data from conclusions” (Eisenhardt 1989 p.539).
The research data comprises transcripts of interviews with directors and published material from six banks, with the data collected from each bank constituting a single case.

The analytical procedures that were adopted were designed to explain the relationship between independent variables that characterise directors and the corporate entrepreneurship of the banks they supervise.

Miles and Huberman (1994) described the process of qualitative analysis as climbing a “ladder of abstraction” whereby “You begin with a text, trying out coding categories on it, then moving to identify themes and trends, and then to testing hunches and findings, aiming first to delineate the ‘deep structure’ and then to integrate the data into an explanatory framework” (Miles and Huberman 1994 p.91).

Similarly, Yin (2003) described the process as a series of iterations, starting with the comparison of data to an initial construct or proposition which is revised to reflect the data from the first and subsequent cases.

The logic of the analytical procedure that was adopted is represented by Figure 3.4
FIGURE 3.4 SUMMARY OF ANALYTICAL PROCESS

The process builds on the *a priori specification of construct* to develop the interview protocol and the *start-list* of codes.

The start-list codes were used to code the interviews comprising the first case using ‘N-Vivo’ qualitative data analysis software. The coded interviews were then analysed to identify themes and patterns that either supported or repudiated the relationships suggested by the a priori specification of construct.

This led to the identification of new themes, patterns, and new constructs that were use to generate a revised list of codes, that were used to repeat the analysis on the interviews comprising the first case, and then on the interviews comprising the other cases.

The process was repeated until the themes and patterns identified through coding were consistent with the construct that has been developed. At this stage, the construct was labelled the “Final Construct.”
3.8 QUALITY

3.8.1 Background

“A good guidance for doing case studies is therefore to conduct the research so that an auditor could repeat the procedures and arrive at the same results” (Yin 2003 p.39).

Yin’s (2003) review of the literature identified four tests that are commonly used to establish the quality of any empirical social research. These are construct validity, internal validity, external validity and reliability. The application of each of these to the current study is explored in turn.

3.8.2 Construct Validity

Yin (2003) defines ‘construct validity’ as “establishing correct operational measures for the concepts being studied” (p.34) so as to prevent ‘subjective’ judgements being used in the collection of data. He proposes that construct validity requires that the types of changes that are to be measured are related to the objectives of the study and that the ways the changes are measured reflect the type of change being measured.

The focus of this study is how the board impacts corporate entrepreneurship. The construct being developed relates the perceptions and attitudes of boards to corporate entrepreneurship.

The perceptions and attitudes of a group of people, such as a board, cannot be measured directly as the data will comprise statements of opinion by individuals that must be interpreted by another individual. Accordingly, a number of risks that are associated with data collection can be identified. Firstly, subjects may choose to modify their views according to what they believe is appropriate for the situation. Second, a subject’s opinions may be inaccurate. Third, the opinions of board members as to their perceptions and attitudes may be inaccurate. Fourth, the researcher’s interpretation of the data may be inaccurate.
While the study cannot completely mitigate these risks, two tactics proposed by Yin (2003) have been adopted to reduce them. Firstly, evidence was collected from multiple directors, multiple companies and multiple sources, to enable within case confirmation and cross-case replication of findings. Second, the chain of evidence comprising interviews, transcriptions and analysis was maintained so that other researchers can review the interpretation of the data.

### 3.8.3 Internal Validity

Yin (2003) describes ‘internal validity’ as whether there is a ‘causal relationship’ between the input being measured and the outcome being observed, as opposed to being a spurious relationship with some other factor producing the outcome being observed.

The current study used three of the four analytical tactics identified by Yin (2003) to achieve internal validity, ‘pattern matching,’ ‘explanation building,’ and ‘addressing rival explanations.’

A pattern matching process compares empirically derived patterns with a theoretically predicted one. In this study, two approaches to pattern matching were used. Firstly, the empirically derived pattern was compared to the a priori specifications of construct that has been developed from the literature review. Second, subsequent constructs were tested to establish theoretical or literal replication across cases.

Explanation building, described by Yin (2003) as a ‘special type of pattern matching,’ (p.120) seeks to build an explanation about a phenomena. That is, ‘to stipulate a presumed set of causal links about it’ (p.120). Such explanations are likely to be in narrative form, ideally reflecting theoretically significant propositions.

In this study, an iterative explanation building process, reflecting that described by Yin (2003) was followed, whereby the findings of the initial case were compared to the a priori specifications of construct. The construct was then revised to reflect the findings
from the comparison. This process was repeated until the construct was consistent with the findings of the case.

The tactic of addressing rival explanations requires the development of theoretical propositions with mutually exclusive patterns of independent variables, which if shown to be valid, preclude other explanations (Yin 2003). In this study, the process of finding a credible explanation involved an iterative process of developing and testing rival explanations until a robust solution was identified.

3.8.4 External Validity
Yin (2003) describes ‘external validity’ as the extent to which the particular set of results generated by a study are generalisable beyond that study. The concept is relevant to case studies as they rely on analytical generalisation as opposed to statistical generalisation.

As replication was achieved across a sample of companies that are similar in terms of their operations, ownership and commercial environment, the findings are generalisable to similar companies. Further work will be required to establish conditions under which the findings of the study can be generalised to companies that share some, but not all of the characteristics of the companies in the sample.

3.8.5 Reliability
Yin (2003) describes ‘reliability’ as the assessment of whether the operations of the study can be repeated by others with the same results so as to minimise errors and biases:

“[T]hat if a later investigator followed the same procedures as described by an earlier investigator and conducted the same case study all over again, the later investigator should arrive at the same findings and conclusions” (Yin 2003 p.37).
Reliability is achieved, in this study, through thorough documentation of the research methodology as presented in the proceeding parts of this document, as suggested by Yin (2003).

3.9 ETHICS APPROVAL

The research component of this project was conducted according to the guidelines published by the Human Research Ethics Committee of Swinburne University of Technology.

An Application for Ethics Approval of a Research Protocol was submitted in October 2005. The Swinburne University of Technology, Faculty of Business and Enterprise Ethics Sub-Committee approved the application.

A letter confirming the committee’s approval, signed by its Chair Associate Professor Linda Brennan, on 9 November 2005, is attached as Appendix 2.

A statement confirming that all conditions pertaining were properly met is attached as Appendix 3.
CHAPTER 4 – FINDINGS

4.1 OVERVIEW

This chapter presents the findings from research that explores “How do boards influence corporate entrepreneurship?” using the methodology described in Chapter 3.

The research question is addressed in two stages. The first stage focuses on the mechanisms through which external factors influence a board, and those through which the board influences management. The second stage focuses on how a board’s characteristics, and in particular its attitudes, perceptions and culture influence a company’s behaviour.

4.2 BOARD OPERATIONS

4.2.1 Overview

The mechanisms whereby external factors influence a board, and those through which a board influences management are explored, thereby addressing “How do boards of companies operate?”

The aim of this exploration is not to determine the basis for a board’s choices, but rather to identify how a board collects information and how its decisions influence a company’s actions. The basis for a board’s choice of an entrepreneurial strategy over another strategy is considered in the next stage of the research.
4.2.2 A Priori Specification of Construct

An a priori specification of construct developed from the literature, as described in the methodology chapter of this document (Section 3.3.2), served as the starting point for the analysis (See Figure 4.1). It comprises nine nodes, representing six board actions and three specific CEO and management actions. The links between the nodes suggest how they might interact with each other and are based on relationships hypothesised in the course of the literature review.

FIGURE 4.1 A PRIORI CONSTRUCT - BOARD OPERATIONS

Codes that were based on the a priori construct were used to group part of the interview data. The match between the data and the a priori construct is indicated by Table 4.1, which shows the number of references associated with each node for the eight director interviews from the first three banks (The first cut of the process was stopped after three banks as patterns had been identified). The columns in the table show the number of directors at each bank who referred to the topic of each node and the number of references that those directors made.

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The data in the table shows that the majority of the references were coded as being related to the development or monitoring of strategy, while a relatively small number were associated with the other codes.

As the entire board of each organisation has not been interviewed, and therefore has not contributed to the assessment of board characteristics, it is not possible to confirm statistically that the views expressed by individual directors represent the position of the board as a whole. Rather, the case study methodology that has been adopted, seeks to cross-reference views expressed by directors with those of at least one other director, and with externally sourced data, and to explain these observations with a supporting rationale.

The table shows that the interviewed directors did not refer to two of the characteristics. In both cases, the characteristics referred to specific responsibilities of management and the board. A review of the transcripts led to these characteristics being redefined. As a
result, ‘CEO & Management Monitor Company Performance’ was replaced by ‘CEO and Management Report Company Performance,’ and ‘Board Appoints CEO’ was replaced by ‘Board Appoints, Incentivises and Assists CEO.’

Analysis of the first eight interviews led the researcher to identify patterns, themes and relationships and to use these to revise the construct. This revised construct was then used as the starting point for repeating the process.

4.2.3 Final Construct

This process was repeated three times as new patterns, themes and relationships led to the construct being revised, and was ended when it no longer did so. The emergent construct was labelled the Final Construct.

Figure 4.2 represents the construct that emerged after four iterations of the process.

![Diagram of Final Construct - Board Operations](image)

FIGURE 4.2 FINAL CONSTRUCT - BOARD OPERATIONS
Four sets of nodes make up the Final Construct. The centre node is an assessment of board aspirations, culture and values; six nodes describe board actions that impact the strategy and operations of the company; four nodes describe the sources of a board’s information; and three nodes describe management actions that are influenced by, or influence board actions. The centre node is connected to all six board actions and all four sources of board information. As well, four of the board actions and two of the sources of board information are connected to specific CEO and management actions.

While the original construct suggested that a board’s actions were primarily a consequence of its analysis of the information that is provided by the management of the company, the research data showed that what Zahra & Pearce (1989) described as the personality of a board, is a key factor in a board’s decision making.

Specifically, a board’s aspirations, culture and values will be influenced by the knowledge that directors gather through their monitoring of a company’s (i) shareholders, (ii) commercial environment, (iii) CEO, and (iv) performance; and by board actions that influence its structure, comprising its (1) choice of chairman, and its (2) management of its membership.

Board actions that influence the management of a company will comprise its (3) appointment of a Chief Executive, (4) involvement in the planning process, (5) influence over the company’s culture and values, and (6) instructions to management.

The extent of the relationship between the data and the Final Construct is indicated by Table 4.2, which shows the number of references associated with each node for the fourteen directors from the five banks. The columns in the table show the number of directors at each bank who referred to the focus of each node and the total number of references made by the directors associated with each bank.

Table 4.2 shows that the majority of the nodes that form the construct were frequently referred to in the interviews. Nodes that are included in the construct but were not frequently referred to, are included either because they were identified from secondary
data or because they are required for logical consistency. An example of the impact of secondary data would be statutory obligations of management to report on a company’s performance, while an example of logical consistency is that if a board shapes a company’s culture and strategy, it is likely to promote it either directly or via the chief executive.

<table>
<thead>
<tr>
<th>TABLE 4.2 FREQUENCY OF REFERENCES - FINAL CONSTRUCT</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Board Aspirations, Culture and Values</strong></td>
</tr>
<tr>
<td>Bank 1</td>
</tr>
<tr>
<td>Directors</td>
</tr>
<tr>
<td>Board Aspirations, Culture and Values</td>
</tr>
<tr>
<td>A. CEO &amp; Mgt Develop &amp; Promote Culture &amp; Strategy</td>
</tr>
<tr>
<td>B. CEO &amp; Mgt Implement Strategy</td>
</tr>
<tr>
<td>C. CEO &amp; Mgt Report Company Performance</td>
</tr>
<tr>
<td>1. Board Chooses Chairman</td>
</tr>
<tr>
<td>2. Board Manages its Membership</td>
</tr>
<tr>
<td>5. Board Promotes Culture and Values</td>
</tr>
<tr>
<td>6. Board Directs Management</td>
</tr>
<tr>
<td>1. Board Monitors Shareholders</td>
</tr>
<tr>
<td>8. Board Monitors Environment</td>
</tr>
<tr>
<td>III. Board Monitors CEO</td>
</tr>
<tr>
<td>IV. Board Monitors Company</td>
</tr>
</tbody>
</table>

Each node’s characteristics are summarised below.

**Centre Node: Board Aspirations, Culture and Values** represents an assessment of board characteristics that are likely to influence how a board impacts a company’s strategic choices. These characteristics are a board’s growth aspirations, its attitudes to entrepreneurial risk and diversification, and the way it interacts with management. The impact of these characteristics is explored in the second stage of the research.
Node (i) – Board Monitors Shareholders is an assessment of the knowledge that a board gathers about the views of its shareholders. This knowledge comes from individual and institutional shareholders through a number of channels including statements made at general meetings, written submissions and individual meetings with shareholders.

Node (ii) – Board Monitors Environment is an assessment of the knowledge that board members gather about what is happening in the commercial environment in which the company operates. This knowledge comes from a range of sources including cross-directorships, industry associations, the media and the business community in general.

The research identified four types of knowledge that a director can bring to a board. These are knowledge that has been: gained as a chief executive, learned as a director of other organisations; gained working in the company’s industry; acquired in a specialist area such as accounting, law, finance or IT.

Node (iii) – Board Monitors CEO is an assessment of the information that a board gathers from and about the CEO. A board will gather this information via its formal and informal interactions with the CEO and management, and from other sources that interact with the CEO, possibly including members of government and the business community. This information is required to evaluate the performance of the CEO.

Node (iv) – Board Monitors Company is an assessment of the information that the board gathers about the performance of the company. A board will receive this information from the CEO, management and external sources including customers, suppliers and regulatory bodies.

Node 1 – Board Chooses its Chairman describes a board’s selection and appointment of its chairman either from within, or from outside of its ranks.

Node 2 – Board Manages its Membership describes a board’s identification, recruitment and retirement of directors.
Node 3 – Board Appoints, Incentivises and Assists CEO describes a board’s identification, recruitment and management of the employment of its chief executive officer.

Node 4 – Board Shapes Company Culture and Strategy describes the actions of a board whereby it influences a company’s choice of culture and strategy of a company.

Node 5 – Board Promotes Culture and Values describes the actions of a board whereby it influences the adoption of its preferred culture and values by a company.

Node 6 – Board Directs Management describes the actions of the board whereby it is directly involved in the management of the company. For example, the board may instruct management to follow a particular course of action.

There are three nodes in the construct that represent the actions of management that interface with the board’s actions. These are included for completeness, and are not analysed in depth.

Node A – CEO & Management Develop and Promote Culture & Strategy describes the actions of the CEO and senior management whereby they develop and promote a company’s culture and strategy.

Node B – CEO & Management Implement Strategy describes the CEO and management’s implementation of an agreed company strategy.

Node C – CEO and Management Report Performance describes the actions whereby the CEO and management will produce reports required to meet statutory obligations such as the annual report and those reports that are prepared for management and/or the board of directors.
The research data for each case was grouped using these codes, analysed and then tested against the emergent model. The findings from this analysis are presented in the next section.

4.2.4 Analysis of the Data

4.2.4.1 Board Aspirations, Culture and Value

The sources of a board’s attitudes to growth, risk and diversification and its preference for interacting with management are characterised as either ‘Codified’ or ‘Adopted.’ Characteristics that are dictated by company law, a company’s constitution, its board charter or another formal document are described as ‘Codified.’ Those that are the result of a board choice are described as ‘Adopted.’ Table 4.3 shows the characteristics of the ‘Centre Node’ for the five cases. Where insufficient information was obtained to determine the source of a board’s attitude, the field was left blank.

<table>
<thead>
<tr>
<th>Centre Node - Board Aspirations, Culture &amp; Values</th>
<th>Bank 1</th>
<th>Bank 2</th>
<th>Bank 3</th>
<th>Bank 4</th>
<th>Bank 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Policy re Growth</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
</tr>
<tr>
<td>- Policy re Business Risk</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
</tr>
<tr>
<td>- Policy re Business Focus</td>
<td></td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
</tr>
<tr>
<td>- Attitude re Role in Management</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>C - Codified</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
</tr>
<tr>
<td>A - Adopted</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**TABLE 4.3** BOARD CULTURE, ASPIRATIONS & VALUES

In each case, the board has adopted its own Aspirations, Culture and Values. That is, they have not been specified in the company’s formal documents, or by its shareholders. Instead, each board’s distinct position has emerged over time as it has gathered knowledge as its membership and leadership has evolved.

The characteristics of each bank’s board are distinct. The board of Bank 1 recognises that the bank does not have the skills required to innovate and believes that its shareholders expect Bank 1 to grow without incurring entrepreneurial risk.
“So it's growth to provide earnings per share to continue to increase by 10% per year” (Bank 1, Director 2, 01:19).

“I've always taken a view and I still would express it here, ‘we can't do the things Macquarie (an entrepreneurial investment bank) can do, the public would expect us to behave differently’” (Bank 1, Chairman, 35:19).

“The staff doesn't have the skill sets to do it, either in the field, or in head office. To run a network like that requires a very different set of skills than a highly centralized model” (Bank 1, Director 1, 34:57).

The board of Bank 2 is less aggressive in its growth objectives, while having similar views with respect to risk and focus.

“There isn't [a growth objective]. Well there is, formally [the chairman] puts out a growth target each year, of the order of eight percent. That's the public number. The system is growing at about that rate. There isn't a growth target as such” (Bank 2, Director 1).

“But we know we've got to face up to the things we can't do successfully, many things. It becomes high risk for us to do it” (Bank 2, Chairman, 30:19).

“Now at some stage, you say, it's not for us. It's not a matter of being innovative. You've got to be realistic about your risk profile and what you're doing, and what you can accomplish” (Bank 2, Chairman, 30:19).

Similar data collected from the boards of Banks 3, 4 and 5 shows that they also have distinct attitudes with respect to growth, risk and focus. This data is included in an extended version of the analysis that is available from the researcher.
The research does not show the origin of these attitudes. However, in the absence of such data, the possible sources of these attitudes can be identified as the knowledge and beliefs of incumbent directors, the knowledge and beliefs brought by new directors and the knowledge that the board gathers over the course of time.

4.2.4.2 Board Knowledge Gathering

A board obtains knowledge from the company’s shareholders, its commercial environment, the chief executive officer, the company’s management team, and from its systems. The processes it employs to do this are characterised as either ‘Codified’ or ‘Adopted.’ This characterisation is presented as Table 4.4.

<table>
<thead>
<tr>
<th>Node (i) - Board Monitors Shareholders</th>
<th>Bank 1</th>
<th>Bank 2</th>
<th>Bank 3</th>
<th>Bank 4</th>
<th>Bank 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Knowledge of Shareholder Profile</td>
<td>C</td>
<td>C</td>
<td>C</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>- Knowledge of Shareholder Views</td>
<td></td>
<td></td>
<td></td>
<td>A</td>
<td></td>
</tr>
<tr>
<td>- Focus on Meeting Shareholder Expectations</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Node (ii) - Board Monitors Commercial Environment</th>
<th>Bank 1</th>
<th>Bank 2</th>
<th>Bank 3</th>
<th>Bank 4</th>
<th>Bank 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Preference for Cross Directorships</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td></td>
</tr>
<tr>
<td>- Preference for Director with Industry Experience</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td></td>
<td></td>
</tr>
<tr>
<td>- Preference for Directors with Technical Expertise</td>
<td>A</td>
<td>A</td>
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<table>
<thead>
<tr>
<th>Node (iii) - Board Monitors CEO</th>
<th>Bank 1</th>
<th>Bank 2</th>
<th>Bank 3</th>
<th>Bank 4</th>
<th>Bank 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>- CEO Required to Maintain Dialogue with Chairman</td>
<td>C</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>- CEO and Chairman in Regular Contact</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Node (iv) - Board Monitors Company</th>
<th>Bank 1</th>
<th>Bank 2</th>
<th>Bank 3</th>
<th>Bank 4</th>
<th>Bank 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Statutory Reporting</td>
<td>C</td>
<td>C</td>
<td>C</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>- Management Reporting</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
<td>A</td>
</tr>
<tr>
<td>- Direct Communication with Management</td>
<td>A</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**C - Codified  A - Adopted**

**TABLE 4.4 BOARD KNOWLEDGE GATHERING**

In each case, the board has access to a core of information that government legislation and market regulations dictate must be published. This information is typically presented in the form of statutory accounts and the company’s annual report. As well,
the board gathers information from shareholders, the commercial environment, the chief executive officer and the management of the company. The board is also informed by information it receives from other companies through cross-directorships.

Examples, from the interview data that show how these mechanisms operate are presented below.

**Node (i) – Board Monitors Shareholders**

While directors aim to represent shareholders, they do not have an effective means to monitor shareholder views. Instead, directors either rely on non-representative samples of shareholder views, or assume that shareholders in general have a preference that the status quo should continue. Under the second scenario, directors assume that if shareholders invest in a bank that is conservative and regional, their preference is for it to continue to be conservative and regional.

“So, you've got to be conscious, we've got lots of mums and dads and we've got conservative institutions whose money is mum's and dad's” (Bank 1, Director 2, 30:59).

“They haven't bought into a third world country bank when they buy us. They bought an Australian, solid performing, dividend franked, income paying bank” (Bank 2, Chairman, 34:42).

“And so, how in this day and age, and it's not a problem that is going to diminish, it's going to get worse, how do institutions find out whether they're expressing the shareholder's views, on whose funds they hold in trust, to me. That's something I always ask them and I never get a good reply” (Bank 3, Chairman, 0:42:01).

The board of Bank 5, a second-tier commercial bank, believes that its membership is representative of the bank’s shareholders. This allows it to assume that their own interests are similar to those of ordinary shareholders.
“That’s another thing that is different about us, the top 20 shareholders have got 16% of the shares, nothing. We are owned by mums and dads, and a big heap of them are here” (Bank 5, Chairman, 15:03).

“I'm either just in or just out of the top 20 shareholders. I'm certainly running it for the shareholders” (Bank 5, Director 3, 24:45).

Bank 5’s directors therefore believe they are justified in approving a change in the bank’s strategic profile, if they see the proposed change as personally attractive.

Node (ii) – Board Monitors Commercial Environment

Boards manage their own membership and therefore have the power to determine the values and the type of knowledge they expect individual board members to bring. For example, the preference of the boards of Banks 1 & 4 is that a high percentage of directors have been chief executives of comparable companies, whereas this is not the case for the boards of Banks 2, 3 & 5.

“I'm a believer in the multi-chief executive board. I'm not a great believer in the clamor in recent times, and the financial journalist's wisdom, there's a contradiction in terms, that bank boards needed bankers” (Bank 4, Former Chairman, 13:27).

“What's more important I think, than whether they are chief executives, or not, or former chief executives, they are all current directors of major Australian companies. So they happen to know the corporate world pretty well” (Bank 4, Former Director, 56:16).

The advantage of having a large number of chief executives on a board appears to be an empathetic relationship with management, while boards with a small number of chief
executives will be comprised of professional directors and technical specialists who provide specialist skills and access to business networks.

A significant majority of Banks 1, 2, 3, & 4 directors serve on comparable boards. This reflects director’s comment that the knowledge that directors gain from serving on one board is valuable to other boards. Conversely, only one Bank 5 director serves on a comparable board.

Boards have diverse views as to the need for commercial banking industry experience on bank boards. While directors on the boards of Banks 1 and 3 said that the presence of directors with industry experience would ensure the board had the required industry knowledge, those on the boards of Banks 2, 4 and 5 regarded the provision of such knowledge as the domain of management. The number of directors with industry experience on each board reflects these views.

“I'm happier sitting on a board where I've got people who understand the banking industry. I don't want a whole lot of them. To me, good boards have a mixture of skills” (Bank 1, Director 2, 16:19).

“We don't have any big banking people in the board. We do have plenty outside, who've worked for the big four banks, and who know, at whatever level they've come out of their bank into ours. We've got it out where it counts, at the coalface, but around the table we don't have big banking theory” (Bank 5, Chairman, 1:36:08).

Industry data shows that board preference for directors with industry or CEO experience varies in response to current events. After the interviews were completed, following a business crisis, the board of Bank 4 recruited directors with specialist financial experience (Annual Reports Bank 4 2000, 2006, 2009). That is, directors are recruited who bring specialist skills that reflect the board’s needs at particular point in time. All of the boards have at least one accountant, most have a lawyer, and some have IT specialists or investment bankers.
“We have a director [...], who was [a technical specialist] for [a major company]. He's a [particular specialist] and prior to retiring to be a non-executive and consultant he was CEO of [a high-tech company]. He's an expert. So he's got the overall thing and management know a lot” (Bank 2, Chairman, 40:47).

“[Y]ou take a diversity of people there, who are plugged into society and you want them with an international flavour as well and perhaps that's why I was brought onto the board of [company name], to understand and see what's going on elsewhere in the world and say “Hey, why can't we do this here? We should be doing this here.” That's what boards do” (Bank 3, Chairman, 01:47:42).

Node (iii) – Board Monitors CEO
The chairman is the focus of a board’s relationship with its CEO. The relationship is complex in that it is essentially informal, as the obligation for the CEO to share information with the board is not codified, and therefore is dependent on the relationship between the CEO and the chief executive. The data suggests that while chairmen seek an open relationship whereby they are fully informed about events at the company, the reality is that chief executives may choose to limit the information that is shared.

“The important role for the chairman is to make sure that the chief executive doesn't unnecessarily or unwittingly lose credibility for the wrong reasons. He needs to have the capacity to understand how his fellow directors are likely to see an issue, and how they are likely to react to something that the chief executive is going to bring to them and if he thinks the reaction is going to be particularly adverse, to let the chief executive know about that and help him to understand why before he loses credibility in the eyes of the board”(Bank 4, Former Chairman, 27:33).
“[M]y view as I've expressed to [the MD], I think most chairman will tell you, ‘we don't want any surprises. I don't want to read about it in the press’” (Bank 1, Chairman, 09:41).

Node (iv) – Board Monitors Company

Information that is provided by the company to the board is comprised of two types: information that is dictated by statutory obligations and general information that is needed by the board to understand the business and guide the development of strategy. The quality of the second of these types of information is determined by the willingness of individuals to share information and their judgement as to what information is important.

Every board meeting begins with one or more presentations from different parts of the business, that have a strategic focus not a tactical focus. If they are tactical, it's the extent to which they are saying, ‘These are the top five things we thought were necessary in order to deliver the strategy, these three worked, this one we haven't started and this one was such a mistake we don't know how to tell you,' kind of thing” (Bank 1, Director1, 35:55).

“I have a view that boards shouldn’t be getting any different information to management. We should be looking at the same things as driving the success of the business. So there’s a close alignment there in terms of what it is that makes the business successful and what comes out of the information pack, which is very disciplined” (Bank 2, Director 2, 12:32).

“The culture was one of ‘don't tell the board anything. Secrecy. We need our perks,’ and all this shit, and, the cost was enormous” (Bank 2, Director 1. 15:01).

The board of Bank 5, a second-tier commercial bank, regularly delves deeper into strategic issues by meeting with the staff outside board meetings.
“In a board of eight, someone picking on something and really getting into it and the rest are not interested or are at a higher level and you really want to, you know, it's like ‘OK. Well Jack, how about I get such and such to give you a call and they can step you through it. You can have those answers, and perhaps take some time with Jack to get comfortable with that issue’” (Bank 5, Director 1, 58:42).

Bank 5’s approach did not appear to be followed at any of the larger banks. This may be a consequence of scale.

4.2.4.3 Board Influences Company Strategy

A board influences company strategy through its choice of chairman, its management of its membership, its appointment and management of a chief executive, its influence over the development of corporate strategy, its promotion of its preferred culture and values, and its direction of management. The mechanisms it employs to gather this knowledge are characterised as either Codified or Adopted. This characterisation is summarised as Table 4.5.
### TABLE 4.5 BOARD ACTIONS INFLUENCING COMPANY STRATEGY

In each case, government legislation and market regulations provide the board with the authority to act, but do not dictate how it should act. A board’s actions are consequently determined by its aspirations, culture and values. The details of these findings are discussed below.

**Node 1 – Board Selects and Appoints Chairman**
While a board’s authority to appoint a chairman is codified in a company’s constitution, its selection process, including the basis for choosing one individual over another is dependent on the joint decisions of the individuals who are members of the board at the time.

<table>
<thead>
<tr>
<th>Node</th>
<th>Board Selects and Appoints Chairman</th>
<th>Authority to Select and Appoint Chairman</th>
<th>Process to Select and Appoint Chairman</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 1</td>
<td>C</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>Bank 2</td>
<td>C</td>
<td>C</td>
<td>C</td>
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<tr>
<td>Bank 3</td>
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<tr>
<td>Bank 4</td>
<td>C</td>
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<td>C</td>
</tr>
<tr>
<td>Bank 5</td>
<td>C</td>
<td>C</td>
<td>C</td>
</tr>
</tbody>
</table>

**Node 2 – Board Manages Its Membership**

<table>
<thead>
<tr>
<th>Node</th>
<th>Authority to Select and Appoint Directors</th>
<th>Process to Select and Appoint Directors</th>
<th>Responsibility to Manage Performance of Directors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 1</td>
<td>C</td>
<td>C</td>
<td>C</td>
</tr>
<tr>
<td>Bank 2</td>
<td>A</td>
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<td>A</td>
</tr>
<tr>
<td>Bank 3</td>
<td>A</td>
<td>C</td>
<td>C</td>
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</table>

**Node 3 – Board Selects, Appoints and Incentivises CEO**

<table>
<thead>
<tr>
<th>Node</th>
<th>Authority to Select and Appoint CEO</th>
<th>Process to Select and Appoint CEO</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 1</td>
<td>C</td>
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<td>Bank 5</td>
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</table>

**Node 4 – Board Shapes Structure and Strategy**

<table>
<thead>
<tr>
<th>Node</th>
<th>Responsible for Adopting Strategy</th>
<th>Establishment Broad Objectives</th>
<th>Development of Structure and Strategy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 1</td>
<td>C</td>
<td>C</td>
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<tr>
<td>Bank 2</td>
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<td>Bank 3</td>
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</table>

**Node 5 – Board Promotes Culture and Values**

<table>
<thead>
<tr>
<th>Node</th>
<th>Identification of Preferred Culture</th>
<th>Promotion of Preferred Culture</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 1</td>
<td>A</td>
<td>A</td>
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<tr>
<td>Bank 2</td>
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<td>Bank 3</td>
<td>A</td>
<td>A</td>
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</tbody>
</table>

**Node 6 – Board Directs Management**

<table>
<thead>
<tr>
<th>Node</th>
<th>Authority to Delegate</th>
<th>Delegation of Operational Responsibilities</th>
<th>Participation in Management</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 1</td>
<td>C</td>
<td>C</td>
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<tr>
<td>Bank 2</td>
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</table>

**C** - Codified  
**A** - Adopted
While the process, and the basis of a board’s decisions are generally hidden behind the cloak of boardroom confidentiality, the chairman of Bank 5 was prepared to describe the collegiate nature of internal board negotiations. These examples highlight the ability of incumbents to protect the board’s culture.

“Then, in ‘86, they made me chairman, with the excuse that I was the only one young enough to be it. No skills, just ‘you're the only one who's young enough.’ The rest were pretty old” (Bank 5, Chairman, 39:33).

“Then they said ‘No. We think it's coming to the end of your term now, but you tell us. You've been here too long not to have the choice of picking it.’ We talked about when and how we'd go about getting new directors, and I said ‘Well, I want to be involved in the new directors, their selection, and I want to help them onto the board. So, I will step down as chair, just prior to the start of our strategy meeting’ (Bank 5, Chairman, 1:34:41).

Node 2 – Board Manages its Membership

Boards have the authority to appoint directors and use this authority to recruit directors who will fit culture of the board and have the skills and knowledge needed by the board.

Historically, the focus of board appointments was the recruitment of ‘like-minded’ individuals who the board was confident would adopt the board’s behavioural norms and work with the other directors to achieve consensus. This focus led to many appointments being made from a small pool of individuals who were personally known to the serving directors.

“Directors picked themselves, they picked their mates. AAAA was a great mate of BBBB’s. The XXYY Club, if you weren't a member of the club . . . . . “ (Bank 1, Chairman, 30:52).
Over the last few years, Australian bank board practices have been modified to reflect the *Principles of Good Corporate Governance and Best Practice Recommendations* published by the Australian Stock Exchange (2003, 2006)

“For the first time, they used executive search to recruit. They had a panel interview, where they were explicitly asking what do you think you can do to make [Bank 1] grow. What are your ideas about how the bank could perform better?” (Bank 1, Director 1, 24:04).

However, while conforming to the requirements of the ASX guidelines, boards have retained procedures that are designed to test the cultural fit of new directors. These procedures typically involve the use of executive search consultants to identify suitable candidates, followed by reference checks and interviews with members of the board.

“Potential board members probably get blacklisted in the case if there are 10 names and I don't like him, I don't like him or her. So you work backwards to get a short-list that more or less, no one has got any great objections to. That means there is a case of interviewing them, are you comfortable with them, and individually how do you feel” (Bank 1, Chairman, 01:03).

“Ideally culture, but it's a hard thing to do. You don't know what a person's cultural views are. People change their cultural views depending on what organization they may be in at any particular time” (Bank 3, Chairman, 58:43).

The ASX recommendations have also led to the boards in the sample adopting procedures whereby they have established governance committees and introduced formal performance evaluation of individual directors and the board as a whole, and systems for ongoing board renewal.

“We are basically adopting an unofficial 12 year rule, whereby you wouldn't go on more than 12 years, or face the electorate after 12 years, unless there was a resolution from the board that everyone wanted you to stay on, and that's
unlikely. It's unlikely a resolution would ever be put” (Bank 1, Chairman, 2-00:15).

Node 3 – Board Selects, Appoints and Incentivises CEO

The constitutions of the banks in the study give their boards the authority to appoint a chief executive officer and to delegate any or all of their responsibilities to that person. This authority is complemented in several of the cases by a board charter that extends the formal role of the board to mentoring and guiding the chief executive, and for the succession planning required for future appointments.

Directors regard the appointment of a chief executive as their most important responsibility because of its potential impact on the performance of the company.

“The main job? It's not the main job, because you only do that once every number of years. It's probably the most important job you do” (Bank 1, Director 2, 30:24).

In the absence of codified guidelines, a board’s appointment and management of a chief executive will depend on the personal opinions of the individual board members.

“There are a couple who are stand-outs, who are able to answer every question. They really know the answer. There are others, who it has not been their management style to perhaps know as much detail. Is that good or bad? It's just different styles. You can tell. You can pick the ones who have really had a diverse experience. The diversity of experience is what I'd be looking for. I wouldn't look for someone who'd just had one, diversity across experience. We've got some standouts, but we have, happy to choose from. As I said, I'm damn sure we'd also get good external applicants” (Bank 5, Director 1, 56:45).
Node 4 – Board Shapes Structure and Strategy

While the directors in the sample view one of their key roles as being to guide management’s development of corporate strategy, the way they perform this role varies.

“The board will say, ‘That's our objective, to achieve at least 10% EPS growth a year’ and management will put forward a plan as to how they are going to do that’” (Bank 1, Director 2, 01:19).

“The board has a role in broad strategy. It would have a retreat for a couple of days a year with management. You are then talking with 'whether we go international, and if so which countries and whether we buy-in or set-up and how much of our shareholder funds we are prepared to put into it; or should we buy [company], which we did last year. Should we bulk up and go into New Zealand? That can be a joint decision and then management brings forward the process. So for diversification, major moves, or country entry, or getting into new areas well established, but not in which we're operating, that can come out of the board's strategy management meeting. But a new product? Probably not. Broad strategy, more of the same, different areas, an area that someone else is operating in, and where not, but should, or merging with someone, yes. Some innovative product? No” (Bank 2, Chairman, 01:00).

“By and large, management takes the lead and the board approves, rejects, modifies, monitors and stuff” (Bank 4, Former Director, 12:02).

“I didn't support it because I'd seen other [similar businesses], and I wasn't sure what we were achieving by it all and I could see it was going to be a public and time consuming episode. Why would we? The debate was had. [The managing director] thought strongly about it. He wanted to get involved in it. People supported him. It's been one of those things that everyone knows
about. It was a relatively minor investment that we ended up making” (Bank 5, Director 2, 29:04).

In general terms, boards set broad objectives for management and then reviews the strategies that management develops. The objectives provided by the board range from a simple growth objective to a desire that management changes an organisation’s culture. The approach taken by a particular board appears to depend on the culture and values of that board.

Node 5 – Board Promotes Culture and Values
Boards seek alignment between the board’s and the company’s culture.

“I think the Chair has a huge role to play on the culture of the board. I think the board’s size has a huge part to play on how effective the board works. I think that the culture of the board and the culture of the organization and the degree of compatibility between those two is very, very important.” (Bank 3, Chairman, 1:00:04).

“[T]he board first-of-all saw the need for [the second last CEO] to go because he was profligate and brought in [the previous CEO].
[That CEO] calmed the ship and got change but wouldn't change the culture.
Then the board said, "Well, it's necessary to have cultural change in this place, and we do need a [executive with industry experience].”
So, we got [the current CEO].
You could say, that's about all the board has done. But it's also about all the board has needed to do” (Bank 2, Director 1, 17:01)

Node 6 – Board Directs Management
While boards in the sample recognise that as they are responsible for the management of the company, they have the authority to direct management, they share the view that management should be the responsibility of the Chief Executive.
“I mean you don’t want a Board that in the end, questions everything you do, and wants to get involved. I know what happens, management say, ‘Stuff-it. Make them run it’” (Bank 1, Chairman, 33:05).

“[H]e’s employed to do the job and has got to get on with it. He shouldn't have me breathing down his neck” (Bank 1, Chairman, 08:23).

“You can't, because your job is not to run the place, it's their job to run the place. You've got, to some extent, rely upon your judgment that what they're going to come forward with, is going to be satisfactory to the risk profile of your shareholders” (Bank 1, Director 2, 30:59)

The reasons for a board’s actions or the factors that lead it to prefer one culture or set of values to another, are likely to be a function of a board’s aspirations, culture and values. This relationship is explored in the next section of this document.

4.2.4.4 Management Interface

The three nodes in the construct that represent the actions of management that interface with the board’s actions are included for completeness. In this study, they are not analysed in depth.

Node A – CEO & Management Develop and Promote Culture & Strategy

The data presented above shows that the board generally establishes guidelines and then delegates responsibility for the CEO and management to develop and promote culture and strategy for the organisation.

Node B – CEO & Management Implement Strategy

The board generally delegates to the CEO and management responsibility to implement the company’s strategy.
Node C – CEO and Management Report Performance

The CEO and management are delegated responsibility for reporting on the performance of a company. This reporting will include reports required to meet statutory obligations such as the annual report and reports that are prepared for the board of directors.

4.3 BOARD CORPORATE ENTREPRENEURSHIP POTENTIAL

4.3.1 Overview

The second stage of the research builds on the first stage by exploring the relationship between those characteristics of the board that influence its promotion of an entrepreneurial strategy (In aggregate, its Board Corporate Entrepreneurship Potential or BCEP) and a company’s Corporate Entrepreneurship (CE), thereby addressing “How do the characteristics of a board influence corporate entrepreneurship?”

4.3.2 A Priori Specification of Construct

4.3.2.1 Overview

The starting point for this analysis is an a priori specification of construct, developed from the literature that was described in the methodology chapter of this document. The a priori construct is modelled on Krueger & Brazeal’s (1994) construct of Entrepreneurial Potential as described in the literature chapter of this document (See Figure 4.3).

The a priori specification of construct comprises fourteen nodes, representing five board and seven management characteristics, the occurrence of precipitating events and evidence of corporate entrepreneurship. The linkages between the nodes of the construct show relationships that were developed from the literature.
The interview data was coded, using codes based on the a priori construct. Interviews of nine directors from three banks were then analysed to assess the match between the data and the construct. The number of directors at each bank who referred to each of the characteristics suggested by the a priori construct, and the number of references made by those directors is shown in Table 4.6 (The codes associated with each node are not sequential as for consistency they match those used in the final construct).
TABLE 4.6 FREQUENCY OF REFERENCES - A PRIORI CONSTRUCT

As the entire board of each organisation has not been interviewed, and therefore has not contributed to the assessment of board characteristics, it is not possible to confirm statistically that the views expressed by individual directors represent the position of the board as a whole. Rather, the case study methodology that has been adopted, seeks to cross-reference views expressed by directors with those of at least one other director, and with externally sourced data, and to explain these observations with a supporting rationale.

The data shows that for some banks, the interviews did not provide evidence of entrepreneurial activity. In such situations, external data will be used to characterise the entrepreneurship and innovation at the banks associated with the case.
4.3.2.2  Assessment of A Priori Construct (First Iteration)

The references that were collected for each of the board and management characteristics were analysed to assess their consistency with the a priori construct. Data that conflicted with the a priori construct was used to develop a more reliable construct. Following are examples of conflicts with the a priori construct that were identified and the changes that were made to the a priori construct that were made as a result:

*Node A – Board’s Growth Aspiration* is not a reliable predictor of *Node D – Board’s Attitude as to CE Desirability* as directors in some cases believe that banks can achieve their growth targets through organic as opposed to entrepreneurial growth.

*Node C – Board’s Perception of CE Feasibility* is not a predictor of *Node D – Board’s Attitude as to CE Desirability*. Directors’ views as to the desirability of corporate entrepreneurship appear to be independent of their perception of its feasibility. That is, directors may perceive that while entrepreneurship is feasible, it is not desirable.

These observations led the incorporation of a node in the construct, subsequently labelled *Node E – Board CE Credibility*. This node is based on Shapero’s (1980) construct of ‘Credibility,’ as discussed in the literature review of this document, where credibility is a function of a board’s attitude as to CE desirability and the a board’s perception as to its feasibility.

The relationships between the ‘Board Nodes’ and the matching ‘Management Nodes’ suggested in the a priori construct were revised after the data was reviewed:

While *Node C – Board’s Perception of CE Feasibility* is likely to be influenced by *Node 2 – Management’s Perception of CE Feasibility* while the reverse relationship is unlikely, as management will rely on its knowledge of its own skills as opposed to the board’s opinions of its skills.

*Node D – Board’s Attitude as to CE Desirability* and *Node 4 – Management’s Attitude as to CE Desirability* are likely to be influenced by each other as a board is likely to
recruit a CEO that shares views as to the desirability of CE and is likely to be influenced by that CEO’s view as to its desirability in specific situations.

Similarly, the relationship between Node A – Board’s Growth Aspiration and Node 1 – Management’s Growth Aspiration is likely to be two-way as the interviews suggest that the board and management will negotiate an agreed growth target.

A relationship between Node E – Board CE Credibility and Node 4 – Management’s Attitude as to CE Desirability is hypothesised. That is, if a board aspires to grow the business and views corporate entrepreneurship and innovation as both feasible and desirable, it is likely to influence management’s attitude about its desirability. This relationship will be tested in the course of this analysis.

A common theme identified in the interviews was that directors were concerned about the entrepreneurial risk profile of their organisation. The identification of this theme led to the construct being revised to include nodes labelled Node B – Board’s CE Risk Preference and Node 2 – Management CE Risk Preference, where CE risk is recognised by directors as being distinct from operational or financial risk.

The interview transcripts were then recoded to identify references to these additional nodes and their relationship to other nodes. The number of references to each of these nodes is shown in Table 4.7.

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<thead>
<tr>
<th></th>
<th>Bank 2</th>
<th>Bank 4</th>
<th>Bank 5</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>Directors</td>
<td>References</td>
<td>Directors</td>
</tr>
<tr>
<td>B. Board’s CE Risk Preference</td>
<td>2</td>
<td>9</td>
<td>1</td>
</tr>
<tr>
<td>Z. Management’s CE Risk Preference</td>
<td>1</td>
<td>4</td>
<td>1</td>
</tr>
</tbody>
</table>

TABLE 4.7 FREQUENCY OF REFERENCES - CE RISK PREFERENCE

The analysis of this data led to these nodes being added to the construct. These nodes were characterised as being linked to each other and to perceptions of feasibility. The
rationale is that if the board or management is reluctant to accept entrepreneurial risk, it is unlikely that entrepreneurship will be regarded as feasible.

4.3.3 Final Construct

This testing and revision procedure was repeated five times as new patterns, themes and relationships led to the construct being revised. The process was ended when analysis did not lead to the identification of new patterns, themes or relationships. The emergent construct was labelled the Final Construct and is represented by Figure 4.4.

FIGURE 4.4 FINAL CONSTRUCT - BOARD CORPORATE ENTREPRENEURSHIP POTENTIAL
The final construct links seven board characteristics and nine management characteristics with the occurrence of precipitating events and evidence of corporate entrepreneurship. It suggests that a board’s influence on corporate entrepreneurship depends on its growth aspirations, its perceptions and attitudes with respect to corporate entrepreneurship and the extent of its engagement with management. By implication, a hands-off board will have little influence one way or the other.

The construct proposes a similar relationship between management characteristics and corporate entrepreneurship with an added dimension being the board’s influence over management.

The relationship between the data and the Final Construct nodes is shown by Table 4.8, which lists the number of references associated with each node from the 14 director interviews across the six cases. The columns in the table show the number of directors at each bank who referred to the focus of each node and the total number of references made by the directors associated with each bank.

Table 4.8 shows that while most of the nodes in the construct were referred to in the interviews, the nodes relating to Board CE Credibility and Management CE Credibility and those relating to Board CE Potential and Management CE Potential attracted few references. This is because these nodes are constructions that are derived from other nodes.
A review of the interview data relating to each of these characteristics has been used to develop criteria for assessing each characteristic. These are presented in turn:

**Node A – Board’s Growth Aspiration** is an assessment of a board’s objective as to how fast an organisation should grow. This objective will both influence and be influenced by the management team’s growth objective. It is a key precursor to its budgets and strategic plans.

Growth aspirations are classified as belonging to one of three types each with distinct criteria as illustrated by Figure 4.5.
Node B – Board’s Corporate Entrepreneurship Risk Preference is an assessment of a board’s preference for entrepreneurship risk-taking by the organisation. This is a group preference and may differ from the individual risk preferences of some, or even all of the directors. The board’s preference may be influenced by the views of management and similarly may influence the views of management. It is distinct from a bank’s financial risk preference.

Boards were identified as displaying one of three preferences as illustrated by Figure 4.6.

Node C – Board’s Perception of Corporate Entrepreneurship Feasibility is a board’s assessment of the capability of the company to implement an entrepreneurship strategy. Its view may be influenced by management’s assessment of its own capabilities.
While boards in the sample had either a positive or a negative perception, conceivably a board might not have a view. Hence, three classifications are proposed as illustrated by Figure 4.7.

**FIGURE 4.7 BOARD’S PERCEPTION OF CE FEASIBILITY**

- **Node D – Board’s Attitude as to Corporate Entrepreneurship Desirability** is an assessment as to whether a board believes that corporate entrepreneurship will be beneficial for the organisation.

  Boards in the sample perceived that entrepreneurship was either undesirable or desirable. As with perceptions of feasibility, a board might not have a view. Three classifications are proposed as illustrated by Figure 4.8.

**FIGURE 4.8 BOARD’S ATTITUDE AS TO CE DESIRABILITY**

- **Node E – Board Corporate Entrepreneurship Credibility** is modelled on Shapero’s (1980) construct of an individual’s perception that entrepreneurship is credible. In the
case of a board, it is a product of three other board characteristics – *Perceived Feasibility*, *Attitude as to Desirability* and *Growth Aspiration*. Conceptually, if a board does not view entrepreneurship as either feasible or desirable, it will not be a credible option. Similarly entrepreneurship will be a more credible option for a board with an aggressive growth aspiration than for one with a modest growth aspiration.

Table 4.9 shows how the three characteristics determine CE credibility. The order of the columns reflects the relative importance of each factor – feasibility is the most important as if entrepreneurship is not feasible, the other criteria are irrelevant. Similarly, if it is desirable, then growth will be sought via other strategies.

<table>
<thead>
<tr>
<th>Perceived Feasibility (Figure 4.7)</th>
<th>Attitude as to Desirability (Figure 4.8)</th>
<th>Growth Aspiration (Figure 4.5)</th>
<th>CE Credibility</th>
</tr>
</thead>
<tbody>
<tr>
<td>Positive</td>
<td>Desirable</td>
<td>Very Aggressive</td>
<td>Very High</td>
</tr>
<tr>
<td>Positive</td>
<td>Desirable</td>
<td>Aggressive</td>
<td>High</td>
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<td>Positive</td>
<td>Desirable</td>
<td>Modest</td>
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<td>Positive</td>
<td>Neutral</td>
<td>Very Aggressive</td>
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<td>Positive</td>
<td>Neutral</td>
<td>Aggressive</td>
<td>Moderate</td>
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<td>Positive</td>
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<td>Neutral</td>
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<td>Neutral</td>
<td>Undesirable</td>
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<td>Low</td>
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**TABLE 4.9 BOARD CE CREDIBILITY**

*Node F – Board Engagement with Management* is an assessment of the extent to which a board is engaged in the management of an organisation. This characteristic varies from company to company and can be classified as being at one of three levels as illustrated by Figure 4.9.
FIGURE 4.9 BOARD ENGAGEMENT WITH MANAGEMENT

**Node G – Board Corporate Entrepreneurship Potential (BCEP)** is an assessment of the extent to which a board promotes the adoption of an entrepreneurial strategy by management. It is a function of the extent of board participation and a board’s attitude as to corporate entrepreneurship and innovation credibility. BCEP will be high if a board regards corporate entrepreneurship as credible and is actively involved in the management of the organization.

BCEP is defined according to the levels of board **CE Credibility** and **Engagement with Management** as shown by Figure 4.10.

FIGURE 4.10 BOARD CE POTENTIAL

The data relating to the nine management characteristics included in the model (See Figure 4.4) does not include interviews with management and instead is based on a
combination of theoretical and board perspectives. While the analysis of management characteristics is less developed than that relating to the board of directors, this does not affect the reliability of the findings, as the relationship between the characteristics of the board and corporate entrepreneurship can be established without confirming the role of management.

**Node 1 – Management’s Growth Aspiration** is an assessment of the management team’s objective as to how fast an organization should grow. It is likely to be influenced by the board’s growth aspiration.

**Node 2 – Management’s Corporate Entrepreneurship Risk Preference** is an assessment of the entrepreneurship risk preference that management adopts when developing strategy for the organisation. It is likely to be influenced by the board’s entrepreneurship risk preference. It is distinct from management’s operational and financial risk preference.

**Node 3 – Management’s Perception of CE Feasibility** is an assessment of the self-efficacy of the management team with respect to corporate entrepreneurship.

**Node 4 – Management’s Attitude as to CE Desirability** is an assessment of whether the members of the management team believe that corporate entrepreneurship will be beneficial both for the organization. It is likely to be influenced by whether the board regards corporate entrepreneurship as credible.

**Node 5 – Management Corporate Entrepreneurship Credibility** is, like its counterpart **Board Corporate Entrepreneurship Credibility**, modelled on Krueger and Brazeal’s (1994) assessment of whether an individual regards entrepreneurship as a credible strategy. In the case of management, corporate entrepreneurship will be perceived as credible if management perceives it as feasible for the organization, if management has growth aspirations for the organization and if management perceives that corporate entrepreneurship will be beneficial for the organization.
Node 6 – Management’s Propensity to Act is an assessment of a management team’s willingness to act when presented with an opportunity.

Node 7 – Management Corporate Entrepreneurship Potential is an assessment of the extent to which a management team when faced with a precipitating event will take advantage of the opportunity presented. It is likely to be influenced by board corporate entrepreneurship potential.

Node 8 – Management’s Corporate Entrepreneurship Intentions represent a conscious decision by management to pursue an entrepreneurial opportunity.

The use of intentions in this situation is an extension of Ajzen’s (1991) theory of planned behaviour which proposes that an individual’s intentions are a reliable predictor of behaviour. The advantage of focusing on intentions as opposed to outcomes is that intentions can be assumed to be a deliberate action by an individual or an organisation, whereas an outcome may be a consequence of another stimulus. For example, the roll-out of new products might a consequence of corporate entrepreneurship, or it might be consequence of a supplier’s initiative.

The organisations in the sample can be characterised as having one of three types of corporate entrepreneurship intentions as shown by Figure 4.11.

![Figure 4.11](image)

<table>
<thead>
<tr>
<th>Limited</th>
<th>Moderate</th>
<th>Aggressive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Limited</td>
<td>Management focuses on organic growth</td>
<td></td>
</tr>
<tr>
<td>Moderate</td>
<td>Management executes entrepreneurial projects</td>
<td></td>
</tr>
<tr>
<td>Aggressive</td>
<td>Management promotes an entrepreneurial culture</td>
<td></td>
</tr>
</tbody>
</table>

FIGURE 4.11 MANAGEMENT’S CEI INTENTION

Node 9 – Management Initiates Corporate Entrepreneurship is the likely consequence of Management’s Corporate Entrepreneurship Intention.
Node a – Corporate Entrepreneurship Precipitating Events is an adaptation of Shapero’s (1980) concept of the precipitating event that is a catalyst for entrepreneurial action.

Node b – Evidence of Corporate Entrepreneurship is an assessment of corporate entrepreneurship activity at an organisation as shown by Figure 4.12.

FIGURE 4.12 EVIDENCE OF CORPORATE ENTREPRENEURSHIP

The assessment of corporate entrepreneurship deliberately does not rely on the assessment of Entrepreneurial Orientation based on the constructs described by Miller (1983) or those described by Lumkin and Dess (1996) as either approach would require a complex analysis of a large amount of information that would be difficult, if not impossible, to acquire and analyse given the scale of the organisations involved. Instead, the assessment relies on information provided by the directors interviewed and information that has been publicly released by the company.

The three-point scale that has been adopted is developed from the analysis of the five forms of entrepreneurship that is presented in the review of the Corporate Entrepreneurship literature. It classifies companies according to the type and scale of their corporate entrepreneurship.
4.3.4 Application of the Model to Data - Banks 1, 2, 4, & 5

4.3.4.1 Overview

Each case involves the study of a single bank with research data comprising director interviews and material published by the bank and by external parties.

The research was undertaken in two parts. In the first part, Banks 1, 2, 4, & 5 were studied. For each of these banks, two or more directors were interviewed. The transcripts were then analysed to allow the characteristics of each bank’s board to be determined.

The results of this analysis are presented in Table 1. Subsequently, after this part of the research was completed, additional research involving, Banks 3 and 6, was undertaken to test these findings.

<table>
<thead>
<tr>
<th>Bank 1</th>
<th>Avoid</th>
<th>Negative</th>
<th>Undesirable</th>
<th>Aggressive</th>
<th>Low</th>
<th>Reacts</th>
<th>Very Low</th>
<th>Limited</th>
<th>Minimal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bank 2</td>
<td>Avoid</td>
<td>Negative</td>
<td>Undesirable</td>
<td>Modest</td>
<td>Low</td>
<td>Engages</td>
<td>Very Low</td>
<td>Limited</td>
<td>Minimal</td>
</tr>
<tr>
<td>Bank 4</td>
<td>Accept</td>
<td>Positive</td>
<td>Desirable</td>
<td>Aggressive</td>
<td>High</td>
<td>Influences</td>
<td>High</td>
<td>Moderate</td>
<td>Significant</td>
</tr>
<tr>
<td>Bank 5</td>
<td>Limit</td>
<td>Positive</td>
<td>Desirable</td>
<td>Very</td>
<td>Very</td>
<td>Engages</td>
<td>High</td>
<td>Aggressive</td>
<td>Extensive</td>
</tr>
</tbody>
</table>

**TABLE 4.10 BOARD CHARACTERISTICS AND CE - I**

Table 4.10 summarises the findings from the first four banks. The categorisation of board perceptions and attitudes is drawn from the content of the interviews comprising each case. A sample of the content used to assess these characteristics is presented.
below. A more detailed compilation of relevant content is available from the researcher.

4.3.4.2 Bank 1

Bank 1’s board aims to avoid entrepreneurial risk.

“Nowadays, if you sit around a board table, the first thing a director thinks about is ‘Am I exposed here?’ I can tell you that it happens on all boards. Even I am guilty of it” (Bank 1, Chairman, 32:45).

“So we worry much more about the downside than the upside” (Bank 1, Director 1, 04:08).

Corporate entrepreneurship is perceived by the board of Bank 1 as not being feasible, as the bank’s management is not capable of exploiting the small number of opportunities that are available.

“The windows of opportunity, to be different in an oligopoly, virtually don’t open” (Bank 1, Director 1, 38:10).

“People who have been brought up in working in banks for the last 20 years, it’s not in their nature to be quick to innovation” (Bank 1, Director 2, 26:54).

The board also believes that corporate entrepreneurship is not required, as the bank’s growth will be driven by its natural momentum.

“I think if you are smaller in any industry, particularly in very mature industries, you’ve got to be far more entrepreneurial than if you’ve got this natural momentum that's you, that sort of drives you on” (Bank 1, Director 2, 24:11).

The board has an aggressive growth aspiration of 10% per annum.
“The board will say, “That's our objective, to achieve at least 10% EPS growth a year”” (Bank 1, Director 2, 01:19).

The board’s corporate entrepreneurship credibility can be characterized as low, as despite its growth target, it does not regard CE as either desirable or feasible:

“We’ve looked at non-organic growth, and none of it seems to make sense at the present time” (Bank 1, Director 2, 01:19).

Bank 1’s board sees its role as being to review management’s decisions rather than to lead management:

“I'm a believer that boards are the final check or arbiter. I don’t think boards can actually show strategic leadership unless management is pretty poor” (Bank 1, Chairman, 37:02).

“The board will say, “That’s our objective, to achieve at least 10% EPS growth a year,” and management will put together a plan as to how they are going to do that” (Bank 1, Director 2, 01:19).

Board corporate entrepreneurship potential is characterised as very low as board corporate entrepreneurship credibility is low.

Management’s corporate entrepreneurship intentions are limited as its focus is on organic growth

“In my definition of entrepreneurial, I would have thought they're not too entrepreneurial. . . . We’ve got organic growth and we are absolutely dedicated to making organic growth work and pushing it” (Bank 1, Chairman, 10:54).
A review of public data suggests that over the last five years Bank 1’s strategic focus has been operational and that any strategic renewal does not involve entrepreneurship. Instead, management has aimed to grow the bank through incremental improvements to the bank’s quality of service through staff training, branch renovations, systems upgrades, and promotion. Over this period, the bank’s growth in revenues has reflected the national growth in credit. Evidence of CE is accordingly minimal.

4.3.4.3 Bank 2

A priority of Bank 2’s directors is to seek growth without increasing risk, and by implication they seek to avoid entrepreneurial risk:

“[A consulting firm] was employed by [Bank 2] to help [the Chief Executive] change the culture of the bank, and in particular to reduce costs, and to increase growth, and to reduce risk” (Bank 2, Director 1, 02:19).

Bank 2’s chairman believes that entrepreneurship is not feasible for the bank.

“Now, somebody else might do it well, but we’ve got three or four examples, and our people don’t come up with ‘infrastructure bonds.’ Macquarie’s come up it. We’d be delighted if they did, but they don’t. It's not going to happen” (Bank 2, Chairman, 28:13).

As well, corporate entrepreneurship is not viewed as desirable for Bank 2 as it is not appropriate for banks and is not consistent with the Bank’s desired focus.

“So, my own view is that this is very much a management thing, and then it depends on culture of the management, their attitude, their experience, and also whether they are in an industry that rewards innovation and has a lot of innovation, such as research or pharmaceuticals, medical areas or whether it's a fairly established industry where you are probably not going to be an innovator” (Bank 2, Chairman, 01:00).
“We've done a lot of getting out of things and becoming more of a traditional commercial banker” (Bank 2, Director 1, 02:19).

Instead, Bank 2’s board aims for the bank to maintain its position by growing with the system:

“You don't grow with the economy. In mortgages you grow with housing credit. Housing credit has been growing at 15% per annum for the last three years. Total credit has been growing by a lot more than the economy.” (Bank 2, Chairman, 21:50).

“There isn't [a growth target]. Well there is, formally [the chairman] puts out a growth target each year, of the order of eight percent. That's the public number. The system is growing at about that rate. There isn't a growth target as such” (Bank 2, Director 1, 08:02).

Board corporate entrepreneurship credibility of Bank 2 is low as its growth aspiration is modest and it does not regard corporate entrepreneurship as either desirable or feasible.

Bank 2 has processes whereby the board is engaged in the development of strategy:

“The board has a role in broad strategy. It would have a retreat for a couple of days a year with management. You are then talking with 'whether we go international, and if so which countries and whether we buy-in or set-up and how much of our shareholder funds we are prepared to put into it; or should we buy the [another financial business], which we did last year. Should we bulk up and go into [a particular market]? That can be a joint decision and then management brings forward the process. So for diversification, major moves, or country entry, or getting into new areas well established, but not in which we're operating, that can come out of the board's strategy management meeting. But a new product? Probably not.
Broad strategy, more of the same, different areas, an area that someone else is operating in, and where not, but should, or merging with someone, yes. Some innovative product? No.” (Bank 2, Chairman, 01:00).

Board Corporate Entrepreneurial Potential of Bank 2 is very low as a consequence of low board corporate entrepreneurship credibility.

Bank 2 actions reflect the board’s attitudes. The Bank has focused on its core businesses leading to a decrease in systematic risk.

“The risk profile has come right down. We got out of [a region] and [a market segment] by and large. We have reduced single customer concentration limits and diversified the portfolio. We have moved, not away from [a market segment], to get much bigger in [another market segment], which is much lower risk, [specific products in preferred segment] as opposed [products in other segment], that's where you lose your money. We have totally changed the profile of the bank” (Bank 2, Director 1, 02:19).

In the course of the interviews, the Bank 2 directors indicated that corporate entrepreneurship at Bank 2 was limited.

“What we're looking at is, in little bites that if they go bad don’t hurt us, is getting into [another geographic market]. We've got a little bit in [sub-market a], a little bit in [sub-market b], and we’ve now got a little bit in [sub-market c]” (Bank 2, Director 1, 08:02).

Similarly, the focus of the chairman and managing director’s statements in the 2005 and 2006 Annual Reports of Bank 2 are on reducing the bank’s costs, improving its customer service and on establishing partnerships with overseas banks. The bank’s strategic renewal efforts do not involve entrepreneurship, so that evidence of CE can be described as minimal.
4.3.4.4 Bank 4

The Former Chairman of Bank 4 described the Board focus as being the management of risk as opposed to its avoidance. He stated that a desirable characteristic of board members is that they both understand and can manage risk:

“We want people who had been out there, people who have been there and done that, and understand risk, and we try to get people with a very broad spread of industries” (Bank 4, Former Chairman, 3:33).

These views were shared by a former director:

“Banks are very much credit managers and credit risk. The credit side of the bank is very powerful in determining what the bank does. Surely the directors agree with all that. They set the appetite for risk” (Bank 4, Former Director, 05:23).

This suggested that the board was confident of Bank 4’s ability to grow by entering new markets and by bringing new products to those markets and therefore perceives that corporate entrepreneurship is feasible.

“We thought that we could bring value by bringing our systems and approaches from [our existing market] into [businesses targeted for acquisition]. They had been poorly managed, they had not moved with the times in terms of their thinking about their product offerings and the way they service their customers. We also saw them as a base to get ourselves some experience on a relatively small scale; to get to understand the realities of the market and then opportunistically build” (Bank 4, Former Chairman, 08:45).

Bank 4’s growth aspiration is aggressive.
“If we thought that growth was slowing below 10% per annum growth in earnings, then we would have said ‘Hey, let’s have a look at why that is’” (Bank 4, Former Chairman, 3 - 00:03).

Corporate entrepreneurship is viewed by the board as desirable, feasible, and as necessary if the bank is to achieve its aggressive growth target. Board Corporate Entrepreneurship Credibility can accordingly be described as high.

The Board at Bank 4 views its role as to ‘influence’ management through its appointment of a Chief Executive, establishment of growth targets, supervision of the risk profile, and its response to management’s recommendations.

“The Directors have to make decisions. They have to make judgments for all of the shareholders. They have to apply their individual thought processes and yet, the Board appoints a Chief Executive to be at the head of a management group that thrashes out where it wants to go and then comes to the Board and says - this is what we’ve decided to recommend to you” (Bank 4, Former Chairman 4 - 13:27).

The combination of the view that risk is something that is to be accepted, aggressive growth targets, a perception that the organization has the skills required to undertake entrepreneurial strategies, and a belief that entrepreneurship is desirable if the organisation is to achieve its growth objectives, leads to the proposition that Board 4’s Corporate Entrepreneurial Potential is high.

While the Former Chairman and Former Director were board members, the strategic renewal of Bank 4 included many entrepreneurial initiatives of material scale. These included:

- Two entries into major new businesses via acquisition.

- A large number of investments in start-up businesses.
- Entry into three new regions.

- The establishment of several new business models of which one is being adopted widely.

These examples were mostly centrally focused as opposed to originating throughout the organisation. They show that Management CE Intentions are Moderate and that the organisation’s CE is significant.

4.3.4.5 Bank 5

Bank 5 is recognised as an aggressive and entrepreneurial organisation. Its growth has come from strategic acquisitions, new products and new markets.

Its Board recognises that it needs to be entrepreneurial and accept entrepreneurial risk, while seeking to limit its exposure to project risk by committing funds incrementally. That is, new business concepts are tested and proven before major funding is committed.

“The board said 'Yes. This is good, this is right. We understand where it fits. We want this to be tested in a difficult environment, because, you know, this is our reputation and rightfully so, and how much do we have to spend?'
Well, we minimized the amount of money we had to spend to get the first few sites, the first initial sites up. So we minimized the risk” (Bank 5, CEO, 00:45:34).

This is further illustrated by the following example that describes how the board was prepared to accept an entrepreneurial initiative proposed by the managing director even though individual directors had doubts about its viability:
“I didn’t support it because I’d seen other [businesses of the same genre], and I wasn’t sure what we were achieving by it all and I could see it was going to be a public and time consuming episode. Why would we? The debate was had. [The Chief Executive] thought strongly about it. He wanted to get involved in it. People supported him. It’s been one of those things that everyone knows about. It was a relatively minor investment that we ended up making. It’s value has somewhat been protected by the thing with [a complementary business]. It’s actually not looking too bad” (Bank 5, Director 2, 00:29:04).

Bank 5’s past entrepreneurial success has led to the board being confident of its ability to be entrepreneurial. The focus of the board is the selection of entrepreneurial projects, rather than with issues about the feasibility of entrepreneurship.

“So each year we had a block of capital called expenses. We had a block of capital over and above our operating costs that we would spend in growing one of those elements of the business” (Bank 5, Managing Director, 00:43:04).

Similarly, the board has moved beyond considering the desirability of entrepreneurship. It is instead seen as an integral part of their strategy.

“Any business you’ve got to experiment. You’ll have some wins and you’ll have some losses. As long as you cut the losses and let the profits run” (Bank 5, Director 3, 00:35:03).

Corporate entrepreneurship is particularly important because of Bank 5’s aggressive growth aspirations:

“[Bank 5] has been growing at over 20%, or at about 20% for the last, I don't know how many years. [Q: As a board, is that your objective] Yes. Keep growing at this rate. We know it's way, way above everything because we are
gaining market share, but we also have a concept” (Bank 5, Chairman, 00:14:54).

The credibility of Corporate Entrepreneurship as a board strategy is very high as it is seen as both feasible and desirable and regarded as required for their very aggressive growth strategy.

The board engages with management to develop Bank 5’s corporate entrepreneurial strategy.

“I think it's probably coming from the top down. Partly the Board, partly the C.E.O.” (Bank 5, Director 3, 00:02:13).

“It's not hands on by any means, but we certainly knew what was going on. So how involved was it? We were certainly over-sighting it and keen to see how it was progressing” (Bank 5, Director 1, 00:16:27).

The combination of Bank 5’s board having very high CE Credibility and being engaged with management leads to it being classified as having very high Entrepreneurial Potential.

Bank 5 has a diverse and extensive track record of corporate entrepreneurship both before and since becoming a bank. It has led the introduction of what are now common products and processes to the Australian finance industry. It has achieved a high growth through the adoption of new business models, development of new products and entry into new markets.

Bank 5’s management has an aggressive approach to entrepreneurship as shown by the teams of people it has working on new projects in its incubator section. It is proud of its entrepreneurial success.
The company has adopted an entrepreneurial culture, which is reflected by a high frequency of entrepreneurial initiatives that in aggregate are material to the company. The company is therefore labelled as having extensive evidence of CE.

4.3.4.6 Findings
Table 4.10 highlights the significant differences in the perceptions and attitudes of the boards of the organisations in each of the cases and highlights a relationship between these and Corporate Entrepreneurial Intentions and Corporate Entrepreneurship.

Corporate entrepreneurship is positively associated with boards that are characterised as having board corporate entrepreneurial potential. That is they regard corporate entrepreneurship as credible for the organisation and have influence over the development of the organisation’s strategy. That is, an organisation will be more likely to be entrepreneurial if its board

- does not seek to avoid entrepreneurial risk,

- perceives that corporate entrepreneurship is feasible for the organisation,

- believes that corporate entrepreneurship is desirable for the organisation,

- has aggressive growth aspirations for the organisation, and

- influences the development of the organisation’s strategy

4.3.5 Application of the Model to Data - Banks 3 & 6

4.3.5.1 Overview
After the analysis described above was completed, two additional cases, Banks 3 and 6, were analysed to test the findings. The additional data comprised interviews with a chairman of Bank 3 and a former chairman of Bank 6, and material published by those banks and external financial analysts. The findings from this analysis are in Table 4.11.
While the interview with the chairman of Bank 3 did not allow an assessment of the board’s engagement with management, this was not relevant to the determination of Board CE Potential for Bank 3, as the bank’s low Board CE Credibility resulted in Board CE Potential being independent of this assessment and characterised as very low.

The data from these cases supports the findings from the first four cases. It confirms that Board CE Potential, a construct based on Board Corporate Entrepreneurship Credibility and Board Engagement, is associated with Corporate Entrepreneurship.

A sample of the content supporting the analysis is presented below. A more detailed version is available from the researcher.

### 4.3.5.2 Bank 3

Bank 3 is one of the five largest commercial banks in Australia. Its chairman is a very senior executive, who was previously a senior executive role in an internationally listed public company. As he recruited the majority of the directors who are on the board, his views and attitudes are likely to be shared by the board as a whole.

The chairman’s describes his risk preference for Bank 3 in terms of shareholder expectations.
“I think what you can promise shareholders, I think, or you should try to, is to encapsulate it all in ‘We will not cut the dividend’” (Bank 3, Chairman, 01:06:45).

The implication of the combination of this objective and the banking industry’s high payout ratios is that the board of Bank 3 aims to avoid entrepreneurial risk.

The chairman also believes that shareholders expect the bank to maintain its historic growth rate.

“That's the best expression to my way of thinking of what the shareholders expect of you, because they are paying their good money to have this growth element in there. So, they're voting with their cash. They're voting with their wallet” (Bank 3, Chairman, 01:08:12).

As the bank has a history of double digit increases in earnings, its growth aspiration can be characterised as aggressive.

The chairman perceives that in commercial banking there is little opportunity to gain an advantage through innovation and entrepreneurship at the bank.

“You can't develop niches. You can't develop new ways of doing things without them being very quickly followed by the competition and the inextricable competitive pressures driving prices down until, like all commodities, you essentially un-differentiate” (Bank 3, Chairman, 00:29:30).

Instead, the bank’s only option for growth is through superior operational performance.

[...]the only way we can truly grow is to take customers from other banks and other financial institutions. You can do that by offering a better service, having a better reputation, so that people want to come and use you, and having a greater range
of products so that you can cross sell in your existing base” (Bank 3, Chairman, 00:29:30).

The board’s perception is therefore likely to be that corporate entrepreneurship is not feasible.

Although the chairman sees little opportunity to build a competitive advantage through innovation, he does recognise that competitiveness requires some innovation.

“All ready our customers on the Internet exceed the customers who come to the branch” (Bank 3, Chairman, 01:39:39).

Specifically, he sees the need for ‘out of the box’ projects that involve innovation, but are not risky.

I don't call that entrepreneurial. I don't think that's huge risk, actually. Thinking out of the box is investing in IT . . . That's the way to the future, that's not risky” (Bank 3, Chairman, 01:46:34).

The board’s attitude at to the desirability of corporate entrepreneurship is likely to be neutral. That is, while the board does not see entrepreneurship and the associated risk as desirable, it recognises the need for innovation, albeit low risk.

These observations reflect the chairman’s 2006 annual report, which says that the Bank is seeking low risk growth that is driven by improvements to customer service.

Overall, as the board does not view corporate entrepreneurship as feasible, the board’s attitude as to the credibility of corporate entrepreneurship can be characterised as ‘low.’

While the Chairman of Bank 3 did not provide details as to the extent of the Board’s involvement in the management of the business, Board Entrepreneurial Potential of
Bank 3 can be characterised as ‘very low’ as corporate entrepreneurship is not viewed as credible.

The managing director in his 2006 annual report describes the focus of management as service improvement, cost reduction and investing in high growth segments of the business. This suggests that \textit{Management’s CE Intentions} are limited.

A review of Bank 3’s 2004, 2005 & 2006 Annual reports shows little evidence of entrepreneurial behaviour by the bank. This is supported by the assessment of a leading stockbroker. Evidence of CE is accordingly labelled as minimal.

\textbf{4.3.5.3 Bank 6}

Bank 6 is another of the five largest Australian commercial banks. A recently retired chairman, who previously held a senior executive role in an international listed public company, was interviewed. As he recruited the majority of the directors who were on the board during his tenure as chairman, his views and attitudes are likely to be shared by the board as a whole.

Data collected comprised: an in-depth interview with the chairman of the board, a review of three annual reports, and research published by financial analysts.

The interview focused on a major strategic initiative developed and launched during the former chairman’s tenure.

The chairman’s views are grounded on his belief that the industry will consolidate over the next 10 – 15 years.

"[I]t's based on the belief that if you're not the best in 10 years time you won't be in the top [one or two banks]" (Bank 6, Former Chairman, 00:50:55).

He expects this consolidation to be driven by performance.
“The one who can meet the needs of its customers, do it most efficiently, offer the best deals - they will be the successes. The ones that can't do that will fall behind” (Bank 6, Former Chairman, 00:42:48).

This analysis led to the former chairman to conclude that Bank 6 had no option but to adopt a major change program:

“I know [it’s a hard game to win]. But you can't afford not to” (Bank 6, Former Chairman, 00:55:56).

The major change program subsequently approved by the board required an investment in excess of A$1B (Bank 6 Annual Report, 2005).

“[T]he [Bank 6] Board was totally sold on what we were doing there, while I was there” (Bank 6, Former Chairman, 00:54:42).

The program required a large investment for a potentially large reward. The former chairman saw it as necessary if Bank 6 was to outperform its competitors. While he did not use the words innovation or entrepreneurship, the strategy he described is consistent with the Schumpeter’s definitions of those terms as it involves ‘the introduction of a new method of production, that is, one not tested by experience in the branch of manufacture, concerned’ (Schumpeter 2000 p.53).

The former chairman confirmed the importance of Board support for major strategic initiatives of this type that are presented by management.

“Like most of these things the Chief Executive has to drive the change. But he's got to have the support of the Board in terms of the direction he wants to go” (Bank 6, Former Chairman, 0:04:46).

At the same time, he provided an example that showed his willingness to replace the managing director, if doing so was necessary for the program’s success.
“As I said the financial performance was going up like that, and I knew when it
came to a judgment, that we could never make that cultural change with that guy
in charge. On the other hand I couldn't allow it to be seen that he was being
demoted or dismissed because otherwise it looks like you get punished for good
performance. I had to make a change. I put a new managing director in” (Bank
6, Former Chairman, 00:40:19).

Bank 6’s 2006 Annual Report confirmed the on-time and within-budget completion of
the $1B+ initiative to improve staff training and deploy new systems. The report
claimed that the initiative had produced in excess of the projected financial benefits and
had made a significant impact on the bank’s profitability. The materiality and
importance of its major CE initiatives represent significant evidence of CE

Overall, the data suggests that Bank 6’s board is willing to accept substantial
entrepreneurial risk, believes CE is both feasible and desirable and has aggressive
growth aspirations. The combination of these characteristics results in CE having a
high level of credibility and high Board Corporate Entrepreneurship Potential.

4.3.5.4 Findings

The second part of this research is a limited study that is designed to test the findings of
the first part of the research as opposed to developing new findings.

In both cases, the person interviewed was either a current or former chairman of the
board. They were similar in many respects, both were previously managing directors of
very large global companies, both had similar views about the relationship between the
chairman and the chief executive and both had refreshed the membership of the bank
board they were leading.

The characteristics of Board of Bank 3 and Bank 6 are assumed to reflect the views of
their Chairman. This is likely because the chairmen are both experienced business
leaders who have personally selected the members of the Board
The findings presented in Table 4.11 replicate those presented in the first part of the study. In particular, the data supports the association between board CE potential and corporate entrepreneurship that was identified in the first part of the study.

In the next and final chapter of this document, these findings are consolidated and reviewed; their implications for practice and limitations are discussed; opportunities for further work are identified; and the conclusions reached by the researcher are presented.
5.1 REVIEW OF FINDINGS

The findings identify mechanisms whereby boards influence corporate entrepreneurship and the characteristics of the board that determine the way they use these mechanisms. Specifically, they show:

1) The boards in the sample employ a range of mechanisms to influence management’s choice of strategy. These include:

   - selecting, employing and managing the chief executive (Reference: Table 4.5, Node 3),

   - participating in the strategic process including the provision of strategic objectives (Reference: Table 4.5 Node 4),

   - selecting and appointing a chairman who will manage the board’s relationship with management (Reference: Table 4.5, Node 1; Table 4.4, Node (iii)),

   - influencing on the culture and values of the company through its interactions with members of management (Reference: Table 4.5 Node 5), and

   - directing management to follow a particular course of action on the rare occasion that this is necessary (Reference: Table 4.5 Node 6).

As the details of these mechanisms are not codified, by either company law or a company’s constitution, their validity depends on a rationale for their existence.
being identified. The nature of these mechanisms suggests that their existence is a consequence of boards fulfilling a strategic role (Section 2.5.4), which is predicated on their adopting either an agency or a stewardship perspective, and accordingly whether they manage companies for their own benefit or for the benefit of the company’s shareholders (Section 2.5.2).

2) The basis on which many board decisions are made is not codified. In the absence of such statutory guidance, a board’s aspirations, culture and values are expected to be central to how and by what mechanisms a board chooses to influence management’s actions (Reference: Table 4.3; Figure 4.2).

This observation suggests that the basis of a board’s decisions is similar to the basis of an individual’s decisions. This is reasonable, as a board is essentially a group of individuals, with their own attitudes and perceptions who seek to reach a consensus.

3) A board’s characteristics are a reliable predictor of management’s entrepreneurial intentions (Reference: Figure 4.4). These include its

- growth aspirations for the company (Reference: Figure 4.4, Node A; Figure 4.5),

- willingness to have the company accept corporate entrepreneurial risk (Reference: Figure 4.4, Node B; Figure 4.6),

- attitude as to the desirability of corporate entrepreneurship for the company (Reference: Figure 4.4, Node D; Figure 4.8),

- perception as to the feasibility of corporate entrepreneurial behaviour by the company (Reference: Figure 4.4, Node C; Figure 4.7), and

- engagement with the management the company (Reference: Figure 4.4, Node G; Figure 4.10).
An overall assessment of these characteristics for a board is defined as its Board Corporate Entrepreneurial Potential (BCEP) (Reference: Figure 4.4, Node G; Figure 4.10).

The ‘a priori construct’ used to develop Board Corporate Entrepreneurial Potential (BCEP) was based on Krueger and Brazeal’s model of entrepreneurial potential (Figure 4.3) and included a characteristic labelled ‘Board’s Growth Aspiration’ but did not specifically include a board’s entrepreneurial risk preference as it was assumed to be part of a board’s assessment whether corporate entrepreneurship was desirable or feasible.

A significant difference between the ‘a priori construct’ and the final construct is that the final construct includes a node that represents the entrepreneurial risk preferences of the board. This node is an assessment of a board’s preference for entrepreneurial risk-taking by the organisation, and was found to influence whether a board’s perceptions as to the feasibility of corporate entrepreneurship.

‘Corporate Entrepreneurship Risk Preference,’ while similar, is not the same as the construct of ‘expected utility’ described in Section 2.1.1. Whereas expected utility is an assessment of an individual’s preference for one set of outcomes over another, corporate entrepreneurial risk preference refers to a willingness to accept entrepreneurial uncertainty. While these concepts are similar, they are distinct and are not necessarily related.

The distinction between expected utility and corporate entrepreneurship risk preference is illustrated by the distinction that bank directors make whereby credit risks are not identified as entrepreneurial risks, but rather are seen as part of day to day business.

An implication of these findings is that boards are similar to individuals in that their decisions are a consequence of their attitudes and perceptions as opposed to their demographic characteristics. This observation is consistent with 2) above.
4) BCEP is a product of a board’s history, its membership and the information gathered by its members.

- The boards in the sample are responsible for the identification and recruitment of new members (Reference: Figure 4.2, Node 2). This responsibility enables a board to replace itself with ‘like-minded-individuals’ who will ensure the continuity of its culture.

- However, while boards have the theoretical ability to recruit individuals who will preserve the status quo, this does not always happen as some boards choose to recruit directors who will encourage change, while others will do so unintentionally as the behaviour of a new director cannot always be predicted.

- The preferences of individual directors will also be influenced by the information they gather while they are members of a board. Such information might include their knowledge of changes in community expectations or their awareness of practices successfully employed by other boards (Reference: Figure 4.2, Node (ii)).

The observation that the attitudes and perceptions of a board with respect to entrepreneurship are dependent on more than the views of a board’s members, reflects Gibson’s observation that an organisation’s efficacy may not be the same as an aggregation of the individual efficacies of its members (Section 2.6.7).

5) Boards can choose from a range of mechanisms to ensure their characteristics are stable:

- They are able to select members who share the board’s attitudes and are likely to conform to the cultural norms of the board (Reference: Figure 4.2, Node 2).
- They can select a chairman who conforms to the board’s attitudes and will protect its cultural norms (Reference: Figure 4.2, Node 1).

- They can require that directors share the board’s aspirations for the company and conform to its cultural norms, so that they can maintain support for their ongoing membership and enhance their prospects for other board appointments (Reference: Figure 4.2, Node 2).

The existence of these mechanisms provides an explanation for situations where boards are seen as being unable to respond to a changing environment instead preferring to protect the status quo.

This study was grounded on the personal perspectives of the researcher that can now be evaluated.

- The first assertion was that companies reach a point where entrepreneurship is required for continuing growth.

While the current study did not specifically explore the relationship between corporate entrepreneurship and long-term growth, interview data from two of the banks revealed that directors questioned this relationship as their experience suggested that banks could achieve growth without entrepreneurship. However, as their belief was based on a period of unusually high credit growth, it may not hold-up over a longer period. Accordingly, although companies may reach a point where corporate entrepreneurship is required for continuing growth, such a relationship has not been established by this study.

- The second assertion was that companies must innovate if they are to maintain a competitive advantage.

Although, a company could enjoy a sustainable competitive advantage without corporate entrepreneurship, the literature contains evidence that any competitive
advantage has a limited lifespan and will need to be renewed (Foster and Kaplan 2001). While the relationship between corporate entrepreneurship and firm competitive advantage was not explored, the data showed that boards hold a range of views as to the importance of corporate entrepreneurship. In particular, while the boards of three of the companies in the sample viewed corporate entrepreneurship as necessary for financial performance (Banks 4, 5 & 6), the boards of the other three did not (Banks 1, 2 & 3).

- The third assertion was that boards play a major role in a company’s choice of strategy.

This assertion was confirmed for the boards in the sample that are involved in the development of their company’s company strategy albeit to varying degrees. The level of involvement varied from case to case, ranging from setting objectives through to participating in the development process.

- The fourth assertion was that boards are knowledgeable about entrepreneurship.

In the cases studied, boards were knowledgeable about entrepreneurship, the associated risks and the potential rewards.

- The fifth assertion was that corporate entrepreneurship initiatives are often abandoned in their early years if their performance is disappointing.

This observation is supported in the literature and by the research. The literature recognises that an entrepreneurial strategy by its nature involves uncertainty (Knight 1921; Schumpeter 2000); that initiatives often fail (Schumpeter 2000); and entrepreneurial strategies are often abandoned following the failure of entrepreneurial initiatives (Bouchard 2002).
While the sample included banks that had unsuccessful entrepreneurial ventures, the impact of failure was mixed, with some companies no longer pursuing an entrepreneurial strategy and others continuing to do so.

The researcher observed that while Ludwig von Mises (1935) proposed that boards of state-owned enterprises are not as entrepreneurial as those of privately owned enterprises because they do not share the same incentives, he did not identify the mechanisms that cause this to happen.

This study provides insight as to the possible causes of this distinction. It suggests that the actions of a state-owned enterprise’s board may be determined by that board’s willingness to accept entrepreneurial risk, its perceptions as to the desirability of corporate entrepreneurship, its growth aspirations for the enterprise, its view as to whether corporate entrepreneurship is desirable for the company, and the level of its engagement in the development of the company’s corporate strategy.

This leads to five factors that might explain Mises’s observation. Firstly, in situations where a state-owned enterprise’s board is appointed directly by the state, its attitudes may be determined by the state, as opposed to by its existing board; second, an enterprise that is owned by a state may be reluctant to accept risks in situations where failure might embarrass the state; third, a state may place a lower priority on growth than other factors such as maintenance of employment or stability of earnings; fourth, a government organisation’s culture may prevent it from developing the skills required to identify, evaluate and realise entrepreneurial opportunities, and fifth, in situations where the state appoints senior management directly, this may create barriers that limit board involvement in the strategic process.

The researcher cited a study that identified a relationship between board attitudes and exploration success:

“The McKinsey contention is that companies answering yes to these questions will be more successful in exploration than those answering no.”
**Board Leadership:**

5. *Does the board take a significant leadership role in exploration rather than treat it as a ‘down-the-line’ technical function?*

6. *Do the board develop and communicate a powerful and believable rationale for exploration?*

7. *Do the board evidence strong commitment to exploration through spending patterns and organisational relationships?*


While the current study aimed to identify the factors whereby boards influence corporate entrepreneurship, as opposed to those that influence exploration success, its findings are still similar to those of the McKinsey study. Specifically, boards will encourage entrepreneurial behaviour if they

- perceive that corporate entrepreneurship is desirable and feasible, and engage in the development of the company’s strategy.

- believe that corporate entrepreneurship by the enterprise is feasible and communicate this belief to senior management.

While the research did not explore the impact of setting specific targets for corporate entrepreneurship, the literature associates success with some companies that have done so. For example, Whirlpool sets aside a substantial share of capital expenditure for projects that meet innovation criteria (Hamel 2006a).

These observations suggest that the findings of the current study are consistent with the observations made by the McKinsey study as to the relationship between board characteristics and exploration success.
5.2 IMPLICATIONS FOR PRACTICE

In summary, the findings show that if a company’s management is to act entrepreneurially, the attitudes and perceptions of its board need to support such behaviour. If they do not, an entrepreneurial strategy is unlikely to be adopted or barring immediate success will be short term.

Knowledge of this relationship provides insight that will assist the boards, private shareholders and government shareholders in their management practices.

The study provides a theoretical framework that rationalises the intuitive behaviours that boards employ. While such knowledge may not lead to a change in board behaviour, the framework will allow boards to review the strategies that they employ. For example, if boards recognise that the reason they are not encouraging entrepreneurial behaviour is because they do not perceive that it is feasible for their companies, they can consciously decide to initiate strategies that either build or provide access to the required skills.

Shareholders of public companies may be frustrated that their boards are reluctant to adopt entrepreneurial strategies. The findings of this study will provide reasons for this reluctance. In particular, it will show shareholders that board attitudes as to the desirability of entrepreneurship, and their perceptions about its feasibility, are both relevant and difficult to change. This appreciation will assist controlling shareholders to develop strategies that will influence company strategy by encouraging changes to board attitudes and perceptions. For example, in a situation where a board’s perception that corporate entrepreneurship is not desirable as a consequence of historic baggage, a change in ownership may be necessary to achieve the board support required to implement entrepreneurial initiatives.

Government owned enterprises have been recognised as being less successful than private enterprise because of the reluctance of their boards to implement change (Mises 1935). This study, by identifying the board characteristics required for a board to support change, allows the development of strategies that will achieve this aim. For
example, a government shareholder may be able to influence a board’s attitude as to the
desirability of entrepreneurship by providing unambiguous signals as to the government
shareholder’s wishes. However, such understanding does not guarantee that a
government shareholder would be prepared to implement such strategies.

These findings are subject to the limitations presented in the next section.

5.3 LIMITATIONS

The applicability of this research, by its nature, is particularly limited as it relies on a
single interviewer, a small number of directors serving on the boards of similar
companies in a single industry segment in a single country. Despite this, it is likely that
the findings have broader applicability than the study sample. In particular, as the
sample includes the five largest Australian commercial banks at the time of the survey,
it is likely that the findings are applicable to any large Australian commercial bank.

The sample also includes an Australian, publicly listed, second-tier commercial bank
that has a reputation for being entrepreneurial. While this tier is made up of a diverse
range of institutions, as the findings are similar to those for the first tier banks, the
findings are likely to be applicable to all listed Australian banks.

Similarly, as the directors who serve on the boards of the banks studied, have also
served on over 20 of the 100 largest Australian listed companies, including 8 of the 10
largest, the characteristics and behaviours displayed by these boards are applicable to
the boards of other large Australian listed companies.

The applicability of the findings to organisations where directors are appointed by a
chairman, who is also the chief executive, or where directors are appointed by an
external body, is less clear. While such directors may adopt the prevailing culture, it is
also possible that they will introduce a new culture. Further work is required to
determine the applicability of the research to such situations.

The findings may also be applicable to the boards of organisations in countries other
than Australia that have similar regulatory environments. Conversely, they may not be
applicable in jurisdictions where the legal environments and corporate cultures differ to
those of the study.

The research led to the identification of Board Corporate Entrepreneurship Risk
Preference as a board characteristic that has a significant influence over whether a board
encourages the adoption of an entrepreneurial strategy or otherwise (Reference Figure
4.4).

As the literature identifies risk-taking as an important element of corporate
entrepreneurship, it supports the inclusion of this characteristic in the final construct
relating board characteristics to corporate entrepreneurship (Section 2.4.4). The
inclusion of this characteristic leads to two important and related questions. What was
the impact of its omission from either or both of the a priori constructs, and second,
would its inclusion in these constructs have led to different results.

The objective of the a priori construct depicting board mechanisms was to provide a
model for analysing the workings of a board and its relationship with management that
could be used in the specific case of corporate entrepreneurship. As such, the a priori
construct envisaged a logical relationship between the various board mechanisms
identified in the literature, which was assumed to be independent of the characteristics
of its membership (Figure 4.1).

The final construct depicting board mechanisms expanded on the a priori construct by
including a node that represented a board’s aspirations, culture and values. This node
represents those characteristics that determine how directors make decisions in specific
circumstances (Figure 4.2).
The first stage of the research does not address the relevance of particular aspirations, cultures and values (including risk preference) or whether their relevance will vary depending on the issue being addressed. That is, the final construct, like the a priori construct is independent of the characteristics, including risk preference, of a board’s membership and so does not provide for such characteristics to be included.

The omission of the node representing risk preferences from the a priori construct had the potential to bias the results by excluding a key issue from the analysis. The impact of this omission is believed to have been minimal as questions exploring the company’s attitude towards risk were included on the interview protocol. This belief is confirmed by the finding of the study that Board’s CE Risk Preference influences a board’s perceptions.

Qualitative research is, by its nature, limited by the scope of the sample. In this case, a small number of cases were investigated with the data from each comprising interviews with between one and five directors and publications based on material provided by the companies to the public domain. As the directors who were interviewed brought their own perspectives of historical events and perhaps a desire to justify past actions, the information they provided may be distorted. Similarly, the information that companies release to the public domain may be purposively chosen to achieve a preferred outcome. While these risks of bias are real, their impact is minimised through data triangulation.

There is also the possibility that board characteristics are a consequence of management’s adoption of an entrepreneurial strategy, as opposed to being a driver of that strategy. Such a relationship could occur in situations where management has both influence over the appointment of new directors and control over the information that the board reviews. While control of the board by management is possible, and might occur in some circumstances, it seems unlikely in the cases studied, as the boards in the sample have control over the appointment of directors and the chief executive, and their chairmen are clearly leaders of industry who would seem unlikely to be intimidated by the managing directors under their control.
While the directors who were interviewed believed they had sufficient information to make decisions, one did recognise that boards were aware that this was not always the case:

“The culture was one of ‘don’t tell the board anything. Secrecy. We need our perks,’ and all this shit, and, the cost was enormous” (Bank 2, Director 1. 15:01).

This study has assumed that the information supplied to the board by management is sufficient for the board to assess the feasibility of the company adopting an entrepreneurial strategy. Conceptually however, management’s ability not to supply the required information may be limited, as the board’s perceptions of feasibility will be shaped by management’s long-term performance.

While the limitations described above are recognised, data triangulation combined with, the replication of the findings across the six cases, suggests that they are reliable.

While the research shows an association between certain characteristics of the board and corporate entrepreneurship, it does not show whether the characteristics of the board are a precursor to corporate entrepreneurship or a consequence of it. This may be a corollary of Zahra and Covin’s (1995) observation that they could not show whether superior financial performance was a consequence of corporate entrepreneurship or vice versa.

In many cases, which comes first, the chicken or the egg, may be a less important question than whether the board develops the perceptions and adopts the attitudes required for corporate entrepreneurship to continue. In a newly established company, the board may have little involvement in the management of the company. In a mature company, that is seeking to become more entrepreneurial, while a management team might initiate entrepreneurship experiments of its own accord, it is likely to require the support of the board if such experiments are to continue.
5.4 **FURTHER WORK**

Ideally, research of a quantitative nature would be undertaken to confirm these findings, however, such work is unlikely to be practical. Instead, a more realistic option is for further research to extend the current work to include a larger number of directors from the banking industry, followed by cases from other industries and other regions.

The results that have been presented are based on six cases, with each case consisting of between one and five interviews. The reliability of these results can be considerably improved if in all cases at an additional two directors could be interviewed. These interviews would also expand the findings by adding a longitudinal dimension to the study.

While the sample included all of the five largest listed commercial banks in Australia, it only included one of the smaller regionally based banks. The generalisability of the findings to that sector would be improved if they could be replicated across a sample of four similar banks as recommended by Yin (2003) and Eisenhardt (1989).

Additional work is required to extend the applicability of these findings to companies operating in other market segments, other organisational structures or residing in countries with different legal environment, cultures and management practices.

The study has deliberately focused on a boards influence on corporate entrepreneurship as opposed to board entrepreneurial success. There is an opportunity for a follow-up study to make a valuable contribution by determining how boards influence the outcome of corporate entrepreneurship initiatives.

A limitation of the research is that the scope of the data collection restricted the extent of the analysis that could be performed. As a result the data has been classified using three point scales as opposed to the five or seven point scales that would allow more
detailed analysis. While additional data collection and more sophisticated analysis would be desirable, the researcher recognises that collecting the detailed data to undertake such analysis may be difficult to achieve.

The finding that some directors are unsure how to determine shareholder preferences is of particular interest, as directors are primarily responsible to shareholders. Further work to determine the extent of this concern is recommended.

5.5 CONCLUSION

The introduction to this study began with a series of observations about corporate entrepreneurship that led to what I believed to be an interesting question: “How does a board of directors influence a company’s corporate entrepreneurship?” Now, after six years, I can confirm that it is an interesting question and I can provide part of the answer.

A purposefully selected sample of six Australian commercial banks was investigated using a case study methodology. Interviews with bank directors revealed their perceptions and attitudes and allowed these to be related to that bank’s corporate entrepreneurship. This information was triangulated with the opinions of other directors and public data relating to each company. While the findings are based on data from a distinct market segment, they are likely to be broadly applicable.

Not surprisingly, boards play a significant role in a company’s choice of strategy. They appoint a chief executive who has views that are consistent with their own. They provide guidelines to management to assist its development of a strategic plan that they will be willing to approve. They assess the performance of the management team by monitoring the implementation of this plan.
As the basis for most board decisions is not codified, directors must make decisions on the basis of their shared judgement. As boards aim to represent shareholders, their objective is that their decisions will reflect the wishes of the company’s shareholders. While this is a practical objective, the data shows that directors are unsure of shareholder priorities. The solution to this dilemma is for boards to assume that if shareholders buy shares in a conservative bank that pays high dividends and seldom innovates, they would like it to remains so. If the status quo is inefficient, in the absence of a change in the board’s position, a situation may emerge where an acquirer can release value by replacing the board.

In the particular case of corporate entrepreneurship, a board’s support depends on it having a shared attitude that corporate entrepreneurship is desirable and a shared perception that it is feasible. A shared attitude that corporate entrepreneurship is desirable appears to be a long-term board value. A shared perception that entrepreneurship is feasible appears to be based on the board’s view as to management’s capabilities.

While the development and evolution of a board’s attitudes and perceptions hasn’t been addressed here, the recognition of their role suggests that this would be valuable information. An understanding of the basis for decisions, should lead to better decisions.

And the bottom line: If we accept that corporate entrepreneurship is important, that boards play a major role in determining whether entrepreneurial strategies are adopted, and that their decisions are based on their attitudes of desirability and perceptions of feasibility, we have made some progress. Our next challenge is to develop a basis for determining whether a board’s attitudes and perceptions are appropriate for a particular circumstance. There is still a long way to travel.
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APPENDICES
APPENDIX 1 CHANGE OF THESIS TITLE

Mr Stephen Spring
6 Grant Avenue
Balwyn
VIC 3103

07 April, 2010

Dear Mr Spring,

RE: CHANGE OF THESIS TITLE

At its meeting held on 01/04/2010 the Research Higher Degrees Executive Committee approved your application to change your thesis title to "The Influence of the Board of Directors on Corporate Entrepreneurship - A Study of Australian Commercial Banks"

Yours sincerely,

[Signature]

Prof Pam Green
Director for Graduate Studies
Swinburne Research
Tel: 9214 5224
Email: pamgreen@swin.edu.au

C.c. Professor Murray Gillin
Dr Bruno Mascitelli (H23)
APPENDIX 2 ETHICS APPROVAL

9 November 2005

Emeritus Professor Murray Gillin
Swinburne University of Technology

Dear Murray,

The Faculty of Business and Enterprise Ethics Sub-Committee has now approved your Ethics Application 2005/058 entitled, ‘Corporate Entrepreneurship: Relationship between company leadership and entrepreneurial success.’

We wish you well with your research project.

Yours sincerely,

[Signature]

Associate Professor Linda Brennan
Chair
On behalf of the Faculty of Business and Enterprise
Ethics Sub-Committee

The completed Application for Ethics Approval of a Research Protocol was considered by the Faculty of Business and Enterprise Ethics Sub-Committee at the 12 October 2005 meeting.

The approval for:
Degree: PhD
RHD Candidate: Stephen Spriging
Co-ordinating Supervisor: L. Murray Gillin

Sighted by:
Dr Toby Harfield, MLIS
Faculty of Business and Enterprise
Ethics Advisor and Research Facilitator
1 July 2009
TRIM: CIN/016292 #9: original application and meeting minutes

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APPENDIX 3 CONFORMANCE WITH ETHICAL APPROVAL

This research has been conducted in accordance with the procedures described in the Application for Ethics Approval submitted in October 2005 and subsequently approved in September 2005 (See Appendix 2).

The data collected as part of that research is being stored in accordance with the procedures described in the Application for Ethics Approval.

Signed: . . . . . . . . . . . . . . . . . . . . . . . . . . . . . .

Dated: . . . . . 23rd September 2010. . . .
APPENDIX 4  LETTER PROVIDING BACKGROUND TO INTERVIEW

Wednesday, February 22, 2006

<Company Director>
<Address Line 1>
<Address Line 2>
<Address Line 3>

Dear <Company Director>,

Corporate Entrepreneurship: Relationship between company leadership and entrepreneurial success

Thank you for agreeing to participate in the referenced research project. The purpose of this letter is to provide you with information about the project and its conduct so that you can make an informed decision to participate.

The aim of the project is to determine how the board and senior management of a large institution impacts that organisation's entrepreneurship and innovation. The background to this research is a 1975 McKinsey study of large mining companies that identified links between board leadership and management style and a company's exploration success. This project is being undertaken to develop theory as to whether there are similar links between the focus of top management teams of large organisations and the corporate entrepreneurship and innovation of those organisations. The research will comprise analysis of interviews with current and former senior executives and board members of a sample of large listed organisations.

The interviews explore the extent of entrepreneurship and innovation at an organisation, how it is managed and how it is affected by the organisation's corporate culture. They follow a consistent structure that is presented in the accompanying "Interview Protocol."

The interview will take about one hour, will be recorded and transcribed. Its content will then be analysed using computed assisted coding. You are free to withdraw consent and discontinue participation in the study at any time.

The research will form the basis for my PhD thesis and for related academic articles. The work is intended to make a valuable contribution to our knowledge of corporate entrepreneurship best practice.
The recording and transcript of the interview will not be published. Any views or comments divulged in the published work will not be specifically attributed to any one person or company. The recordings and the transcripts of the interviews will be securely stored for the duration of the prescribed research data-holding period of five years and then destroyed.

If you require additional information about the project at any time I can be contacted by email (sspring@swin.edu.au) or by phone (0418 368 199). The Senior Investigator for this project is Emeritus Professor Murray Gillin. He can be contacted by email (mgillin@swin.edu.au) or by phone (03 9214 5900).

If in the process of the conduct of this research you have a complaint about the way you have been treated during the study, or a query that I or the Senior Investigator has been unable to satisfy, you should approach in the first instance:

Chair of the Faculty of Business and Enterprise Ethics Sub-Committee
Swinburne University of Technology
P O Box 218
HAWTHORN. VIC. 3122.

Alternatively you can direct your complaint to:

The Chair
Human Research Ethics Committee
Swinburne University of Technology
P O Box 218
HAWTHORN. VIC. 3122
Phone: (03) 9214 5223

Thank you for agreeing to participate in this project.

Yours sincerely

Emeritus Professor L Murray Gillin
Senior Investigator
Student

Stephen Spring
Second Investigator & Doctoral

Can you please confirm your willingness to participate in this project
and that the conditions outlined are acceptable by signing and returning
a copy of the attached ‘Disclosure and Informed Consent Form.’
APPENDIX 5 INTERVIEW PROTOCOL

Project Title: Corporate Entrepreneurship: Relationship between company leadership and entrepreneurial success

First Investigator: Emeritus Professor L. Murray Gillin
              (mgillin@swin.edu.au)

Second Investigator: Stephen F. Spring
                     (sspring@swin.edu.au)

Revision Date: Thursday, November 17, 2005

INTERVIEW PROTOCOL

Formalities
Confirm permission to record interview.
Confirm receipt of letter describing project.
Obtain signed Disclosure and Consent Form.

Overview Corporate Entrepreneurship & Innovation
The concepts of corporate entrepreneurship and innovation mean different things to different people. In the context of this study, following Howard Stevenson’s work, we define corporate entrepreneurship as the pursuit of desirable and feasible future situations without regard to the resources currently controlled.

Discussion Topics

1. Extent of corporate entrepreneurship & innovation
   What types of growth does your company seek?
   (e.g. Organic growth? New products? New markets? Radical? Incremental?)
   What strategies does your company employ to meet its objectives for profit growth, and how successful have they been?
   (e.g. Separate ventures? Intrapreneurs? Entrepreneurial environment?
   Structure & systems?)

2. Management of corporate entrepreneurship and innovation
   What is the view of CEO & Board with respect to entrepreneurial strategies?
   (e.g. Initiation? Encouragement? Monitor?)
   What actions do the CEO & Board employ to encourage entrepreneurial behaviour?
   (e.g. Establishment of internal venture funds? Idea generation competitions?
   How have the CEO & Board attitudes to corporate entrepreneurship evolved?
How have changes in company leadership impacted corporate entrepreneurship?

3. How entrepreneurial is the corporate culture of the organization?
   What is the attitude to risk?
   What is the attitude to failure? Forgiveness? Learning?
   Are staff pro-active in their actions?
   How aggressively does the company compete?
   Is there a commitment to innovation?
   How autonomous is management?
   What authority do managers have to commit?

4. What drives the corporate culture?
   What is its origin?
   Who are its guardians?
   What is the role of the board?
   How does culture influence recruitment? Of senior executives? Of directors?
   How are new employees indoctrinated?
   What drives cultural change?

Conclusion & Thanks

Questions
APPENDIX 6  DISCLOSURE AND INFORMED CONSENT

Disclosure and Informed Consent Form

I, have read and understood the information provided for the Corporate Entrepreneurship: Relationship between company focus and entrepreneurial success project. Any questions I have asked have been answered to my satisfaction.

I agree to participate in this activity, realising that I may withdraw at any time.

I agree that the interview may be recorded on a digital recorder as data on the condition that no part of it is included in any presentation or public display.

I agree that research data generated from analysis of information provided by me may be published or provided to other researchers on the condition that anonymity is preserved and that I cannot be identified.

NAME OF PARTICIPANT:

SIGNATURE.................................. DATE ........

FIRST INVESTIGATOR:  L Murray Gillin

SIGNATURE.................................. DATE ........

SECOND INVESTIGATOR  Stephen F Spring

SIGNATURE.................................. DATE ........