

# Board composition in companies listed on the Johannesburg Securities Exchange

Mandhlaenkosi Nyirenda

Student Number: 25482174

A research report submitted to the Gordon Institute of Business Science,
University of Pretoria, in partial fulfillment of the requirements for the degree of
Master of Business Administration.

10 November 2010



#### **Abstract**

It is necessary to address the nature of board composition in the South African economy because boards of directors are the lead indicator of whether or not the transformation initiatives put in place since 1994 are effective in bringing about meaningful change in the society within which we live. Companies are a microcosm of society.

A hundred randomly selected companies were used to provide demographic data which was used in the analysis for this study. The aim was to identify what constitutes a typical board of directors for a Johannesburg Securities Exchange listed company by measuring dimensions of gender, race, tenure, independence and board size attributes.

Findings from this research will help companies to better understand the role they can play in leveling the playing field by enabling more black people and white females to fulfil their potential and become directors of companies.

Keywords: board composition, gender, race, independence, tenure



# **Declaration**

I, Mandhlaenkosi Nyirenda, declare that this research project is my own work. It is submitted in partial fulfillment of the requirements for the degree of Master of Business Administration at the Gordon Institute of Business Science, University of Pretoria. It has not been submitted before for any degree or examination at any other University. I further declare that I have obtained the necessary authorization and consent to carry out this research.

\_\_\_\_\_

Mandhlaenkosi Nyirenda

Date: 10 November 2010



# **Acknowledgements**

I humbly acknowledge the following people for their immense contribution:

- Thanks and praise be to God Most High through whom all blessings flow.
- My Supervisor, Jonathan Cook, for his guidance, patience and challenging me to develop my own insights.
- Johan Pretorius, my mentor and manager at Exxaro Resources for generously supporting my MBA studies.
- My eternal gratitude goes to my wife, Sindi, for her strength and love.
- My genes and spirits: my mother, Maida Irene, and my maternal grandmother, uMaNdlovu, both of whom are gone but never forgotten.
   Both were mighty women of valor who overcame social, cultural and religious barriers to make the world a better place. Thank you for raising me to appreciate the importance of education.
- My future genes and spirits: my daughter, Nhlanhla Duduzile, and son,
   Ntfutfuko, who bring me endless joy.



# **Table of Contents**

# Chapter 1

1. Definition of problem	1
1.1 Research title	1
1.2 Background	1
1.3 Introduction	2
1.4 Aim of the research	3
1.5 Motivation for the research	4
1.6 The research problem	6
1.7 Conclusion	7
Chapter 2	
2 Literature review	7
2.1 Introduction	7
2.2 Gender	9
2.3 Race	13
2.4 Age	16
2.5 Tenure	17
2.6 Independence	22
2.7 Board size	27



5.2.2 Hypothesis 2-Race

5.2.3 Hypothesis 3-Tenure

5.2.4 Hypothesis 4-Independence

Chapter 3	
3 Research hypotheses	31
3.1 Introduction	31
3.2 Hypothesis 1- Gender	33
3.3 Hypothesis 2- Race	34
3.5 Hypothesis 3-Tenure	34
3.6 Hypothesis 4-Independence	35
Chapter 4	
4 Research methodology	36
4.1 Research design	36
4.2 Methodology for data collection	39
4.3 Research limitations	42
4.4 Conclusion	43
Chapter 5	
5 Data analysis	44
5.1 Description of Data	44
5.2.1 Hypothesis 1-Gender	50

52

57

60



Cha	pter	6
		_

6 Discussion of results	62
6.1 Reliability of data	62
6.2 Analysis of board composition	62
6.2.1 Gender orientation	62
6.2.2 Race	66
6.2.3 Tenure	70
6.2.4 Independence	72
Chapter 7	
7 Conclusion	76
7.1 Summary of results	76
7.2 Recommendations	80
Chapter 8	
Bibliography	81



# List of Tables

Table 5.1 Summary of sample	45
Table 5.2 Summary of age characteristics	46
Table 5.3 Summary of tenure data	47
Table 5.4 Summary of board size	47
Table 5.5 Frequency distribution of board size	48
Table 5.6 Audit committee gender orientation	48
Table 5.7 Paired sample test of audit committee	49
Table 5.8 Gender orientation of non-executives	50
Table 5.9 Paired sample tests of race	53
Table 5.10 Role of black directors	55
Table 5.11 Paired sample test black directors role	56
Table 5.12 Tenure statistics	57
Table 5.13 Tenure sample information	58
Table 5.14 Director independence	60
Table 5.15 Paired sample test director independence 60	



# **List of Figures**

Figure 4.1 Research methodology design framework	38
Figure 5.1 Box plot of gender on audit committee	49
Figure 5.2 Gender and independence	51
Figure 5.3 Box plot of race on audit committee	53
Figure 5.4 Box plot of role of black directors	55
Figure 5.5 Distribution of board tenure	57



#### 1 Definition of Problem

#### 1.1 Research Title

Board composition in companies listed on the Johannesburg Securities Exchange.

# 1.2 Background

The board composition of listed firms attracts significant interest from politicians, investors and the general public. The Johannesburg Securities Exchange (JSE), in 2006, had more than 400 companies listed which represented a market capitalization of R5, 041 trillion (Standard and Poor's, 2007). The JSE hosts companies from a broad spectrum of the South African economy such as mining, agriculture, manufacturing and financial services.

The emergence in recent times of major corporate scandals such as Enron and WorldCom in America and Regal Bank and Leisurenet in South Africa has heightened interest in how corporations are governed globally. There have been changes in the corporate governance landscape as evidenced by the introduction of stringent listing and reporting requirements on the JSE and the implementation of recommendations as dictated by corporate governance instruments such as the Surbanes-Oxley Act in America, the Cadbury Commission Report in the United Kingdom and the King Commission in South



Africa with the aim of reducing the likelihood of similar scandals occurring therefore effectively protecting investors' funds.

Good corporate governance, as determined by optimal board composition, has been demonstrated to be useful in attracting investors and influential to what investors paid for stock (Abdo and Fisher, 2007). This suggests that investors will pay a premium for a company's stock should it be perceived to have a competent board in place. In a study of listed companies in four African countries, Kyereboah-Coleman (2007, p350) found that the boards of well-governed companies maximized shareholder value with mining dominating the performance across all the four sampled countries.

Board composition, in this study, will be explored along the following dimensions of gender orientation, racial composition, age of individual board members, tenure of individual board members, independence and board size. The composition of what constitutes an optimal board is not clearly defined in the literature and, as such, there is increasing interest in how boards are composed globally and locally.

#### 1.3 Introduction

The business landscape in South Africa has historically been dominated by middle aged and senior white males at the director level. The political change in the country which was brought about by the first, all inclusive democratic



elections, in 1994, which resulted in the shift in political power from the minority white led government to a majority black ruled government. The changing political landscape brought expectations of socio-economic transformation.

This study will evaluate the respective boards of directors in the sampled JSE listed companies as at the end of the 2008 financial year against these diversity dimensions of gender, race, age, tenure, independence and board size.

#### 1.4 Aim of the research

This research aims to build on previous work in the relevant literature regarding board composition with a particular focus on gender, age, race, tenure, independence and board size. This profiling of boards is important in order to understand the manner in which boards are composed and also to gain insights into the extent to which transformation has taken place at director level in South Africa within JSE listed companies.

The aim of this research on the boards of JSE listed companies is to determine:

- the gender orientation of a typical board,
- the racial orientation of a typical board,
- the tenure of directors on a typical board and



the independence of directors by looking at the ratio between executive and non-executive directors

#### 1.5 Motivation for the research

Whilst similar studies were conducted in different countries around the world (Brammer, Millington and Pavelin, 2007; Hermalin and Weisbach, 1988; Nguyen and Faff, 2007; Rose, 2007) which examined various dimensions of board composition, none of the studies focused on the dimensions discussed in this study in a single study. These studies were adapted for the South African context and were used to determine the approach to the research problem and anticipated research findings.

South African companies have been faced with tremendous political, social and moral pressure to transform themselves to create institutions which closely represent the societies within which they operate. There have been sector specific transformation charters which have been developed in order to provide a guideline for the relevant industry to reach the transformation targets across all levels of the organization in line with the one of the primary objectives of Employment Equity Act, No. 55 of 1998, which is to 'achieve a diverse workforce broadly representative of our people' and 'achieve equitable representation in all occupational categories and levels in the workforce'. Listed companies are especially vulnerable to this external pressure to



transform given their obligation to report on all aspects of their operations in their annual reports.

This study will help answer the question of whether South African companies are transforming at board level. This study will assist in developing an understanding of what incumbent board members consider to be important attributes when selecting new members and at what intervals board members are changed. Furthermore, this study will enable current directors to inform the timing and choice of new directors based on its current composition to increase the diversity of the current board composition.

Is the dominance of white, middle aged to senior males creating an inhospitable environment which is hostile to the participation of young people of colour irrespective of gender? Another interesting observation is the role of independence of external directors, non-executive, especially when they have served for extended periods on the board and serve on the boards of several other companies which brings into doubt their ability to discharge of their duties impartially, without undue conflicts of interest arising, as well as the socio-political and economic value of 'busy' directors to the boards which they are appointed.



# 1.6 The research problem

This study investigates the profile of the boards of directors for a variety of companies listed on the JSE. These boards are profiled according to gender dominance, racial composition, tenure of members and director independence

This study investigates the composition of a typical JSE listed company in view of the above characteristics and attempts to understand the causes of the patterns observed.

#### 1.7 Conclusion

The constructs of what is meant by a "typical board of directors" are critical for the future transformation of JSE listed companies and the South African economy in general and the proactive development of human resources to close the gaps in the diversity of board of directors' talent for the future by establishing optimally diverse boards.



# 2 Literature Review

#### 2.1 Introduction

The understanding of what constitutes 'diversity' is important in approaching the discussion of board composition in JSE listed companies. The term diversity loosely refers to characteristics attributable to groups or individuals which result in variety or spread of results or heterogeneity within a particular cognitive attribute which can be used to describe a group or individual.

Diversity extends beyond the phenotype or externalized elements of what makes up an individual such race, physical ability, height and weight. In fact, diversity within the context of the above definition must be extended to include other non-phenotype attributes such as religion, age, nationality, language, ethnicity, language or educational level.

Companies provide a change agent function within societies as evidenced by the increased interaction between companies and broader society. There have been various interventions from government via legal instruments such as the Employment Equity Act, No. 55 of 1998 and by the private sector through the adoption of industry specific transformation charters with targets for achieving workplace diversity which is aligned with the goal of creating



more diversified organizations which are more reflective of the broader society's demographics.

The board of a company sets the standard in terms of norms and values expected within the company together with establishing the strategic direction which the company will take. The composition of the board is a reflection of the company's attitude towards transforming the organization in order to ensure that the demographics within that company are in line with the society within which they operate. Pitcher and Smith (2001) note that heterogeneous top management teams are more successful in that they exhibit greater creativity due to the exchange of ideas originating in different cognitive perspectives. This means that there is an economic value and competitive advantage from which the company can benefit by having a diverse board of directors beyond just diversifying the board for legal compliance.

It is important, therefore, to understand the framework along which the different diversity aspects are addressed in the literature and to investigate their practical application within listed South African companies. This investigation includes reviewing gender, race, age, tenure, independence and size attributes of the boards of JSE listed companies to develop an understanding of what demographic composition constitutes the profile of a 'typical' board of directors for JSE listed companies.



#### 2.2 Gender

Gender is an observable physical human trait lends itself to use as a discriminatory dimension within the confines of broader society and the workplace which is a microcosm of society. Historically, this inequality of how the genders are perceived and, therefore, reacted to is reflected in the categorization of certain work environments as being 'masculine' or 'feminine'. Increasingly, through the power of globalization of the world economy, these gender segregated definitions are being challenged to allow female access to these previously male domains in the workplace by fostering sameness of the genders, a process referred to as 'tinkering' by Walby (2005).

Collins, Chafetz, Blumberg, Coltrane and Turner (1993) present a 'gender stratification model' which segregates work roles by gender lines. The gender stratification model demonstrates that due to their natural reproductive duties which influence the role of women in productive environments women are disadvantaged which results in a gender biased supply of the labour pool which economically and materially weakens the role women can play in the workplace.

The study evaluate the role of gender within the board of directors because the board is composed of people at the strategic apex of the organization and, subsequently, also responsible for that organization's performance in terms of



financial objectives and the societal obligations such as transformation and corporate social responsibility (Pitcher and Smith, 2001).

In a study of gender diversity in the boardroom and firm financial performance conducted by Campbell and Minguez-Vera (2008), in Spain, contend that the gender composition of the board affects the quality of the monitoring role of the board, ultimately, the financial performance. The study found that boards consisting of a higher proportion of women board members had a positive effect on firm value. The conclusion of the study was that the direction of causality was that gender board orientation to firm value and not the other way round. This forms the foundation of the economic argument for the inclusion of women at board level.

The moral argument states that, assuming that women directors are selected without prejudice from both genders, greater participation by women at board level increases the monitoring function of the board which occurs due to the diverse gathering of board members. Previous studies (Earley and Mosakowski, 2000; Tajfel and Turner, 1986; Williams and O'Reilly, 1998) found that members of a homogeneous group tend to communicate more frequently as they are more likely to share the same opinions as well as that homogeneous groups are more cooperative therefore they experience fewer emotional conflicts. Heterogeneous management teams will be more



successful as they exhibit greater creativity due to the exchange of diverse ideas originating in different cognitive perspectives (Wiersema and Bantel, 1992). This creates the need for greater women to participate at board level to increase the gender diversity which generates divergent opinions and raises critical questions.

Lau and Muringham (1998) contend that increased women participation at board will result in unnecessarily higher levels of gender based conflict which will cause the decision-making to be more time consuming and less effective. Richard et al (2004) observed that there is a stronger identification by directors with the opinions expressed by other directors of the same gender thus increasing the likelihood of conflict within the board.

This gender-based conflict is unlikely to occur given that the quality of women candidates presented as board members have the requisite qualifications, senior management experience and, in most cases, have multiple directorships which would inform their conduct and quality of their contributions to the board proceedings. These women directors have highly social visibility and reputations which are associated with them. This suggests that women directors are appointed primarily for their social and political capital more than their specific industry experience in an attempt by



the company to increase their political correctness (Lester, Hillman, Zardkoohi and Cannella, 2008).

A study by Farrell and Hirsch (2005) found that there was an insignificant market reaction to the announcement of female director appointments and concluded that the female director appointments were driven by calls for greater board diversity rather than as a response to the business case for female directors.

Campbell and Minguez-Vera (2008) found that larger boards tended to have a greater probability of women directors being appointed as well as observing that firm size does not have a significant effect on the proportion of women on the board. This is not consistent with the expectation that a larger firm would be more visible in the market place and therefore under greater pressure to transform its board than a smaller company.

Increased gender diversity of the board can be achieved without destroying shareholder value and the investors and other external stakeholders may value the value contribution made by female directors. The women directors, especially the internal appointees, have had to overcome insurmountable odds and resistance in their career advancement. These women directors serve as role models to the female middle managers in the company, who are



future feedstock for executive positions, and better represent the firm to external stakeholders as proof of how progressive the company's selection and promotion processes are with respect to women (Harrigan, 1981).

#### 2.3 Race

Race is an important element in the board composition debate because it is a remnant of apartheid system which places immense amounts of pressure on business, especially JSE listed companies, to transform the demographics throughout all levels to be more representative of the general population. The board of directors of a listed company is the most visible measure of the extent to which the company has embarked and committed to transformation. Racial discrimination in this study refers to the systemized, institutionalized structural discrimination against people of colour, be they Black, Indian or Coloured, which seek to uphold the unfair system by which white privilege in South African society was entrenched and implacable (Ken,2007; Seidman, 1999).

Race is one of the major bases of domination in society and has been present all along in organizations (Nkomo,1992). Race needs to be dealt with within organizations because these very organizations are microcosms of society hence the need to transform has been drafted into legislation and various



industry charter wherein the companies have been given transformation targets across various management levels and deadlines.

Tarman and Sears (2005) describe various forms of racism in their study but discuss the concept of 'symbolic racism' which effectively speaks of white opposition to racially targeted policies, typically outweighing the roles of other important political attitudes. Racism as a social construct thrives on stereotyping between the different groups and is seen in incorrect perceptions which different racial groups have about each other, for instance, the feelings that blacks are making and winning too many demands from the government as was observed by Jacobson (1985) in an American study which looked at resistance to affirmative action programmes within companies but is equally applicable to the South African context.

Sarra (2005) observes that the advancement by people of colour within companies is minimal at the highest managerial and director level. Legislation enforcing transformation and enabling access for people of colour and women however these forced measures have resulted in 'tokenism' where companies appoint people into positions where they are ineffective or undeserving just to meet the prevailing compliance targets. Tokenism itself can be viewed as a form of overt racism in that it is demeaning to the appointees as it restricts their ability to contribute meaningfully to the proper functioning of the



organization and derive a greater sense of self worth. Tokenism is especially harmful at board level given the visibility which comes with such appointments since individual reputation is an important consideration.

Collins (1997) explored the problem of race and corporate mobility and found that race was used to structurally eliminate people of colour from qualifying for executive level jobs. He referred to these jobs as 'racialised jobs' which were characterized by lower job ceilings which were designed to systematically ensure that people of colour are not on the fast track in terms of career progression.

Notably the academic literature on the role of race and racial heterogeneity within boards is limited despite its importance especially given that workplace realities manifest themselves in the demographics of board and senior management levels. Cox and Nkomo (1990) in commenting on the absence of academic interest in researching race in organizational behavior conclude that race is an 'invisible' topic in published research. Andersen (2001) similarly mentions that race-blind thinking has thwarted teaching about structural racism.



# 2.4 Age

Age of board members is an important consideration in the board composition debate because companies at every level are made up of different age groups. Taveggia and Ross (1978) state that different age groups have significantly different values, beliefs and attitudes which is what commonly referred as 'generation gaps'. The boundaries between the generational groups are not distinct but rather loosely defined and permeable. It is important to know the generational orientation of a board of directors in view of the impact the dominant generational membership will have on strategic decision making especially their risk aversion and openness to adapting technology. Papenhausen (2006) postulates that there are two distinct categories mainly psychological orientation which incorporates values, cognitive models and other elements and, secondly, observable dimensions such as age, experience, functional background, company tenure and formal education.

Laufer (1971) concurs that generational conflict is driven by the impact of demands of post-industrial society on the children of the middle class and the change in the pattern of childhood socialization within the middle class. This means that individuals from a certain generational era experience common major events such as war, plagues, famines and economic crises which



informs their world view, which is what Hazlett (1992) refers to as 'generational self-consciousness'.

Given that boards are made up of people belonging to different generational collectives with their attendant prejudices but are tasked with achieving a common goal by the shareholders, the board of directors need to be able to work together effectively despite their different generational affiliations. Papenhausen (2006) proposes three generational groupings with different roles, namely 'Elders', Mid-lifers and 'Rising Adults'.

Generational theory as an academic theory is still in its infancy and it is anticipated that academic researchers and firms stand to benefit immensely by combining generational theory into the field of strategic management as well as understanding its role in impacting behavioural patterns and decision making within boards.

#### 2.5 Tenure

Tenure, in the context of this research study, refers to the duration for which a particular director has been serving as an appointed member of the board of directors for the sampled company. This definition is particularly important in that it measures the period in which a particular individual has been an



appointed board member as some directors have had long standing associations with the boards of companies for which the serve in a consultative role which period is usually not reported in the annual reports but has direct impact in the nature of personal relationships within the board.

The tenure is an indicator of stability within the board as the top management team for a company which stability, or the lack thereof, impacts company performance and perceptions of the market of the firm which, for a listed company, influences the share price. Daily and Dalton (1995) observe that top management changes are frequently symptomatic of organizational distress which suggests that the turnover at board level is usually as a result of internal strife and is unlikely to be a result of natural attrition. Wagner, et al (1984) note that there is a negative relationship between firm performance and the tenure of board members where boards with a high turnover were observed to have inferior performance compared to boards whose directors served the same boards for longer periods collectively.

This observed inferior performance in boards with high turnover could be a result of the inability of the replacement directors to 'hit the ground running' due to the sustained inability for the board to adopt and absorb new members to create an enabling environment for seamless director replacement and facilitate the immediate positive contribution of incoming directors.



The pressure on boards to produce results from shareholders and stakeholders of the firm such as employees increases the likelihood that remaining board members will choose an individual who is most likely to fit in with the board and company culture with the least amount of disruption and discomfort experienced. Crutchley, Garner and Marshall (2002) state that board members opt to voluntarily leave poorly performing company boards rather than to wait for the shareholders to demand their departure given the ineffectiveness of the board. This suggests that individuals who accept director appointments do so with a view to enhancing their personal reputations which is the currency for their continued appointment as director on the current and future boards. Tenure as a director can be terminated by individuals as a means of protecting their reputational capital which means that sustained superior performing boards are bound to experience lower member turnover as the good performance enhances the reputations of the serving directors.

Denis and Sarin (1999) found that poorly performing firms are more likely to add more external directors to the board as a means of stabilizing the company and ensure improvement in performance. However, Denis and Sarin (1999) also observe that these replacement external directors in their study did not result in performance improvements. This could be attributed to the inferior quality of the replacement directors or the information asymmetry



which the internal directors may use to advantage during periods of strife within the firm leadership.

The social structure of boards would suggest that there are divisions across various lines such as between external and internal directors, long serving and recently appointed directors, male and female, relative age of group members and other factors which may give rise to clique formation within small groups. Eriksson, Madsen, Dilling-Hansen and Smith (2001), in a study of turnover at board level within Danish firms, found that there were other less obvious factors which were crucial in determining the tenure of board members such as firm age and size, board size, industry type and the market dominance position of the firm in its specific industry. Wiersema and Bantel (1993) propose a model which groups the contributing factors for board member turnover into three groups namely 'munificence', 'instability' and 'complexity'. In the model, 'munificence' refers to the ability of the operating environment to permit organizational growth which is useful in that this munificence helps buffer organizations within that context from external and internal hostilities. The 'instability' refers to the rate of unpredictable change in the external operating environment whilst 'complexity' refers to the heterogeneity in and range of environmental factors that need to be considered in strategic decision-making.



Taylor, Ardia and Gupta (1996) state that tenure at board level is a function of each individual director's ability to cope with the emerging reality within the firm's operating environment and within the social context of how the board members relate to and work with each other. Taylor et al (1996) further find that psychological contracts which each director has with the rest of the board are different on an individual level given that the inequality of directors due to the perceived power which some directors have with some directors being seen as 'kingmakers' within the firm. The directors who are not aligned with the more powerful directors would be under tremendous pressure to conform or be confronted with a hostile environment which over time would be result in these directors terminating their service with the firm. Shen and Cannella (2002) propose a model which states that the biggest influence on board tenure is the timing and nature of Chief Executive Officer (CEO) succession. They postulate that termination of tenure by directors is observed to be greatest when there has been a change in CEO as well as in response to the choice of CEO replacement whether the replacement is a 'follower' of the outgoing CEO or an internal 'contender' or an 'outsider'.

Extended tenure on a board could also be perceived as a measure of value which the firm attaches to a particular director as well as the converse, which may be that extended tenure may be a measure of increased loyalty of the individual to the broader organization and fellow board members. This would



imply that the level and nature of commitment of each director change over time which would have an impact on the individual decision to continue to serve on a company's board.

# 2.6 Independence

The recent widely publicized corporate scandals which led to the collapse of global firms such as Arthur Andersen, Bre-X, Enron, WorldCom and, locally, of Leisurenet and Regal Bank due to poor internal corporate governance The response from the legal and investor controls and standards. communities has been to institute more stringent corporate governance and more transparency from firms especially in the ability of the firm to remain a going concern. In South Africa, the King Commission Report of 1994 which was instrumental in establishing the first code by which companies would abide. Subsequent codes such as the King II and III served to update and make the corporate governance standards for South African relevant given the broadening scope of what the concept of what good corporate governance constitutes. A key recommendation of the King Reports centers on the role of the board, board sub-committees and the duties of its directors in ensuring that the firm is well governed so as to ensure that the interests of the investors, shareholders, employees and the various other stakeholders are protected. The latest report, King III of 2009 in Chapter 2.18, though not prescriptive in terms of specific ratios of internal to external directors, makes



the recommendation that the majority of external directors be independent and that the level of independence be evaluated annually as a means of balancing power within the board.

The subsequent section, Chapter 2.19 of King III, refers to the process by which directors are selected and appointed with an emphasis on ensuring that the selection process be handled by a Nominations Committee and should be a transparent, fair process. Hill (1996) states that boards should be recognized as social entities which have their own micro-structures, hierarchies and cultures despite their relatively small size. The role of the external director is to provide a balancing mechanism to the board proceedings (Hill, 1996; King III, 2009) but this role is difficult to fulfill especially given the manner in which directors are identified, put forward for selection, appointed and assimilated as board members to an existing board.

Appointment to the board of a company is an affirmation of that individual's stature and ability to contribute to the future success of a company. Taylor, et al (1996) state that a board appointment for an internal board member represents the pinnacle of a career path whereas an external appointment is of a transactional nature given that the individual is appointed for their reputation, expertise or industry network value which the firm can leverage for profitability. The transactional nature of the relationship with external directors



is as such because both the firm and individual stand to benefit from the relationship. The external appointees benefit because a board seat adds to their personal profiles and makes them more visible in the market place which normally leads to other similar board appointments. The firm benefits from its association with the said external directors who are expected to provide expert, alternative and independent voice to the board proceedings.

In addition, the firm expects the external directors to provide access to new markets especially where internal managers in the firm would not, due to the limited reach of their networks, be able to penetrate such as in firms where the firm has a high value of business with government departments or state owned enterprises (Agrawal and Knoeber, 2001). This has been seen in the South African context where senior public office bearers have been absorbed into the private sector at relatively senior levels to fulfil this market-seeking need of the firm which employs them. Clarysse, Knockaert and Lockett (2007),in a study of board membership in start-up firms, found that the reputational and relational capital of external board members may be important resources in helping firms overcome the liability and newness. This resource dependence may result in a lack of board independence given the underlying relationships within the board members.



Hill (1995) argues that the concept of outside directors being independent is flawed because boards, being social entities, have social processes and micro-structures of their own which require that incoming directors be 'socialized' or assimilated into the culture and norms of the board in order that they be able to contribute meaningfully to the board proceedings. Given that the individuals operating at board level have accepted the appointment as an affirmation of their worth to the company and recognition from their peers, there is a great pressure to 'fit in' exerted by the incumbent board members on incoming board members.

Despite most boards having a sub-committee which deals with the nomination and selection of new appointees to the board, there is a behind-the-scenes where the person who chairs the Nomination Committee lobbies the other directors as to the possible options of new board members before the matter is tabled formally in a board meeting. This means that the proposed new director, internal or external, must be acceptable to his peers on the board in addition to being able to provide valuable insights, expert opinion, independent and alternative perspectives. Clarysse, et al (2007) found that firms in the start-up phase have limited resources internally which increases their dependence on external sources for their specific resource needs, such as funding, expertise or technology, which leads to the firm making room on the board for more external directors.



Agrawal and Knoeber (2001) found that larger firms, owing to their greater visibility, have a higher exposure to the consequences of political oversight hence their greater propensity to appoint politically influential and relevant external directors than in a smaller company in the same industry. Raheja (2005) puts forward a model which predicts the circumstances under which firms would require larger boards or a higher proportion of external directors to provide a more effective monitoring role. Whilst having a greater proportion of external directors on the board is supposed to provide a neutralizing effect on the CEO's power, Raheja (2005) states that despite their independence, external directors are less informed about the internal firm projects and operations which increases their reliance on their fellow directors who serve in an executive capacity. Information asymmetry reduces the importance of the non-executive directors as they are only able to act on information which they have been provided. The attendant verification costs which the external directors have to incur as a result of this information asymmetry causes a delayed decision making process and, may eventually, lead to mistrust within the board between the executive and non-executive board members.

Yermack (2006) argues that the independent monitoring role of the board is compromised because directors sometimes serve on each other's boards, belong to the same clubs hence the board is unlikely to endorse the appointment of new directors who are likely to challenge or criticize the



company's management. Hill (1995) concurs in that boards constitute a small social circle of individuals connected professionally or otherwise. The interconnected nature of directors gives rise to the concept of 'busy' directors who are appointed on multiple boards. This calls to question the independence of many directors and their ability to impartially discharge of their duties as directors of firms operating in different industry sectors effectively as is expected of every company director. Fich and Shivdasani (2006) in a study of the importance of 'busy' directors found that the share price reacts favourably to news of the resignation of a 'busy' director which signals the dissatisfaction shareholders have with having 'busy' directors serving on their boards as their independence is compromised due to their commitment to the boards of other firms. Their findings are in sharp contrast to a study done by Perry and Peyer (2005) which found that individuals who hold multiple directorships can enhance value in that these 'busy' directors can be useful in the cross-pollination of ideas and best practices which they have access to in the firms on whose boards they sit.

#### 2.7 Board Size

Board size is one of the most studied topics in the corporate governance field but the bulk of the literature has focused on companies in the United States of America (Dalton, et al 1999; Yermack, 1996;), Europe (Staikouras, et al, 2007), Germany (Frick and Bermig, 2009), India (Dwivedi and Jain, 2005) and Egypt



being the only African case study in the literature (Elsayed, 2009). This present study will also serve to contribute to the board size debate in the South African context.

There is a widely held expectation that as a group gets larger, 'free-riders' start emerging within the group and the decision-making ability and decision-quality diminishes consequently. The 'free rider' hypothesis comes from social psychology and it posits that as a group gets larger, individual contribution is reduced. Lipford (1995) in a test of the 'free rider' hypothesis in a church context found that contrary to conventional wisdom, free riding tendencies are greater in smaller groups than in larger groups. Whilst this is an interesting finding, it is important to note that group membership within companies is by invitation and has resource-seeking, reputation enhancing benefits for members whereas in the church context group membership is voluntary and seen to be part of one's contribution to the common good for which one does not expect compensation in return for their contribution.

There is work done in the education field which looks at the relationship between class size and student performance (Arias and Walker, 2004) which is useful in developing an understanding of the role which board size can play in facilitating and enhancing the performance of the board of directors of companies. Arias and Walker (2004) found that smaller classes are more



conducive to interactive, engaging discussions and critical thinking from participants which elements would be useful at board level proceedings. Smaller group sizes mean that each member is more visible and this tends to encourage greater individual participation. The implication for business would be that companies need to ensure that the board size, expertise and demographics support the establishment of an efficient board.

Yermack (1996) found that firm size and board size are closely related in that bigger firms by turnover tend to have larger boards. Other factors influence board size such as complexity of the firm which refers to the divergent businesses within the company's portfolio as geographical spread of the operations. Hermalin and Weisbach (1988) postulate that troubled companies tend to respond to turbulent business conditions by reducing board size and they observe that this phenomenon is particularly common after CEO succession battles. Dalton, et al (1999) concur by adding that smaller boards are less prone to free riding as is seen in board sub-committees which the study found, ironically, are more effective than the main boards. This phenomenon is due to sub-committees being smaller therefore less prone to free-riding as well as leveraging on director expertise than would be possible within the main board where matters tend to be of a general nature.



There are contrasting views which support larger boards in the literature (Larma and Vafeas, 2009; Dwivedi and Jain, 2005) from the perspective that larger groups have better monitoring and reduce the likelihood of 'group think' especially in boards where the CEO tends to dominate the board proceedings. These proponents of large boards find that large boards have a diverse skills pool from which to draw opinions, greater networks which the company can tap into from diverse director background as well as lower workload per director. Larma and Vafeas (2009) observe that the relationship between board size and firm performance is non-monotonic that is the relationship is positive as board grow from small to medium and negative as boards grow from medium to large. This would suggest that board size must be matched to the firm's life cycle and greater attention should be paid to establishing the optimal board size for the company at the particular stage of its life cycle whilst considering the skills set and demographic composition required making the board functional.



# 3 Research hypotheses

## 3.1 Introduction

Various studies (Di Petra, et al 2008; Garg, 2007; Kim, 2007, Lester, 2008; Matolcsy, Stokes and Wright, 2008; Nguyen and Faff, 2007) have been done which explored board composition in relation to relation to firm performance and value creation in the American, Australian and European contexts. Few (Kyereboah-Coleman, 2007) have studies looked addressed board composition in the African business context and, more specifically, in the South African context given the political, legislative and moral pressure exerted on businesses to transform at all levels. The existence and adoption of sector charters, such as the Mining Industry Charter on Transformation which was adopted in tandem with Minerals and Petroleum Resources Development Act 28 of 2002, means that companies operating in South Africa, irrespective of their ownership, whether local or foreign, have had sufficient time to transform themselves at all levels. This study assesses specifically at the transformation which has taken place at board level since the data is easily verifiable yet it would be difficult to accurately measure transformation maturity across lower levels in all the sampled companies.

The specific research hypotheses that will be examined are explained below.



## 3.2 Hypothesis 1<sup>a</sup>

Male directors are more likely to serve on the audit committee than female directors

Arfken, Bellar and Helmus (2004) present evidence, from a study conducted in the United States of America, that most boards of directors are dominated by males and that there is a scarcity of women at board level within listed companies suggesting the existence of a 'glass ceiling' within most companies. The Audit Committee is the board committee which is charged with the most responsibility in terms of ensuring proper financial governance of the company hence it can be said that appointment to the audit committee can be said to be a reflection of one's value to the board. This hypothesis tests the extent to which women directors are 'tokens' by examining the board subcommittees to which women directors are appointed as a measure of their value against the notion that women directors are appointed to boards merely for the company's image and political correctness without due regard to the capability and potential contributions these women are able to make. This study will test the conclusion of the above study within the South African context which, given the random selection of listed companies, should provide a balanced perspective on the progress made by listed South African companies across all industrial sectors to facilitate the advancement of women at board level. The influence of sector specific transformation charters



and individual company sized should be neutralized by the random sample population to determine the existence of a 'glass ceiling' in JSE listed companies.

# 3.2 Hypothesis 1<sup>b</sup>

Women are more likely than men to be non-executive directors

A study by Huffman and Cohen (2004) found that there exists a gender-based workplace authority deficit within companies across all levels by making the observation that most women are concentrated in female dominated occupations which comprise fewer positions of authority than male dominated occupations. This observation may be useful in developing an understanding of what factors, other than government policy, is influencing the rate of progress of women in South African companies. Daily, Certo and Dalton (1997) found that despite the number of women at board level having increased, the number of female executive directors is astonishingly small. Burgess and Tharenou (2002) observe that since non-executive directors are appointed by invitation, non-executive directors are most likely to be women which provide the boards with an opportunity to bypass traditional hurdles which women encounter internally in the normal rise to a board position. It is very important to test this hypothesis because, in most instances, nonexecutive directors provide a monitoring role on the boards of the companies to which they are appointed. Developing an understanding of the current



proportion of female non-executive directors there are currently on JSE listed companies is a good indicator of whether they are appointed for compliance purposes.

## 3.3 Hypothesis 2<sup>a</sup>

White directors are more likely to serve on the audit committee than black directors

It is expected that, given the history and legacy of apartheid in South Africa, the number of white directors will outnumber black directors in JSE listed companies. This hypothesis tests the existence of a deliberate resistance to the progress of black people in the upper echelons of companies in South Africa along racial lines similar to what was found in a study done in America by Jacobson (1985) which found that resistance to affirmative action was in itself a form of racism. The audit committee discharges an important function of the board and, as such, appointment to the audit committee is a measure of one's value to the board. This hypothesis tests the racial composition of the audit committee versus the other board committees as a reflection of the 'tokenism' of black directors on boards of JSE companies. This may lead one to conclude that boards of a JSE listed company are typically an 'old boys' club' which makes it difficult for black people to be accepted and assimilated.



# 3.3 Hypothesis 2b

Black directors have a higher likelihood of being non-executive directors than do white directors

A study by Cox and Nkomo (1990) points to the existence of 'invisible men and women' in describing the status of minorities in American companies. In the South African context, this could explain the expectation that the majority of black directors are externally oriented in that they would be non-executive directors given the difficulty the internal black men and women have of rising within the companies based on the socialization process which would tend to favour the appointment of white directors in executive board positions and exclude potential black board appointees.

## 3.4 Hypothesis 3

The boards of JSE listed companies have a majority of external directors. The number of external directors is a measure of the independence of that particular board given that external directors play a monitoring role on boards and the extent to which new ideas are introduced to the board from external directors who are appointed for their qualifications, experience, financial and socio-political capital (Yermack, 2006; Hermalin and Weisbach, 1988, Agrawal and Knoeber, 2001). It is expected that the boards of JSE listed companies will have majority of external directors. This hypothesis also tests the compliance to the recommendations of the King Code of Corporate



Governance which explicitly states that external directors must be the majority of directors on the boards.



# 4 Research methodology

# 4.1 Research design

## 4.1.1 Introduction

This study uses a methodology most appropriate to answer the research hypotheses given the time and resource limitations. The purpose of the study is to determine the profile of a typical board of a JSE listed company.

The study, first, ascertains the gender orientation of the board in each company by categorizing the degree to which it is masculine. The second stage of the research examines the extent to which the profiled board is racially diverse. The study further examines the age profile of the board with the view to developing an understanding whether age plays a role in determining board appointments. The study assesses the tenure of the directors which will provide insights into the manner whether boards deliberately steer clear away from 'group think' by periodically rotating board appointees.

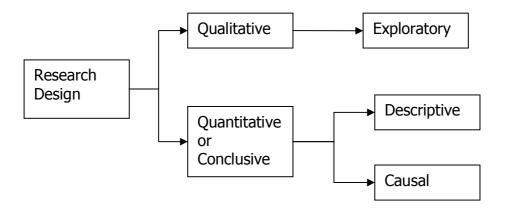
Finally, the study looks at the independence of board members by examining the ratio between internal and external directors on the board together with evaluating the board size.



The study can be classified as a quantitative research which according to Creswell (1994) is defined as being 'an inquiry based on testing a theory measured and analysed with statistical procedures in order to determine whether the predictive generalizations of the theory hold true'. Similarly, Zikmund (2003) defines quantitative research as descriptive research as being 'research designed to describe characteristics of a population or a phenomenon'. Understanding both definitions is important in developing the approach which is relevant to this study.

This study uses a random sampling technique to collect and analyse the relevant data for the research.

Figure 4-1 Research design framework





# 4.2 Methodology for Data Collection

## 4.2.1 Unit of analysis

The unit of analysis is the composition of the boards of directors for JSE listed companies during the 2008 financial year.

## 4.2.2 Population of relevance

The population of relevance is entire population of directors of companies listed on the JSE during the 2008 financial year. The entire population of JSE listed companies is 400. The population of relevance will be obtained from the sampled companies' annual report for the 2008 financial year and JSE companies to confirm listing status during 2008.

## 4.2.3 Sampling method and size

The exact size of the sample is 100 which is deemed to be sufficiently representative of the 400 JSE listed companies. The research sample will include companies listed on the  $Alt_x$  board of the JSE despite their relatively smaller scale of operations and the subsequent reduced visibility and political pressure to transform their boards.



No mention is made of the company name in the analysis and discussion, and where it is necessary to make a point by way of example a code name is used.

Zikmund (2003) states that within simple random sampling the procedure followed to select the sample population must be such that 'each element in the population has an equal chance of being included in the sample'. In view of this definition, the procedure followed in selecting the 100 sampled companies was that all the 400 JSE listed companies were listed in alphabetical and, using the 'random number' function in Microsoft Excel program, were assigned random number between 0 and 1. The list of companies was then sorted in ascending order based on the value of the random assigned to it. The first 100 companies on this new ordered random list were deemed as the sample to be used for the analysis. The ordered random list of all the companies used for this study is included as Appendix 1.

This sampling method was used to given each company which is listed on the JSE a fair chance of being selected for the sample population. This randomization process was an important step in order to reduce the amount of bias which could be introduced by having prior information such as industry in which the company operates in, company size effects and any other biases



which may, otherwise, have been introduced by manually selecting the companies for the sample.

The sample size of 100 from the population of 400 is statistically relevant when testing is done at the 95% confidence level with an 8.5 confidence level.

#### 4.2.4 Methods of data collection

The study utilizes an unobtrusive data collection method in that there is no interaction with the study subjects as sample data will be collected from the published annual reports for the 2008 financial year. These annual reports will be downloaded from the websites of the sampled companies but where the company does not have a website or its annual report for 2008 is not available, steps will be taken to obtain the financial report directly from the company concerned but where this is not possible, the next available company will be used as a replacement.

When the method is applied correctly and sufficient controls have been put in place to reduce sampling errors and biases, passive data collection is quicker and cheaper which is important given the time and resource constraints for this study. The data which will be collected and analyzed consists of the following data for each company in the sample:

- Gender of board members
- Race of board members



- Tenure of board members
- Independence of board

All this information will be available in the published annual report for the period under review.

## 4.2.5 Data analysis approach

This study will use panel data to analyze the data pertaining to the research questions posed. These statistical tests will be followed by a discussion of the results in relation to the hypotheses developed above.

## 4.3 Research limitations

The study analyses companies from various sectors of the economy which may mean that intra-industry biases will inevitably reduce the reliability of the observations to be a proxy for the rest of the JSE listed companies. Furthermore, the study relies on information in the public domain and does not include interviews with some board members to obtain insights into the director appointments made on their respective boards as well as the companies' philosophy regarding director appointments. The key requirement



that the company needed to have been listed in 2008 means that companies which listed after 2008 will not have published audited financial reports for use in this study. The list of diversity aspects discussed in this study is not exhaustive. Finally, the research looks at particular year, 2008, which is just a snapshot in the history of transformation at board level in South Africa and therefore does not provide a 'before' and 'after' perspective of those particular companies for comparison.

## 4.4 Conclusion

This study should be able to be repeatable, accurate and be able to measure the aspects it is intended to. Staikouras, Staikouras and Agoraki (2007) observed that board size and composition constitute two of the most prevalent

corporate governance issues which may affect the ability of the board of directors' ability to be an effective monitor of senior management and influence corporate performance. This study, by using the abovementioned quantitative research methods aims to investigate and establish what constitutes a typical board in South Africa.

As previously mentioned, the study examines only JSE listed companies which is not fully representative of the companies operating in the South African economy, the bulk of which are not listed which would make it difficult gathering reliable information for this study.



## **5: DATA ANALYSIS**

## 5.1 Description of Data Set

The data used in the sample was taken the annual reports of companies listed in the Johannesburg Securities Exchange for the 2008 financial year. This information is summarized in Table 5.1 below.

The sample constituted of 99 randomly selected JSE listed companies which in total provided 931 directors on these boards. However, the number of directors has not been adjusted to allow for multiple directorships which would result in a single director being counted more than once but even if such adjustment were to be made the magnitude of the numbers and the conclusions drawn from them would still be similar.

There were a total of 568 external directors in the sample of whom 243 were black directors, both male and female. There were 177 black male directors and 67 black female directors. There were only 22 white female directors in the entire sample.



Table 5.1 Summary of sample

Total number of companies	99
Total number of directors	931
Total outside directors	568
Total executive directors	363
Total black directors	243
Non-executive black directors	199
Executive black directors	44
Black male directors	177
Black female directors	67
White female directors	22

The other demographic attributes of this sample of directors such as age, tenure and board size were analyzed using simple statistics and are detailed below.

The reporting standards across the sampled companies were not similar which resulted in the amount and quality of director demographic information available to vary greatly within the sample. For instance, only 75 companies reported on the director ages and within a particular company the female directors' age were not mentioned. However, within the 75 sampled companies 746 directors are represented from which it was observed that the youngest director was 27 years old while the oldest director was 80 years old. The widest range within a single board was 42 years and the average age was 53 years with a standard deviation of 10.06 years.



Table 5.2 Summary of age characteristics

Companies sampled	75
Number of directors	746
Youngest director (in years)	27
Oldest director (in years)	80
Widest range (in years)	42
Average age (in years)	53
Standard deviation (in years)	10.06

The tenure attributes of each board were also analyzed but a small number of companies provided information of director tenure. In some instances, the board member tenure was given for some directors and not for others. This further shows that the reporting standards of listed companies should be regulated to ensure that companies a standardized set of demographic information in the reports. The tenure information is summarized in Table 5.3 below.

Only 30 companies were sampled from the few which provided tenure data which comprised 256 directors. A minimum tenure of 1 year was observed which was attributable to new board appointees and was observed in almost all the sampled companies with the longest tenure observed being 40 years but this anomaly was due to the individual concerned being the founder of the family owned business. The widest tenure range was observed in the same company owing to there having been a new appointment in the same year which resulted in a range of 39 years for the tenure between the longest serving director and newest appointee. The narrowest range observed range was 0 years in a company which had been recently founded and listed which suggests a new management



team. For the entire sample of 30 companies, the average tenure was 15.43 years with a standard deviation of 9.6013 years.

Table 5.3 Summary of tenure data

De ande avancia a d	20
Boards examined	30
Directors in sample	256
Least tenure (in years)	1
Longest tenure (in years)	40
Widest tenure range (in years)	39
Narrowest tenure range (in years)	0
Average tenure (in years)	15.43
Standard deviation (in years)	9.6013

The last demographic element of board composition which was observed in the sample population but not hypothesized is board size. All 99 companies had information on board size and it was observed that the smallest board had 4 members whilst the largest board had 18 members as shown below in Tables 5.4 and 5.5. The modal board size was 10 which occurred in 18 companies whilst the mean board size was 9.404 people with a 3.139 standard deviation.

Table 5.4 Summary of board size

Boards examined	99
Smallest board size	4
Largest board size	18
Modal board size	10
Average board size	9.404
Standard deviation	3.139



Table 5.5 Frequency distribution of board size

Board Size	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
Frequency	2	11	4	14	11	8	18	9	4	7	5	7	5	0	1

## **HYPOTHESIS 1a**

Research hypothesis: Male directors are more likely to serve on the audit committee than female directors

Table 5.6 Audit Committee gender orientation

Gender		ber of panies		Numb	er of direc	tors (statis	stics)		
Gender				Std.					
	Valid	Missing	Mean	Deviation	Minimum	Maximum	P25	P50	P75
Male	257	2	2.65	.990	0	6	2.00	3.00	3.00
Female	30	2	.31	.507	0	2	.00	.00	1.00
TOTAL Audit Committee	287	1	2.97	1.060	1	6	2.00	3.00	4.00

There is an obvious skew of the director membership of the audit committee towards the male directors. Half of the companies surveyed have no female directors at all in their audit committees. The maximum number of directors for a given company's audit committee is only 2. Whereas about half of these companies have 3 or more male directors in their audit committees.



Figure 5.1 Box plot of Audit committee gender

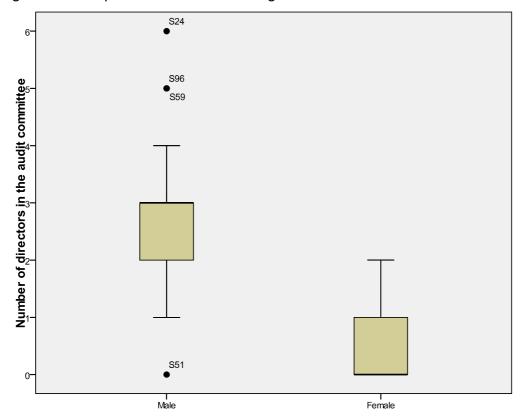


Table 5.7 Paired sample test for audit committee

# **Paired Sample Statistics**

	-	Mean	N	Std. Deviation	Std. Error Mean
Pair 1	Male	2.65	257	.990	.101
	Female	.31	30	.507	.052

# **Paired Samples Test**

			P	aired Diffe	rences				
			Std.	Std. Error	95% Confidence Interval of the Difference				Sig. (2-
		Mean	Deviation	Mean	Lower	Upper	t	df	tailed)
Pair 1	Male - Female	2.340	1.172	.119	2.104	2.576	19.673	96	.000



We are interested to determine whether audit committees are more dominated by male as opposed to female directors. The numbers of male and female directors were gathered for a sample of 100 companies. In this case, we use a paired t-test to determine whether the average number of male directors is indeed significantly higher than the number of female directors in an audit committee.

Looking at the descriptive statistics, we can immediately notice that there is an average of about 3 male directors per audit committee, while there is an average of less than 1 per committee. The paired t-test confirms this. With a very small p-value less than 0.01, we can confidently conclude that on average, there are more male directors than females in the audit committees of companies. This confirms the hypothesis that audit committees are dominated by males than female directors.

#### **HYPOTHESIS 1B**

# Research hypothesis 1b: Women are more likely than men to be nonexecutive directors

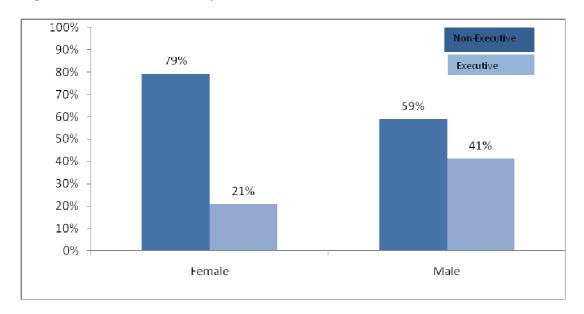
Table 5.8 Gender orientation of non-executive directors

Type Of Director	Female	Male	Total
Non-Executive	68	461	529
Executive	18	322	340
Total	86	783	869

Type Of			
Director	Female	Male	Total
Non-Executive	79.07%	58.88%	60.87%
Executive	20.93%	41.12%	39.13%
Total	100%	100%	100%



Figure 5.2 Gender and independence of directors



80% of female directors in the sample were Non-Executive Directors compared to a much more even 60-40 split within male directors. It is clear that female directors are much more likely to be Non-Executive as opposed to Executive directors, whereas the chances of being either are even for male directors. The possible reasons for this are the masculine work environments prevalent in the sampled companies of the JSE listed companies as well as confirming that the appointment of women directors is meant to serve a political or compliance purpose from the perspective of the firm. This would demonstrate the insurmountable odds faced by women, both white and black, in rising to board level within JSE listed companies. This would suggest that most of the women who are appointed onto these boards are token appointments. Therefore based on this evidence we reject hypothesis 1B.



## **HYPOTHESIS 2a**

Research hypothesis 2a: White directors are more likely to serve on the audit committee than black directors

Table 5.8 Racial orientation of audit committee

Race	_	ber of panies	Number of directors (statistics)						
	Valid	Missing	Mean	Std. Deviation	Minimum	Maximum	P25	P50	P75
White	210	2	2.16	1.222	0	5	1.00	2.00	3.00
Black	77	2	.79	.865	0	4	.00	1.00	1.00
TOTAL Audit	287	1	2.97	1.060	1	6	2.00	3.00	4.00
Committee									

Although the maximum number of white and black directors in the audit committee are almost the same (5 and 4, respectively), we observe that 75% of these companies have at most only 1 black director in the audit committees but there are at least 50% of these same companies have at least 2 white directors in their audit committees. Clearly, there is a skew in the composition of the audit committees towards the white directors.



Figure 5.3 Box plot of racial orientation of audit committee

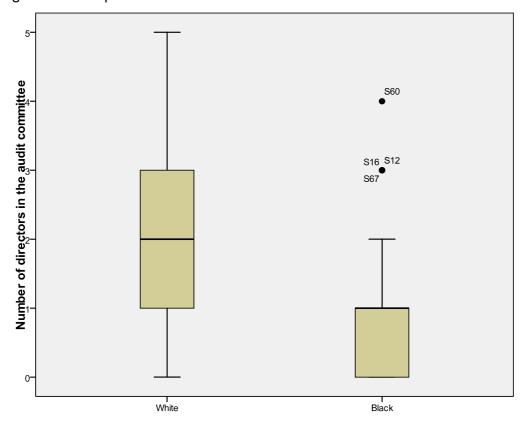


Table 5.10 Paired sample test of racial orientation of audit committees

Paired Samples Statistics

	-	Mean	N	Std. Deviation	Std. Error Mean
Pair 1	White	2.16	97	1.222	.124
	Black	.79	97	.865	.088

Paired Samples Test

		Std. Deviatio		Std. Error	95% Confidence Interval of the Difference				Sig. (2-
		Mean	n	Mean	Lower	Upper	t	df	tailed)
Pair 1	White - Black	1.371	1.810	.184	1.006	1.736	7.459	96	.000



In this hypothesis, we are interested to know whether audit composition of the audit committees are mostly white than black directors. For each the 100 randomly selected companies, the numbers of white and black directors were gathered. We use the same test (paired t-test) as in the previous hypotheses to determine whether the average number of white directors is indeed significantly higher than the number of black directors in an audit committee.

Descriptive statistics immediately shows the noticeable difference. There is an average of more than 2 white directors while there is an average of less than 1 black director only per audit committee. On average, the difference between the number of white and black directors in an audit committee is about 1.4. The paired t-test confirms this is a highly significant difference (p-value less than 0.01). This supports the hypothesis that audit committees are composed more likely of white than black directors.



## **HYPOTHESIS 2b**

**Research hypothesis:** Black directors have a higher likelihood of being nonexecutive directors than do white directors

Table 5.10 Role of black directors

Director Type	Number of		Number o	of directors	(statistics)			
Director Type	companies	Mean	Std. Deviation	Minimum	Maximum	P25	P50	P75
Non-executive	199	2.01	1.502	0	8	1.00	2.00	3.00
Executive	44	.44	.895	0	5	.00	.00	1.00
TOTAL Black directors	243	2.45	1.939	0	10	1.00	2.00	3.00

Figure 5.4 Box plot of role of black directors

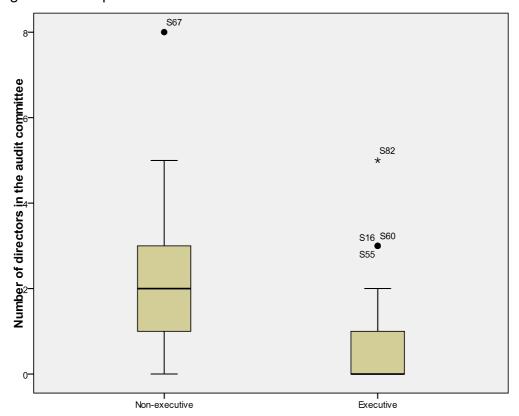




Table 5.12 Paired sample test of role of black directors

#### Paired Samples Statistics

		Mean	N	Std. Deviation	Std. Error Mean	
Pair 1	Non-executive	2.01	199	1.502	.151	
	Executive	.44	44	.895	.090	

#### Paired Samples Test

	-		Paired Differences						
			Std.	Std. Error	95% Confidence Interval of the Difference				Sig. (2-
		Mean	Deviation	Mean	Lower	Upper	t	df	tailed)
Pair 1	Non-executive - Executive	1.566	1.533	.154	1.260	1.871	10.162	98	.000

In this hypothesis, we are interested to know among black directors, whether or not most of them are non-executives rather than executives. Starting with basic statistics, we immediately notice that there is an average of about 2 non-executive directors among the blacks in the audit committees. On the other hand, there is an average of less than half (0.44) who are executives. Using the same statistical technique used in the earlier hypotheses, we compared the average number of non-executive blacks and executive blacks in the audit committees of these randomly selected JSE listed companies. On average, the number of non-executive black directors is 1.6 more than black executive directors. Computations show that this difference is highly



significant (less than 0.01). These results support the hypothesis that indeed most black directors are non-executives rather than executives.

# Research hypothesis 3: There will be disproportionately more directors with long tenure than with short tenure on the boards

Figure 5.5 Distribution of board tenure

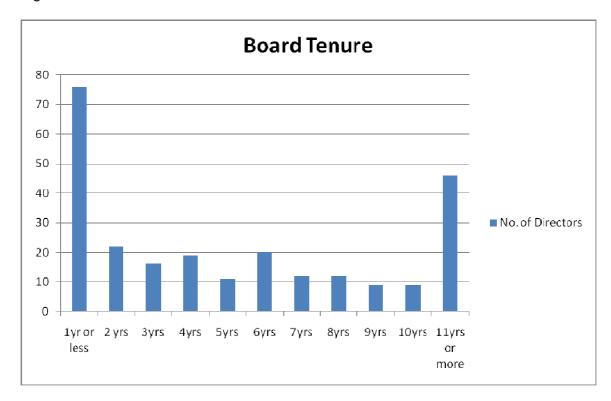


Table 5.13 Tenure Statistics

Sample size	252
Companies	30
Maximum	1-40
Maximum (yrs)	40
Mean(yrs)	6.68
Std. Dev (yrs)	8.94



Table 5.14 Tenure sample information

	No. of	% of Sample	Cumulative
Tenure	Directors	Population	%
1yr or less	76	30.15873016	30.2
2 yrs	22	8.73015873	38.9
3yrs	16	6.349206349	45.2
4yrs	19	7.53968254	52.8
5yrs	11	4.365079365	57.1
6yrs	20	7.936507937	65.1
7yrs	12	4.761904762	69.8
8yrs	12	4.761904762	74.6
9yrs	9	3.571428571	78.2
10yrs	9	3.571428571	81.7
11yrs or more	46	18.25396825	100.0
Total	252	100	

The data sample used for analyzing the tenure attributes within the boards of JSE listed companies was made up 30 companies in the original 100 companies selected because the reporting format was not sufficiently consistent to allow meaningful analysis. Not all companies reported the tenure of the directors in the director biographies included in their respective annual reports for the 2008 financial year.

There is a great imbalance in the spread of the tenure within the sample where 45.2% of the sample consists of directors with tenure of 3 years or less, where 30.1% of the population has 1 year or less tenure at the end of the 2008 financial year. This shows most boards are in the process of changing for



various reasons but what is interesting is that 18.3% of the population has had board tenure on the same board for 11 years or more even though these individuals are spread across different companies, it is concerning that this would be the case especially where these individuals are tasked with providing oversight in a non-executive capacity.



## **HYPOTHESIS 4**

Research hypothesis: The boards of JSE listed companies have a

# majority of external directors

Table 5.15 Director independence

Source of directors	Number of		Number of directors (statistics)							
	companies	Mean	Std. Deviation	Minimum	Maximum	P25	P50	P75		
External Directors	568	5.74	2.783	1	14	4.00	5.00	8.00		
Internal Directors	363	3.67	1.879	1	11	2.00	3.00	5.00		
Board size	931	9.40	3.139	4	18	7.00	9.00	11.00		

Table 5.18 Paired sample tests of director independence

## Paired Samples Statistics

	-	Mean	N	Std. Deviation	Std. Error Mean
Pair 1	Outside Directors	5.74	568	2.783	.280
	Inside Directors	3.67	363	1.879	.189

## Paired Samples Test

			Paired Differences								
			Std.	Std. Error	95% Confidence Interval of the Difference				Sig. (2-		
		Mean	Deviation		Lower	Upper	t	df	tailed)		
Pair 1	Outside	2.071	3.564	.358	1.360	2.781	5.782	98	.000		
	Directors - Inside Directors										



In this hypothesis, we are interested to verify whether majority of directors of the JSE listed companies are external. Based on statistics, the average number of external directors is about 5.7 while the average number of internal directors is only 3.7. This means, on average, there are 2 more external directors than internal ones.

The same statistical technique used in the hypotheses 1a, 1b, 2a and 2b was used to determine whether the average number of external directors is indeed higher than the average number of internal directors. Paired samples t-test results reveal that this difference is highly significant (p-value less than 0.01). This support the claim that majority of directors of the JSE listed companies are external directors.



## 6 Discussion of Results

# 6.1 Reliability of data used in the study

It is important to confirm the validity and reliability of the data used in this study because the analysis and conclusions drawn are based on the very same data captured. The data used for this study obtained from the sampled companies' annual report for the year 2008. These reports were available freely in the public domain and were entirely sourced from the internet websites of the said companies. These annual reports were the electronic version of the physical annual reports which the shareholders, investors and other market players have access to. Furthermore, the information contained in the annual has been signed off by the appointed auditors of the firm.

## 6.2 Analysis of board composition in JSE listed companies

#### 6.2.1 Gender orientation

# Hypothesis 1a

Male directors are more likely to serve on the audit committee than female directors



The primary objective of this test was to develop an understanding for the role that gender plays in determining the membership of the audit committee. The audit committee represents the specialized monitoring organ of the board and is tasked with ensuring that the business is not unduly exposed to risk and ensuring that the business remains a going concern for the foreseeable future.

The total number of directors who serve on audit committees for the sample population is 291 of which 257 are male directors irrespective of race and there are 30 female directors who serve on the audit committees sampled. The above numbers provide *prima facie* evidence that Hypothesis 1a may be valid. Half of the sampled companies did not have female directors on their Audit committees and the maximum number of female directors on an audit committee is 2 whereas the maximum number of male directors is 6.

A paired t-test was used to determine whether the average number of male directors is indeed significantly higher than the number of female directors in an audit committee. By visual inspection of the box plot used in the descriptive statistics, one notices that there is an average of about 3 male directors per audit committee versus an average of less than 1 female director per audit committee. The paired t-test confirms this observation by returning a very small p-value which enables us to conclude with confidence that there is a



greater likelihood that the audit committee will be comprised of a male director than a female director.

In conclusion, there is sufficient evidence to support the hypothesis. The statistical tests conducted confirm that audit committees are dominated by male directors. The low representation of females on the audit committees is, primarily, indicative of the resistance towards the appointment of more females on boards of directors in general which could support the widely held belief of the existence of a 'glass ceiling' which systematically prevents female employees from reaching the upper echelons of a corporate career, a board of directors' appointment.

In previous gender research, Collins, et al (1993) observed that work roles are segregated on the basis of gender and resulted in a reduced contribution by women and is evident in the failure to appoint female directors to the audit committee which has an important monitoring role in the board. The female appointees could be viewed as token appointments as their presence on the boards could be for compliance purposes especially in companies which are highly visible due to their size or companies which have a high volume and value of business with government departments or state owned enterprises. Previous research by Lester, et al (2008) states that women directors are appointed for their social and political capital more than for their specific



industry competence as a means of increasing the political correctness of a company.

## Hypothesis 1b

Women are more likely than men to be non-executive directors

The reason for conducting this test was to develop an understanding of what form of board membership do the women who are board members enjoy. The sample of directors examined for this test was composed of a total of 529 non-executive directors of whom 68 are female directors and there is a sample population of 340 executive directors of whom only 18 are female directors. For the total sample population of 86 female directors, a mere 21% are executive directors whereas 40% of the male director population comprises executive directors. This means that a male director has an almost even chance of being appointed in either an executive or non-executive capacity whereas for female directors there is a 79% chance of being appointed as a non-executive director.

The possible explanations for the observed phenomenon are the masculine work environments which are prevalent in most of the sampled JSE-listed companies as the political compliance-driven nature of female board appointments. These results would suggest that external board appointments are made to replace the lack of internal female candidates being appointed to



board positions which, again, supports the 'glass ceiling' theory as presented by Arfken, et al (2004). The non-executive appointees do not have operational influence and, generally, perform a compliance function within the board. The results of this test are sufficient for us to reject hypothesis 1b.

Campbell and Minguez-Vera (2008) noted that larger boards tended to have a greater probability of women directors. However, larger companies are most likely to have greater visibility which brings with it even greater pressure to comply to the transformation demands from government hence the appointment of women directors as non-executive directors is a defence mechanism for most firms. Clarysse, et al (2007) propose that resource dependence forces firms to appoint external directors to the board in order to have access to resources such as funding, expertise or technology which an external director can access through their networks.

### 6.2.2 Racial orientation

#### Hypothesis 2a

White directors are more likely serve on the audit committee than black directors

The purpose of this test is to measure the role which race plays in determining one's appointment to the audit committee. The audit committee, as mentioned previously, is the most important board sub-committee. Audit committee



appointment is used here as a measure of individual committee is a measure of one's value to the board and firm.

In the sample for this test, there were 291 directors who were audit committee members of whom 210 were white and 77 were black. The maximum observed number of white audit committee members is 5 whilst it is 4 for black audit committee members. It is worth noting that on 75% of the sampled companies there is at least 1 black audit committee member but there are at least 50% of the sampled companies which have at least 2 white audit committee members.

As was done in the previous audit committee hypothesis, a paired t-test was conducted to determine whether the average number of white directors is indeed significantly higher than the number of black directors in an audit committee. The test conducted showed that there is on average more than 2 white directors on the audit committee whilst there is on average less than 1 black director on the audit committee. The paired t-test confirms this is a highly significant difference with p-values of less than 0.01. This supports the stated hypothesis that audit committees are most likely to be composed of white than black directors.



Collins (1997) observed that race was systematically used to limit corporate mobility especially qualifying for board level position hence the low number of black executives within the broader sample population which would lead to an even smaller contribution by black people at board sub-committee level. The black directors who are on the audit committees could be representing special interest groups such as Black Economic Empowerment (BEE) partners who would want to be recognized by having their board representatives being assigned meaningful work which is as close to running the business as possible. Conversely, the company could provide an audit committee seat to BEE partner representatives as a means of demonstrating the transparency with which they conduct their business or as a compensatory measure to involve the black non-executive directors for their lack of involvement in the day to day running of the company.

The appointment of black directors to the audit committees of JSE listed companies does not seem to be following a natural pattern given the haphazard spread of the distribution of black executives on the audit committees. This may also be indicative of more listed companies unearthing and recognizing black talent within their own ranks and from other companies where these appointments are competency based.



## Hypothesis 2b

Black directors have a higher likelihood of being non-executive directors than do white directors

The purpose behind this hypothesis is to determine, once more by using another indicator, the nature of board membership of black directors on the boards of JSE listed companies.

The sample population for this hypothesis consists of all 243 black directors, irrespective of gender, of whom 199 are non-executive directors while 44 executive directors. A basic statistical analysis reveals that there is an average of 2 non-executive directors for every board whereas there is an average of less than half (0.44) who are executive directors.

By running paired t-tests to compare the average number of black non-executives to black executives from the sample of JSE listed companies used in this study. On average, the number of black non-executive directors is 1.6 more than that of black executive directors. Statistical computations show that this difference is highly significant, with p-values of less than 0.01. These results provide evidence to support the hypothesis that indeed most black directors on JSE listed companies are non-executive appointees.



Agrawal and Knoeber (2001) argue that external directors are valued for their networks and, especially in the South African context in recent times, where senior public office bearers have been appointed at strategically high positions in companies seeking to maintain or acquire new business from government or state owned enterprises. These non-executive director appointments could be an extension of friendships which have been formed by the firm's incumbent directors which are then rewarded by a board appointment. Hill (1995) questions the independence of outside directors whom have to be acceptable to the majority of the board prior to their formal nomination to the board as well as socialized or assimilated into the board's way of working to remain a member of the board.

## 6.2.3 Tenure

## Hypothesis 3

There will be disproportionately more directors with long tenure than with short tenure on the boards

The objective behind this hypothesis was to determine whether tenure has an influence on board membership. The results of this test would assist to develop an understanding of how much change the boards of JSE listed companies are exposed to or, conversely, willing to undergo. Tenure is an



important dimension in the board composition debate because it provides insight into how often people are changed on the board which helps to explain the openness to new ideas and is also an indicator of the rigorous debates which take place within the board meetings.

This test only uses tenure information gathered from 30 companies in the sample because it is not compulsory to report on tenure as part of the director biographies in the annual report which means that the information is scattered and not in a standard format which lends itself to useful, consistent analysis.

The sample consisted of 252 observations of director tenure which ranged from a low of 1year and a maximum tenure of 40 years. The average tenure was 6.68 years with a standard deviation of 8.94 years. There is a great imbalance in the spread of the tenure with 45.2% of the sample having served on the same board for less than 3 years whereas 30.1% of the sample has a tenure of 1 year or less. It is interesting to note that 18.3% has been serving on the same board for 11years or more.

In research by Garner and Marshall (2002), it is shown that board members opt to voluntarily leave poorly performing company boards. The difficult trading conditions during the 2008 financial crises could have forced many companies to limit the number of people serving on their boards as part of an interim coping mechanism. Another reason why the short tenure



demonstrated would suggest that there are new directors joining boards from as part of a take-over as part of the reason or the company had recently completed a BEE transaction so they would demand a board seat. The board members with long tenure are in most cases owners or founding partners in those business which makes them indispensible to the continued survival of the orientation. Long tenure individuals are highly respected but their presence stifles debate from taking place as these individuals are conferred patriarch status in the company; it is within the hands of these few individuals that the vast amount of power vests for most companies.

#### 6.2.4 Independence

## Hypothesis 4

The boards of JSE listed companies have a majority of external directors. The objective of this hypothesis was to determine the extent to which the boards of the sampled JSE listed companies are independent as measured by the number of external directors appointed to the board. The number of external directors on a board is a good proxy for board independence because the external directors are not involved with the day to day operations of the company but are invited to attend board and sub-committee meetings as and when they are scheduled.



In conducting this analysis, the boards of 99 JSE listed companies were chosen which included 931 directors of whom 568 were external appointments. The basic statistics test done shows that the average number of external directors per board is about 5.7 whilst the average is about 3.67 internal directors per board. This follows that there are on average 2 more external directors than internal ones.

Similar to the previous hypotheses tested above, the paired sample t-test was used to show that there is a highly significant difference between the number of internal and external directors with p-values of less than 0.01. These results support the hypothesis that the majority of directors of JSE listed companies are external directors.

The increasingly strict corporate governance codes are compelling the boards to be composed of more external directors to allow them as a board, being the agent between the managers of the business and the shareholders or owners, to better perform their monitoring role. The recently published King III Report of 2009 makes the specific recommendation that, as a minimum, the CEO and the financial director be appointed members of the board of directors.

The majority of boards are dominated, in number terms, by external directors.

The commonly held view that board members are equal is flawed in that the internal directors have an informational advantage over their external



counterparts who have to go to great lengths to verify the information presented to them. Furthermore, the internal directors are able to meet more often with each other and prior to the board sessions to gain consensus on major issues which the external directors are not readily able to do owing to the aforementioned information asymmetry.

This study broadly divides the directors into internal and external or, interchangeably, executive and non-executive classes. This study takes a functional view of the director which, though simplistic, manages to demonstrate that the external directors mentioned herein do not have equal access to information as do the internal directors who are hands-on in the running of the business. Another dimension worth mentioning is that some of the non-executive directors are shareholders of the business but are not engaged in the daily operations which mean that there is a category of director which would be the independent non-executive director who has no commercial relationship with the company beyond the board appointment. These independent non-executive directors are normally appointed for their expertise, political connectedness, business networks and, or, reputational capital which they bring to the business. Given the above, it follows that the boards of companies are dominated in an functional sense by the executive or internal directors despite their limited numbers on JSE listed company boards.



Hill (1995) posits that the concept of external directors being independent is flawed given their selection procedure which requires their prior approval before their formal nomination and appointment to the board. This means that the external directors though the motive for their appointment is to provide an alternative view are unlikely to be able to discharge of this monitoring function effectively. The socialization which takes place within the board as a social entity erodes the ability of external members to provide an effective monitoring role over time as these individuals belong to the same golf clubs, special interest societies and other external activity. Another complicating factor in this regard is the fact that most directors hold multiple directorships and, in some cases, in each others' companies which means that the level of interconnectedness at the individual level undermines the independence and effectiveness of the external directors despite their individual competence and reputational capital which they possess for which they are offered board positions.



# 7 Conclusion

# 7.1 Summary of results

Table 7-1 Summary results of the Hypotheses as tested in this study

Number	Construct	Hypothesis	Result
1a	Gender	The audit committee is more likely to be comprised of male directors than female directors	Accept
1b	Gender	Women are more likely than men to be non-executives	Reject
2a	Race	The audit committee is more likely to be comprised of white directors than black directors	Accept
2b	Race	Most black directors on the boards JSE listed companies are non-executives	Accept
3	Tenure	There be disproportionately more directors with long tenure than with short tenure on the boards	Reject
4	Independence	The boards of JSE listed companies have a majority of external directors	Accept



The objective of this study was to:

- Investigate whether the composition of the boards of directors on JSE
  listed companies follows a particular pattern when certain demographic
  attributes are tested such as gender orientation, race, age, tenure,
  independence and size of the group members
- Determine the profile of what constitutes a typical board of directors for JSE listed companies so as to answer the question of whether or not there is meaningful change at the board level of JSE listed companies
- Determine the gender orientation of the board of directors by measuring the gender of the appointees to the audit committee and the gender of the non-executive directors
- Determine the racial orientation of the board by measuring the racial composition of the audit committee and the impact of race in determining whether one is a non-executive or executive director
- Determine the mix between long and short tenure board members and
- Determine the independence orientation of the board

The literature surveyed for this study identified factors such as firm size, firm complexity, maturity of industry, age of company, ownership structure, market dominance ranking and profitability as key determinants of board composition.



The study was a desktop study which used non-intrusive analytical techniques by analyzing historic demographic information which is in the public domain to understand the most complex social grouping, the board of directors of the sampled companies. None of the companies is mentioned by name and the sample has been randomized to ensure that there is a fair representation of industries and company size in the sample when conducting the analysis.

The majority of directors on the boards of JSE listed companies are white males who are over 50 years of age. There is a visible increase in the number of black directors serving on boards over the years but the board positions are spread between a few individuals. This is especially so given that most companies have had to do a BEE transaction in the last few years. These consortia with whom the companies dealt were invariably linked to an individual who is part of the new BEE elite.

The same observation could be applied to the black female directors who despite showing an increase in number of directorships held, these directorships are spread between a few people. The concept of 'busy' directors who hold multiple directorships is mainly in reference to a certain group of white males, black male and female directors.

White female directors are the least represented demographic grouping within the sampled population. There were a paltry 22 white female directors whose



positions were secured on merit because the bulk of them were appointed as financial directors who invariably had qualified as Chartered Accountants. There were other female directors who had been appointed onto the board of directors because they represented family interest either as spouses, daughters or sisters to the company owners. It was difficult to discern the nature of the relationship where the surnames were not the same; in which case, the study takes the case that those individuals had been appointed on merit.

Four hypotheses were rejected, as shown in Table 7-1, but that is attributable to the highly skewed distribution of the demographics in the director population of JSE listed companies. The numbers suggest that directorship in JSE listed firms is still considered to be an 'old boys club' whose membership favours white males and a new elite group of black males. The implications of this observation are that transformation legislation and the initiatives to change the demographic make up and ownership within JSE listed companies have failed to produce the desired results. Those initiatives have managed to secure the positions of those previously in power and have harmed the very people whom they were supposed to help namely black people and white women through the formalization of tokenism and the entrenchment of racialized jobs which stifle the emergence of black executives and white female executives from within the ranks of JSE listed companies.



#### 7.2 Recommendations

This research provides a starting point for further study to be done in the field of board composition in the South African context specifically the social structure and psychology within the boards.

This study although focusing on JSE listed companies and the nature of their boards, has the ability to be applied to the nature of transformation at levels below the executive level as well as across various industrial sectors and countries.

Further use of this research could be for boards wishing to assess the extent of their transformation or seeking to develop an understanding of the profile of a replacement director could possibly use the report as background to their discussions.

Future directions for research in this field could perhaps focus on the interactions of directors of companies during board composition and how these interactions differ depending on the extent to which the company has a diverse board. It would be interesting to explore these diversity dimensions over a longer period and not just one year as was done in this study and across countries with a similar history.



## 8 Bibliography

Abdo, A. and Fisher, G., 2007, The impact of reported corporate governance disclosure on the financial performance of companies listed on the JSE, *Investment Analysts Journal* No. 66

Andersen, M.L., 2001, Restructuring for whom? Race, class, gender and the ideology of invisibility, *Sociological Forum*, Vol. 16, No. 2, Page 181-201

Agrawal, A. and Knoeber, C.R., 2001, Do some outside directors play a political role?, *Journal of Law and Economics, Vol. 44, No. 1, April 2001*, Page 179-198

Arfken, D.E., Bellar, S.L. and Helmus, M., M., 2004, The ultimate glass ceiling revisited: The presence of women corporate boards. *Journal of business ethics 50:* Page 177-186

Arias, J.J. and Walker, D.M., 2004, Additional evidence on the relationship between class size and student performance. *Journal of Economic Education*,

Brammer, S., Millington, A. and Pavelin, S., 2007, Gender and ethnic diversity among UK corporate boards, *Corporate Governance* Volume 15 Number 2 March 2007

Broad-based socio-economic empowerment charter for the South African mining industry, 2002, commonly referred to as '*The Mining Charter*',

Burgess, Z. and Tharenou, P., 2002, Women Board Directors: Characteristics of the few. *Journal of business ethics 37:* Page 39-49.



Financial aspects of corporate governance, 1992, commonly referred to as "Cadbury Report", Chaired by Adrian Cadbury

Campbell, K. and Minguez-Vera, A., 2008, Gender diversity in the boardroom and firm financial performance. *Journal of business ethics 8:* Page 435-451.

Clarysse, B., Knockaert, M. and Locket A., 2007 Outside board members in high tech start ups. *Small business economics*, *29:* Page243-259.

Collins, R., Chafetz, J.S., Blumberg, R. L., Coltrance, S. and Turner, J.H., 1993, Towards an intergrated theory of gender stratification, *Sociology Perspectives, Vol36, Number.3*, Page185-216.

Collins, S. M.,1993, Blacks on the bubble: the vulnerability of black executives in white corporations. *The Sociology Quarterly, Vol34, Number3*, Page 429-447.

Cox Jnr, T. and Nkomo, S.M., 1990, Invisible men and women: A status report on race as a variable in organization behaviour research. *Journal of Organizational Behavior, Vol 11*, Page 419-431.

Creswell, J.W., 1994, Research design: Qualitative and quantitative approaches, Thousand Oaks, CA: Sage

Crutchley, C.E., Garner, J.L. and Marshall, B.B., 2002, An examination of board stability and the long-term performance of initial public offerings, *Financial Management*, *Autumn 2002*, Page 63-90

Daily, C>M. and Dalton, D.R., 1995, CEO and director turnover in failing firms: An illusion of change? *Strategic Management Journal, Vol.16*, Page 393-400.



Daily, C.M., Certo, S.T. and Dalton, D.M., 1999, A decade of corporate women: Some progress in the boardroom, none in the executive suite, *Strategic Management Journal*, *Vol. 20*, Page 93-99.

Dalton, D.R., Daily, C.M., Johnson, J.L., and Ellstrand, A.E., 1999, Number of directors and financial performance: A meta-analysis. *Academy of Management Journal*, 1999, Vol.42, Number.6, Page 674-686.

Denis, D. and Sarin, A., 1999, Ownership and board structure in publicly traded corporations, *Journal of Financial Economics*, *Vol. 52*, Page 187-223.

Di Petra, R., Grambovas, C.A., Raonic, I. and Riccaboni, A., 2008, The effects of board size and 'busy' directors on the market value of Italian companies, *Journal of Management and Governance Vol. 12*, Page 73-91.

Dwivedi, N. and Jain, A.K, 2005, Corporate governance and performance of Indian firms: The effect of board size and ownership. *Employee Responsibilities and Rights Journal, Vol .17 Number .3, September 2005* 

Earley, P. C., and Mosakowski, E., 2000, Creating hybrid team culture: An empirical test of transnational team functioning, *Academy of Management Journal, Vol. 43*, Page 26-49.

Elsayed, K.E., 2009, Board size and corporate performance: The missing role of board leadership structure, *Journal of Management and Governance*, Sep 2009.

Eriksson, T., Madsen, E. S., Dilling-Hansen, M. and Smith, V., 2001, Determinants of CEO and board turnover. *Empirica, 28,* Page 243-257.



Farrell, K.A., and Hirsch, P.L., 2005, Additions to corporate boards: The effect of gender, *Journal of Corporate Finance, Vol. 11*, Page 85-106

Fich, E.M. and Shivadasani, A., 2006, Are busy boards effective monitors?, *Journal of Finance, Vol. 61*, Page 689-724

Frick, B. and Bermig, A., 2009, Board size, board composition and form performance: Empirical evidence from Germany, (Unknown publisher)

Garner, L. and Marshal B., 2002, An examination of board stability and the long-term performance initial public offerings. *Financial Management*, *Autumn 2002*, Page 63-90.

Garg, A.K., 2007, Influence of board size and independence on firm performance: A study of Indian Companies, *Vikalpa, Vol, 32, No. 3* 

Harrigan, K.R., 1981, Numbers and positions of women elected to corporate boards. *Academy of Management Journal, 1981, Vol24, Number 3,* Page 619-625.

Hazlett, J.D.,1992, Generational theory and collective autobiography. *American Literary History'* 

Hermalin, B.E. and Weisbach, M.S., 1988, The determinants of board composition, *RAND Journal of Economics*, Volume 19, No. 4, Winter 1988

Heaney, R.,2009, The size and composition of corporate boards in Hong Kong, Malaysia and Singapore, *Applied Financial Economics*, 19:13



Hill, S., 1995, The social organization of boards of directors, *British Journal of Sociology*, Vol. 46, No. 2, June 1995, Page 245-278.

Huffman, M.L. and Cohen, P.N., 2004, Occupational segregation and the gender gap in workplace authority: National versus local labour markets, *Sociological Forum*, *Vol.* 19, *No.* 1, *March* 2004, Page 121-147.

Jacobson, C.K., 1985, Resistance to affirmative action. *Journal of Conflict Resolution*, *Vol.29*, *Number.2*, Page 306-329.

Ken, I., 2007, Race – Class – Gender Theory: An image(ry) problem. *Gender issue, 24:* Page 1-20.

Kesner, I. F., 1988, Directors characteristics and committee membership: An investigation of type, occupation, tenure and gender. *Academy of Management Journal, Vol. 31, No.1*, Page 66-84.

Kim, Y., 2007, The proportion and social capital of outside directors and their impacts on firm value: Evidence from Korea. *Corporate Governance, Vol 15, No. 6, Nov 2007.* 

King Report on Corporate Governance for South Africa, 1994, commonly referred to as "King I", Chaired by Judge Mervyn King

King Report on Corporate Governance for South Africa, 2002, commonly referred to as "King II", Chaired by Judge Mervyn King

King Report on Corporate Governance for South Africa, 2009, commonly referred to as "King III", Chaired by Judge Mervyn King



Lau, D., and Murringham, K., 1998, Demographic diversity and fault lines: The compositional dynamics of organizational groups, *Academy of Management Review, Vol. 23*, Page 325-240.

Kyereboah-Coleman, A., Corporate governance and shareholder value maximization: An African perspective, *African Development Bank* 

Kyereboah-Coleman, A., Adjasi, C.K.D. and Abor, J., 2007, Corporate governance and firm performance: evidence from Ghanaian listed companies, *Corporate Ownership and Control*, Volume 4, Issue 2, Winter 2006-2007

Larma, S., and Vafeas, N., 2009 The relation between board size and firm performance in firms with a history of poor operating performance. *Journal of Management and Governance*, (2001) 14: Page 61-85.

Laufer, R.S., 1971, Sources of generational consciousness and conflict. *The Annals of the American Academy.* 

Lester, R.H., Hillman, A, Zardkoohi, A., and Cannella, A.A., 2008, Former government officials as outside directors: The role of human and social capital, *Academy of Management Journal*, 2008, Volume 51, No. 5, Page 999-1013

Lipford, J.W., 1995, Group size and the free-rider hypothesis: An examination of new evidence from churches. *Public Choice 83:* Page 291-303

Mantashe, G., 2002, "The Mining Charter", Paper delivered by the General Secretary of the National Union of Mineworkers and member of the South African Communist Party Political Bureau to the Annual Conference of the Black Management Forum, October 2002 sourced online:



http://www.sacp.org.za/pubs/acommunist/2002/ac162i.html (Accessed 29 April 2010)

Matolcsy, Z.P., Stokes, D. and Wright, A., 1999, The value relevance of board composition within corporate governance (*publisher unknown*)

McKintyre, M.L., Murphy, S.A. and Mitchell, P., 2007, The top team: examining composition and firm performance, *Corporate Governance*, Vol. 7, No. 5, Page 547-561

Mineral and Petroleum Resources Development Act of 2002, Act No. 28 of 2002, Republic of South Africa Government Gazette Vol. 448

Nguyen, H. and Faff, R., 2007, Impact of board size and board diversity on firm value: Australian evidence, *Corporate Ownership and Control*, Vol. 4, Issue 2

Nkomo, S.M., 1992, The emperor has no clothes. Rewriting "Race in organizations". *Academy of Management Review, Vol 17, Number3*, Page 487-513

O'Sullivan, N., 2001, The determinants of non-executive representation on the boards of large UK Companies, *Journal of Management and Governance, Vol. 4,* Page 283-297

Papenhausen, 2006, Top manager's generational membership and strategic decision – making. *Journal of Business and Management, Vol 12, Number 2.* 

Perry, T. and Peyer, U., 2005, Board seat accumulation by executives: A shareholder's perspective, *Journal of Finance*, Vol. LX, No. 4, August 2005, Page 2083-2123



Pitcher, P. and Smith, A.D., 2001, Top management team heterogeneity: Personality, power and proxies, *Organization Science, Vol. 12, No. 1, January-February 2001*, Page 1-18

Raheja, C.G., 2005, Determinants of board size and composition: A theory of corporate boards, *Journal of Financial and Quantitative Analysis*, Vol. 40, No. 2, June 2005, Page 283-305

Rose, C., 2007, Does female board representation influence firm performance? The Danish evidence, *Corporate Governance*, Volume 15, Number 2, March 2007

Sarbanes-Oxley Act of 2002, passed by 107<sup>th</sup> Congress of the United States of America at the Second Session on 23<sup>rd</sup> January, 2002.

Sarra, J., 2006, Class Act: Considering race and gender in the corporate Boardroom. *St john's Law Review, Vol. 79*, Page 11-21.

Seidman, G., 1999, Is South Africa different? Sociology comparisons and theoretical contributions from the Land of Apartheid. *Annual Review of Sociology* 25 Page 459-440

Shen, W. and Cannella, A.A, 2002, Revisiting the performance consequences of CEO succession: The impacts of success type. *Academy of Management Journal*, *Vol.45*, *Number 4*, Page717-733

Staikouras, P.K., Staikouras, C. K. and Agoraki, M. K., 2007, The effect of board size and composition on European bank performance, *European Journal of Law and Economics Vol23*, May 2007, Page 1-27.



Standard and Poor's, Global Stock Markets Factbook 2007, Standard and Poor's

Tajfel, H. and Turner, J.C., 1986, The social identity theory of inter-group behavior, *Psychology of Inter-group Relations*, Chicago

Tarman, C. and Sears, D.O., 2005, The conceptualization and measurement of symbolic racism. *The Journal of Politics, Vol. 67, Number.3, August 2005.* 

Taveggia, T.C. and Ross, B., 1978, Generational differences in work orientations: Fact or fiction, *Pacific Sociological Review, Vol. 21, No. 3, July 1978*, Page 331-349

Taylor, M.S., Audia, G. and Gupta, A.K., 1996 The effect of lengthening job tenure on managers organizational commitment and turnover. *Organizational Science*, Vol. 7, No.6, Nov-Dec 1996.

Wagner, W.G., Pfeffer, J. and O'Reilly, C.A., 1984, Organizational demography and turnover in top-management group, *Administrative Science Quarterly, Vol. 29, No. 1, March 1984*, Page 74-92

Walby, S., 2005, Introduction: Comparitive gender mainstreaming in a global era. *International Feminist Journal of Politics, 7:* Page 453-470.

Wiersema, M.F. and Bantel, K.A., 1992, Top management team demography and corporate strategic change, *Academy of Management Journal, Vol. 35*, Page 91-121



Wiersema, M.F. and Bantel, K.A., 1993, Top management team turnover as an adaptation mechanism: The role of the environment, *Strategic Management Journal*, Vol. 14, Page 485-504

Williams, K. and O'Reilly, C., 1998, Demography and diversity in organizations: A review of 40 years of research, *Research in Organizational Behavior, Vol. 20*, Page 77-140

Yermack, D., 1996, Higher market valuation of companies with a small board of directors, *Journal of Financial Economics, Vol. 40*, Page 185-211

Yermack, D., 2006, Board members and company value, *Financial Markets Portfolio Management, Volume 20,* Page 33-47

Zikmund, W.G., 2003, Business research methods, *South-Western Cengage Learning*, 7<sup>th</sup> Edition

## Websites

South Africa Information

http://www.southafrica.info/business/economy/sectors/mining.htm (accessed 26 February 2010)