	MBL3 RESEARCH REPORT
	FOR
,	ANDRÉ HENDRIK STEPHANUS HAVENGA 7050-545-4
	OF ENTERPRISE RISK MANAGEMENT IN THE OUTH AFRICAN BUSINESS ENVIRONMENT
	2006
	Version: Final Research Report

RESEARCH REPORT SECTION 1

ABSTRACT

The research question and phenomenon that is addressed by this research study is: "What is the perceived importance and level of acceptance of ERM in the South African business environment, and what is the perceived value of ERM in South African organisations?"

The definition of ERM utilised throughout this research study is: "Enterprise Risk Management is a process, effected by an entity's board of directors, management and other personnel, applied in strategy setting and across the enterprise, designed to identify potential events that may affect the entity, and manage risk to be within its risk appetite, to provide reasonable assurance regarding the achievement of business objectives". (Committee of Sponsoring Organisations of the Treadway Commission – COSO, 2004: 4)

Enterprise Risk Management is perceived by many as being a necessity, but a burden to business caused by increased investor confidence requirements, such as adherence to King II, Basel II, JSE listing requirements, and the Public Finance Management Act in South Africa, and Sarbanes Oxley requirements placed on organisations listed in the USA, resulting primarily from recent international corporate failures. This causes ERM to be implemented for compliance reasons without obtaining the true value that ERM provides.

The main research problem is therefore to firstly identify the extent of acceptance and implementation of ERM in organisations in the South African business environment, secondly identify the reasons why organisations implement ERM in these organisations, and thirdly identify factors that describe the perceived value that ERM provides to these organisations.

Careful consideration of the statement of the research problem and research objectives, the assumptions made, and delimitation of this research study, confirmed the fact that this research is exploratory in nature. In order to enhance the value of results obtained from this exploratory research study it was decided to design it in a format that makes optimal use of a variety of research methodologies. This combination of research methodologies includes literature review, document study, quantitative questionnaire driven, and qualitative interview driven information gathering and interpretation. By making use of the combination of methodologies the approach to this research enables structured information gathering through the literature review and document study, confirmation of interpretations made through quantitative questionnaires, followed up by confirmation of the results obtained and further exploration of the topic by way of qualitative interviews.

The approach to the research conducted is inextricably linked to four sequential objectives aimed at answering the research question being "What is the perceived importance and level of acceptance of ERM in the South African business environment, and what is the perceived value of ERM in South African organisations?" The four objectives, per related research methodology used, aimed at answering the research question are:

- Literature review Identification of potential benefits of ERM
- Document review Confirmation of status of ERM implementation in selected organisations, and existence of value adding benefits of ERM, as identified during literature review within selected organisations representing the South African business environment.
- Quantitative questionnaires Confirmation of the driving forces of ERM within
 the selected organisations, the level of implementation and acceptance of
 ERM within said organisations, and finally confirmation of the validity of value
 adding benefits of ERM identified during literature review and document
 review.
- Qualitative interview Confirmation of results identified during literature review, document review, and quantitative questionnaire phases of the

FINAL PAGE II

research, as well as gathering any additional information regarding the value of EWRM not identified during the previous phases of the research.

The findings relating to the research objectives to determine the perceived importance and level of acceptance of ERM in the South African business environment is that the level of importance or acceptance of ERM in the South African business environment is high. ERM is also at an advanced level of implementation within South African business organisations. South African organisations are reaching the end of the ERM infancy period, and are now entering the next stage of the ERM lifecycle where they should be focusing on maximising the value obtained through appropriate utilisation of ERM principles.

The ultimate conclusion reached upon completion of this exploratory research study is that the true value of ERM in the South African business environment is appropriately described by the following statements:

- ERM has the ability to assist organisations with ensuring compliance with applicable laws and regulations;
- ERM provides assistance through facilitation with the identification and management of multiple and cross-enterprise risks;
- ERM provides support to an organisation's corporate governance process, and thereby increases the confidence stakeholders and regulators has in the organisation that they are stakeholders of;
- ERM has the ability to lead to a broader understanding and recognition of risks throughout the organisation through increased communication on the topic; and
- ERM provides assistance with the reduction and or minimising of possible financial losses that might be encountered by an organisation.

This research study successfully achieved the objectives of determining the current level of importance and level of acceptance of ERM in the South African business environment and also identifies what value is derived from ERM in South African organisations. Regarding the last mentioned objective achieved at completion of this

FINAL PAGE III

research study, findings made succeeded in identifying key descriptions of the value of ERM in South African business organisations only. A recommendation for future research is therefore that each of the above descriptions of the value of ERM as identified and confirmed during the course of this research study be studied in more detail and that practical actions required to obtain most effective and efficient realisation of these value descriptions be identified, confirmed, and communicated as best practices throughout the South African business environment.

FINAL PAGE IV

ACKNOWLEDGEMENTS

No endeavour of the magnitude of this three year MBL study programme can be completed without the support and assistance received by me.

I thank Jesus Christ my Lord for providing me with the opportunity, desire, motivation, and support to start and complete this study programme and research report.

I thank my wife, Isabel, and son, Willem, who encouraged and supported me throughout this study programme culminating in this research report. Their love, support, encouragement, dedication, and many personal sacrifices contributed to the successful completion of this three year study period and eventual research report.

The moral, and intellectual support, encouragement, and contribution made by family, friends, members of my study group, and colleagues is truly appreciated, and duly acknowledged.

I thank Professor Peet Venter, my lecturer and sponsor during the course of this research project for the advice, constructive critique, and encouragement that resulted in the completion of this research document.

This document is the end result of a long road travelled that contributed to my personal growth and development, and would not have been possible without the collective contributions by all mentioned above. I dedicate this work to Isabel and Willem as the result of their selfless love and continued support during this three year period of my personal development.

DOCUMENT INFORMATION

DOCUMENT TYPE	Research Report
DOCUMENT TITLE	Value of Enterprise Risk management in the South African Business Environment
FILE NAME AND PATH	C:\My Documents\MBL\MBL 3\Final Research Report\Andre Havenga Research Report (20-11-06) - Final.doc
RELEASE DATE	26 September 2006
REVISION DATE	30 November 2006
STUDENT / AUTHOR	André Havenga
STUDENT NUMBER	7050-545-4
STUDY LEADER / SPONSOR	Prof Peet Venter
E-MAIL ADDRESSES	André Havenga: andre.havenga@telkomsa.net
	Peet Venter: PVenter@sbleds.ac.za
CONTACT DETAILS	Andre Havenga: 082 924 0129
	Peet Venter: 082 416 6801 // 011 652 0336

DOCUMENT REVISION HISTORY

DATE	REVISION NUMBER	PREPARED BY	REVISION DETAILS
21/04/2006	Proposal	André Havenga	Proposal submitted for study leader review and comment
29/06/2006	Interim Report	André Havenga	Interim report submitted for review and comment
26/09/2006	First Draft Research Report	André Havenga	First draft research report submitted for review and comment
20/11/2006	Final	André Havenga	Final report submitted for marking

FINAL PAGE VI

TABLE OF CONTENTS

A BSTR	RACT	1
ACKNO	DWLEDGEMENTS	V
Docu	MENT INFORMATION	. VI
Docur	MENT REVISION HISTORY	. VI
	OF CONTENTS	
LIST O	F TABLES	. IX
	F FIGURES	
1.	CHAPTER 1: ORIENTATION	
1.1	INTRODUCTION	
1.2	Purpose of this research	
1.3	STATEMENT OF THE RESEARCH PROBLEM AND RESULTING RESEARCH OBJECTIVES	
1.4	DEFINITIONS	
1.5	DELIMITATION OF THE STUDY	
1.6	IMPORTANCE OF THE STUDY	
2	CHAPTER 2: FOUNDATION OF THE STUDY	
2.1	INTRODUCTION	
2.2	HISTORY OF ENTERPRISE-WIDE RISK MANAGEMENT	
2.3	SUBJECT MATTER RELEVANT TO THE RESEARCH CONDUCTED	
2.4	THEORY OF ENTERPRISE-WIDE RISK MANAGEMENT – AS PER COSO FRAMEWORK.	
3	CHAPTER 3: LITERATURE REVIEW	
3.1	INTRODUCTION	
3.2	CURRENT TRENDS POSSIBLY IMPACTING ON THE VALUE OF ERM	
3.3	ACADEMIC EMPIRICAL RESEARCH CONDUCTED TO DATE	
3.3.1	THE DETERMINANTS OF ERM: EVIDENCE FROM THE APPOINTMENT OF CHIEF RISK	
0.0	OFFICERS (LIEBENBERG AND HOYT)	28
3.3.2	THE EFFECT OF CORPORATE GOVERNANCE ON THE USE OF ENTERPRISE RISK	
	MANAGEMENT: EVIDENCE FROM CANADA (KLEFFNER, LEE & MCGANNON)	29
3.3.3	THE DEVELOPMENT OF AN INTEGRATED MODEL OF RISK (BRIERS)	31
3.4	RESEARCH STUDIES BY SERVICE PROVIDERS AND INTEREST GROUPS	
	IIA – ENTERPRISE RISK MANAGEMENT: EMERGING TRENDS AND PRACTICES (2000)	
	THE ECONOMIST INTELLIGENCE UNIT – ENTERPRISE RISK MANAGEMENT:	
_	IMPLEMENTING NEW SOLUTIONS (2001)	34
3.4.3	DELOITTE & TOUCHE - RISK MANAGEMENT SURVEY - WHAT ARE THE CRITICAL ISSU	
	(August 2003)	
3.4.4	DELOITTE & TOUCHE – DISARMING THE VALUE KILLERS – A RISK MANAGEMENT	-
	Survey (2004)	39
3.4.5	FINANCE WEEK SURVEY - GREATER DRIVE FOR ENTERPRISE-WIDE RISK MANAGEMEN	
	(2004)	
3.4.6	PRICEWATERHOUSECOOPERS: 8 TH ANNUAL GLOBAL CEO SURVEY – BOLD	
	AMBITIONS, CAREFUL CHOICES (2005)	42
3.5	RESEARCH STILL TO BE DONE	
3.6	Conclusion	
4	CHAPTER 4: RESEARCH METHODOLOGY	
4.1		46

FINAL

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

4.2	ASSUMPTIONS OF THE STUDY IMPACTING ON METHODOLOGY CHOSEN	47
4.3	DESCRIPTION OF CHOSEN METHODOLOGY	48
4.4	POPULATION, SAMPLE AND SOURCE	50
4.5	MEASURING INSTRUMENTS	52
4.6	DATA ANALYSIS	54
5	CHAPTER 5: RESEARCH RESULTS	55
5.1	LITERATURE REVIEW	55
5.2	DOCUMENT REVIEW	58
5.2.1	STATISTICAL INFORMATION	60
5.2.2	FORMAT AND LAYOUT	
5.2.3	LEVEL OF IMPLEMENTATION	
5.2.4	VALUE ITEMS MENTIONED OR IMPLIED	
5.3	QUANTITATIVE REVIEW	
5.3.1	LEVEL OF ACCEPTANCE AND IMPLEMENTATION OF ERM	_
5.3.2	POTENTIAL REASONS OR DRIVING FORCES FOR THE IMPLEMENTATION OF ERM	
5.3.3	FACTORS THAT DESCRIBES THE PERCEIVED VALUE THAT ERM PROVIDES	
5.4	QUALITATIVE INTERVIEWS	83
5.4.1	ESKOM	
5.4.2	GROUP FIVE	
5.4.3	VODACOM	
6	CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS	
6.1	DISCUSSION	
6.1.1	LITERATURE REVIEW	
6.1.2	DOCUMENT REVIEW	
6.1.3	QUANTITATIVE QUESTIONAIRE DRIVEN INFORMATION GATHERING	
	QUALITATIVE INFORMATION GATHERING	
6.1.5	COMBINED RESULTS OF VARIOUS RESEARCH METHODOLOGIES UTILISED	97
6.1.6	HIGH LEVEL DISCUSSION OF THE VALUE OF ERM AS IDENTIFIED AND CONFIRMED	
	THROUGH THIS RESEARCH	
6.2	CONCLUSION AND RECOMMENDATION	
	RENCES	
	IDIX 1: QUANTITATIVE QUESTIONNAIRE TO ADDRESS RESEARCH PROBLEM	_
	IDIX 2: MEASUREMENT INSTRUMENT TO ADDRESS QUALIATATIVE RESEARCH	
APPEN	IDIX 3: TABLES CONTAINING RESULT OF QUANTITATIVE QUESTIONNAIRES SUBMITTE	
	SELECTED ORGANISATIONS	
APPEN	IDIX 4: COMBINED RESULTS OF DIFFERENT RESEARCH METHODS USED TO DETERMI	
	THE VALUE OF ERM	131

FINAL PAGE VIII

LIST OF TABLES

TABLE 1	LIST OF COMPANIES SELECTED FOR DOCUMENTATION,	
	QUANTITATIVE AND QUALITATIVE REVIEW	51
Table 2	STATISTICAL INFORMATION GATHERED DURING DOCUMENT REVIEW.	61
TABLE 3:	FORMAT AND LAYOUT OF RISK MANAGEMENT PARAGRAPHS IN	
	ANNUAL REPORTS REVIEWED	65
TABLE 4	LEVEL OF IMPLEMENTATION OF ERM IN ORGANISATIONS REVIEWED.	69
TABLE 5	CONFIRMATION OF STATEMENTS EXPLAINING POTENTIAL VALUE OF	
	ERM, OR BENEFIT DERIVED FROM ERM	76
TABLE 6:	EXTRACT OF COMBINED RESULTS OF VARIOUS RESEARCH	
	METHODS USED TO IDENTIFY THE VALUE OF ERM	98
TABLE 7	LEVEL OF ACCEPTANCE OF AN ERM FRAMEWORK WITHIN	
	ORGANISATIONS REPRESENTING THE INDUSTRIES TESTED	123
TABLE 8	LEVEL OF COMMITMENT TO ERM WITHIN ORGANISATIONS	
	REPRESENTING THE INDUSTRIES TESTED	123
Table 9	STATUS AFFORDED TO ERM WITHIN ORGANISATIONS	0
.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	REPRESENTING THE INDUSTRIES TESTED	124
Table 10	LEVEL OF OWNERSHIP OF ERM WITHIN ORGANISATIONS	
TABLE TO	REPRESENTING THE INDUSTRIES TESTED	124
TABLE 11	Level Of Implementation Of An Erm Framework Within	
IADLL II	ORGANISATIONS REPRESENTING THE INDUSTRIES TESTED	125
TABLE 12	LEVEL OF ERM COMMUNICATION AND TRAINING WITHIN	123
IADLE IZ	ORGANISATIONS REPRESENTING THE INDUSTRIES TESTED	125
TABLE 13	Level Of Risk Identification, Assessment And Measurement	123
IADLE IS		126
TABLE 1.4	WITHIN ORGANISATIONS REPRESENTING THE INDUSTRIES TESTED	120
TABLE 14	LEVEL OF RISK MONITORING AND MANAGEMENT OVERSIGHT	100
T 45	WITHIN ORGANISATIONS REPRESENTING THE INDUSTRIES TESTED	126
TABLE 15	REASONS OR DRIVING FORCES BEHIND THE ADOPTION, OR	
	CONSIDERATION, OF AN ERM APPROACH WITHIN ORGANISATIONS	407
T 40	REPRESENTING THE INDUSTRIES TESTED	127
TABLE 16	STATEMENTS EXPLAINING THE BIGGEST VALUE ADDING BENEFIT OR	
	ADVANTAGE FOR IMPLEMENTING ERM WITHIN ORGANISATIONS	
_	REPRESENTING THE INDUSTRIES TESTED	127
TABLE 17	COMBINED RESULTS OF DIFFERENT RESEARCH METHODS USED TO	
	DETERMINE THE VALUE OF ERM	131
LIST OF FIGURE	JRES	
FIGURE 1	THREE DIMENSIONAL MATRIX DEPICTING RELATIONSHIP BETWEEN	
	BUSINESS OBJECTIVES AND ERM COMPONENTS ACROSS AN	
	Organisation	17
FIGURE 2	Process Flow Description Of Chosen Research	
	METHODOLOGY	49
FIGURE 3	GROUP FIVE'S ERM FOCUS AREAS	86

FINAL PAGE IX

1. CHAPTER 1: ORIENTATION

1.1 Introduction

"All entities face uncertainty, and the challenge for management is to determine how much uncertainty it is prepared to accept as it strives to grow stakeholder value. Enterprise risk management enables management to identify, assess, and manage risks in the face of uncertainty, and is integral to value creation and preservation. Enterprise risk management is a process, effected by an entity's board of directors, management and other personnel, applied in strategy setting and across the enterprise. It is designed to identify potential events that may affect the entity, and manage risk to be within the entity's risk appetite, to provide reasonable assurance regarding the achievement of entity objectives". (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework, 2004: 13)

Risk management has always been inherently part of managing a business. Historically however, until recently, it was not a recognised part of the business management process, but merely a method of taking precautions when a business is faced with factors negatively influencing the achievement of business objectives.

Service providers in the field of Enterprise Risk Management ("ERM") has identified that organisations approaching ERM generally fall into one of the following categories:

- Those for whom ERM is a *logical approach for addressing new regulatory requirements* in an efficient and integrated manner.
- Those for whom ERM is a strategic initiative that provides distinct benefits
 over and above simple regulatory compliance. For these firms, ERM is not a
 defensive undertaking but an offensive strategy that yields potential
 competitive advantage through an integrated enterprise-wide perspective on
 their risk profile.

 Those who struggle to define what ERM actually is and how it can benefit their specific circumstances. These firms are typically wrestling with the scope and purpose of an initiative as expansive as ERM and are challenged by the ambiguity of its business case.

(Bailey, Bloom & Hida, 2004: 2)

There are many reasons why ERM is not effectively implemented, or not implemented at all, in organisations. Amongst these reasons are the following:

- Absence of standardised risk terminology, valuation methods, reporting and coordination. (Kalita, 2004: 23).
- Gathering data accounts for more than 50% of the cost and effort of implementing an ERM system. (Kalita, 2004: 23).
- The cost of implementing ERM is too high and firms are wondering whether such a huge investment will bring results in the future. (Kalita, 2004: 23).
- There is a fear that ERM software may become redundant, thereby requiring major upgrades of legacy systems. (Kalita, 2004: 23).
- The fact that ERM requirements are not solved by implementation of software, but merely enabled through correct software implementation places a damper on the acceptance of ERM value creation.
- Many organisations implement ERM purely for compliance (to PFMA Act and or King 2 guidelines), and / or marketing to investors purposes.
- ERM does not receive the necessary support required for success from senior management.

These reasons if properly analysed all indicate a lack of perceived value being added by ERM to business. In order to make a convincing statement or business case to decision makers in the marketplace, and to ensure incorporation of ERM principles in the business culture of these firms, the ERM value proposition should be built around demonstrating its benefits beyond meeting minimum regulatory or rating agency expectations. To achieve this, organisations needs to define an ERM

framework and link the tangible and intangible benefits of incremental investment to that framework.

The reason why the researcher selected this topic, "the value of Enterprise Risk Management in the South African Business Environment", is because he experienced a lot of resistance in the marketplace, as an ERM service provider, from organisations to improve their risk management culture (e.g. adherence to best practices such as the COSO EWRM Framework). The following was his opinion prior to completion of this research:

- Most organisations in the Public Sector take pro-active action on improvement of EWRM purely because Section 38(a) of the PFMA forces them to do so. The adequacy of their improvement processes is doubtful. Many of them take action without realising the full value that can be added to stakeholders through improved business processes resulting from optimal utilisation of ERM.
- Organisations in the Private Sector adheres to ERM principles as little as
 possible to satisfy JSE requirements, say that they adhere to King 2, make
 impressive corporate governance statements in their annual financial
 statements to create a good impression with interest groups (such as possible
 investors), and spend as little money as possible on the topic.

The selection of the research topic is therefore influenced by the above perceptions the researcher has, and because he believes that good ERM principles has a potential to create tremendous value to organisations. Most role-players in the marketplace however do not know what these values are (apart from the high level value statements recorded in media statements such as "we adhere to King 2" or "we have high ethical values" or "integrity is part of our business"). The researcher wishes to find out what the real value is of EWRM in the marketplace so that it can be shared with others, and pro-actively used to market ERM solutions.

1.2 Purpose of this research

The research question and phenomenon that is intended to be addressed by this research is:

"What is the perceived importance and level of acceptance of ERM in the South African business environment, and what is the perceived value of ERM in South African organisations?"

The primary purpose of this research is therefore to determine the importance and acceptance of Enterprise Risk Management ("ERM"), and the value that it adds to business, as perceived by decision makers in the South African business environment.

1.3 STATEMENT OF THE RESEARCH PROBLEM AND RESULTING RESEARCH OBJECTIVES

Enterprise Risk Management is perceived by many as being necessary, but a burden to business caused by increased investor confidence requirements, such as adherence to King II, Basel II, JSE listing requirements, and the Public Finance Management Act in South Africa, and Sarbanes Oxley requirements placed on organisations listed in the USA resulting primarily from recent international corporate failures. This causes ERM to be implemented for compliance reasons without obtaining the true value that ERM provides.

The main research problem is therefore to firstly identify the extent of acceptance and implementation of ERM in organisations in the South African business environment, and secondly identify factors that describe the perceived value that ERM provides to these organisations.

The main research problem is addressed by the following research objectives:

- Research objective 1: Measure the level of acceptance of ERM within South African business environment;
- Research objective 2: Measure the level of implementation of ERM in organisations in the South African business environment;
- Research objective 3: Identify why ERM is implemented in organisations;
- Research objective 4: Identify factors that describe the perceived value that ERM provides to these organisations.

1.4 **DEFINITIONS**

The driving force of this research study is the need to determine the reasons for implementing ERM expressed as critical factors used to describe the perceived value of ERM in organisations. In order to ensure a standard starting point, it is essential to confirm the definitions of *Enterprise Risk Management*, *Value*, and *Critical Factors*, being terminology forming the foundation of this research study.

<u>"Enterprise Risk Management</u> is a process, effected by an entity's board of directors, management and other personnel, applied in strategy setting and across the enterprise, designed to identify potential events that may affect the entity, and manage risk to be within its risk appetite, to provide reasonable assurance regarding the achievement of business objectives". (Committee of Sponsoring Organisations of the Treadway Commission – COSO, 2004: 4).

<u>"Enterprise Risk Management</u> is a response to corporate risk. It is a structured and systematic process that is interwoven into existing management responsibilities. The term "enterprise risk management" has become the preferred name for the process that responds to every conceivable type of risk in every part of the enterprise". (Briers, Darbourn, De La Rosa. Du Toit, Skivington, & Vivian, 2003: 10)

<u>Value</u> is "the regard that something is held to deserve; importance or worth". (Concise Oxford English Dictionary, 2004: 1597)

<u>Critical factors</u> are circumstances, facts or influences that contribute to a result having a decisive importance in the success or failure of something. (Compiled from the Concise Oxford English Dictionary, 2004: 339; 509).

1.5 DELIMITATION OF THE STUDY

The boundaries of this study are caused by the focus being placed on business enterprises in the South African business environment that might have a primary interest in Enterprise-wide Risk Management.

Although the primary purpose of this research is to determine the importance and acceptance of Enterprise Risk Management ("ERM"), and the value that it adds to business, as perceived by decision makers in the South African business environment, and to identify critical factors that will enhance the value of enterprise risk management to said businesses, it should be accepted that it is not possible in research of this nature to address all decision makers and all businesses in South Africa.

Taking cognisance of the above limitation, and giving consideration to organisations expressing a need for ERM services to ERM service providers and at conferences

where ERM principles are discussed, the population was decided on as South African organisations that are representative of the South African business environment such as those listed on the Johannesburg Stock Exchange and Schedule 2 Public Entities.

Due to time constraints, and the availability of targeted respondents representing the organisations in the sample, it is recognised that the research results will be biased towards the opinions and perceptions of professionals with a direct service delivery interest in ERM and the perceived value it adds to organisations. The results emanating from this study is therefore not intended to be representative of all businesses and all participants within the South African business environment.

1.6 IMPORTANCE OF THE STUDY

Risk Management as a business discipline can be traced back for a number of decades in history. Enterprise-wide Risk Management is however a relatively new international business concept, implemented with varying degrees of success in organisations. Although the concept of ERM receives high prominence from business leaders internationally and in South Africa, the acceptance thereof by business leaders is questionable. Very little academic research has been conducted on the topic of ERM, and more specifically the value of ERM to the business world. A number of research studies have been conducted by prominent service providers in the risk management sphere (refer to the literature review discussing research done to date). These research studies however focus primarily at a high level on the status of ERM implementation, and provide limited practical information on factors ensuring optimal value added to business through the implementation of ERM.

This study is expected to identify information that will ultimately be of benefit to implementers of ERM, and ERM service providers seeking to add true value to the business objectives of organisations through the implementation of ERM and enhancement of ERM service delivery to organisations.

2 CHAPTER 2: FOUNDATION OF THE STUDY

2.1 Introduction

The foundation of this study starts off with a brief sketch of the history of ERM confirming the fact that ERM is an evolving discipline reaching an increased level of importance in the business environment. This sketch explains how risk management evolved since the early 1900s from a component of business goal setting to more insurance based management actions in the 1950's, evolving in more enhanced components of financial risk mitigation in the 1970's and eventually the creation of a more integrated organisation-wide approach to risk management towards the latter part of the 1990's that is known as the origin of ERM. This review of the history of ERM aims to indicate to the reader the great advances made in developing ERM principles, but also confirms that uncertainty still exist as to what the true value of ERM to business is while it moves from a more *theoretical stage* to a more *practical implementation stage* in the business environment.

The foundation of the study then continues by briefly explaining why the Integrated Risk Management Framework as developed by The Committee of Sponsoring Organisations of the Treadway Commission provides the theory and model forming the supporting theoretical framework of this research. A primary selection criterion for all research material reviewed during the course of the literature review that follows is that it must be in agreement with the explanation of what ERM is as set out in the COSO Integrated Risk Management Framework.

In order to provide an appropriate and consistent understanding when reading through this document of what ERM is, a summarised but detailed explanation of ERM is provided as contained in the COSO Enterprise Risk Management Integrated Framework.

2.2 HISTORY OF ENTERPRISE-WIDE RISK MANAGEMENT

Risk management has been around for many decades. While the principle of enterprise-wide risk management may be fairly new, the idea is not. The tools for integrated risk assessment and management have been around for many decades. Frank Knight's *Risk, Uncertainty and Profit*, written in 1921, suggested the importance of risk in economic goal-setting by the modern business firm of that time. (Jablonowski, 2006: 34).

ERM as a formal part of decision-making process within organisations is traceable to the late 1940's and early 1950's. The concept of ERM started off in these years primarily under the strands of insurance risk and financial risk. In the 1950's, Nobel Prize winner, Harry Markovitz, pioneered the study of optimal diversification in investment portfolios as a hedge against risk. In 1962, Canadian risk management pioneer Douglas Barlow said "All management is risk management" (Shaw, 2005: 23; Dickenson, 2001: 360)

For many years companies have been able to transfer certain types of risk to insurance companies. These transferred risks related mainly to natural catastrophes, accidents, human error or fraud. Management started realising that some of these insurable risks could be prevented, or their impact reduced through effective loss prevention and control systems. This led to the broader approach to the management of insurable risks. (Dickenson, 2001:360). Dynamic financial analysis, or DFA, brought integrated financial management, with an emphasis on risk, into the computer age. Multi-line insurance policies and "all risk" coverage were tremendous innovations in collective risk management in the field of hazard risk indemnification. (Jablonowski, 2006: 34).

In the 1970's, companies began to look more closely at how they could manage their financial risks such as movement in exchange rates, commodity prices, interest rates and stock prices. Management recognised that insurable and financial risks

could be managed together (e.g. the purchase of insurance and the purchase of derivatives to hedge financial risks performed the same role). (Dickenson, 2001: 361).

The movement towards an integrated risk management approach was enhanced during the 1990's when holistic management thinking principles which considered issues such as contingency planning and business continuation management started leaning towards strategic decision-making and risk management principles. Companies were faced with other goals over and above pure profit making such as accountability, transparency and performance as demanded by their investors. Many of these aspects of risk assessment and management can be tied together in recent times with the rise of enterprise-wide information systems. (Kalita, 2004: 22).

Within a climate of ever increasing corporate uncertainty, ERM emerged in the early 2000's as a new paradigm for managing risk. Instead of relying on a traditional, intra departmental strategy where each area of the organisation manages its own risk, and where risk management has primarily an insurance and or financial focus, ERM adopts a broader perspective that integrates and coordinates risk management across the entire organisation. This enterprise-wide approach is ultimately intended to enhance and protect stakeholder value. In order to do so, the following standard steps are widely accepted by various authors as current requirements to make a success of ERM:

- ERM requires a top down approach with strong support from CEO's and CFO's;
- ERM should not be confined to various departments a "risk-silo" mentality should be abandoned and a holistic approach embraced;
- ERM should be built into daily management processes; and
- ERM should be used to strengthen corporate governance by monitoring and managing risks, and identifying opportunities for taking calculated business risks.

(Bowling & Rieger, 2005: 32 – 33; Barton, Shenker & Walker, 2003: 52)

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 2: FOUNDATION OF THE STUDY

Although the awareness of ERM has increased tremendously over the years, particularly the last ten years, research performed clearly indicates that the adoption of ERM is still evolving. Various recent surveys performed indicates that many respondents to these surveys have not implemented ERM in their organisations. This prompts the question once again of what value does ERM add to business. The answer to this question might hasten the implementation of ERM in organisations. (Beasley, Clune & Hermanson, 2005: 72).

An analysis of risk management approaches gives a clear indication that risk management as it was known prior to the mid 1990's can be classified as *traditional risk management*, whereas risk management since the mid '90's evolved more towards what is currently known as an *enterprise-wide approach*. As explained in the introduction to research performed by Liebenberg and Hoyt (refer to paragraph 3.2.1 below), the traditional risk management approach has been characterized as a highly disaggregated method of managing firm risks. Under this approach, various categories of risk are managed in separate units within the firm. Financial firms often manage market, credit, liquidity, and operational risk separately in individual risk silos. Traditionally, non-financial firms have followed a similar approach to hazard, financial, operational, and strategic risks. An enterprise-wide approach to risk management treats each of these risk classes as part of the firm's overall risk portfolio that is managed holistically. (Hoyt & Liebenberg, 2003: 39).

Although the concept of Risk Management has grown over a number of years, the evolution of ERM has been discussed extensively during the late 1990's and early 2000's. Early adopters of risk management principles realised that traditional approaches were no longer effective ways to identify, assess, and respond to the growing array of risks that organisations face. ERM has therefore become a hot topic representing more than just another management fad, and is now poised to move from the theoretical stage, (as contained in the COSO ERM integrated Framework discussed in paragraphs 2.3 and 2.4 below), to a practical implementation stage. According to Beasly, Chen, Nunez & Wright, ERM as it

currently stands in its progressed form "offers significant opportunity for competitive advantage, providing value well beyond mere compliance with regulatory expectations". (Beasley, Chen, Nunez & Wright, 2006: 50).

2.3 SUBJECT MATTER RELEVANT TO THE RESEARCH CONDUCTED

The proposed theory and model forming the framework of the literature review forming part of this research is The Committee of Sponsoring Organisations ("COSO") Enterprise Risk Management – Integrated Framework, often referred to as the COSO Framework.

The COSO framework used as primary source of theory was mainly supported by the following theory and models during the course of this research:

- King Report on Corporate Governance for South Africa 2002, Section 2 Risk Management
- The Institute of Risk Management South Africa Code of Practice
- JSE Listing Requirements
- AS/NZS 4360: 1999 Risk Management Standard.

The chosen COSO ERM framework as a primary model is selected because it is internationally considered as a prime source of reference, and is endorsed and or referred to by:

- The American Accounting Association
- The American Institute of Certified Public Accountants
- Financial Executives International
- The Institute of Management Accountants
- The South African Institute of Chartered Accountants
- The Institute of Internal Auditors
- The Institute of Risk Management South Africa
- South African Government National Treasury Guidelines addressing the topic of EWRM

• Service providers in the area of Enterprise Risk Management such as PricewaterhouseCoopers, KPMG, Deloitte & Touche, and Ernst & Young.

2.4 THEORY OF ENTERPRISE-WIDE RISK MANAGEMENT – AS PER COSO FRAMEWORK

The majority of paragraphs that follows in this section was copied from the COSO EWRM Integrated Framework, and condensed where considered applicable. The purpose of this section is to provide an explanation of what Enterprise Risk Management is as supported by a generally accepted frame of reference that is also the theory and model forming the framework of the literature review, and provides direction towards the further research conducted during the course of this project.

Recent years have seen heightened concern and focus on risk management. This was caused by a number of factors such as an increase in corporate failures (e.g. Enron, WorldCom, Regal Bank, Saambou, Macmed and Leisurenet, to name a few), and also a difference in opinion on what is considered to be risk amongst various industries and functional areas in business, and even specific organisations.

It became increasingly clear that a need exists for a robust framework to effectively identify, assess, and manage risk. In 2001, the Committee of Sponsoring Organizations of the Treadway Commission (COSO) initiated a project, and engaged PricewaterhouseCoopers, to develop a framework that would be readily usable by managements to evaluate and improve their organisations' enterprise risk management.

The period of the framework's development was marked by a series of high-profile business scandals and failures where investors, company personnel, and other stakeholders suffered tremendous loss. In the aftermath were calls for enhanced corporate governance and risk management, with new laws, regulations, and listing standards. The need for an enterprise risk management framework, providing key principles and concepts, a common language, and clear direction and guidance,

became even more compelling. This need was intended to be filled by COSO's Enterprise Risk Management – Integrated Framework. The expectation expressed by COSO is that it will become widely accepted by companies and other organisations and indeed all stakeholders and interested parties.

Enterprise risk management deals with risks and opportunities affecting value creation or preservation, and is defined as follows:

"Enterprise risk management is a process, effected by an entity's board of directors, management and other personnel, applied in strategy setting and across the enterprise, designed to identify potential events that may affect the entity, and manage risk to be within its risk appetite, to provide reasonable assurance regarding the achievement of entity objectives". (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework; p 3).

The definition reflects certain fundamental concepts. Enterprise risk management is:

- A process, ongoing and flowing through an entity.
- Effected by people at every level of an organization.
- Applied in strategy setting.
- Applied across the enterprise, at every level and unit, and includes taking an entity level portfolio view of risk.
- Designed to identify potential events that, if they occur, will affect the entity and to manage risk within its risk appetite.
- Able to provide reasonable assurance to an entity's management and board of directors.
- Geared to achievement of objectives in one or more separate but overlapping categories.

This definition is purposefully broad. It captures key concepts fundamental to how companies and other organizations manage risk, providing a basis for application across organizations, industries, and sectors. It focuses directly on achievement of objectives established by a particular entity and provides a basis for defining

enterprise risk management effectiveness (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework: 4).

According to COSO, EWRM forms an inherent and critical component of achieving an organisation's objectives. Within the context of an entity's established mission or vision, management establishes strategic objectives, selects strategy, and sets aligned objectives cascading through the enterprise. The COSO enterprise risk management framework is geared to achieving an entity's objectives, set forth in four categories:

- Strategic high-level goals, aligned with and supporting its mission
- Operations effective and efficient use of its resources
- Reporting reliability of reporting
- Compliance compliance with applicable laws and regulations

This categorization of entity objectives allows a focus on separate aspects of enterprise risk management. These distinct but overlapping categories – a particular objective can fall into more than one category – address different entity needs and may be the direct responsibility of different executives. This categorisation also allows distinctions between what can be expected from each category of objectives.

Because objectives relating to reliability of reporting and compliance with laws and regulations are within the entity's control, enterprise risk management can be expected to provide reasonable assurance of achieving those objectives. Achievement of strategic objectives and operations objectives, however, is subject to external events not always within the entity's control. Accordingly, for these objectives, enterprise risk management can provide reasonable assurance that management, and the board in its oversight role, are made aware, in a timely manner, of the extent to which the entity is moving toward achievement of the objectives.

Enterprise risk management consists of eight interrelated components. These are derived from the way management runs an enterprise and are integrated with the management process. These components are:

- Internal Environment The internal environment encompasses the tone of an organisation, and sets the basis for how risk is viewed and addressed by an entity's people, including risk management philosophy and risk appetite, integrity and ethical values, and the environment in which they operate.
- Objective Setting Objectives must exist before management can identify
 potential events affecting their achievement. Enterprise risk management
 ensures that management has in place a process to set objectives and that
 the chosen objectives support and align with the entity's mission and are
 consistent with its risk appetite.
- Event Identification Internal and external events affecting achievement of an entity's objectives must be identified, distinguishing between risks and opportunities. Opportunities are channelled back to management's strategy or objective-setting processes.
- Risk Assessment Risks are analysed, considering likelihood and impact, as a basis for determining how they should be managed. Risks are assessed on an inherent and a residual basis.
- Risk Response Management selects risk responses avoiding, accepting, reducing, or sharing risk – developing a set of actions to align risks with the entity's risk tolerances and risk appetite.
- Control Activities Policies and procedures are established and implemented to help ensure the risk responses are effectively carried out.
- Information and Communication Relevant information is identified, captured, and communicated in a form and timeframe that enable people to carry out their responsibilities. Effective communication also occurs in a broader sense, flowing down, across, and up the entity.
- Monitoring The entirety of enterprise risk management is monitored and modifications made as necessary. Monitoring is accomplished through ongoing management activities, separate evaluations, or both.

There is a direct relationship between objectives, which are what an entity strives to achieve, and enterprise risk management components, which represent what is needed to achieve them. The relationship is depicted in a three-dimensional matrix, in the form of a cube as presented below.



Figure 1: Three dimensional matrix depicting relationship between business objectives and ERM components across an organisation

The four objectives categories – strategic, operations, reporting, and compliance – are represented by the vertical columns, the eight components by horizontal rows, and an entity's units by the third dimension. This depiction portrays the ability to focus on the entirety of an entity's enterprise risk management, or by objectives category, component, entity unit, or any subset thereof. (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework, 2004: 1 - 16)

Although there is appropriate guidelines as to what is considered to be best practices in the area of ERM, research conducted to date and recent articles written by professionals on the topic of ERM needs to be further analysed to enable appropriate assimilation of current thoughts on the topic as contained in available literature.

3 CHAPTER 3: LITERATURE REVIEW

3.1 Introduction

The literature review conducted provides an overview of information available on the topic being reviewed. This allows the researcher with a point of reference to conduct the research from, and also to provide the reader of the document with necessary information required to enhance the existing knowledge on the topic, and thereby creating an informed opinion on the eventual research results.

The literature review starts off with the identification of current trends as contained in recent articles on the topic of ERM that might possibly provide an indication of factors that provides an indication on the value of ERM as seen by professionals knowledgeable in the field of risk management. The varied opinions expressed by the variety of authors mentioned during this portion of the literature review once again confirmed the need to identify through a research study amongst the South African business community what value is derived by businesses through the implementation of ERM.

The literature review then analyses the result of recent research conducted on the topic of ERM. The first realisation is that very little empirical academic research had been conducted on the topic of ERM to date. At the same time a lot of interest has been expressed by ERM service providers in the form of research and surveys. These research and survey results were also reviewed and interpreted to gather information of interest that could provide prompters towards searching for factors that could be considered as value adding in the process of implementing ERM. A review of these research and survey results clearly confirmed the fact that the implementation of ERM in organisations evolved from a process of defining what ERM is, to the creation of a generic ERM framework enabling consistency of language and terminology, towards a period of providing guidance on the

implementation of ERM, towards a period of attempting to identify, define and confirm the principle of what is considered to be the value of ERM in business.

The literature review then concludes with a brief discussion of what research still needs to be done on the topic of ERM.

3.2 CURRENT TRENDS POSSIBLY IMPACTING ON THE VALUE OF ERM

This portion of the literature review was performed in order to identify current trends in the enterprise risk management environment as communicated in academic and technical publications. The purpose of a search for the meaning or value of enterprise risk management is well worded in the introductory paragraph to an article written by Robert Baldoni (2004) where he says: "To directors of companies trying to analyse its (ERM's) benefits, it represents a confusing quagmire of risk measurement systems, 'consultant speak' and analytical formulas......the market has done a poor job of defining exactly what ERM is, and even a poorer job of addressing its practical value with a level of detail understandable by potential users". (Baldoni, 2004: 10).

The underlying premise of enterprise risk management is that every entity exists to provide value for its stakeholders. All entities face uncertainty, and the challenge for management is to determine how much uncertainty to accept as it strives to grow stakeholder value. Uncertainty presents both risk and opportunity, with the potential to erode or enhance value. Enterprise risk management enables management to effectively deal with uncertainty and associated risk and opportunity, enhancing the capacity to build value. (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework, 2004: 3).

According the COSO Integrated Risk Management Framework, value is maximized when management sets strategy and objectives to strike an optimal balance between growth and return goals and related risks, and efficiently and effectively

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 3: LITERATURE REVIEW

deploys resources in pursuit of the entity's objectives. Enterprise risk management encompasses:

- a) Aligning risk appetite and strategy Management considers the entity's risk appetite in evaluating strategic alternatives, setting related objectives, and developing mechanisms to manage related risks.
- b) Enhancing risk response decisions Enterprise risk management provides the rigor to identify and select among alternative risk responses risk avoidance, reduction, sharing, and acceptance.
- c) Reducing operational surprises and losses Entities gain enhanced capability to identify potential events and establish responses, reducing surprises and associated costs or losses.
- d) Identifying and managing multiple and cross-enterprise risks Every enterprise faces a myriad of risks affecting different parts of the organization, and enterprise risk management facilitates effective response to the interrelated impacts, and integrated responses to multiple risks.
- e) Seizing opportunities By considering a full range of potential events, management is positioned to identify and proactively realise opportunities.
- f) Improving deployment of capital Obtaining robust risk information allows management to effectively assess overall capital needs and enhance capital allocation.

(Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework, 2004: 3)

The above capabilities as expressed by COSO are inherent in enterprise risk management to help management achieve the entity's performance and profitability targets and prevent loss of resources. Enterprise risk management helps ensure effective reporting and compliance with laws and regulations, and helps avoid damage to the entity's reputation and associated consequences. In sum, enterprise risk management helps an entity get to where it wants to go and avoid pitfalls and surprises along the way.

A common theme identified in articles reviewed during this literature review, and appropriately captured in the Bowling and Rieger's (2005) article entitled Making Sense of COSO's New Framework for Enterprise Risk Management is that "ERM can provide a solid foundation upon which companies can enhance corporate governance and create greater shareholder value". (Bowling & Rieger, 2005: 29)

Benefits or advantages of ERM as identified during a review of many recent articles written on the topic are:

- ERM supports the corporate governance process, which can increase the confidence of stakeholders and regulators.
- ERM helps control the overall costs of risk management by anchoring activities to key business strategies and aggregating risks across the enterprise.
- Through increased communication, ERM leads to broader understanding and recognition of risks throughout the organisation.
- Successful ERM implementation can reduce an organisation's overall risk profile, which may lower the cost of capital in the organisation.
- An ERM approach seeks to strategically consider the interactive effects of various risk events with the goal of balancing an enterprise's entire portfolio of risks to be within the stakeholders' appetite or tolerance for risk.
- ERM takes an enterprise-wide focus by strategically looking at risks in a coordinated, consistent manner.
- Appropriate utilisation of ERM enhances internal audit efforts during the planning and execution phase of their service delivery.
- ERM provides expanded opportunities to business due to better informed business decisions.
- ERM provides more efficient use of resources within organisations;
- ERM enables improved strategic planning by appropriate identification and ranking of risks hampering the achievement of business objectives, thereby not only identifying hazards and uncertainties, but also opportunities that should be fed back to the strategic planning process.

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 3: LITERATURE REVIEW

- ERM assists with:
 - Decreasing earnings and stock price volatility
 - Reduction of external capital costs
 - Increase in capital efficiency;
 - Creating synergies between different risk management activities.
- ERM reduces inefficiencies inherent in the traditional risk management approach.
- ERM reduces the expected costs of external capital and regulatory scrutiny. (D'Arcangelo & Matyjewicz, 2004: 8, Bowling & Rieger, 2005: 26; Greenhill, 2005: 397).

The views expressed by Robert Baldoni (2004), taken from his 25 years experience as a risk management service provider, is that the value of the ERM process can be seen as follows:

- ERM allows a company to stabilise volatility of its earnings caused by the impact of external risks. This is done through a combination of financial analysis and insurance products allowing a company to gain a level of certainty that the impact on earnings of identified risks would be no greater than a planned percentage over an identified period or financial year;
- ERM will ensure efficient allocation of capital due, understanding that higherrisk projects demand higher returns, and therefore the level of risk should be factored into required investment returns.
- There are applications of the ERM process that can be used in determining the total risk of a company's launching of a new product or entering a new market.

(Baldoni, 2004: 11 – 15)

In performing a careful analysis of COSO's ERM Integrated Analysis and by providing advice on the approach to implementing the framework, Ballou and Heitger (2005) provides information on issues that the majority of ERM implementers are struggling with. These are practical steps to enable organisations to standardise

ERM so that they can easily benchmark, establish best practices, and have more meaningful dialogue about risk management. Although this practical advisory information makes a crucial contribution towards the successful implementation of ERM in organisations, it still does not provide clarity on what the value of ERM is to business, thereby enhancing the ability to sell the concept of ERM to decision makers within business. (Ballou & Heitger, 2005: 1).

According to Galloway and Funston (2000), the current "sources of enterprise risk solutions are many – from the qualitative world of audit and control, the actuarial world of insurance and risk management, the six sigma world of quality and engineering risk management, to the quantitative world of financial, market and credit risk management". Given that each of these sets of solutions speaks different languages, these languages all need to be translated to one language that is relevant to management – the language of value. (Galloway & Funston, 2000: 22).

In the opinion of Galloway and Funston (2000), a key driver in the implementation of enterprise-wide risk management as a capability in organisations is the need to achieve competitive advantage in a rapidly changing and evolving risk environment. The following four factors, having their roots in value creation and preservation, characterises the need for an enterprise-wide capability and by implication represents the value provided by ERM to the organisations:

- Appropriate ERM increases market confidence as it is interpreted as high shareholder values, (e.g. ethics and integrity), where markets trusts the management team of these companies. (Galloway & Funston, 2000: 22).
- Because strategies are expected by investors to deliver value to shareholders quickly, and if it does not happen a vote to remove the CEO is possible, "the captains of corporate rafts are not allowed to capsize, and will be allowed only one or two bumps before being replaced. One of the quickest ways of getting everyone on board with a desired strategic direction is to enable each business unit to identify their top risks to successful

- execution, learn how to address those risks, get support where needed, and manage those risks successfully". (Galloway & Funston, 2000: 22).
- With current trends in business indicating that innovation is demanded at great speed, coupled with the fact that the capacity of many organisations to deliver innovation is restricted by many factors such as amongst others a shortage of required resources, it means that "the management of risks is constrained and demands the involvement of all those involved in new products, new markets, new processes and new systems". (Galloway & Funston, 2000: 22).
- Because critical risks can occur anywhere in an organisation (e.g. non adherence to strategy, market positioning, privacy, data integrity etc.), a concerted effort is required by a large number of people within an organisation to address risks impacting on the achievement of business objectives effectively. (Galloway & Funston, 2000: 22).

Another concept to analyse when researching the value of enterprise risk management, as proposed by Jack Shaw (2005), is to consider the extent to which organisations ensures that the degree of risk to which it is exposed stays close to its risk appetite. Every company has a risk appetite, and in most cases it is only vaguely understood rather than being explicitly stated by senior management. The logic behind this concept is that financial markets evaluates the prospective returns a business promises and weigh them against the risks to which it exposes itself in order to gain those returns. If the return-to-risk ratio is deemed appropriate by the markets, the value of the firm goes up. If not, it goes down. Two important aspects of managing the level of risk exposure to be within an organisation's risk appetite are:

 Ensuring that the risks to which the organisation is exposed to is not too high as it will damage investor confidence, and reduce the value of the organisation.

CHAPTER 3: LITERATURE REVIEW

 Ensuring that the risks to which the organisation is exposed to is not too low, because if no risk is taken, the expected reward may be too small to satisfy prospective investors.

(Shaw, 2005: 23 – 24)

In the opinion of Mark Jablonowski (2006), it makes sense for management to get their arms around all the aspects of risks including its potential impact on earnings and its effects on the long term viability of the business. To do so, an enterprise-wide view of risks is required. Jablonowski further states that the leaders of ERM have always been financial services (e.g. banks, investment companies, and insurers) because they are all in one way or the other affected with public interest. They hold a higher fiduciary duty to the public than other service and or product suppliers because they are direct stewards of public funds, and their failure has immediate and possible widespread financial implications for their customers. For these financial organisations, their leadership in the field of ERM led to increased profitability by encouraging sounder practices of investment management, and emphasis being placed on innovation towards consumer protection. (Jablonowski, 2006: 33 - 34).

Noticing the benefits derived by financial institutions, Jablonowski argues that the challenge is now for business outside of the financial sector to "get into ERM" and obtain the benefits of increased safety, effective risk management and increased earnings. In his opinion though, the real value of ERM does not come from short term gains to profitability. "Rather, it lies in a wider view of corporate responsibility, to its managers, to its shareholder, and to the community. In this sense, ERM can be the glue that holds corporate governance together, much in the same way as it does so today with financial firms. To do so, however, non-financial, including industrial firms, must recognise their wider responsibility to society. This leads to long-term profitability and sustainable growth" (Jablonowski, 2006: 36).

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 3: LITERATURE REVIEW

The wider perspective of ERM that organisations should therefore aim for is in the opinion of Jablonowski not just a matter of leveraging risk for profit, or simply a matter of risk arbitrage or transfer. The wider perspective of ERM to which organisations should aim is to implement an urgent and convincing philosophy towards risk. That philosophy should entail a reasoned approach to the treatment of risks, be they hazard, operational or financial. The fact that the social dimension of risk can not be ignored makes implementation of ERM tough because the management of risk is no longer out of sight as it used to be under the traditional approach to risk management where risks were managed in silos of responsibility (e.g. legal, operational, and financial). Developing an urgent and convincing enterprise-wide philosophy towards ERM in a coordinated effort with all stakeholders, and consistently implementing this philosophy, is where the true value of ERM lies in the opinion of Jablonowski. (Jablonowski, 2006: 37).

"ERM is an ongoing journey that includes using a risk champion to lead the process, using a common business language throughout the process, and biting off small manageable chunks to demonstrate specific measurable accomplishments at each step of the ERM implementation process". (Miller & Schanfield, 2005: 83).

A most recent contribution to the theory of adding value to the concept of ERM is that made by Sim Segal (2006) in a recent article in which he proposes that the obstacles confronting most companies implementing ERM can be solved by adopting a value-based ERM approach, which has the quantitative rigor needed to fully realize the promise of ERM. The lack of quantitative rigor includes a lack of business case for ERM, an unclear concept of risk appetite, incomplete integration of ERM into decision-making processes, and the inability to quantify operational risk. A value-based ERM approach provides the quantitative business case needed to get senior management buy-in. It offers tangible definitions of risk appetite and exposure, allowing these concepts to be used to manage the ERM process and helping companies bring their risk exposure more in line with their risk appetite. It provides management with a modelling tool that facilitates risk-informed decision

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 3: LITERATURE REVIEW

making, quantifying the expected impact of a decision on shareholder value, based on a range of risk scenarios. It quantifies operational risk, and it does this in a manner consistent with all other risks. Finally, it aligns the otherwise disparate ERM processes using the common language of value, enabling consistent messages, both internally and externally. Segal closes off by saying that "many of the companies struggling with their ERM programs will find that a value-based ERM approach can shine a bright light on the value of ERM. The rest, being those unaware of value-based ERM and still searching for a way out,-will likely remain in the dark". (Segal, 2006: 23).

Future improvements of existing application of ERM principles in business is expected to include leveraging existing strategic performance measurement systems, such as the balanced scorecard, to support an ERM view of risk management. As mentioned by Beasley, Chen, Nunez and Wright (2006), balanced scorecards measure an organisation's progress toward achieving strategic goals, while ERM helps company leaders think through positive and negative factors that can affect the achievement of their goals. Because the two principles both strengthens the likelihood of achieving strategic objectives, the argument goes that the two goes hand in hand, and should in future be treated as such to ensure enhanced benefit for organisations.(Beasley et al, 2006: 50).

Future benefit of integrating ERM and balanced scorecard processes will be obtained as long as the balanced scorecard captures more information about risk management objectives and performance measures, thereby making people more aware of risks and the need for managing those risks. "A stronger perspective about risk management issues", caused by inclusion in balanced scorecards, "should ultimately lead to improved internal business processes by eliminating or reducing risk exposures within key business processes. That, in turn, should improve customer satisfaction and financial performance". (Beasley et al, 2006: 53)

3.3 ACADEMIC EMPIRICAL RESEARCH CONDUCTED TO DATE

Despite the heightened interest in ERM, very little academic empirical research has been done on the topic of ERM. An extensive search to identify empirical research performed on this topic resulted in the identification of three relevant research projects only being the following:

- Research performed by André Liebenberg and Robert Hoyt focussing on the determinants of ERM adoption amongst organisations based in the United States that appointed Chief Risk Officers (CRO's) within the period between 1997 to 2001 (Liebenberg & Hoyt, 2003: 37);
- Research performed by Anne Kleffner, Ryan Lee and Bill McGannon to examine the use of enterprise risk management in Canada (Kleffner, Lee & McGannon, 2003: 53).
- Research performed Stephen Briers in South Africa in 2000 intended to result in the development of a model of risk that is valid for all schools of risk management (Briers, 2000: 1).

3.3.1 THE DETERMINANTS OF ERM: EVIDENCE FROM THE APPOINTMENT OF CHIEF RISK OFFICERS (LIEBENBERG AND HOYT)

"A major obstacle to empirical ERM-related research is the difficulty in identifying firms that are indeed engaging in ERM. Firms typically do not disclose whether they are managing risks in an integrated manner. Much of their risk management disclosure and discussion relates to specific risks and, thus, researchers are unable to distinguish whether firms are managing these risks in a disaggregated or aggregated manner. Due to absent explicit disclosures of ERM implementation, researchers are forced to either rely on survey data or search for a signal of the existence of ERM programs". (Liebenberg & Hoyt, 2003: 38)

The purpose of the empirical research as conducted by Liebenberg and Hoyt was to explore differences between a sample of firms that have announced the

appointment of a Chief Risk Officer and a closely matched control sample. The result of the research conducted can be summarised as follows:

- The magnitude of the average firm size reflects that firms appointing Chief Risk Officers are generally amongst the largest in their particular industry.
- The majority of firms (70%) that appoint CRO's are in the financial industry.
- Firms that are more highly leveraged are more likely to appoint a CRO than
 other firms of a similar size that operates in the same industry. Because firms
 that appoint CRO's are more likely to implement ERM than firms with no
 CRO's, this tendency confirms the contention that ERM programs enable a
 reduction in agency costs (interest rates) resulting from borrowing.

3.3.2 THE EFFECT OF CORPORATE GOVERNANCE ON THE USE OF ENTERPRISE RISK MANAGEMENT: EVIDENCE FROM CANADA (KLEFFNER, LEE & MCGANNON)

This research examined the use of enterprise risk management (ERM) by companies in Canada, the characteristics that are associated with the use of ERM, what obstacles companies face in implementing ERM, and what role, if any, corporate governance guidelines have played in the decision to adopt ERM.

The researchers obtained their data from the responses to a mail survey sent to Canadian Risk and Insurance Management Society members as well as telephone interviews with 19 of the respondents. The results indicate that 31 percent of the sample had adopted ERM and that reasons for adopting ERM include

- the influence of the risk manager (61 percent),
- encouragement from the board of directors (51 percent), and
- compliance with Toronto Stock Exchange (TSE) guidelines (37 percent).

The major deterrents to ERM identified through the research were an organizational structure that discourages ERM and an overall resistance to change. Although only about one-third of companies indicated that they had adopted an ERM approach, evidence was clear that a larger portion of the sample was moving in that direction,

as indicated by what changes they had observed in their companies in the three years prior to the research. These include:

- the development of company-wide guidelines for risk management (45 percent);
- an increased awareness of non-operational risks by operational risk management personnel;
- an increased awareness of operational risks by non-operational risk management personnel (49 percent),
- more coordination with different areas responsible for risk management (64 percent), and
- more involvement and interaction in the decision making of other departments.

Contrary to what was expected by the researchers, there was not a significant difference between firms that are listed on the Toronto Stock Exchange (TSE) versus those that are not in terms of the propensity to use ERM. However, the fact that 37 percent of firms indicated that the TSE guidelines were influential in their decision to adopt ERM provides some evidence that the guidelines are influencing companies' risk management strategies.

The benefits of ERM, as described in the trade or academic press, arise from taking a portfolio approach to managing risk, thereby capitalizing on less than perfect correlation across risks in the company and benefiting from natural hedges. By asking risk managers what they saw as the benefit of ERM, the researchers wanted to assess whether this was a primary motivator in adopting ERM. The results were as follows:

 Not surprisingly, one of the most common benefits cited was a coordinated and consistent approach to risk management, resulting in lower costs and better communication across the company. Companies also saw this coordination as an important way to avoid very large losses since the

- company had a better handle overall on its risks and was doing a better job of communicating with individual departments,
- A second benefit seen by many of the risk managers was a company-wide philosophy regarding risk management. Adopting an ERM approach was a way to align everyone to the same objective. When risk management permeates the entire company, and if everyone buys in, better results can be expected.
- Finally, a number of companies saw ERM as a much more strategic approach to managing risk. Rather than the company simply buying insurance, ERM is a way to increase risk awareness, and this increase in awareness and knowledge allows for more sound decision making. Companies saw this as an important way to increase the comfort level of the board of directors.

3.3.3 THE DEVELOPMENT OF AN INTEGRATED MODEL OF RISK (BRIERS)

At the time of research conducted by Stephen Briers, (currently considered to be an authoritative figure in the area of ERM within the South African Business Environment), concluded as recently as November 2000, the concept of "risk" within the business environment was considered to be so wide that risk management activities for responding to it were diverse to the point of being unrelated to one another. This led to a situation where it was considered that "Risk Management is not yet recognised as being a fully-fledged management science that spans all dimensions of the concept of risk". (Briers, 2000: 1).

The problem addressed by Briers' research was that so called "risk practitioners" all uses the concept of *risk* as a common point of reference, but that "there is no consistent framework or process for the management of risk across the entire spectrum of business activity. Many of these risk practitioners claim to be delivering enterprise-wide solutions, but mostly these are run on functional and modular lines". This was caused by the fact that "there is no common theoretical framework upon which risk practitioners can refer to". (Briers, 2000: 1). The research objective was

therefore intended to develop a model of risk, and more specifically a theoretical basis for enterprise-wide risk management. The new model of risk that was developed through this research used an approach that involved a critical analysis of theories of risk existing at that time. An empirical research process was designed to test the validity of the newly developed model of risk.

The model of risk as developed through this research conducted by Briers in 2000, read together with the fact that an authoritative international framework for ERM was only developed and released as early as 2004 (refer to the COSO ERM Integrated Framework discussed in chapter 2 of this study), thereby confirming the fact that Enterprise-wide Risk Management is an evolving management principle, still in its infancy stage, not only in the South African business environment, but worldwide.

3.4 RESEARCH STUDIES BY SERVICE PROVIDERS AND INTEREST GROUPS

Although very little academic research has been done on the topic of ERM, a large number of research results by ERM Service Providers and Interest Groups in the marketplace have been identified. The research topics identified as being of interest to the proposed study are the following:

- Enterprise Risk Management: Emerging trends and practices as conducted by the Institute of Internal Auditors and issued during 2000, (Hively, Merkley & Miccolos, 2001).
- Enterprise Risk Management: Implementing new solutions as released by the Economist Intelligence Unit during 2001 (The Economist Intelligence Unit Limited and MMC Enterprise Risk Inc., 2001).
- Risk Management Survey What are the critical issues as released by Deloitte & Touche during 2003 (Deloitte & Touche, 2003).
- Disarming the Value Killers A Risk Management Survey as released by Deloitte & Touche during 2004 (Kambil & Mahidhar, 2004).

- Greater drive for enterprise-wide risk management as released by Finance Week during 2004 (Finance Week, 2004).
- 8th Annual Global CEO Survey Bold ambitions, careful choices as released by PricewaterhouseCoopers during 2004 (PricewaterhouseCoopers, 2004).

Although the abovementioned research drives, explained in more detail in the paragraphs below, provides valuable information on the topic of ERM, it confirms the fact that more research is required on the value that ERM adds to business when implemented in organisations.

3.4.1 IIA – ENTERPRISE RISK MANAGEMENT: EMERGING TRENDS AND PRACTICES (2000)

The Institute of Internal Auditors Research Foundation and Tillinghast – Towers Perin, with the assistance of The Conference Board of Canada, undertook a multi industry global survey in late 2000 to identify trends and emerging practices within ERM.

The survey indicated that the following are the top five motivating factors driving ERM within organisations in order of importance at that time:

- Desire for a unifying framework;
- Corporate governance guidelines;
- Mandate from board of directors;
- Competitive pressure; and
- Desire for earnings stability.

The following trends were identified in analysing the survey results:

- Organisations view ERM as a tool to help manage their most important business issues:
- ERM trends are found mainly among larger organisations such as publicly held multinationals with large revenue and asset bases;

- ERM was at the time of performing the survey still in the early stages of application (e.g. 75% of organisations taking part in the survey only started implementing ERM during the 2 year period prior to the survey, and only 11% of respondents claimed to have a full ERM system in place).
- ERM activities are lead by senior executives within organisations (e.g. Chief audit executives, or CFO's or CEO's or Chief Risk Officers).
- Significant internal barriers needs to be overcome in implementing ERM, of which the top five barriers in order of importance are:
 - Organisational culture not susceptible to ERM implementation;
 - Benefits of ERM implementation are unclear to senior management;
 - A lack of formalised ERM processes, language and definitions exists;
 - Senior management considers ERM implementation as a threat to their "organisational turf";
 - A lack of tolls (e.g. taxes, duties, incentives) to support the implementation and application of ERM.
- Comprehensive risk assessment exists in few organisations in that financial and or operational risks are assessed by most of the surveyed organisations, but very few of them consider the assessment of strategic risks.
- ERM are seen by many as more of a management information tool than a driver of corporate performance.

The interpretation of the above research survey results confirms the assumption that ERM might be implemented within organisation for reasons such as compliance to corporate governance principles. The question of what the true value of ERM is therefore still exists after completion of this survey.

3.4.2 THE ECONOMIST INTELLIGENCE UNIT – ENTERPRISE RISK MANAGEMENT: IMPLEMENTING NEW SOLUTIONS (2001)

Over the past few years, enterprise risk management (ERM) has spread well beyond the borders of the financial services industry. Companies in many industries and

regions now structure their risk management programmes within an enterprise context or with an ERM approach. What is driving these companies to reconsider how they manage risk? How do they hope to benefit? What challenges are they encountering? How are the most successful companies implementing ERM?

To answer these questions, the EIU spoke with executives at 40 companies in North America, Europe and Asia—some of whom already use ERM and others who are considering it. To measure how widely and for what reasons firms are implementing ERM, they also conducted a written survey of 200 senior finance and risk management executives.

Their written survey and face-to-face interviews have led them to the following key findings:

- Enterprise risk management (ERM) is being adopted widely. They found that 41% of companies are implementing some form of ERM. Europeans were farthest ahead, which reflects the continuing evolution of corporate governance reforms and directives in Europe: 53% of European companies manage risk using some form of ERM, compared with 34% of North American companies and 33% of Asian companies.
- Companies using ERM are more confident in their ability to manage risk. They asked respondents how satisfied they are with their risk management processes. Those pursuing ERM were found to be significantly more confident than other companies, with 90% reporting that they are very confident, compared with just 45% of those not using ERM.
- Firms adopt ERM for a wide range of reasons. ERM is not about insurance or reducing insurance costs, though both factor into an ERM approach.
 Companies cited the following as the most important reasons for implementing ERM:
 - o to gain a better understanding of risks across functions and business units:
 - to use risk for competitive advantage;

- to safeguard against earnings-related surprises;
- o to respond effectively to low-probability catastrophic risks; and
- to gain cost savings by managing internal resources and capital more effectively.
- Companies believe ERM can improve their P/E ratio and cost of capital.
 Eighty-four per cent of companies reported that they believe ERM can improve these two metrics, which suggests a link between better risk management and shareholder value. They are uncertain how to strengthen this link, however.
- Executives believe that communicating their ERM activities to investors
 can be beneficial. More than 50% of respondents at public companies say
 that they have much to gain by advertising their risk management efforts to
 the investment community—investors may be ready to recognise ERM as a
 corporate best practice.
- Non-traditional risks pose the greatest threat. Executives reported that
 their most significant risks aren't those traditionally managed by the risk
 management or treasury departments. The top three are customer loyalty,
 competitive threats and operational failure. These are also among the risks
 companies believe they manage least well.
- ERM requires structural and cultural change. Executives reported that implementing ERM requires them to overcome a lack of alignment between risk management and strategic planning, an insufficient IT system and cultural opposition to the programme.
- Few measure the integrated effects of risk across the entire organisation. Today only 15% of companies aggregate risks across their entire organisation. Many have started, though: 55% do so within the financial risk category and 46% within operational risk. In three years' time, the percentage across all risks is expected to rise to 43%.
- Current quantification methods are inadequate for intangible risks.

 Respondents reported that the single greatest obstacle to ERM is the inability to measure intangible risks, with 53% identifying this as a major problem.

- There is no single approach to ERM. Through interviews, the researchers found that companies are using one of three broad methods to implement ERM:
 - Comprehensively identifying and assessing all risks and controls throughout the firm;
 - Concentrating on many risks in a single unit to build support for ERM in other areas of the company; and
 - Addressing a few critical risks across the organisation or within a senior executive's area of influence.

3.4.3 DELOITTE & TOUCHE - RISK MANAGEMENT SURVEY - WHAT ARE THE CRITICAL ISSUES (AUGUST 2003)

A survey performed by Deloitte & Touche during a Risk Management Summit in Sandton on 21 August 2003 came up with the following results:

- The most important issue regarding the implementation of ERM is "gaining top management support". (Deloitte & Touche. 2003: 3). Although this is the most important issue, it is not the most difficult, because the importance given by members of management to Corporate Governance drives support for ERM implementation.
- The greatest challenge for ERM implementation is to embed it into existing processes and activities within organisations.

The interpretation of the above two issues clearly indicates that management in general views enterprise risk management more as a compliance issue. This could be interpreted as meaning that management takes cognisance of ERM because they have to, and not because they have realised the value of ERM as a business tool.

The above issues does support the fact that ERM, driven by compliance requirements or expectations, result in annual report disclosures that are considered

to be not difficult to implement. A survey performed by McKinsey suggested that over 80% of investors said that they will pay more for the shares of a well governed company, and that UK investors said they will pay a premium of 18% for a well governed company. The confidence afforded to investors is done mainly by way of compliance driven reporting in annual reports.

The survey identified the following four main drivers as factors that raise the importance of having an effective risk management process:

- Share price and securing capital: Investors are paying more attention to companies risk management practices. It is now accepted that investors will pay a premium for companies with good Corporate Governance processes, specifically including risk management. As such, demonstrating effective risk management enables organisations to acquire funds at a lower cost of capital.
- Non-Executive Directors: Non-Executive Directors have a significant number of responsibilities and in order to discharge these, they need to understand the risks facing the businesses they represent. Non-Executive Directors are key drivers in ensuring that there is an effective process in place to highlight and prioritise risks, as well as to drive appropriate action plans.
- Regulatory requirements: A number of organisations are governed by specific regulations and Governance codes which shape and drive their risk management processes. Aside from King II this would include the Public Finance Management Act, Basel II, and Banks Act and, for those listed overseas, Turnbull, Sarbanes-Oxley and Combined Code.
- Driving profitability: Some organisations do recognise that risk
 management is in place to identify and drive the implementation of new
 opportunities. These organisations often increase their profitability and returns
 by taking more risks. This approach is very different to the historic and
 traditional focus on downside risk.

(Deloitte & Touche. 2003: 8)

The survey communication as published by Deloitte & Touche concluded that whilst Senior Management will support risk management, there is a concern that their focus is on risk management as a compliance issue. As such, they often do not believe risk management will drive value and the risk management process is not implemented with their full support. It is very difficult to define and measure the value of risk management to an organisation. This represents a key challenge as risk managers need to define and prove the value proposition.

3.4.4 DELOITTE & TOUCHE - DISARMING THE VALUE KILLERS - A RISK MANAGEMENT SURVEY (2004)

Taking consideration of a succession of cataclysmic events such as the dot-com burst, the Asian financial crisis, and a wave of business scandals, Deloittes performed a survey intended to examine instances of major losses in shareholder value over a period of ten years from 1994 to 2003. The analysis performed gave way to understanding the patterns emerging from the data, and resulted in a picture called "value killers" that is reflected in a precipitous drop in share price that results in restricted credit, impeded growth, decimated pension plans, and reduced competitiveness.

Although companies analysed experienced unique circumstances that contributed to their loss in value, the following common underlying risk factors that resulted in a negative effect on value were identified:

Lack of management of critical risk interdependencies – The majority of companies that suffered great losses (80% of population reviewed) were exposed to more than one type of risk. The relationship between these various types of risks are most of the time not recognised and managed (e.g. actions taken to address one type of risk such as strategic risk, can often increase exposure to other risks such as operational or financial risks). (Kambil & Mahidhar, 2004: 1).

- A strong ethics and controls culture not fostered Corporate cultures and incentive systems that set high premium for returns without complementary controls can lead to major value and brand losses. (Kambil & Mahidhar, 2004: 1).
- High-impact low-frequency risks are not pro-actively addressed Many firms fail
 to plan for rare but high impact risks such as the September 11 terrorist attacks
 and bursting of the technology bubble. (Kambil & Mahidhar, 2004: 1).
- Information on control factors not provided timely A number of organisations lacked access to current information required for senior management to respond quickly to emerging problems. (Kambil & Mahidhar, 2004: 1).

The conclusion reached in the Deloittes survey is that losses occurred due to failures in correctly anticipating, hedging against and managing diverse risks. To preserve value, companies need to go beyond risk management in silos to create an integrated, organisation wide risk management function. Management should look at risk across the enterprise.

3.4.5 FINANCE WEEK SURVEY - GREATER DRIVE FOR ENTERPRISE-WIDE RISK MANAGEMENT (2004)

A survey by Finance Week, sponsored by Alexander Forbes and entitled "Greater drive for enterprise-wide risk management", the results of which was published in the 19 May 2004 issue, confirmed the fact that the release of King II prompted closer scrutiny of companies risk management processes to such an extent that an internal risk management system has become an "unwritten listing requirement" on the JSE. (Finance Week, 2004: 44).

In the publication of the survey results, Oliver Laloux representing Alexander Forbes states that his scrutiny of recent surveys conducted indicates that "well governed companies in emerging markets with a sound enterprise-wide risk management

system can demand an additional share premium of between 10% and 30%". (Finance Week, 2004: 44).

Answers received from questions posed to 113 respondents in the South African business environment revealed the following answers:

- 81% of Boards representing the targeted companies accepted responsibility for the total process of enterprise risk management and tasked senior management with the implementation of a continuous process of risk management, while the remaining 19% of respondents indicated that their Boards accept partial responsibility for ERM.
- 54% of surveyed companies indicated that they have an up to date and relevant business continuity plan in place that facilitates an executive response should any key business threats materialise, while an additional 39% of the surveyed organisations said that their business continuity plans are only partially relevant or in place.
- 25% of surveyed companies stated that their organisations risk management performance is linked to individuals' performance targets and indicators, and an additional 46% of respondents stated that they do this partially.
- 32% of respondents answered that their employees and management have been trained regarding the company's enterprise risk management framework, processes and requirements, while an additional 45% of organisations surveyed stated that they satisfied this requirements for successful ERM partially.

(Finance Week, 2004: 44).

The above survey results confirm that the importance and perceived level of ERM implementation is high within the South African business community. It does however not indicate if companies derive value from ERM, and if they do, what factors enable them to derive value from ERM.

3.4.6 PRICEWATERHOUSECOOPERS: 8TH ANNUAL GLOBAL CEO SURVEY – BOLD AMBITIONS, CAREFUL CHOICES (2005)

PwC's 8th Annual Global CEO Survey focused on Governance, Risk Management, and Compliance (GRC) - areas of critical concern to business leaders in every industry. During the course of this survey, more than 1,300 global CEOs were asked to state their perceptions of GRC and to assess their progress, their successes, and their failures.

One of the conclusions reached by PwC's research is that in today's global business environment, governance, risk management, and compliance form a triad that no CEO can afford to ignore. Although it is considered to be costly and onerous at times, it is evident that many CEO's are beginning to see GRC in a new light as an integrated set of concepts that can provide significant benefits for their organisations. These benefits however do not come easily. CEO's acknowledge that achieving effective GRC is a battle that is worth waging. (PricewaterhouseCoopers, 2004: 15)

Despite the fact that most of the CEO's are struggling with implementing effective GRC, a generally positive view is reflected in their perceptions about a number of potential benefits that GRC can deliver. In high numbers, the CEO's credit GRC with having a major, positive impact on legal liabilities (64 percent) and on reputation and brand (56 percent). At the same time, however, only about one-third of the CEO's feel that GRC has a major impact on their relationships with ratings agencies (38 percent), financial performance (37 percent), operational excellence (37 percent), relationships with business partners (33 percent), customer loyalty/retention (32 percent), employee morale/productivity (30 percent), product/service excellence (30 percent), and relationships with citizens and civil society (29 percent). (PricewaterhouseCoopers, 2004: 23)

This survey reports on what many of the world's leading CEO's have to say about GRC - an area of growing importance. The differences among them lie not primarily in degrees of awareness but in attitude, approach, and effectiveness. A very small minority of CEO's view GRC in its narrowest sense, as a mandated and costly activity that must be performed under pain of penalty. Most, however, view GRC in a broader way as concerning much more than laws and regulations. They recognise that GRC is an integrated set of concepts, that it can add value, that it can help them manage risk more effectively, and that it can be a source of competitive advantage. The survey's findings can therefore be summarised that the vast majority of CEO's view **GRC** as concerning just laws more than and regulations. (PricewaterhouseCoopers, 2004: 43)

3.5 RESEARCH STILL TO BE DONE

In analysing the research that still needs to be done, cognisance was firstly taken of the recommendations made by academic researchers, whereafter possible questions that remains unsatisfactorily answered or unanswered by research conducted by service providers and interest groups was considered for further research.

Potential research identified as not addressed by the empirical research conducted by Liebenberg and Hoyt (2003) are:

- Understanding the determinants of ERM and the method of its successful implementation;
- The optimal organisational structure of ERM functions within firms. (Liebenberg & Hoyt, 2003: 51)

The results of research performed by Kleffner, Lee and McGannon (2003) have also produced a variety of research questions that needs to be addressed in the future.

- First, given the large proportion of public and governmental respondents to the survey, the issue of public versus private use of ERM should be considered for study.
- Second, the introduction of new corporate governance standards has varied across countries globally, and it could be expected that the timing, and differences in corporate cultures, have led to differences in the adoption of ERM in these different markets. As such, the study conducted could be internationalised to the various world sectors that have introduced corporate governance standards for their corporations.
- Finally, there is the possibility to investigate whether consensus exists on what ERM truly is. Given the results of their survey and the extensive use of the term, it was believed at the time that an internationally accepted definition of ERM would be useful in gaining a better understanding of its use, or lack thereof, in the risk management community.

(Kleffner, Lee & McGannon, 2003: 66)

The surveys conducted by service providers and interest groups hints at what could be considered as value adding components of ERM. This topic is however considered as being under-researched, and therefore provides the opportunity for future research. The search for what is considered as the "value of ERM" in the business community is therefore supported by the research already conducted to date, but more importantly by the fact that none of the research conducted to date provides a clear answer as to what is considered to be the value of ERM in the South African business community.

3.6 CONCLUSION

This literature review focussing on the value of ERM clearly indicates that there are varied opinions firstly on what ERM is, and secondly what the benefit or value of ERM is. These varying opinions on what ERM is, and more importantly what the benefit or value of ERM is depends on the various needs of the different

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 3: LITERATURE REVIEW

stakeholders (e.g. academics, internal auditors, financial managers, investors, legislators, boards members, etc.) having an interest in ERM and contributing to the discussion through the literature reviewed.

The variety of information gathered through this literature review confirmed the need for this research project to analyse the variety of potential benefits or description of the value of ERM, and determine which of these best describe the value of ERM in the SA business environment. The concluding result of this literature review, forming the starting point for the next phases of this research project, is discussed in more detail in section 5.1 below.

4 CHAPTER 4: RESEARCH METHODOLOGY

4.1 Introduction

This research project is exploratory in nature. The research methodology used was therefore chosen to be complimentary to exploratory research. Careful attention was given during the planning and development of the research methodology to be used during this research project to the research problem, the research objectives, and the assumptions flowing from these.

During the course of this exploratory research project, a combination of research methodologies such as literature review, document study, quantitative and qualitative information gathering was utilised to enable structured information gathering, confirmation of the results and interpretation of information gathered. The sequential interaction of research methodologies utilised during this project is reflected in figure 2 below, and consists of the following four phases, the result of which is represented in this research report:

- Phase 1: Literature review with the objective of identifying potential value or benefits of ERM;
- Phase 2: Document review with the objective of exploration and confirmation of existence of potential value adding ERM benefits identified during the literature review;
- Phase 3: Quantitative review with the objective of confirming the result of the document review and exploring further, and
- Phase 4: Qualitative review with the objective of confirming the result of the previous three phases, and exploring further.

The population being the subject of this research study is South African businesses representing major industries in both the private and public sector.

4.2 ASSUMPTIONS OF THE STUDY IMPACTING ON METHODOLOGY CHOSEN

The assumptions made when conducting this research study is linked directly to the statement of problems and research objectives associated with this research. These assumptions influenced the methodology chosen to conduct the research, and are the following:

- Assumption1: The level of acceptance of ERM within South African business environment can be evidenced by the status afforded to ERM through appropriate allocation of ERM responsibilities throughout the organisation with ownership maintained at a high level within the organisation.
- Assumption 2: Organisations that has a high regard for ERM and perceives ERM to add value to the business will be at an advanced stage of ERM implementation. The stage of ERM implementation, and related importance afforded by the organisation to ERM, can be measured in terms of:
 - Status of ERM implementation within the organisation
 - o The level of ERM communication and training within the organisation;
 - The extent of risk identification, assessment and measurement within the organisation; and
 - The level of risk monitoring and management oversight within the organisation
- Assumption 3: Organisations utilises their Annual Reports as a communication tool expressing the value added by said organisations. For this reason, annual financial statements will be a good source to identify reasons for ERM adding value to said organisations.
- Assumption 4: There are a wide variety of reasons or driving forces for implementation of ERM in the South African business environment that has not been prioritised in order of importance as yet because the implementation of ERM within South African business is still in an infancy stage.
- Assumption 5: Risk Officers of South African business organisations are well placed to provide an indication of what is perceived to be value adding factors

explaining the advantage or benefit of implementing ERM within South African organisations.

4.3 DESCRIPTION OF CHOSEN METHODOLOGY

Careful consideration of the statement of the research problem and research objectives, the assumptions made, and delimitation of this study confirmed the fact that this research is exploratory in nature. In order to enhance the value of results obtained from this exploratory research study it was decided to design it in a format that makes optimal utilisation of a variety of research methodologies. This combination of research methodologies includes literature review, document study, and quantitative questionnaire driven and qualitative interview driven information gathering and interpretation. By making use of the combination of methodologies the approach to this research enables structured information gathering through the literature review and document study, confirmation of interpretations made through quantitative questionnaires, followed up by confirmation of the results obtained and further exploration of the topic by way of qualitative interviews.

The approach to the research conducted is inextricably linked to four sequential objectives aimed at answering the research question being "What is the perceived importance and level of acceptance of ERM in the South African business environment, and what is the perceived value of ERM in South African organisations?" The four objectives, per related research methodology used, aimed at answering the research question are:

- Literature review Identification of potential benefits of EWRM
- Document review Confirmation of status of ERM implementation in selected organisations, and existence of value adding benefits of ERM, as identified during literature review, within selected organisations.
- Quantitative questionnaires Confirmation of the driving forces of ERM within the selected organisations, the level of implementation and acceptance of ERM

information

- within said organisations, and finally confirmation of the validity of value adding benefits of ERM identified during literature review and document review.
- Qualitative interview Confirmation of results identified during literature review, document review, and quantitative questionnaire phases of the research, as well as gathering any additional information regarding the value of EWRM not identified during the previous phases of the research.

Process Flow Description of Chosen Exploratory Based Research Methodology Research Source of Objectives Population Sample Size Output Methodology Information Value and or All available All available benefit PHASE 1: Variety of reputable reputable criptions of Identify potential benefits of ERM Literature Review ERM as topic of ERM mentioned in topic of ERM literature PHASE 2: Confirmation of All organisations 5 organisations representing industries in SA FRM benefits per industry selected possible value identified during Document Review Annual Reports adding factors identified during previous phase (30 organisations) testing and explore previous phase further PHASE 3: Confirmation of All organisations tested during alidity of selected Quantitative 1 organisation per organisations, and Answers received reached during on quantitative documentation industry reviewed further identification of nrevious phase based review questions posed review phase of (6 organisations) and explore value adding factors of ERM Confirmed PHASE 4: enefits of ERM in SA business, Information / All organisations 50% of Qualitative conclusions knowledge as taking part in organisations together with further value reviewed during reached during previous phase: interview based shared by ERM professionals quantitative adding factors not (3 organisations) and explore interviewed based review identified during previous phases Recording of

The chosen methodology is graphically represented as follows:

Figure 2: Process Flow Description of chosen research methodology

Each of the objectives mentioned above, and reflected in the above figure, is considered as a sequential phase of the research intended to provide answers to the research problem forming the basis of this research study.

research report

4.4 POPULATION, SAMPLE AND SOURCE

The population utilised to perform the research was decided upon by utilising the following criteria:

- The population must be representative of the South African Business environment:
- The population must represent both the private and public sectors;
- The population must represent at least the following industry sectors:
 - Resources
 - Basic Industries
 - Financials
 - Consumer Goods and Services
 - Information Technology and Telecommunications
 - Public Sector

Taking cognisance of the above criteria, the population was confirmed as South African organisations representing the above industries, and consisting of both private and public companies, and Schedule 2 Public Entities.

The sample size decided on to test the population mentioned above is the following:

- Literature review: All available and accessible literature identified that relates to the value of EWRM
- Documentation review: 5 organisations for each of the 6 industries selected for the research
- Quantitative questionnaire: 1 organisation per industry selected for testing
- Qualitative interview: 50% of organisations taking part in quantitative questionnaire driven portion of research conducted.

Selection of the target companies for this research was done on a random basis, and is the following:

Industry	Companies	Randomly selected for:					
	selected for documentation review	Document Review	Quantitative Review	Qualitative Review			
Resources	Transhex	✓					
	Anglo Gold	✓					
	Goldfields	✓					
	BHP Billiton	✓	✓				
	Sasol	✓					
Basic Industries	AECI	✓					
	SAPPI	✓					
	Highveld Steel	✓					
	Group Five	✓	✓	✓			
	PPC	✓					
Financials	Remgro	✓					
	ABSA	✓					
	Standard Bank	✓					
	Liberty Life	✓	✓				
	Alexander Forbes	✓					
Consumer Goods and	AVI	✓					
Services	Massmart	✓					
	Johnnic	✓					
	Communications						
	Sun International	✓					
	Pick & Pay	✓	✓				
Information Technology	Mustek	✓					
and Telecommunications	ldion	✓					
	Vodacom	✓	✓	✓			
	MTN Group	✓					
	Paracon	✓					
Public Sector	Transnet Limited	✓					
	Eskom	✓	✓	✓			
	Denel	✓					
	Telkom	✓					
	IDC	✓					

Table 1: List of companies selected for documentation, quantitative and qualitative review

The subjects of study during each of the phases of the research are the following:

• Literature review – all literature related to the topic of the study

- Document review latest published annual financial statements / annual reports of selected companies available on internet
- Quantitative questionnaire and qualitative review professionals in the selected South African businesses recorded in table 1 above that has a direct interest in Enterprise-wide Risk Management in order of preference one of the following officials in organisations:
 - Chief Risk Officers
 - Heads of Corporate Governance
 - Company Secretaries
 - Heads of Internal Audit

The subjects of the study during the quantitative and qualitative phases of the research were identified through telephonic enquiry made to each of the organisations. The most appropriate official as identified through telephonic enquiry was requested to complete the quantitative survey and return the completed questionnaire via e-mail. Each respondent was asked whether they will be willing to continue participation in the research by taking part in a qualitative information gathering interview. 50% of these organisations taking part in the quantitative questionnaire driven information gathering phase of the research study was randomly selected to take part in the qualitative interview driven portion of the research study. Refer to table 1 above for a record of these organisations selected.

4.5 MEASURING INSTRUMENTS

The measurement instrument used for the quantitative analysis is a questionnaire consisting of a combination of:

- pre-developed questions selected from and currently available in:
 - the Institute of Risk Management South Africa ("IRMSA") Code of Practice Scorecard (Briers, Darbourn, De La Rosa, Du Toit, Skivington & Vivian, 2004),

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 4: RESEARCH METHODOLOGY

- the PricewaterhouseCoopers 8th Annual Global CEO Survey (PricewaterhouseCoopers, 2004),
- the surveys conducted by Deloitte & Touche entitled
 - The Status of Risk Management in South Africa (Deloitte & Touche, 2003), and
 - Disarming the Value Killers (Kambil & Mahidhar, 2004), and
- Questions developed from information contained in articles studied during the Literature Review
- Additional questions as required to clearly identify factors that indicates that organisations have a well developed ERM methodology in place that is perceived to add value to organisations being reviewed.

No formalised measurement instruments were used for the exploratory qualitative interviews. The following questions were however used as prompters as and if required during the qualitative interviews to ensure that these interviews results in providing the required information:

- Who / what is the driving force behind ERM in your organisation?
- What is the true value of ERM in your organisation, (Provide practical examples)?
- What makes ERM a success in your organisation (Provide practical examples)?
- What has to happen within your organisation in order to consider ERM as a failure?

The unit of analysis used for the quantitative questionnaire is amongst others the perceptions of targeted population expressed as follows:

- Percentage or number of targeted population answering the questions posed in the questionnaire;
- Selection of statements best describing the status of ERM within organisations

- Percentage of respondents answering affirmative to statement posed in any of the following formats:
 - Strongly agree
 - Agree
 - Neither agree nor disagree
 - o Disagree
 - Strongly agree
- Recording pre-worded statement in order of priority on a scale of 1 to 10

The unit of analysis used for the qualitative analysis is the perceptions of Risk Managers of organisations selected and agreeing to take part in the qualitative analysis.

4.6 DATA ANALYSIS

The research conducted during the course of this research study is of an exploratory nature. For that reason, exploratory data analysis was used to interpret data collected.

Analysis of data was performed by making use of various formats of frequency tables where the following options were used:

- The frequency of a specific statement (or circumstance) being confirmed through observation and interpretation as existing in the sample of organisations reviewed;
- The frequency of the level of agreement, expressed in numerical rating scale, with specific statements as expressed by participants representing selected organisations reviewed during this research.

The frequency of statements being confirmed or agreed with are expressed either in numerical or percentage format in the frequency tables used to analyse data gathered during the course of the research study.

5 CHAPTER 5: RESEARCH RESULTS

5.1 LITERATURE REVIEW

Information gathered, reviewed and analysed during the course of the literature review formed the basis for the remaining three phases of research conducted as depicted in figure 2. The result of the literature review was the building blocks referred to in the paragraphs below that shaped the creation of research criteria used during the document review, quantitative questionnaire and qualitative review based phases of the research.

A critical issue identified during the literature review performed was the fact that the level of importance allocated to the implementation of ERM in organisations might indicate the level of perceived value afforded to risk management. Indicators for the level of importance allocated to ERM as identified during the literature review are:

- the status afforded to risk management within organisations
- the level of risk management progression or implementation within organisations
- the level of risk management communication and training within organisations
- the level of risk identification, assessment and measurement within organisations
- the level of risk monitoring and management oversight within organisations
- the level of acceptance as a value adding business process by senior management within organisations, as reflected by:
 - the level of acceptance of a risk management framework within organisations
 - the level of commitment towards enterprise-wide risk management within organisations

The next area identified during the literature review that warranted further research during the next phases of this research study was the reasons or driving forces for

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

ERM implementation in organisations. The assumption leading identification of these items is that all actions taken within an organisation originates from the desire or objective to create value. Reasons or driving forces for implementation of ERM identified are:

- Compliance requirements (e.g. with JSE, and or King 2, and or Basel 2 guidelines, and or Sarbanes Oxley requirements, and or PFMA requirements).
- Concerns about Directors' and Officers' liability exposures.
- Encouragement from the Board of Directors.
- Competition or other industry-related pressures.
- Pressure from a majority shareholder.
- Stakeholder pressure.
- The need to impress / satisfy potential investors.
- Influence of or pressure from an international parent company.
- Adoption of an enterprise risk management strategy by the firm.

Finally, a number of key factors were identified that makes an attempt at describing the value or benefits of ERM in organisations. These factors were allocated to four components as listed below:

- Providing assistance with the achievement of compliance.
- Realising the following benefits as proposed by the COSO Integrated Risk Management Framework:
 - providing assistance with the achievement of high level goals, aligned with supporting the mission of the organisation;
 - assisting with the effective and efficient use of resources within the organisation;
 - o enhancing reliability of reporting within the organisation; and
 - assisting with compliance with applicable laws and regulations.
- Value added by ERM in pursuit of an organisations objectives as set out in the COSO Integrated Risk Management Framework by:
 - o aligning the organisation's risk appetite / tolerance and strategy;

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

- enhancing the organisation's risk response decisions;
- reducing operational surprises and losses;
- providing assistance with the identification and management of multiple and cross enterprise risks;
- assisting organisation to pro-actively realise and seize opportunities;
 and
- o assisting with the deployment of capital
- Potential ERM benefits as identified through review of articles and publications:
 - supports the corporate governance process, which can increase the confidence of stakeholders and regulators;
 - helps with the control of the overall costs of risk management by anchoring activities to key business strategies and aggregating risks across the enterprise. This facilitates effective response to the interrelated impacts, and integrated responses to multiple risks;
 - leads to broader understanding and recognition of risks throughout the organisation;
 - reduce an organisation's overall risk profile, which may lower the cost of capital in the organisation, which may result in an increase in capital efficiency;
 - strategically considers the interactive effects of various risk events with the goal of balancing an enterprise's entire portfolio of risks to be within the stakeholders' appetite or tolerance for risk;
 - takes an enterprise-wide focus by strategically looking at risks in a coordinated, consistent manner, thereby enabling creation of synergies between different risk management activities;
 - enhances internal audit efforts during the planning and execution phase of their service delivery;
 - provides expanded opportunities to business due to better informed business decisions:
 - assists with the reduction and or minimising of possible financial losses that might be encountered by the organisation;

- enables improved strategic planning by appropriate identification and ranking of risks hampering the achievement of business objectives, thereby not only identifying hazards and uncertainties, but also opportunities that should be fed back to the strategic planning process;
- increasing earnings and decreasing stock price volatility;
- o reduces inefficiencies inherent in the traditional risk management approach;
- o reduces the expected costs of external capital and regulatory scrutiny;
- o provides the rigor to identify and select among alternative risk responses risk avoidance, reduction, sharing, and acceptance;
- o increases market confidence; and
- developing an urgent and convincing enterprise-wide philosophy towards ERM with all stakeholders

The above factors and statements listed as identified during the literature review created the opportunity to further explore the perceived value of ERM in the South African marketplace through the document review, quantitative questionnaire, and qualitative interview phases of this research study as recorded in the paragraphs below.

5.2 DOCUMENT REVIEW

The assumption made in preparation of the document review is that organisations utilise their annual reports to communicate the status and achievement of the organisational, strategic, operational and financial objectives to stakeholders. The readers of annual reports are normally all stakeholders of the organisation. Stakeholders in principle are looking for value in organisations. The annual report is a good medium to communicate the value of said organisations to all stakeholders.

Taking cognisance of the abovementioned assumption, it was presumed during the planning phase of the document review that if organisations wishes to express the value of said organisations to stakeholders in their annual reports, and if risk management does add value to organisations, then surely the ERM principles as communicated in the annual reports of the organisations should give an indication of what the value of ERM is as perceived by the executive management preparing these reports for the information of all stakeholders.

The document review is a direct outflow from the literature review. Information learnt during the literature review was used to structure the fact finding exploration of information as contained in the annual reports of the 30 organisations selected for review. The document review was structured in the following four parts:

- Statistical information was collected to obtain indications of the importance allocated to risk and ERM in the annual reports reviewed;
- Annual reports were scanned to determine the general format and layout utilised to discuss ERM in the annual reports, with a related objective to determine what the prepares of annual reports wishes to communicate when reporting on risk management to stakeholders;
- The level of implementation of ERM, based on criteria identified during the literature review was determined by searching the ERM paragraphs for comments indicating the level of implementation of ERM within these organisations;
- A detailed search was performed to identify any statements made that supports, suggests, or implies the existence of items explaining the value of ERM as identified during the literature review.

It is important to the reader to note that when interpreting the tables in the document review paragraphs that follows, the fact that an item was not marked as being evidenced does not mean that it does not exist. It simply means that existence thereof could not be evidenced by the researcher when performing the document

review of the latest annual reports available on internet at the time of performing the research.

5.2.1 STATISTICAL INFORMATION

The statistical information gathered through review of the annual reports is the following:

- The financial year end addressed by the annual report reviewed, intended to indicate to how recent period the information gathered applies;
- The number of times the word "Risk" is mentioned in the annual report reviewed, intended to indicate how important risk is to the organisation being reviewed (the assumption is that the more times risk is mentioned, the more importance is allocated to risk by the organisation);
- Whether the annual report contains a paragraph dedicated to ERM, and if
 it does whether the paragraph is a stand alone section in the annual
 report, or whether it is a sub-component of a section of the annual report
 (the assumption is that the more prominent the discussion of ERM is in
 the annual report, the more importance and or value it has in the
 organisation).
- The number of words contained in the paragraph dedicated to the discussion of risk management in the organisation (the assumption is that the more words or in depth the discussion, the more importance and or value is allocated to ERM in the organisation).

The abovementioned information obtained through the review of the annual reports of 30 companies was also extrapolated to each of the 6 industries represented by these companies in an attempt to indicate which of these industries places the highest importance or value on risk management.

The result of statistical information gathered during the document review is contained in the table below:

Industry	Company	Year	1	2	3	4	Total risk per industry	Average risk per industry	Total words per industry	Average words per industry	
Resources	Kumba Resources	2005	87		1	1,089					
	Anglo Gold	2005	33	1		9,578					
	Goldfields	2005	21	1		1,583	303	61	13,719	2,744	
	BHP Billiton	2005	109		1	937					
	Sasol	2005	53		1	532					
Basic Industries	AECI	2005	26		1	493					
	SAPPI	2005	73		1	511					
	Hiveld Steel	2005	5	1		116	281	56	3,764	753	
	Group Five	2005	111	1		1,408	1				
	PPC	2005	66		1	1,236	1				
Financials	Remgro	2006	96		1	1,146					
	ABSA	2005	999	1		16,118					
	Standard Bank	2005	133	1		2,126	1,674	335	29,894	5,979	
	Liberty Life	2005	331		1	9,950	,-		-,	-,	
	Alexander Forbes	2006	115		1	554					
Consumer Goods and Services	AVI	2005	40		1	172					
	Massmart	2005	74		1	2,734	1				
	Johnnic Communications	2005	37		1	2,437	274	69	7,034	1,759	
	Sun International	2005	123	1		1,691			,	,	
	Pick & Pay	2005	**		1	**					
Information Technology and Telecommunications	Mustek	2003	17		1	226					
	Idion	2005	35		1	320					
	Vodacom	2005	122		1	546	191	48	1,128	282	
	MTN Group	2005	**		1	**					
	Paracon	2005	17		1	36					
Public Sector	Transnet Limited	2005	111	1		789					
	Eskom	2006	206		1	3,096					
	Denel	2005	45		1	192	569	114	7,406	1,481	
	Telkom	2005	144	1		2,169	1				
	IDC *	2005	63		1	1,160	1				
Total			3,292	9	21	62,945					
Total per company (28 companies)			118	30%	70%	2,248	1				
** Pdf file format of annual report does not allow word count and word search * Review limited to a portion of annual report only (full report not available in electronic readable format											

Table 2: Statistical information gathered during document review

Information contained in the above table is interpreted as follows:

- Of the annual reports of the 30 randomly selected organisations reviewed, 1 dates to the 2003 financial year, 26 dates to the 2005 financial year, and 3 dates to 2006 financial year. These being the most recent annual reports available on internet for the selected organisations at the time of the research clearly indicates that the information is recent enough (29 documents being not older than one year) to consider the result of the document review to be applicable and valid in the current time period.
- A review of 28 of the annual reports of the 30 companies selected indicated that risk is mentioned on average 118 times in the annual reports of these

companies. Although there is no established criteria to measure this finding against, the interpretation of the researcher is that any issue, (risk in this case), mentioned so many times in the annual report of organisations must be of importance to those organisations. At the same time, further extrapolation of this information provides an indication that the industry in which risk is considered most important is the Financial industry, (with the word "risk" mentioned on average 335 times per company reviewed in this industry), followed by the Public Sector in the second place (with the word "risk" mentioned on average 114 times per company reviewed), and the Information and Technology industry indicating the lowest level of importance allocated to risk by mentioning it on average as many as 48 times in their annual reports.

- All 30 annual reports reviewed contained either a paragraph or a full section dedicated to risk management. 30% of these organisations, (as evidenced by column "2" in the above table), considered risk management important enough to dedicate a separate section in the annual report to the discussion of risk management, while the remaining 70%, (as evidenced by column "3" of the above table), treated the discussion of risk management as a sub-component of a section, normally being the section dealing with Corporate Governance in the organisation. This finding once again confirmed the importance allocated to risk management in organisations reviewed in that the topic is not omitted from the annual reports of any of the organisations reviewed;
- Paragraphs or components of 28 of the annual reports of the 30 organisations reviewed consists of at least 2 248 words per company (as evidenced in column "4" of the above table). The most words being 16 118 in the ABSA annual report, and the least words being the 116 contained in the Highveld Steel Annual Report indicates the spread in importance allocated to risk management between the number of organisations tested. The fact however that on average 2 248 words are allocated to the discussion of risk management in their annual reports indicates that a high level of importance is given to the topic by all organisations. Once again, an extrapolation of the information collected per company tested to the industries that these companies represent, clearly

indicates that the Financial industry allocates the greatest importance to risk management (with an average of 5 979 words per company in that industry), followed by the Resources industry with and average of 2 744 words per organisation in that industry reviewed, and finally once again with the Information Technology and Telecommunications industry indicating the least level of importance to the topic of ERM with an average of 282 words per company in this industry allocated to ERM.

The overall conclusion reached by the researcher through interpretation of the above information is that a high level of importance is allocated to the topic of risk, and more specifically risk management by all organisations in the South African business environment with the highest level of importance evident in the Financial industry, and the lowest level of importance evident in the Information Technology and Telecommunications industry.

5.2.2 FORMAT AND LAYOUT

As a second step of the exploratory document review of the annual reports of the 30 companies randomly selected, an attempt was made identify whether a consistent and standard format is utilised by all these organisations when discussing risk management, or more specifically enterprise-wide risk management, in their annual reports. The process followed to determine the type of format and layout of information contained in the portion of the annual reports reviewed that discusses ERM. The criteria listed below are those identified during a scanning process of each discussion relating to risk management in these annual reports.

- 1 Risk Management Philosophy
- 2 Structure of Risk Management Function
- 3 Risk Management duties of:
 - 3.1 Board
 - 3.2 Board Risk / Audit Committee
 - 3.3 Management committees

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

- 3.4 Group Risk Officer
- 3.5 Management and staff
- 4 ERM Framework
- 5 Types of risks being addressed within the organisations
 - 5.1 Strategic
 - 5.2 Operational
 - 5.3 Insurance
 - 5.4 Safety, Health, Environmental, Quality (SHEQ)
 - 5.5 Industry
 - 5.6 Legal
 - 5.7 Economical/ Economy
 - 5.8 Shares, Investments and Returns
 - 5.9 Political
 - 5.10 Technology
 - 5.11 Human Resources
 - 5.12 Social
- 6 Relationship between Risk Management and Internal Control

The results of the exploratory review of annual reports of the randomly selected organisations tested are contained in table 3 on the next page. The reference numbers on the top row of each column corresponds with those listed above.

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

Industry	Company	1	2	3.1	3.2	3.3	3.4	3.5	4	5.1	5.2	5.3	5.4	5.5	5.6	5.7	5.8	5.9	5.10	5.11	5.12	6
	Kumba Resources	1			1	1				1	1		1	1		1				1		
	Anglo Gold			1							1	1	1	1	1	1	1	1		1		1
	Goldfields	1	1	1		1						1	1		1	1		1		1	1	
	BHP Billiton	1			1					1			1			1	1	1			1	1
	Sasol				1						1	1	1	1	1	1			1	1	1	1
Basic Industries	AECI				1								1	1	1	1			1	1	1	
	SAPPI			1						1	1	1	1		1				1	1		1
	Hiveld Steel											1				1						
	Group Five	1	1	1	1		1	1	1	1	1	1	1									
	PPC	1			1						1	1	1		1							1
Financials	Remgro		1		1					1	1		1		1	1	1		1	1	1	1
	ABSA	1	1	1	1	1	1	1	1	1	1	1		1	1	1	1	1	1			1
	Standard Bank		1							1	1	1	1		1			1				1
	Liberty Life	1		1	1		1				1	1										
	Alexander Forbes									1	1				1							1
Consumer Goods and	AVI										1		1		1							
Services	Massmart				1					1			1		1				1	1	1	1
	Johncom										1	1	1	1		1				1	1	1
	Sun International	1	1	1	1	1				1	1	1	1				1					1
	Pick & Pay		1		1						1	1										1
Information Technology	Mustek										1	1			1	1		1				1
and Telecommunications	Idion			1	1																	
	Vodacom*				1								1	1	1	1				1	1	1
	MTN Group	1	1	1	1	1	1	1	1						1	1		1	1	1	1	
	Paracon				1											1						1
Public Sector	Transnet Limited									1	1		1		1							
	Eskom				1						1	1	1	1	1	1		1	1	1		1
	Denel				1	1	1		1										1	1	1	1
	Telkom		1	1	1			1		1	1		1	1	1	1	1	1	1			1
	IDC		1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of organisations with identified criteria		9	10	11	20	6	5	5	5	13	20	16	20	10	19	17	7	10	11	14	11	20
% of organisations with identified criteria		30%	33%	37%	67%	20%	17%	17%	17%	43%	67%	53%	67%	33%	63%	57%	23%	33%	37%	47%	37%	67%

Table 3: Format and layout of Risk Management paragraphs in Annual Reports reviewed

CHAPTER 5: RESEARCH RESULTS

The first observation made during interpretation of the information contained in the above table is that there is no standard format or layout used by organisations when discussing the status of enterprise risk management within the organisation. There are a variety of formats utilised in preparing and setting out ERM specific information to stakeholders in annual reports.

The second, and perhaps the most disappointing observation made is that there are no **direct and detailed structured** discussion on the value of enterprise-wide risk management within the annual reports reviewed. This observation will be expanded on during the discussion in item 5.2.4 below of value items mentioned or implied in the annual reports reviewed.

Having mentioned the above two observations indicating that the main research objective was not achieved by this portion of the document review, the following interpretation of information gathered was made to determine what organisations share with stakeholders reading their annual reports when discussing the status of ERM in those organisations. The discussion starts off with the type of issues identified in the majority (more than 50%) of annual reports analysed during the document review, and ends with the issues of disappointment or surprise in the opinion of the researcher because these items considered to be of importance, once again in the opinion of the researcher, are not mentioned in the majority of annual reports reviewed.

Criteria mentioned in more than 50% of the ERM specific portions of the annual reports reviewed are the following:

More than 50% of organisation reviewed (67% to be precise – refer to column 3.2) discuss in one form or the other the risk management specific role and responsibility, or duties of members of the Risk or Audit Committee (both of these committees representing the Board of the organisations). The second most frequent discussion of risk management duties or roles and responsibilities relates directly to that of the Boards of these organisations

- (37% refer to column 3.1), while the risk management duties and responsibility of management committees, the Group Risk Officer, and members of management and staff are <u>not</u> mentioned in at least 80% of all the annual reports reviewed (refer to columns 3.3, 3.4, and 3.5 in the table above).
- Issues discussed in the majority of annual reports reviewed are the types of risks being addressed or managed within the organisation. The types of risks discussed in annual reports of more than 50% of the organisations reviewed are:
 - Operational Risks (67% refer to column5.2 in the table above);
 - Safety, Health, Environmental, and Quality risks (SHEQ) (67% refer to column 5.4 in the table above);
 - Legal risks (63% refer to column 5.6 in the column above);
 - Economical and or economy related risks (57% refer to column 5.7 in the table above); and
 - o Insurance risks (53% refer to column5.3 in the column above.
 - (Note that the management of these type of risks can be considered as implying value added to the organisation or issues indicating the value of risk management within the organisation. This is discussed in more detail in item 5.2.4 below).
- The relationship between risk management and internal control (or at least internal audit) is discussed in 67% of the annual reports of the organisations analysed during this document review (refer to column 6 of above table).

Issues identified during interpretation of the information contained in the above table that surprised, and at times even disappointed the researcher, are the following:

 70% of organisations reviewed does not make mention of their Risk Management Philosophy which is expected to amongst others contain information relating to their risk management culture in the organisation, the tone at the top, business ethics, risk appetite, and tolerance for risk within the organisation (refer to column 1 in the above table).

 Only 17% of organisations reviewed provide a discussion of the Enterprise Risk Management Framework - considered as a combination of risk management policy, procedure, methodology, and guideline (Refer to column 4 in above table).

The overall conclusion reached when interpreting the above information is that although the value of ERM in the organisations reviewed are not <u>directly discussed in detail</u> in the annual reports reviewed, and although there is no standard format and layout for reporting on ERM to stakeholders in the majority of these reports reviewed, the majority of companies analysed during this document review touches on the risk management duties of either the board or a committee of the board, the relationship between risk management and internal controls, and the type of risks identified and or managed by these organisations.

5.2.3 LEVEL OF IMPLEMENTATION

Following from the portion of the document review intended to determine the type of information mentioned in the annual reports reviewed, an attempt was made to search for information indicating the level of implementation of ERM within organisations forming part of the review. This was done to prove that the level of ERM implementation within the organisation is sufficient to enable interpretations to be made regarding the value of risk management within these organisations as reflected in their annual reports. The following criteria as identified during the literature review were utilised to determine the level of implementation:

- 1 Existence of a formalised ERM approach and methodology within the organisation
- 2 Capturing of formalised approach and methodology within an EWRM framework
- 3 Board takes responsibility for the discharge of EWRM responsibilities
- 4 Formal risk identification and assessment takes place within the organisation
- 5 ERM activities are monitored and reported to the Board

- 6 A Chief Risk Officer has been appointed to take care of the ERM function within the organisation
- 7 A risk management committee of the Board exists
- 8 The audit committee takes care of ERM on behalf of the Board (therefore a combined risk and audit committee)

The result of the search for information indicating the level of implementation is contained in the table below. The numbers of the columns, from 1 to 8, are the same as those listed above.

Industry	Company	1	2	3	4	5	6	7	8	Total per company	Total per industry
Resources	Kumba Resources	1	1		1	1	1		1	6	27
	Anglo Gold	1		1	1	1			1	5	
	Goldfields	1			1	1	1		1	5	
	BHP Billiton	1	1	1	1	1			1	6	
	Sasol	1			1	1	1	1		5	
Resources Basic Industries Financials Consumer Goods and Services Information Technology and Telecommunications Public Sector	AECI	1			1				1	3	22
	SAPPI	1	1	1	1	1			1	6	
	Hiveld Steel				1				1	2	
	Group Five	1	1	1	1	1	1	1		7	
	PPC	1			1	1		1		4	
Financials	Remgro	1			1	1			1	4	29
Timanolais	ABSA	1	1	1	1	1	1	1		7	
	Standard Bank	1	1		1	1				4	
	Liberty Life	1	1	1	1	1	1	1		7	
	Alexander Forbes	1	1	1	1	1	1		1	7	
Consumer Goods and	AVI	1		1	1	1			1	5	21
Services	Massmart	1			1	1		1		4	
	Johnnic Communications	1			1				1	3	
	Sun International	1	1	1	1	1		1		6	
	Pick & Pay**			1		1			1	3	
Information	Mustek	1		1	1	1			1	5	25
Technology and	Idion	1	1	1	1	1		1		6	
Telecommunications	Vodacom	1			1	1		1		4	
	MTN Group**	1	1	1	1	1	1	1		7	
	Paracon	1			1				1	3	
Public Sector	Transnet Limited	1	1	1	1	1	1	1		7	29
	Eskom	1	1		1	1		1		5	
	Denel	1		1	1	1		1	1	6	
	Telkom	1		1	1	1			1	5	
	IDC *	1	1	1	1	1		1		6	
Number of companie	28	14	17	29	26	9	14	16			
Percentage of compa	nies	93%	47%	57%	97%	87%	30%	47%	53%		
** Identification of results we			-							place.	

^{**} Identification of results were hampered because Pdf format of annual report does not allow word search to take place.

* Review limited to a portion of annual report only (full report not available in electronic readable format

Table 4: Level of implementation of ERM in organisations reviewed.

Interpretation of information contained in the above table revealed the following results:

- Although only 47% of organisations reviewed made mention (no detailed discussion) of an EWRM Framework existing in the organisation 93% of these organisations indicated that they do have a formalised ERM approach and or methodology within the organisation to address risks that has an impact on the objectives of the organisation (refer to columns 1 and 2 of the above table).
- In 57% of the annual reports reviewed, it was stated that the Board takes responsibility for the discharge of ERM responsibilities within the organisation, a statement that is aligned with generally accepted best practices as contained in the COSO Integrated Risk Management Framework (refer to column 3 of the above table).
- 97% of the organisations reviewed indicated that they perform formal risk identification and assessment within their organisation, while 87% of the organisations reviewed clearly indicated that the status of risks identified, assessed and monitored are reported to the Board (refer to columns 4 and 5 of the above table).
- Only 30% of the organisations reviewed indicated that a Chief Risk Officer have been appointed to take charge of the facilitation of risk management responsibilities within these organisations (refer to column 6 of the above table).
- All of the organisations reviewed indicated that they a committee of the Board takes charge of risk management responsibilities on behalf of said Board. 53% of these organisations made it known that these risk management responsibilities are taken care of the Audit Committee, while 47% of these organisations made it known that risk management responsibilities are taken care of a Risk Committee on behalf of the Board (refer to columns 7 and 8 of the above table).

The overall conclusion reached when interpreting the above information is that although many organisations does not mention the existence of an ERM Framework in the annual reports, and as many as 70 % of the organisations reviewed does not indicate whether a Chief Risk Officer has been appointed to facilitate the discharge of risk management duties within the organisation, it is still evident that all organisations reviewed are at an advanced stage of ERM implementation. This can be said because an overwhelming majority of organisations reviewed does have a formalised ERM approach and methodology in place, the Boards of these organisations takes overall responsibility for the discharge of risk management responsibilities, and formal risk identification, assessment, monitoring and reporting takes place. Reaching this conclusion provided sufficient support that the documents being reviewed are of an adequate nature to possibly indicate statements explaining the value of ERM. The next stage of the document review as discussed in the paragraphs below then commenced.

5.2.4 VALUE ITEMS MENTIONED OR IMPLIED

Having confirmed during the previous three parts of the document review that sufficient importance is afforded to the topic of risk management by the organisations being reviewed, that the annual reports reviewed is recent enough to identify current trends regarding the perceived value of ERM, and that the organisations being reviewed has implemented ERM to sufficient level to be considered an informative source on the topic being reviewed.

In order to determine the perceived value or determine the biggest value adding benefit or advantage of ERM to the organisations being reviewed, the statements listed below were utilised as prompters to identify any indicators of these value items being experienced by the organisations reviewed. The origins of these statements are the following:

• Statement 1: Self developed to indicate compliance as a perceived benefit

- Statements 2.1 2.4: Benefits of ERM mentioned in the COSO Integrated Risk Management Framework
- Statements 3.1 3.6: Intended value added by ERM in pursuit of an organisations objectives as set out in the COSO Integrated Risk Management Framework
- Statements 4.1 4.16: Potential ERM benefits as identified during the literature review.

Existence of the following statements explaining the potential value of ERM in the organisations being reviewed was searched for in the annual reports of these organisations:

- 1 ERM assists with the achievement of ERM compliance requirements (e.g. with JSE, and or King 2, and or Basel 2 guidelines, and or Sarbanes Oxley requirements, and or PFMA requirements)
- 2 The following benefits intended by COSO EWRM Framework is achieved:
 - 2.1 ERM provides assistance with the achievement of high level goals, aligned with supporting the mission of the organisation
 - 2.2 ERM assists with the effective and efficient use of resources within the organisation
 - 2.3 ERM enhances reliability of reporting within the organisation
 - 2.4 ERM assists with compliance with applicable laws and regulations.
- 3. Intended value added by ERM in pursuit of an organisations objectives (as set out in COSO):
 - 3.1 ERM aligns the organisation's risk appetite / tolerance and strategy
 - 3.2 ERM enhances the organisation's risk response decisions
 - 3.3 ERM reduces operational surprises and losses
 - 3.4 ERM provides assistance with the identification and management of multiple and cross enterprise risks
 - 3.5 ERM assists organisation to pro-actively realise and seize opportunities

3.6 ERM assists with the deployment of capital

- 4 Potential ERM benefits as identified through review of articles and publications:
 - 4.1 ERM supports the corporate governance process, which can increase the confidence of stakeholders and regulators.
 - 4.2 ERM helps control the overall costs of risk management by anchoring activities to key business strategies and aggregating risks across the enterprise. This facilitates effective response to the interrelated impacts, and integrated responses to multiple risks.
 - 4.3 Through increased communication, ERM leads to broader understanding and recognition of risks throughout the organisation.
 - 4.4 Successful ERM implementation can reduce an organisation's overall risk profile, which may lower the cost of capital in the organisation. ERM results in an increase in capital efficiency.
 - 4.5 An ERM approach seeks to strategically consider the interactive effects of various risk events with the goal of balancing an enterprise's entire portfolio of risks to be within the stakeholders' appetite or tolerance for risk.
 - 4.6 ERM takes an enterprise-wide focus by strategically looking at risks in a coordinated, consistent manner. ERM enables creating synergies between different risk management activities.
 - 4.7 Appropriate utilisation of ERM enhances internal audit efforts during the planning and execution phase of their service delivery.
 - 4.8 ERM provides expanded opportunities to business due to better informed business decisions. By considering a full range of potential events, through application of ERM principles, management is positioned to identify and proactively realise opportunities.
 - 4.9 ERM assists with the reduction and or minimising of possible financial losses that might be encountered by the organisation.
 - 4.10 ERM enables improved strategic planning by appropriate identification and ranking of risks hampering the achievement of business objectives, thereby not only identifying hazards and uncertainties, but

also opportunities that should be fed back to the strategic planning process.

- 4.11 A benefit of ERM is decreasing earnings and stock price volatility
- 4.12 ERM reduces inefficiencies inherent in the traditional risk management approach.
- 4.13 ERM reduces the expected costs of external capital and regulatory scrutiny.
- 4.14 Appropriate application of ERM provides the rigor to identify and select among alternative risk responses risk avoidance, reduction, sharing, and acceptance.
- 4.15 Appropriate ERM increases market confidence as it is interpreted as high shareholder values, (e.g. ethics and integrity), where markets trusts the management team of these companies
- 4.16 Developing an urgent and convincing enterprise-wide philosophy towards ERM in a coordinated effort with all stakeholders, and consistently implementing this philosophy, is where the true value of ERM lies.

The process followed to identify information in the annual reports of the organisations reviewed that confirms potential existence of benefits or value of ERM as described by the above statements was done as follows:

- An electronic search of key words contained in each of the above statements was performed
- Once the words, or any other words with a similar meaning identified through physical observation, were found, the paragraph in which these words were found were carefully read to determine if the benefit or value of ERM as contained in the above statements does in fact exist.

None of the statements as listed above were identified word for word in the annual reports reviewed. A lot of professional and intellectual judgement was required from the researcher during this portion of the document review to determine whether the

words, sentences, and paragraphs identified with key words, or similar words contained in the statements, implies that the benefits or description of vale of ERM exists in the organisations reviewed. It is therefore acknowledge that the results of the document review conducted as contained in table 5 on the next page does contain an element of subjective interpretation by the researcher.

Only statements explaining the benefit or value of ERM that could be identified in 50% or more of the organisation's annual reports reviewed were considered as confirmed explanations identified during this document review. Interpretation of the document review results contained in table 5 below is therefore the following:

- 70% of all organisations indicated in the risk management portion of their annual report that ERM assists with the compliance to applicable laws and regulations.
- 60% of all organisations reviewed indicated in the risk management portion
 of their annual report that the achievement of compliance requirements (e.g.
 JSE listing requirements, King II, Base II, Sarbanes Oxley, or PFMA Act) is a
 benefit provided by ERM (refer to column 1 of the table below);
- 60% of organisations reviewed indicated in the risk management portion of their annual report that ERM provides assistance with the achievement of strategic goals of the organisation (refer to column 2 of the table below);
- 50% of the organisations reviewed indicated in the risk management portion of their annual report that ERM provides assistance with the identification and management of multiple and cross enterprise risk;
- 50% of the organisations reviewed indicated in the risk management portion of their annual report that ERM supports the corporate governance process within the organisation which can increase the confidence of stakeholders and regulators.

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

Industry	Company		CC)SO 0	bjecti	ves	Value add set out in COSO							Potential value add as identified in Literature												Cov	Industry			
		1	2.1		2.3		3.1			3.4			4.1	4.2	4.3	4.4	4.5		4.7						4.13	4.14	4.15	4.16		Total
	Kumba Resources	1	1	1		1	1	1	1	1	1		1		1		1	1		1	1	1	1		1	1	1		20	48
	Anglo Gold	1	1	1		1																	1						5	
	Goldfields		1		1	1					1	1	1									1							7	
	BHP Billiton		1	1	1			1			1		1						1	1							1	1	10	
	Sasol	1	1		1	1							1								1								6	
Basic Industries	AECI			1		1			1																				3	38
	SAPPI	1	1			1		1	1	1	1			1	1			1	1		1	1							13	
	Hiveld Steel																												0	
	Group Five	1	1	1	1	1	1				1				1		1	1		1									11	
	PPC	1		1		1				1			1	1				1	1	1		1				1			11	
Financials	Remgro	1			1	1	1		1	1			1	1			1	1	1		1								12	61
	ABSA	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1			1	1	1	1	25	
	Standard Bank	1	1	1	1	1	1		1	1			1		1				1								1		12	
	Liberty Life		1			1			1	1					1														5	
	Alexander Forbes	1	1	1				1		1			1		1														7	
Consumer Goods and	AVI	1												1	1			1			1								5	37
Services	Massmart	1		1		1		1	1									1	1		1								8	
	Johnnic																													
	Communications			1	1	1							1							1									5	
	Sun International	1	1	1		1	1	1		1	1		1		1		1	1	1	1		1				1	1		17	
	Pick & Pay								1												1								2	
Information Technology	Mustek	1	1											1															3	27
and Telecommunications	ldion																		1										1	
	Vodacom	1				1			1	1			1						1										6	
	MTN Group	1	1		1	1	1	1		1	1		1	1			1	1	1	1		1				1			16	
	Paracon							1																					1	
Public Sector	Transnet Limited	1			1	1				1																			4	57
	Eskom	1	1		1	1	1	1		1	1	1	1	1	1	1	1	1	1		1		1			1	1	1	20	-
	Denel		1					1	1		1												1				1		6	
	Telkom		1		1	1				1	1	1	1		1		1	1	1	1		1	1						14	
	IDC *		1		1	1	1		1	1					1	1	1	1	1		1	1							13	
	Total	18	18	12	13	21	9	11	12	15	11	4	15	8	12	3	9	13	14	9	10	9	5	0	2	6	7	2		
	Percentage	60%			43%		30%					13%										30%	17%	0%	7%	20%	23%	7%	1	

Table 5: Confirmation of statements explaining potential value of ERM, or benefit derived from ERM.

Further extrapolation of the information contained in table 5 on the previous page to the six industries represented by the 30 companies reviewed indicated that the most benefit and or value in ERM is seen in the Financial industry, followed by the Public Sector, and then the Resources industry. The Information Technology and Telecommunications industry is the one that makes the least reference to the value or benefit of ERM to their respective organisations.

The overall conclusion reached when interpreting the above information is that although ERM is well established in the South African business environment, and although risk management is considered as an area of importance to the organisations reviewed, few of these organisations focus on reporting the value added by ERM to their organisations and or business. This conclusion is reached because only 5 of 27 potential statements describing the value or benefit of ERM as identified in the COSO Framework and literature on the topic could be identified in more than 50% of the annual reports of the 30 companies reviewed. A concluding remark is that the majority of organisations see the primary benefit of ERM as being compliance driven, which indicates that there is a lot of room for improvement in the South African business environment to realise the true value of ERM if it is more than being compliance driven.

Having completed the documentation review, the next challenge of this research study was to determine whether the results obtained during the document review will be supported by the results of a quantitative questionnaire driven review, which is the topic of discussion in the next portion of this document.

5.3 QUANTITATIVE REVIEW

The purpose of the quantitative review performed on a selective basis for one organisation per industry tested, was to firstly confirm the validity and accuracy of findings made during the course of the document review, and secondly gather

further information assisting with determining the value added by ERM in organisations in South Africa.

The quantitative questionnaire utilised during this portion served an exploratory purpose only, and for that reason the sample size was kept small at one organisation per industry reviewed. The six organisations, one per industry, randomly selected to take part in the quantitative review as recorded in table 1 in paragraph 4.3 above are:

- BHP Billiton
- Group Five
- Liberty Life
- Pick 'n Pay
- Vodacom
- Eskom.

Risk management officials of all of the above organisations, were contacted telephonically, and explained the purpose of the research, and the questionnaires to be completed by them. All of these officials expressed a willingness to participate, and made a verbal commitment to return the completed questionnaires within a one week period.

The quantitative research performed allowed collection and interpretation of information addressing the following three focus areas:

- The level of acceptance and implementation of ERM within organisations in South Africa;
- Potential reasons or driving forces for the implementation of ERM in South Africa; and
- Factors that describes the perceived value that ERM provides to the organisations taking part in the review.

The results obtained through this quantitative questionnaire based portion of the research study are contained in the paragraphs below.

5.3.1 LEVEL OF ACCEPTANCE AND IMPLEMENTATION OF ERM

A number of questions were asked to determine the level of acceptance of ERM in the sample of organisations representing the 30 organisations and six industries analysed during the document review portion of this research study. Refer to questions 1 to 8 listed in Appendix 1 of this document.

The answers to questions raised enabled the following interpretations to be made:

- All organisations reviewed indicated that an enterprise-wide risk management framework is in place within the organisations as a minimum, while three of the six organisations taking part in the quantitative review indicated that this framework serves as a common language and focal point to view and manage risk as part of the business culture in the organisation.
- Five of the six organisations taking part in this review indicated a strong commitment of senior management within their organisations towards enterprise-wide risk management.
- All organisations reviewed indicated that a high status is afforded to ERM in their organisations, either through establishing a process owner for the development and implementation of and ERM framework, or through having a Chief Risk Officer at a senior level in the organisation to maintain the risk architecture, develop risk policies, and monitor risk management routines.
- All organisations reviewed indicated that ERM has a high level of ownership in their organisations, and five of these organisations indicated that ERM is driven by the board in their companies.
- Although all organisations reviewed indicated that an enterprise-wide risk
 management framework is in place within the organisation as a minimum,
 only two of these companies indicated that implementation of this framework
 has been completed. The remaining four of the companies did however

confirm that implementation of an ERM framework has been partially completed.

- The level of communication of ERM within organisations varies in that one organisation reviewed indicated that risk communication is likely to take place only after a loss to the company occurring, two indicated that a risk awareness programme has been established, and the remaining three indicated that risk owners are appropriately trained, and provides periodic briefings on the topic. None of the organisations reviewed indicated that all persons in the organisation clearly understand risk management.
- All organisations reviewed indicated that risk identification and assessment is
 performed within their organisation, while at least four of these organisations
 indicated that risks are measured and linked across the enterprise. Only two
 of the organisations reviewed however indicated that the identified,
 assessed, measured and linked risks are subject to an integrated and
 measurable response to these risks which measures the effectiveness of
 controls.
- All organisations reviewed indicated that there is a high level of risk
 monitoring and management oversight within their organisations with two of
 them indicating that management's control of risk is centrally assessed, and
 four of them indicating that risk management activities are monitored,
 aggregated and reported upwards to the Board.

The overall conclusion reached during this portion of the quantitative questionnaire driven exploratory research process is that there is a high level of acceptance and implementation of ERM within all organisation subjected to this review.

5.3.2 POTENTIAL REASONS OR DRIVING FORCES FOR THE IMPLEMENTATION OF ERM

In answer to the question intended to identify potential reasons or driving forces for the implementation of ERM in South Africa the following answers were received

(refer to question 9 in Appendix 1 for question asked, and table 15 in Appendix 2 for answers received):

- The biggest driving force for implementation of ERM within organisations reviewed is the encouragement received from the Board to do so.
- The second biggest driving force for the implementation of ERM within organisations reviewed is compliance requirements (e.g. with JSE, and or King 2, and or Basel 2, and or Sarbanes Oxley, and or PFMA requirements).
- The third biggest driving force for the implementation of ERM within organisations reviewed is an adoption of an ERM strategy by the firm.

An additional reason for the implementation of ERM identified during the course of the quantitative questionnaire portion of this exploratory research study is the urge to ensure good corporate governance within the company. Although this factor was identified, it could not be presented for consideration to the other companies taking part (because all questionnaires was sent out simultaneously), and could therefore not be measured to determine the priority thereof.

The overall conclusion reached during this portion of the quantitative questionnaire driven exploratory research process is that the existence and implementation of ERM within organisation is driven firstly from the top at Board level, and secondly by compliance requirements. The factor that ERM implementation is driven from the top once again emphasises the importance of, and interest in, identifying the descriptions of the perceived value that ERM provides to organisations in the South African business environment.

5.3.3 FACTORS THAT DESCRIBES THE PERCEIVED VALUE THAT ERM PROVIDES

In answer to the question intended to identify factors that describes the perceived value that ERM provides to the organisations taking part in the review, the following answers were received (refer to question 10 in Appendix 1 for question asked, and table 16 in Appendix 2 for answers received):

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

- The primary factor indicated as best describing the perceived value that ERM provides is that through increased communication, ERM leads to broader understanding and recognition of risks throughout the organisation.
- Factors receiving the second highest score in terms of the level to which it describes the value of ERM are:
 - ERM provides assistance with the identification and management of cross enterprise risks;
 - ERM supports the corporate governance process, which can increase the confidence of stakeholders and regulators.
- Factors receiving the third highest score in terms of the level to which it describes the value of ERM are:
 - ERM assists with the effective and efficient use of resources within the organisation;
 - ERM assists with compliance to applicable laws and regulations;
 - ERM aligns the organisation's risk appetite and tolerance strategy;
 - ERM enhances the organisation's risk response decisions;
 - ERM takes an enterprise-wide focus by strategically looking at risks in a coordinated, consistent manner, and thereby enabling the creation of synergies between different risk management activities; and
 - ERM assists with the reduction and or minimising of possible financial losses that might be encountered by the organisation.

The overall conclusion reached during this portion of the quantitative questionnaire driven exploratory research process is that ERM provides most value to an organisation through creating a broad understanding and recognition of risks throughout the organisation by identification and management of cross enterprise risks which supports the corporate governance process and increases the confidence in the organisation of stakeholders and regulators.

Having confirmed the validity of selected organisations selected to take part in this research study, identifying and confirming the driving forces of ERM

implementation, and descriptions of factors describing the value ERM adds to business, the final step towards completion of this research study was to firstly confirm the results obtained during the literature review, document review, and quantitative questionnaire driven information gathering phases of this research study, and secondly identify any further value adding factors not identified during previous phases. These objectives would be achieved through the qualitative interviews discussed in the paragraphs that follow.

5.4 QUALITATIVE INTERVIEWS

Qualitative interviews were performed with the officials responsible for enterprise-wide risk management within a number of randomly selected organisations. The three organisations randomly selected as recorded in table 1 in paragraph 4.3 above are Eskom, Group Five and Vodacom. The following officials were met on 16 and 17 August 2006:

- Eskom: Me Kay Darbourn General Manager Risk Management (16 August 2006 at 13h00)
- Group Five: Mr Guy Mottram Group Risk Manager (17 August 2006 at 8h30)
- Vodacom: Me Wilna Meiring EHOD: Insurance and Risk (17 August 2006 at 15h00)

The discussion with each of the abovementioned officials was focused on confirming at a very high level the level acceptance and implementation of ERM in their organisations, but even more importantly to finalise through a qualitative discussion the exploration for answers on the question of what the value of ERM in the South African business environment is.

5.4.1 ESKOM

Me Kay Darbourn, the chief risk officer of Eskom, and also a Board member of the Institute of Risk Management of South Africa started off by saying that ERM is well

developed and established in Eskom. The required processes are in place to ensure an effective and efficient ERM function throughout the organisation.

The initial driving factor to implement ERM in Eskom was a combination of pressure and desire to adhere to compliance requirements (e.g. the PFMA Act, stakeholder requirements, and King II guidelines). Implementation of ERM within the organisation was not easy. The challenge was to shift the inherent mindset within the organisation from being compliance orientated, which by implication builds up resistance, towards a mindset that sees the value of ERM in the day to day tasks of management.

The ERM function within Eskom has grown to consist of 46 dedicated team members focusing on Insurance (42 team members), PFMA compliance (3 team members) and business ethics (one team member). The achievement of ERM responsibilities are driven by the Chief Risk Officer within the organisation. This objective is achieved through appreciation from the top, tasks being driven down by risk managers, and continuous reporting on the status of ERM within Eskom at Exco level.

The management of ERM is based on a risk accountability matrix within Eskom. Responsibilities as set out in the accountability matrix can be summarised as follows:

- Board focussing on strategic issues
- Exco focussing at both strategic and operational issues
- Management focussing on operational issues.

Eskom's Risk Accountability Matrix, set out in booklet format consisting of 16 pages clearly sets out the allocation of responsibility for specific risk categories to divisional and subsidiary officials per functional area in the organisation. The status of ERM, or Integrated Risk Management (IRM) as it is known in Eskom is clearly described in the following two quotes from the first page of Eskom's Risk Accountability Matrix:

CHAPTER 5: RESEARCH RESULTS

"Eskom IRM strategy and process continues to be a focus area in the organisation. The board should set the risk strategy or policy in liaison with the Managing Directors, Finance Director and senior management. These policies should be clearly communicated and promoted to all employees to ensure that the risk strategy is incorporated into the language and culture of the company" ... "The Board is responsible for the total process of risk management, as well as for forming its opinion on the effectiveness of the process. Management is accountable to the Board for designing, implementing and monitoring the process of risk management, and integrating it into day to day activities of the company". (Eskom, 2004: 1)

An interpretation of the above quotes from Eskom's Risk Accountability Matrix clearly supports the statements made by Me Darbourn that risk management within the organisation started off as a compliance driven function implemented with pressure to comply through a top down directive approach within the organisation.

Me Darbourn however continued the discussion by stating what she as the chief risk officer of Eskom sees as the value of ERM in the organisation. According to Me Darbourn, the value of ERM is the ability generated by the application of the methodology to take appropriate action that is aligned to the strategy of Eskom to mitigate risks. According to Me Darbourn, if correctly applied, risk management ensures that duplication of effort required to address risks in the day to day management of the business is minimised when an appropriate enterprise-wide action plan for the management of risk is followed. Risk management appropriately applied assists management to focus on important issues in the business. Me Darbourn concluded the discussion by stating that ERM adds value by providing focus throughout the organisation (Darbourn, 2006: Personal Interview).

5.4.2 GROUP FIVE

Mr Guy Mottram, the Group Risk Manager of Group Five, set the scene for the discussion by saying that the success of ERM within Group Five is the result of a number of factors all linked to the importance afforded to the function and

methodology throughout the organisation. This is evidenced by the fact that ERM has become entrenched into the day to day management culture within the organisation. Group Five's Group Risk Manager is a member of Exco with a direct reporting line to the CEO of the organisation. ERM is therefore driven from the top within Group Five. Risks are a standard discussion item at Board, Exco, operational and functional level within the organisation.

The value of ERM as experienced within Group Five is directly related to the driving forces of the construction industry being profit, margins, and cash. These drivers are also measured in terms of the saving of money within the organisation. These drivers of the industry and Group Five as a representative organisation within the industry is difficult to measure from an ERM perspective, and therefore places increased risk on the success of risk management within the organisation.

Group Five's ERM methodology is based on generally accepted best practice as contained in the COSO ERM Integrated Framework. The challenge posed to the Group Five risk management function during implementation of their methodology was to move from a theoretical framework to practical application thereof. In order



Figure 3: Group Five's ERM focus areas

to address this challenge, Group Five developed their ERM methodology to address risks within the organisation from a strategic, projects, operational, and functional perspective as depicted in figure 3 to the left. Strategic Risks pertains to opportunities and threats that are directly related to the achievement of the organisation's business

objectives. Measuring these types of risk by way of a quantitative value is dependent on the knowledge skills and expertise of the organisation's executive team.

Project specific risk identification and assessment is performed within a project lifecycle timeframe that is different to the longer term strategic view placed on

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

strategic risks and the cyclical annual financial reporting timeframe allocated to operational and functional risks. The benefit of project specific risk management within the organisation is the fact that there is sufficient knowledge of lessons learnt during the execution of contracts that went south (projects that did not succeed). The financial implication of risks materialising in these projects provides sufficient substantive information to enable quantification of potential risks. Risk identification, assessment and monitoring within projects are performed at various stages of the project lifecycle (e.g. inception, proposal, planning, execution and post mortem). This early involvement of risk management in the project life cycle enables early quantification of the potential cost of risk. During periods of economic down time in the construction industry, the potential value of these risks is used, together with other criteria, to decide on the acceptance of potential contracts. During economic boom times in the economy and the construction industry, the potential effect of possible risks materialising is worked into the price of contracts and related projects, thereby providing a sufficient safeguard against risk materialising, and increased profit incentive if risks does not materialise due to appropriate risk management.

Operational and functional risks are managed in accordance with an annual identification, assessment, monitoring and reporting cycle. Value is allocated to potential risks identified. These allocated values determine the importance of these risks. Values are also allocated to mitigation plans intended to mitigate said risks. The values allocated to mitigation plans determine the action taken to address risks. The objective is at all times profit driven.

Mr Mottram continued the information sharing during the interview by reemphasising the fact that the success of ERM in the organisation is a direct result of the fact the risk management represented at an executive level within the organisation, is driven from the top, and is subject to continuous monitoring and improvement. A high level review of the status of risks within the organisation is performed at Board level once every three months. Future enhancement of ERM within Group Five will involve creation of a user friendly risk dashboard that enables

ease of access and monitoring of the top ten risks in the organisation. The key to development of this dashboard would however be to keep it simple and user friendly. Further enhancement of the ERM function will be to align the management of risks within the organisation with the balanced scorecard of management.

The discussion was concluded with Mr Mottram emphasising the fact that identification and management of bonus and profit contribution is the overriding value adding factor of ERM, but that the difficulty of accurately performing this task remains a challenge that does not have a model answer in the international business community. For this reason, Group Five pro-actively participates in the Construction Industry's Risk Management Focus Group with the intention of learning from competitors and peers in the industry and at the same time sharing information with members. This involvement is expected enable enhancement of the value of ERM within the organisation (Mottram, 2006: Personal Interview).

5.4.3 VODACOM

ERM has been successfully implemented within Vodacom. Although Vodacom Group's insurance and risk management function is centralised at Head Office level, the responsibility for the management of risk within the organisation remains that of line management. The centralised group or enterprise-wide risk management function merely facilitates the availability of a standardised ERM methodology and related processes, and the communication flow of related information from the champions of risk throughout the organisation to the Risk Management Committee, and eventually the Board through the Audit Committee.

The discharge of risk management responsibility is coordinated by approximately 60 risk champions throughout the organisation in South Africa, while the task is performed to a varying degree of success in operations in the rest of Africa (e.g. the risk management function is reasonably well established in Tanzania, to a lesser extent but still acceptable in Swaziland, and not sufficiently in Mozambique as yet).

CHAPTER 5: RESEARCH RESULTS

The duty of Risk Champions throughout the organisation is in essence the application of the enterprise-wide risk management methodology in a consistent way. This includes risk identification, assessment, determining action plans, monitoring progress against plan, and reporting firstly to internal management levels and more specifically heads of departments, and finally to Exco and the Board via the centralised enterprise-wide risk management function.

Establishing and implementing the ERM methodology within Vodacom has been a tremendous challenge because of resistance to the adoption of the methodology within the organisation. The success of implementation and acceptance throughout the organisation is the result of firstly support and pressure from the executive management level within the organisation, and secondly the perseverance of the small but dedicated team taking charge of implementation throughout the organisation.

According to Wilna Meiring, the Executive Head of Department: Insurance and Risk Management within Vodacom, the success of ERM in the organisation is directly related to the most visible benefit or value of ERM, being the increased understanding and recognition of risks throughout the organisation which leads to the appropriate management thereof. In the experience of Me Meiring, extensive communication, training, patience, and continued coaching ensured buy-in from Heads of Departments for the risk management function. This buy-in did however have the risk of being of a temporary nature. Success was however ensured through realisation and understanding of the existence of risks in the area of responsibility of Heads of Departments. Many risks were identified through the pro-active and conscious identification and assessment of potential risks. The awareness of these risks led to the next visible benefit being the prioritisation of action steps to mitigate identified risks trough prevention action steps as a normal outflow of business. The support provided to responsible officials by the ratings allocated to identified risks,

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 5: RESEARCH RESULTS

and the monitoring thereof by senior management further entrenched the benefit or value of ERM to the organisation.

In closing the qualitative interview based discussion, Me Meiring stated that the value of ERM as realised through and increased awareness, understanding and recognition of risks throughout the organisation is clearly evidenced by an increased level of a relaxed state at Board and Exco level on the topic of risks within the organisation because members of Board and Exco are assured that risk identified are allocated appropriate ownership, that owners of risks understands the identified risks, and even more importantly, that these owners manages the identified risks (Meiring, 2006: Personal Interview).

6 CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

6.1 DISCUSSION

This section of chapter 6, being a discussion of the outcomes of this research study as contained in the previous chapter, is intended to provide a link to the underlying theory or foundation to this study as contained in chapter 2, and the content of the literature review as contained in chapter 3. The discussion is structured to firstly focus on the individual results of each of the 4 different research methods used, secondly to focus on the combined results of the 4 research methods used, and ends off with a high level overview of the value of ERM as identified and confirmed through this research.

6.1.1 LITERATURE REVIEW

The literature review conducted clearly indicates that ERM has been part of management practices in business for many years. During these years however ERM evolved from an insurance based focus area in the period prior to the 40's to an area incorporating diversification of investment portfolios in the 50's, to financial management of risks in to 70's, and finally a holistic integrated management of risks process during the 90's focussing on the achievement of strategic objectives.

The literature reviewed confirmed the fact that enterprise-wide risk management as a formalised and holistic integrated management concept is a relative new management concept with theoretic guidelines or generally accepted best practices in the form of guidelines, (refer to the second King Report on Corporate Governance), a framework (refer to the COSO Integrated Risk Management Framework), and standards (refer to the Australian / New Zeeland Risk Management Standard), that came to the forefront during the early 2000's. The fact that available guidelines, frameworks, and standards only became available recently by implication resulted that the majority of current literature focuses on the interpretation and application of the recently developed theory on the topic of ERM.

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

Both academic empirical research and research studies performed by service providers and interest groups to date focuses primarily on the level of development, acceptance and implementation of enterprise-wide risk management principles within organisation. The value of ERM to organisations are touched upon in much of the literature discussing the development, acceptance and level of implementation of ERM in organisation, but is not supported by formal academic research in the available literature reviewed.

The relevant infancy of ERM as an integrated and holistic management concept within the business environment therefore allowed identification during the course of this literature review of a wide variety of potential factors that could explain the value of ERM to organisations that have implemented these principles. These are recorded in paragraph 5.1, and will therefore not be repeated here. Of primary interest however is that no formal research to confirm these factors intended to describe or explain the value of ERM could be identified. This factor therefore adds impetus to the importance and value of this research conducted. The second issue of interest identified during the literature review is that factors identified that attempts to describe the value of ERM to businesses are varied and includes items that are far removed such as compliance to legislation to reduction of risk profile, to coordination of an organisation's risk profile, to reduction of inefficiencies and or costs, towards increasing market confidence.

Because the majority of current ERM literature focuses on the level of development, acceptance and implementation of enterprise-wide risk management principles within organisation, the basis for further research on the status afforded to ERM and the level of implementation thereof was readily available for further research.

The end result of the literature review is a varied and comprehensive feeding mechanism for the interrelated documentation, quantitative and qualitative exploratory reviews that followed.

6.1.2 DOCUMENT REVIEW

The primary purpose of the document review, being to confirm the existence of ERM benefits as identified during the literature review was achieved. Prior to discussing the confirmation of these benefits, the following observations deserve mention:

- ERM receives a high level of importance in the South African Business Community. The fact that enterprise risk management is mentioned on average 118 times in each of the annual reports of the 30 companies reviewed together with the fact that it forms an easily identifiable component of the annual reports (either as a stand alone section or as a sub section of another section such as that on corporate governance) is interpreted as confirming this observation.
- South African Organisations, (as represented by those randomly selected for this documentation review) are in an advanced stage of implementation of Enterprise Risk Management Principles as available in current ERM subject matter (refer to paragraph 2.2 of this document) and available theory (refer to paragraph 2.3).
- An overwhelming majority of organisations reviewed does have a formalised ERM approach and methodology in place (either partially or fully implemented), the Boards of these organisations takes overall responsibility for the discharge of risk management responsibilities, and formal risk identification, assessment, monitoring and reporting takes place.

A disappointing observation made during the document review portion of this research study is that there is no direct and detailed structured discussion on the value of ERM within the annual reports reviewed. There was however sufficient discussion of ERM in these documents to enable through interpretation of discussion contained in these reports confirmation of possible factors explaining the value of ERM as identified during the literature review. The benefit of performing

this document review is that the following descriptions out of the variety of potential descriptions of the value of ERM identified during the literature review was confirmed as receiving sufficient prominence to be mentioned in the annual reports of these organisations:

- ERM provides assistance with achieving of compliance objectives (e.g. compliance to applicable laws and regulations);
- ERM provides assistance with the achievement of strategic goals within the organisation.
- ERM provides assistance with the identification and management of multiple and cross enterprise risk;
- ERM supports the corporate governance within organisations, and can thereby increase the confidence of stakeholders and regulators in these organisations.

Because great reliance was placed during the document review on the professional but arguably also subjective interpretation of information by the researcher, the importance of the quantitative questionnaire driven information gathering portion of this research study, discussed in the section below, to confirm, enhance, or dispute the result of the document review portion of the research conducted is evident to eliminate possible subjectivity that could be associated with final research results.

6.1.3 QUANTITATIVE QUESTIONAIRE DRIVEN INFORMATION GATHERING

The quantitative questionnaire driven information gathering portion of the research study confirmed the results obtained during the course of the document review in that the following conclusions was reached:

- A high level of acceptance of and implementation of ERM exists within the organisations reviewed
 - The driving forces for implementation of ERM, which relates to potential value of ERM to stakeholders that can be associated with these driving forces are:

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

- Encouragement by the board of directors of these organisations to implement ERM;
- o Compliance requirements placed on organisations; and
- Adoption of an ERM strategy by organisations;
- The items describing value of ERM best, as confirmed through interpretation of the quantitative questionnaire results are:
 - ERM assists with the effective and efficient use of resources within the organisation
 - ERM assists with compliance with applicable laws and regulations
 - ERM aligns the organisation's risk appetite, tolerance, and strategy
 - ERM enhances an organisation's risk response decisions
 - ERM provides assistance with the identification and management of multiple and cross enterprise risks
 - ERM supports the corporate governance process which can increase the confidence of stakeholders and regulators.
 - Through increased communication, ERM leads to broader understanding and recognition of risks throughout the organisation
 - ERM takes an enterprise-wide focus by strategically looking at risks in a coordinated and consistent way;
 - ERM assists with the reduction and or minimising of potential financial losses.

The completion of the quantitative questionnaire driven portion of the research study provided the benefit of firstly confirming the results obtained during the documentation review, and secondly enhancing the final conclusion reached by identifying a few more descriptions of the value of ERM for further exploration during the qualitative information gathering portion of the research study.

6.1.4 QUALITATIVE INFORMATION GATHERING

The objective of the qualitative information gathering portion of the research study was achieved in that the findings made during the previous phases of the research study were confirmed, and additional information was gathered.

Apart from confirming that ERM is in essence well established within organisations reviewed, the following were highlighted by the risk management professionals interviewed as the true value of ERM to organisations in the South African business environment as seen from their individual perspectives:

- Appropriately applied risk management principles avoids duplication of effort
 to mitigate risks hampering the achievement of strategic objectives within
 said organisations due to coordinated enterprise-wide risk management
 effort focussing on areas of highest priority (aligned with item 3.4 listed in
 table 6 in section 6.1.5 below).
- Enterprise wide risk management plays a critical role towards achievement of profits, margins and cash flow objectives through enabling pro-active action that results in the saving money or costs (this description of value relates to item 4.9 recorded in table 6 below).
- Value of appropriately implemented and applied ERM is realised through and enhanced understanding and recognition of risks throughout the organisation which leads to the appropriate management and mitigation of said risks. The resulting management of identified risks provides increased assurance to Board members as key stakeholders in the organisations (this description of value relates to item 4.3 recorded in table 6 below).

Taking cognisance of the above descriptions explaining the value of ERM, the following lessons learnt during the course of the review should be noted:

 The initial implementation of ERM was historically driven to a large extent by either compliance requirements placed on organisations or pressure by

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

Board members to implement ERM. These driving forces is however to a large extent replaced by the value of ERM as listed in the paragraph above as driving forces for the implementation of ERM.

 Although procedures for the identification, assessment, monitoring and reporting is well established within organisation that implemented ERM, the actual financial quantification of the benefits of ERM policies and procedures implemented and adhered to is difficult to determine accurately without a measure of subjective estimation involved. The quantification of ERM benefits to organisations is an area for future enhancement of ERM in the South African, but also international business environment.

Having completed the final phase of the research study being the qualitative interview, it was realised that added value will be obtained through combining the results of all four phases of the research study (using different methodologies), and discussing those. The section that follows therefore discusses the combined results obtained through the utilisation of different research methodologies.

6.1.5 COMBINED RESULTS OF VARIOUS RESEARCH METHODOLOGIES UTILISED

In order to obtain combined results emanating from the various research methods used to identify what is perceived to be the value of ERM in South African businesses, the results obtained from each of these processes were recorded (marked with this symbol "\scrtw") in table 17 in Appendix 4 to this research report.

The statements explaining the value of ERM as identified in two of the additional three research methods used over and above the literature review were considered to be valued descriptions of the value of ERM in South African business. These descriptions are confirmed by at least three out of four different research methodologies used during this research study. This combination of research methods revealed 5 statements, as listed in table 6 below that clearly explains the value of enterprise risk management in the South African business environment.

Selection criteria for marking items listed in the table below as good descriptions of the value of ERM are the following:

- Literature review: statement identified as a description of the value of ERM during the review of available literature;
- Document review: identification of information describing the value of ERM in 50% or more of organisations whose annual financial reports was reviewed;
- Quantitative questionnaire driven information gathering: the descriptions agreed to by the majority of participants as describing the value of ERM (the majority agreement of participants are reflected by the three highest scores allocated to the list of descriptions – refer to table16)
- Qualitative interviews: the value of ERM as seen by risk management officials interviewed (aligned by the researcher with the generic descriptions recorded in the table below).

No	Statements explaining the biggest value		Type of Res	search Performe	d
	adding benefit or advantage to organisations for implementing Enterprise-wide Risk	Literature Review	Document Review	Quantitative Information	Qualitative information
2.4	Management ERM assists with compliance with applicable			gathering	gathering
2.4	laws and regulations.	V	~	•	
3.4	ERM provides assistance with the identification and management of multiple and cross enterprise risks	√	√	✓	✓
4.1	ERM supports the corporate governance process, which can increase the confidence of stakeholders and regulators.	√	✓	✓	
4.3	Through increased communication, ERM leads to broader understanding and recognition of risks throughout the organisation.	√		√	√
4.9	ERM assists with the reduction and or minimising of possible financial losses that might be encountered by the organisation.	√		✓	✓

Table 6: Extract of combined results of various research methods used to identify the value of ERM

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

The table above clearly indicates the value of making use of a combination of different, but aligned, research techniques during execution of this research study. Refer to Table 17 in Appendix 4 for the complete list of combined results of various research methods used. One or two of the explanations of the value of ERM would not have been identified if the document review process was not enhanced with the quantitative and or qualitative information gathering processes during this research study. Although document review is a widely accepted method for exploratory research, the combination of quantitative questionnaire and qualitative interviews used as additional aligned methods or processes during this research study enhanced the value of results obtained because it reduced the risk of issues of importance not being detected because a solitary approach (only document or quantitative, or qualitative review) was performed.

6.1.6 HIGH LEVEL DISCUSSION OF THE VALUE OF **ERM** AS IDENTIFIED AND CONFIRMED THROUGH THIS RESEARCH

Although a large number and variety of statements describing the potential value of ERM was identified during the course of the literature review, 27 in total, 5 of these was confirmed as being good descriptions applicable to the South African business environment, and deserves further discussion.

The ability of ERM to assist organisations with ensuring compliance with applicable laws and regulations: An organisation's compliance record to laws, regulations, and market or stakeholder expectations can significantly affect its reputation in the community in which it operates and the marketplace at large. According to the COSO EWRM Integrated Framework which forms the foundation of this research study, ERM is geared towards achievement of organisational objectives which comprises of strategic, operational, reporting and compliance categories. There is a direct relationship between these objectives as depicted in figure 1 on page 17 that are addressed across the entire organisation through application of ERM principles consisting of the 8 components of ERM depicted in this figure. The ability of ERM to assist

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

organisations with ensuring compliance with applicable laws and regulations assists said organisations with the achievement of strategic objectives because of the integrated and aligned nature of strategic, operational, reporting and compliance objectives, and in doing so enhances the achievement of stakeholder objectives which can in turn be directly related back to the value of ERM to the organisation.

- The function of ERM to assist and facilitate the identification and management of multiple and cross-enterprise risks: Every organisation faces a myriad of risks affecting different parts of the organisation. Enterprise-wide risk management facilitates effective response to the interrelated impacts of this myriad of risks through integrating responses to multiple risks affecting the achievement of organisational objectives.
- Providing support to the organisation's corporate governance process, and thereby increasing the confidence stakeholders and regulators has in the organisation that they are stakeholders of: Recent corporate reforms and new regulatory requirements that came to the forefront in the past decade have been the driving force behind increased demands on executive leaders and board members to improve their corporate governance practices. "Increasingly, leading-edge research, expert analysis, and the opinions of business executives indicate that when companies apply an integrated approach to governance, risk, and compliance activities, they enhance their competitiveness and bottom line success" (PricewaterhouseCoopers, 2005: 13).
- The ability to lead to a broader understanding and recognition of risks throughout the organisation through increased communication on the topic: Enterprise risk management enables organisations to ensure that "relevant information is identified, captured and communicated in a form and timeframe that enable people to carry out their responsibilities. Information is needed at all levels of an entity for identifying, assessing and responding to risks. Effective

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

information sharing also occurs in a broader sense, flowing down, across and up the entity." (COSO EWRM Integrated Framework, 2004: 22). Appropriate application of an EWRM framework ensures that personnel receive clear communications regarding their roles and responsibilities relating to the discharge of their risk management duties.

Providing assistance with the reduction and or minimising of possible financial losses that might be encountered by the organisation: The definition of enterprise-wide risk management, states that ERM is a process that provides "... reasonable assurance regarding the achievement of entity objectives". (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework, 2004: 3). Objectives set by organisations are invariably geared towards increasing profit, return on investment and or cost effective service delivery. A logical deduction is therefore is that if a process such as ERM provides a measure of assurance that objectives are achieved it does provide assistance with the reduction and or minimising of possible financial losses because strategic objectives of organisations is inherently aligned with maximising financial gains (which can also be interpreted as minimising financial losses).

This discussion of the descriptions of the value of ERM was done at a high level because the purpose of this research study is merely to identify and confirm what is understood within the South African business environment as the value of ERM. A more detailed understanding of above descriptions requires further research. A recommendation for future research is therefore that each of the above descriptions of the value of ERM as identified and confirmed during the course of this research study be studied in more detail and that practical actions required to obtain most effective and efficient realisation of these value descriptions be identified, confirmed and communicated as best practices throughout the South African business environment.

6.2 CONCLUSION AND RECOMMENDATION

As identified during preparation of the literature review, the underlying premise of risk management is that every organisation exists to provide value for its stakeholders. Such value is based on the quality of service delivery and achievement of strategic objectives. All organisations face uncertainty, and the challenge for management is to determine how much **uncertainty** the organisation is prepared to accept as it strives to grow stakeholder value. Uncertainty presents both risk and opportunity, with the potential to erode or enhance **value** (Committee of Sponsoring Organisations of the Treadway Commission – COSO EWRM Integrated Framework, 2004: 3).

Value is created, preserved or eroded by management decisions ranging from strategic planning to daily operation of the organisation. Inherent in decisions is recognition of risk and opportunity, requiring that management consider information about the internal and external environment, deploys precious resources, and appropriately adjusts organisational activities to changing circumstances.

As identified during this research study, the level of acceptance of ERM in the South African business environment is high. ERM is at an advanced level of implementation within organisations even though implementation of a fully fledged integrated enterprise-wide risk management framework is still in progress in the majority of organisations reviewed. ERM is discussed in depth in annual financial statements. The focus of communication in annual financial statements is however more on the existence and application of ERM principles than the value derived from ERM which is in most cases implied and not directly mentioned. Analysis of information available on the topic of ERM as made available by organisations selected for review during this research study clearly indicates that South African organisations are now moving to the stage succeeding the ERM infancy period, and are now ready to start focusing on maximising the value available through appropriate utilisation of ERM principles.

Organisations realise value when stakeholders derive recognisable benefits that they in turn value. Given the status of ERM in the South African business environment as mentioned in the paragraph above, the ultimate conclusion reached upon completion of this research study is that the true value of ERM in the South African business environment are appropriately described as follows:

- ERM has the ability to assist organisations with ensuring compliance with applicable laws and regulations;
- It is the function of ERM to assist and facilitate the identification and management of multiple and cross-enterprise risks;
- ERM provides support to an organisation's corporate governance process, and thereby increases the confidence stakeholders and regulators has in the organisation that they are stakeholders of;
- ERM has the ability to lead to a broader understanding and recognition of risks throughout the organisation through increased communication on the topic; and finally
- ERM provides assistance with the reduction and or minimising of possible financial losses that might be encountered by an organisation

As a final remark, having confirmed through this research that implementation of ERM is largely driven through a combination of top down pressure or encouragement from a board level to do so, the necessity to adhere to compliance requirements, and adoption of an ERM strategy by organisations, it is recommended that in order to realise the value of ERM as listed above, appropriate ERM principles and methodology be integrated into the day to day management of organisations and adhered to, that attention be given to finalising the implementation of an integrated ERM framework serving as a detailed yet understandable and user friendly guideline on the topic within organisations, and that through pro-active communication using appropriate media, such as the annual report, the value derived through the utilisation of ERM be made known to all stakeholders both in

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

CHAPTER 6: DISCUSSION, CONCLUSIONS AND RECOMMENDATIONS

qualitative and quantitative terms as far as practically possible and enabled through utilisation of the ERM approach and methodology available within organisations.

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

REFERENCES

REFERENCES

ABSA. 2005: Annual Report

http://1.1.1.1/508996372/496191896T060727182026.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.absa.co.za/absacoza/generated/files/3d12a1ce75b57010VgnVCM1000003511060aRCRD/Risk%20management.pdf
Accessed 2006/07/27

AECI. 2005: Annual Report

http://1.1.1.1/510298932/496191896T060727173223.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.aeci.co.za/New/Financial/2005AnnualReport/pdfs/corporate_governance.pdf
Accessed 2006/07/27

Alexander Forbes. 2006: Annual Report

http://1.1.1.1/513076100/496377544T060727183140.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.alexanderforbes.co.za/investors/annrep2006/downloads/afar2006_full_commentary.pdf
Accessed 2006/07/27

Anglo Gold. 2005: *Annual Report* http://www.anglogold.com/subwebs/InformationForInvestors/AnnualReport05/report/pdf/p21.pdf Accessed 2006/07/26

AVI. 2005: Annual Report http://avi.quickreport.co.za/avi_ar_2005/downloads/avi_ar_2005_final.pdf Accessed 31/07/06 at 16h48

Bailey MA, Bloom I, Hida ET. 2004: Assessing the value of Enterprise Risk Management.

http://www.deloitte.com/dtt/article/0,1002,sid%253D8165%2526cid%253D71020,00.html

Accessed on 2006/04/16

Baldoni RJ. 2004: The journey to successful enterprise-wide risk management. *Directorship*, Vol.30 Issue 3: 10 - 15

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

REFERENCES

Ballou B, Heitger DL. 2005: A building block approach for implementing COSO's Enterprise Risk Management – Integrated Framework. *Management Accounting Quarterly*, Vol 6 Issue 2: 1 - 10

Barton TL, Shenker WG, Walker PL. 2003: ERM in practice. *Internal Auditor*, Vol. 60 Issue 4: 51 – 55

Beasley MS, Clune R, Hermanson DR. 2005: ERM A Status Report. *Internal Auditor*, Vol 62, Issue 1: 67 - 72

Beasley M, Chen A, Nunez K, Wright L, 2006: Working hand in Hand: Balanced Scorecards and Enterprise Risk Management. *Strategic Finance*, Vol. 87 Issue 9: 49 – 55.

Bowling DM, Rieger LA. 2005: Making Sense of COSO's New Framework for Enterprise Risk Management, *Bank Accounting & Finance*, Vol. 18 Issue 2: 29 - 34

Bowling DM, Rieger LA. 2005: Success Factors for Implementing Enterprise Risk Management, *Bank Accounting & Finance*, Vol. 18 Issue 3: 21 - 26

BHP Billiton. 2005: *Annual Report*http://www.bhpbilliton.com/bbContentRepository/Reports/bhpb_ltd_concise_ar0
5.pdf
Accessed 2006/07/27

Briers S. 2000. The development of an integrated model of risk. Unpublished DBL thesis. Pretoria: University of South Africa.

Briers S, Darbourn K, De La Rosa S. Du Toit G, Skivington P & Vivian R. 2003. The Institute of Risk Management South Africa – Code of Practice. Sandton: IRMSA

Chapman C, 2003: Bringing ERM into focus, *The Internal Auditor*, Vol 60 Issue 3: 31 - 35

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

REFERENCES

Committee of Sponsoring Organisations of the Treadway Commission. 2004: Enterprise Risk Management – Integrated Framework. Jersey City: Committee of Sponsoring Organisations of the Treadway Commission.

Concise Oxford English Dictionary. 2004: Edited by Soanes C & Stevenson A, 11th ed. Oxford: Oxford University Press.

Darbourn K. 2006: General Manager (Risk Management), Eskom. Personal interview. 16 August 2006

D'Arcangelo JR, Matyjewicz G. 2004: ERM-Based Auditing, *Internal* Auditing, Vol 19 Issue 6: 4 - 13

Deloitte & Touche. 2003: *The status of Risk Management in South Africa*. http://www.irmsa.org.za/library/status%20of%Risl%20Management.pdf Accessed on 2005/08/13

Denel. 2005: Annual Report

http://1.1.1.1/513349628/512134936T060804161748.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.denel.co.za/Resources/AnnualReport2005.pdf Accessed on 2006/08/04

Dickenson G. 2001: Enterprise Risk Management: It's Origins and Conceptual Foundation, *The Geneva Papers on Risk and Insurance*, Vol. 26, No3: 360 - 366

Eskom. 2004: Risk Accountability Matrix. Eskom, 2004:1

Eskom. 2006: Annual Report

http://1.1.1.1/523567172/511903888T060804160946.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.eskom.co.za/annreport06/pdf/eskomar.pdf Accessed on 2006/08/04

Galloway D, Funston R. 2000: The challenges of enterprise risk management. *Balance Sheet*, Vol. 8 Issue 6: 22 - 25

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

REFERENCES

Greater drive for enterprise-wide risk management. 2004: Finance Week. 17 April 2004. 44 - 45

Goldfields. 2005: *Annual Report* http://www.goldfields.co.za/investor/annual_reports/annual2005/pdfs/risk_mana gement.pdf Accessed 2006/06/07

Greenhill J. 2005: Major dimensions of risk management implementation. *Assurances et Gestion des Risques Montréal*, Vol. 73 Issue 3: 397 - 406

Group Five. 2005: *Annual Report* http://1.1.1/495956852/496142544T060727175707.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.quickreport.co.za/group5_ar_2005/downloads/group5_ar_2005_full.pdf Accessed 2006/07/21

Highveld Steel. 2005: *Annual Report* http://www.highveldsteel.co.za/financial/Files/HighveldAR2005%201-32.pdf Accessed 27/07/06 at 17h47

Hively K, Merkley BW & Miccolis JA. 2001: *Enterprise Risk Management: Trends and Emerging Practices*. Altamonte Springs, Florida: Tillinghast-Towers Perrin.

Hoyt RE, Liebenberg AP. 2003: The determinants of Enterprise Risk Management: Evidence from the appointment of Chief Risk Officer. *Risk Management and Insurance Review*, Vol 6 Issue 1: 36 -52.

IDC. 2005: Annual Report http://www.idc.co.za/admin/ewebeditpro4/upload/annual-report/2005/15%20Risk%20management.zip Accessed on 04/08/06 at 16h49

Idion. 2005: Annual Report

http://1.1.1.1/524169284/511795792T060804165136.txt.binXMysM0dapplication /pdfXsysM0dhttp://www.idion.co.za/docs/2005%20PDF_s/IDION%202005%20A NNUAL%20REPORT%20wo%20sign.pdf Accessed on 2006/08/04

Jablonowski M. 2006: The Real Value of ERM. *Risk Management*, Vol. 53 Issue 2: 32 – 34, 36 – 37.

Johnnic Communications. 2005: *Annual Report* http://www.johncom.co.za/annualreport/JohncomAnnual%20Report%202005.pdf Accessed on 31/07/06 at 16h58

Kambil A, Mahidhar V, 2004: *Disarming the Value Killers – A Risk Management Study* http://www.deloitte.com/us/valuekillers Accessed on 8 April 2006

Kalita, Mitalil. 2004: Enterprise Wide Risk Management: Myth or Reality? Business Credit, Vol. 106 Issue 3: 22 - 23

Kleffner AE, Lee RB & McGannon B. 2003: The effect of Corporate Governance on the use of Enterprise Risk Management: Evidence from Canada. Risk Management and Insurance Review, Vol 6 Issue 1: 53 - 73

Kumba Resources. 2005: *Annual Report* http://www.kumba.co.za/contents/results/kumbaannualreport2005/pdf/Kumba%2 0A4%20AR%202005.pdf Accessed on 2006/07/31

Liberty Life. 2005: Annual Report

http://1.1.1.1/513076100/496185416T060727182810.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.libertylife.co.za/liberty/content/main/investorrelations/financialresults/financialreports/ar2005/pdfs/Liberty%20Group%20A_R.pdf Accessed on 2006/07/27

Massmart. 2005: *Annual Report* http://www.massmart.co.za/financials/annual_reports/massmart_ar05/pdf/massmart_ar05.pdf Accessed on 2006/07/31

Meiring W. 2006: EHOD: Insurance and Risk, Vodacom Group (Pty) Ltd. Personal interview. 17 August, Midrand.

Miller M. Schanfield A. 2005: A sustainable approach to ERM. *Internal Auditor*, April 2005: 79 – 83.

MottramT. 2006: Group Risk Officer, Group Five. Personal interview. 17 August, Rivonia.

MTN Group. 2005: Annual Report

http://1.1.1.1/516195404/512134936T060804152928.txt.binXMysM0dapplication /pdfXsysM0dhttp://annualreport.mtn.com/pdfs/full_report_web_print.pdf Accessed on 4/08/06 at 15h32

Mustek. 2003: Annual Report

http://1.1.1.1/495653652/496377544T060731173057.txt.binXMysM0dapplication /pdfXsysM0dhttp://www.mustek.co.za/images/Mustek%20comp.pdf Accessed on 2006/07/31

Paracon. 2005: Annual Report

http://1.1.1.1/523567172/511889424T060804153738.txt.binXMysM0dapplication/ pdfXsysM0dhttp://www.paracon.co.za/assets/attachments/AnnualReport2005.pdf Accessed on 2006/08/04

Pick 'n Pay. 2006: Annual Report

http://www.pnp.taps-

nodes.co.za/fin2006/downloads/FINAL%20PnP%20Complete%202006%20AR.pdf Accessed on 31/07/06 at 17h15

PPC. 2005: Annual Report

http://1.1.1.1/500015172/496191896T060727180413.txt.binXMysM0dapplication /pdfXsysM0dhttp://www.ppc.co.za/pdfs/annual2005/ppcfullreport2005.PDF Accessed 2006/07/27

PricewaterhouseCoopers. 2004: 8th Annual Global CEO Survey – Bold Ambitions, Careful Choices https://www.pwc.com/Extweb/insights.nsf/docid/48C44DA89CB0CC4185256F7 F0061C641/\$file/8thAnnualGlobalCEOSurvey.pdf Accessed on 2005/08/13

MBL3 RESEARCH REPORT — ANDRÉ HAVENGA — 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

REFERENCES

PricewaterhouseCoopers. 2005: Governance Risk and Compliance Series – Corporate Governance http://www.globalbestpractices.com
Accessed on 2006/09/24

Remgro. 2006: Annual Report

http://1.1.1.1/500015172/496191896T060727180818.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.remgro.com/financials/ar2006/Remgro_annualreport2006.pdf

Accessed 2006/07/27

SAPPI. 2005: Annual Report

http://1.1.1.1/510298932/496191896T060727173801.txt.binXMysM0dapplication/pdfXsysM0dhttp://sappi.investoreports.com/sappi_ar_2005/downloads/sappi_ar_2005_full.pdf

Accessed 2006/07/27

Sasol. 2005: Annual Report

http://1.1.1.1/497180740/501502608T060727172155.txt.binXMysM0dapplication/pdfXsysM0dhttp://sasol.quickreport.co.za/sasol_ar_2005/downloads/sasol_ar_2005_com.pdf

Accessed 2006/07/27

Segal S. 2006: Value based enterprise-wide risk management: The key to unlocking ERM potential. Corporate Finance Review, Vol 10 Issue 4: 16 - 26

Shaw J. 2005: ERM: Walking the walk on holistic risk. *Risk Management Magazine*, Vol. 52 Issue 9: 22 – 26, 28, 30.

Standard Bank. 2005: Annual Report

http://1.1.1.1/508996372/30442104T060727182317.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.standardbank.co.za/pdfs/investor/2005_sbsa_annual_report.pdf

Accessed 2006/07/27

Sun International. 2005: Annual Report http://www.quickreport.co.za/sun_ar_2005/downloads/sun_ar_2005.pdf Accessed on 2006/07/31

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

REFERENCES

Telkom. 2005: Annual Report

http://1.1.1.1/513348060/512509040T060804163011.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.telkom.co.za/pls/portal/docs/page/contents/minisites/ir/ar/telkom_ar_2005_full.pdf
Accessed on 2006/08/04

The Economist Intelligence Unit Limited and MMC Enterprise Risk Inc. 2001: Enterprise risk management implementing new solutions. New York: The Economist Intelligence Unit Limited and MMC Enterprise Risk Inc.,

Transnet. 2005: Annual Report

http://1.1.1.1/512178804/512509040T060804154559.txt.binXMysM0dapplication/pdfXsysM0dhttp://www.transnet.co.za/Documents/Annual_Report_2004_05.pdf Accessed on 2006/08/04

Vodacom. 2005: *Annual Report* http://www.vodacom.co.za/about/docs/Vodacom%20Group%20Annual%20Report%20Year%20End%202005.pdf Accessed on 2006/07/31

MBL3 RESEARCH REPORT – ANDRÉ HAVENGA – 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

APPENDICES

APPENDIX 1: QUANTITATIVE QUESTIONNAIRE TO ADDRESS RESEARCH PROBLEM

Introduction and background to research being conducted

The research question and phenomenon that is intended to be addressed by this research is: "What is the perceived importance and level of acceptance of ERM in the South African business environment, and what is the perceived value of ERM in South African organisations?"

The primary purpose of this research is therefore to determine the importance and acceptance of Enterprise Risk Management ("ERM"), and the value that it adds to business, as perceived by decision makers in the South African business environment.

Approach followed, and purpose of this questionnaire

This research being conducted is exploratory in nature. It is intended to more clearly describe the perceived value of enterprise-wide risk management within the South African business environment. Because of the qualitative nature of this research study, maximum benefit will be obtained through explorative discussion during the course of a qualitative interview on the topic of ERM.

In order however to provide a high level contextual understanding of the level of implementation and importance of ERM within your organisation, and at the same time your understanding of the value of ERM within your organisation, the attached quantitative questions have been developed. You are kindly requested to complete the attached questionnaire prior to the qualitative interview. This quantitative questionnaire is intended to provide informative answers on the following factors:

- The level of acceptance of ERM within your organisation;
- The level of implementation of ERM in your organisation;
- > Potential reasons for the implementation of ERM in your organisation
- > Identification of potential factors that describes the perceived value that ERM provides to your organisation.

The quantitative research questionnaire might be followed up by a qualitative interview with you, intended to further explore the perceived value of ERM in your organisation. Prompters during this interview would be the following questions:

- Who / what is the driving force behind ERM in your organisation?
- > What is the true value of ERM in your organisation, (Provide practical examples)?
- > What makes ERM a success in your organisation (Provide practical examples)?
- What has to happen within your organisation in order to consider ERM as a failure?

Question 1

Select one of the 5 statements below that best describe the acceptance of an				
enterprise-wide risk framework within your organisation:				
Concept of enterprise risk management is not well understood in my				
organisation.				
Risk management policies and guidelines are partially developed and in				
place for the management of hazards.				
Organisation-wide risk management framework is in place for hazard				
and uncertainty risks. A process to promote a risk culture is developed.				
Managers are trained in risk evaluation techniques and tools. Senior				
staff is conversant with risk management principles.				
The business risk management framework serves as a common				
language and focal point to view and manage risk as part of the				
business culture in the organisation.				

Question 2

Select one of the 5 statements below that best describe the commitment of senior					
management within your organisation towards enterprise-wide risk n	nanagement:				
Risk management is seen as an unnecessary expense.					
Risk management is viewed by Management as a compliance or control					
requirement resulting in varied or low support.					
Senior Management allocates contingency funds to deal with unforeseen					
events. The risk appetite within the organisation is not yet clarified.					
Major risks are identified, assessed, and addressed in strategic and					
business plans.					
Senior Management agrees on the intended operational state of risk					
management, see value in the process, and they recognise that they					
have an ongoing role in the process of risk management. They show					
support through resource commitment and messages sent within the					
organisation.					

Question 3

Select one of the 5 statements below that best describe status afforded to risk					
management within your organisation:					
No interest in establishing a risk management methodology or approach within					
the organisation. There is no champion for risk management within the					
organisation					
A risk management framework is developed for particular departments or					
business units within the organisation. The champion for risk management is a					
middle- management representative.					
No single entity-wide risk champion exists for all areas of risks. Different					
champions exist for different types of risks (e.g. operational, financial, hazard					
etc.)					
A process owner is established for the development and implementation of an					
enterprise-wide risk management framework.					
A Chief Risk Officer is established for the ongoing maintenance of the risk					
architecture. The CRO is at a senior level within the organisation and develops					
risk policies and institutes monitoring routines.					

Question 4

Select one of the 4 statements below that best describe the level of ownership of risk				
management within your organisation:				
Risks are dealt with in a reactive manner.				
Internal audit, insurance, legal and various functional lines are responsible for				
risk management within their areas or responsibility.				
Risk management is viewed as everyone's responsibility. However, still				
managed individually along functional lines				
The policy, design and framework for risk management are driven by the Board.				
Risk management controls are executed by the business units. ERM policy and				
governance are performed by a central authority (e.g. an enterprise risk				
management team)				

Question 5

Select one of the 5 statements below that best describe the status of ERM	
implementation within your organisation:	
No ERM framework in place, and no immediate plans to create and implement	
one.	
Currently investigating the concept of creating and implementing an ERM	
framework	
Planning to implement an ERM framework	
Partial implementation of an ERM framework	
Complete implementation of an ERM framework	

Question 6

Select one of the 5 statements below that best describe the level of risk management
communication and training within your organisation:
Risk communication is likely only after a loss in the company. No guidance or assistance
is given to prevent or mitigate risks. No formal training has been provided to date.
A Risk Management Manual is circulated to all staff detailing procedure to mitigate hazard
risk and uncertainty risks. Limited training has however been provided.
A formal risk awareness program has been established (e.g. ERM provides input into
company newsletters). Regular risk management briefings are provided to staff. The
value of risk management is clearly communicated to all.
Risk owners in business units are trained to provide periodic risk management briefings.
The enterprise-wide risk framework is clearly communicated to all.
All persons clearly understand risk management. Personnel embrace the risk
management concept. An effective risk management training and communication plan is
in place and adhered to.

Question 7

Select one of the 5 statements below that best describe the level of risk identification,					
assessment and measurement within your organisation:					
No formal risk identification and assessment is performed.					
Qualitative risk assessments are performed within functional departments only					
Risk identification and assessment is performed. Controls mitigating risks are identified.					
Residual risks are measured					
Business unit and organisational wide risks are measured and linked across the enterprise.					
The organisation capitalise on utilisation of technology for effective risk measurements.					
Organisational-wide risks are detailed and measured in terms of business impact and					
urgency. There is an integrated response to risks. Controls are measured in terms of their					
effectiveness. Organisation-wide integration of risk-adjusted performance takes place.					

Question 8

Select one of the 5 statements below that best describe the level of risk monitoring an	d
management oversight within your organisation:	
Monitoring by management is only performed through financial audits by Internal Audit	
within the organisation	
Controls are put in place by each business unit. Controls are only monitored if a loss	
occurs.	
Each business unit monitors the controls implemented within their own area of	
responsibility.	
Information on business risks is accumulated under one area of responsibility.	
Management's control of risk is centrally assessed.	
Risk management activities are monitored, aggregated and reported upwards to the board.	

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

Question 9

Record answers in order of priority on scale of 1 to 10 with 1 being the best description of the reason why ERM is implemented within **your** organisation:

Which of the following in order of priority are the reasons or driving forces behind the	Answer
adoption, or consideration, of an ERM approach within your organisation?	(1 – 10)
Compliance requirements (e.g. with JSE, and or King 2, and or Basel 2 guidelines, and or	
Sarbanes Oxley requirements, and or PFMA requirements)	
Concerns about Directors' and Officers' liability exposures	
Encouragement from the Board of Directors	
Competition or other industry-related pressures	
Pressure from a majority shareholder	
Stakeholder pressure	
The need to impress / satisfy potential investors	
Influence of or pressure from an international parent company	
Adoption of an enterprise risk management strategy by the firm	
Other (please record)	
>	
>	
>	
>	
>	

Question 10

Utilise the statements below that in you're opinion best describe the value of implementing ERM within your organisation.

No	Statements explaining the biggest value adding Level of agreement with statements					
	benefit or advantage to organisations for implementing Enterprise-wide Risk Management	Strongly agree		Neither agree nor disagree	Disagree	Strongly disagree
1	ERM assists with the achievement of ERM compliance requirements (e.g. with JSE, and or King 2, and or Basel 2 guidelines, and or Sarbanes Oxley requirements, and or PFMA requirements)					
2	The following benefits intended by COSO EWRM Framework is achieved:					
2.1	➤ ERM provides assistance with the achievement of high level goals, aligned with supporting the mission of the organisation					
2.2	> ERM assists with the effective and efficient use of resources within the organisation					
2.3	> ERM enhances reliability of reporting within the organisation					
2.4	ERM assists with compliance with applicable laws and regulations.					
3.	Intended value added by ERM in pursuit of an organisations objectives (as set out in COSO):					
3.1	ERM aligns the organisation's risk appetite / tolerance and strategy					
3.2	> ERM enhances the organisation's risk response decisions					
3.3	ERM reduces operational surprises and losses					
3.4	ERM provides assistance with the identification and management of multiple and cross enterprise risks					
3.5	> ERM assists organisation to pro-actively realise and seize opportunities					
3.6	➤ ERM assists with the deployment of capital					
4	Potential ERM benefits as identified through review of articles and publications:					
4.1	ERM supports the corporate governance process, which can increase the confidence of stakeholders and regulators.					
4.2	ERM helps control the overall costs of risk management by anchoring activities to key business strategies and aggregating risks across the enterprise. This facilitates effective response to the interrelated impacts, and integrated responses to multiple risks.					

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

No	Statements explaining the biggest value adding	Level of a	agreeme	nt with state	ments	
	benefit or advantage to organisations for	Strongly	Agree	Neither	Disagree	Strongly
	implementing Enterprise-wide Risk	agree	1 19. 5 5	agree	g	disagree
	Management	, and the second		nor		Ü
				disagree		
4.3	Through increased communication, ERM leads					
	to broader understanding and recognition of					
	risks throughout the organisation.					
4.4	Successful ERM implementation can reduce an					
	organisation's overall risk profile, which may					
	lower the cost of capital in the organisation.					
	ERM results in an increase in capital efficiency.					
4.5	An ERM approach seeks to strategically					
	consider the interactive effects of various risk					
	events with the goal of balancing an enterprise's					
	entire portfolio of risks to be within the					
4.0	stakeholders' appetite or tolerance for risk.		-			
4.6	ERM takes an enterprise-wide focus by strategically looking at risks in a coordinated,		1			
	consistent manner. ERM enables creating					
	synergies between different risk management					
	activities.		1			
4.7	Appropriate utilisation of ERM enhances internal					
	audit efforts during the planning and execution					
	phase of their service delivery.					
4.8	ERM provides expanded opportunities to					
	business due to better informed business					
	decisions. By considering a full range of					
	potential events, through application of ERM					
	principles, management is positioned to identify					
	and proactively realise opportunities.					
4.9	ERM assists with the reduction and or					
	minimising of possible financial losses that					
	might be encountered by the organisation.					
4.10	ERM enables improved strategic planning by		1			
	appropriate identification and ranking of risks					
	hampering the achievement of business					
	objectives, thereby not only identifying hazards and uncertainties, but also opportunities that		1			
	should be fed back to the strategic planning					
	process.		1			
4.11	A benefit of ERM is increasing earnings and					
	decreasing stock price volatility		1			
4.12	ERM reduces inefficiencies inherent in the					
	traditional risk management approach.		1			
4.13	ERM reduces the expected costs of external					
	capital and regulatory scrutiny.		1			
4.14	Appropriate application of ERM provides the					
	rigor to identify and select among alternative					
	risk responses - risk avoidance, reduction,					
	sharing, and acceptance.					
4.15	Appropriate ERM increases market confidence					
	as it is interpreted as high shareholder values,		1			
	(e.g. ethics and integrity), where markets trusts		1			
	the management team of these companies					

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

No	Statements explaining the biggest value adding	Level of agreement with statements							
	benefit or advantage to organisations for implementing Enterprise-wide Risk Management	Strongly agree	Agree	Neither agree nor disagree	Disagree	Strongly disagree			
4.16	Developing an urgent and convincing enterprise-wide philosophy towards ERM in a coordinated effort with all stakeholders, and consistently implementing this philosophy, is where the true value of ERM lies.								

APPENDIX 2: MEASUREMENT INSTRUMENT TO ADDRESS QUALIATATIVE RESEARCH

The purpose of the qualitative research questionnaire is to gather practical information in as far as reasonably possible addressing the question of how optimal value creation and success is obtained for organisations busy with implementing ERM, or done with the process. These questions were prepared to be used as prompters during the qualitative interview process if rehired:

- How long has ERM been implemented within your organisation?
- Why was ERM implemented?
- What is the organisational status / reporting line of ERM within your organisation (focus on reporting lines to the Board)?
- What is the size of your ERM function?
- Who / what was the driving force behind ERM?
- What is the true value of ERM in your organisation, (Provide practical examples)?
- What makes ERM a success in your organisation (Provide practical examples)?
- What has to happen within your organisation in order to consider ERM as a failure?

APPENDIX 3: TABLES CONTAINING RESULT OF QUANTITATIVE QUESTIONNAIRES SUBMITTED TO SELECTED ORGANISATIONS

Select <u>one</u> of the 5 statements below that best describe the acceptance of an enterprise-wide risk framework within your organisation:	BHP Billiton	Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
Concept of enterprise risk management is not well understood in my organisation.						
Risk management policies and guidelines are partially developed and in place for the management of hazards.						
Organisation-wide risk management framework is in place for hazard and uncertainty risks. A process to promote a risk culture is developed.			✓	√		
Managers are trained in risk evaluation techniques and tools. Senior staff is conversant with risk management principles.		✓				
The business risk management framework serves as a common language and focal point to view and manage risk as part of the business culture in the organisation.	√				✓	✓

Table 7: Level of acceptance of an ERM Framework within organisations representing the industries tested

Select <u>one</u> of the 5 statements below that best describe the commitment of senior management within your organisation towards enterprise-wide risk management:	BHP Billiton	Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
Risk management is seen as an unnecessary expense.						
Risk management is viewed by Management as a compliance or control requirement resulting in varied or low support.			✓			
Senior Management allocates contingency funds to deal with unforeseen events. The risk appetite within the organisation is not yet clarified.						
Major risks are identified, assessed, and addressed in strategic and business plans.		✓		✓		✓
Senior Management agrees on the intended operational state of risk management, see value in the process, and they recognise that they have an ongoing role in the process of risk management. They show support through resource commitment and messages sent within the organisation.	√				✓	

Table 8: Level of commitment to ERM within organisations representing the industries tested

Select <u>one</u> of the 5 statements below that best describe status afforded to risk management within your organisation:	BHP Billiton	Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
No interest in establishing a risk management methodology or approach within the organisation. There is no champion for risk management within the organisation						
A risk management framework is developed for particular departments or business units within the organisation. The champion for risk management is a middle- management representative.						
No single entity-wide risk champion exists for all areas of risks. Different champions exist for different types of risks (e.g. operational, financial, hazard etc.)						
A process owner is established for the development and implementation of an enterprise-wide risk management framework.	√			✓		
A Chief Risk Officer is established for the ongoing maintenance of the risk architecture. The CRO is at a senior level within the organisation and develops risk policies and institutes monitoring routines.		√	√		*	√

Table 9: Status afforded to ERM within organisations representing the industries tested

Select one of the 4 statements below that best describe the level of ownership of risk management within your organisation:		Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
Risks are dealt with in a reactive manner.						
Internal audit, insurance, legal and various functional lines are responsible for risk management within their areas or responsibility.						
Risk management is viewed as everyone's responsibility. However, still managed individually along functional lines				✓		
The policy, design and framework for risk management are driven by the Board. Risk management controls are executed by the business units. ERM policy and governance are performed by a central authority (e.g. an enterprise risk management team)	√	>	>		>	✓

Table 10: Level of ownership of ERM within organisations representing the industries tested

Select one of the 5 statements below that best describe the status of implementation of an ERM framework within your organisation:	BHP Billiton	Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
No ERM framework in place, and no immediate plans to create and implement one.						
Currently investigating the concept of creating and implementing an ERM framework						
Planning to implement an ERM framework						
Partial implementation of an ERM framework		✓	✓	✓		✓
Complete implementation of an ERM framework	√				✓	

Table 11: Level of implementation of an ERM Framework within organisations representing the industries tested

Select one of the 5 statements below that best describe the level of risk management communication and training within your organisation:	BHP Billiton	Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
Risk communication is likely only after a loss in the company. No guidance or assistance is given to prevent or mitigate risks. No formal training has been provided to date.				✓		
A Risk Management Manual is circulated to all staff detailing procedure to mitigate hazard risk and uncertainty risks. Limited training has however been provided.						
A formal risk awareness program has been established (e.g. ERM provides input into company newsletters). Regular risk management briefings are provided to staff. The value of risk management is clearly communicated to all.	√	✓				
Risk owners in business units are trained to provide periodic risk management briefings. The enterprise-wide risk framework is clearly communicated to all.			√		√	✓
All persons clearly understand risk management. Personnel embrace the risk management concept. An effective risk management training and communication plan is in place and adhered to.						

Table 12: Level of ERM communication and training within organisations representing the industries tested

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

Select one of the 5 statements below that best describe the level of risk identification, assessment and measurement within your organisation:		Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
No formal risk identification and assessment is performed.						
Qualitative risk assessments are performed within functional departments only						
Risk identification and assessment is performed. Controls mitigating risks are identified. Residual risks are measured			√		✓	
Business unit and organisational wide risks are measured and linked across the enterprise. The organisation capitalise on utilisation of technology for effective risk measurements.				√		√
Organisational-wide risks are detailed and measured in terms of business impact and urgency. There is an integrated response to risks. Controls are measured in terms of their effectiveness. Organisation-wide integration of risk-adjusted performance takes place.	✓	√				

Table 13: Level of risk identification, assessment and measurement within organisations representing the industries tested

Select one of the 5 statements below that best describe the level of risk monitoring and management oversight within your organisation:		Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom
Monitoring by management is only performed through financial audits by Internal Audit within the organisation						
Controls are put in place by each business unit. Controls are only monitored if a loss occurs.						
Each business unit monitors the controls implemented within their own area of responsibility.						
Information on business risks is accumulated under one area of responsibility. Management's control of risk is centrally assessed.		✓		√		
Risk management activities are monitored, aggregated and reported upwards to the board.	✓		✓		✓	√

Table 14: Level of risk monitoring and management oversight within organisations representing the industries tested

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

APPENDICES

Which of the following in order of priority are the reasons or driving forces behind the adoption, or consideration, of an ERM approach within <i>your organisation</i> ? (Score of 10 provides best description of driving force, and score of 1 the least best description)		Group Five	Liberty Life	Pick 'n Pay	Vodacom	Eskom	Total	Priority
Compliance requirements (e.g. with JSE, and or King 2, and or Basel 2 guidelines, and or Sarbanes Oxley requirements, and or PFMA requirements)		5	10	10	8	9	50	2
Concerns about Directors' and Officers' liability exposures		6		9	3	3	26	4
Encouragement from the Board of Directors	9	9	9	8	10	8	53	1
Competition or other industry-related pressures	6	8			2	6	22	5
Pressure from a majority shareholder	3	3			6	5	17	8
Stakeholder pressure	7	4			6	4	21	6
The need to impress / satisfy potential investors	2	7			4	7	20	7
Influence of or pressure from an international parent company		2	·		5		11	9
Adoption of an enterprise risk management strategy by the firm	10	10	8		9	10	47	3
Other: Good Governance					7		7	10

Table 15: Reasons or driving forces behind the adoption, or consideration, of an ERM approach within organisations representing the industries tested

No	Statements explaining the biggest		Level of ag	reement wit	h statements	3	Combined
	value adding benefit or advantage to organisations for implementing Enterprise-wide Risk Management	Strongly agree (2)	Agree (1)	Neither agree nor disagree (0)	Disagree (-1)	Strongly disagree (-2)	Score
1	ERM assists with the achievement of ERM compliance requirements (e.g. with JSE, and or King 2, and or Basel 2 guidelines, and or Sarbanes Oxley requirements, and or PFMA requirements)	2+2	1+1+1 +1				8
2	The following benefits intended by COSO EWRM Framework is achieved:						
2.1	➤ ERM provides assistance with the achievement of high level goals, aligned with supporting the mission of the organisation	2+2+2	1+1			-2	6
2.2	 ERM assists with the effective and efficient use of resources within the organisation 	2+2+2	1+1+1				9 (3 rd highest score)
2.3	> ERM enhances reliability of reporting within the organisation	2+2	1+1+1 +1				8
2.4	ERM assists with compliance with applicable laws and regulations.	2+2+2	1+1+1				9 (3 rd highest score)

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

No	Statements explaining the biggest		2	Combined			
NO	value adding benefit or advantage to	Strongly	Agree	reement wit Neither	Disagree	Strongly	Score
	organisations for implementing	agree	(1)	agree nor	(-1)	disagree	00010
	Enterprise-wide Risk Management	(2)	(1)	disagree	(-1)	(-2)	
	Enterprise wide Hisk Management	(2)		(0)		(2)	
3.	Intended value added by ERM in			(-)			
	pursuit of an organisations objectives						
	(as set out in COSO):						
3.1	> ERM aligns the organisation's risk	2+2	1+1+1				9
	appetite / tolerance and strategy		+1				(3 rd highest
							score)
3.2	> ERM enhances the organisation's	2+2+2	1+1+1				9
	risk response decisions						(3 rd highest
							score)
3.3	> ERM reduces operational surprises	2+2+2	1+1	0			8
	and losses						
3.4	> ERM provides assistance with the	2+2+2+2	1+1				10
	identification and management of						(2 nd highest
	multiple and cross enterprise risks						score)
3.5	> ERM assists organisation to pro-	2+2	1+1	0		-2	4
	actively realise and seize						
	opportunities						
3.6	> ERM assists with the deployment	2	1+1+1	0+0			5
	of capital						
4	Potential ERM benefits as identified						
	through review of articles and						
	publications:						
4.1	ERM supports the corporate	2+2+2+2	1+1				10
	governance process, which can						(2 nd highest
	increase the confidence of						score)
	stakeholders and regulators.						
4.2	ERM helps control the overall costs of	2+2	1+1+1				8
	risk management by anchoring		+1				
	activities to key business strategies						
	and aggregating risks across the						
	enterprise. This facilitates effective						
	response to the interrelated impacts,						
	and integrated responses to multiple						
1.0	risks.	0.0.0.0	_				4.4
4.3	Through increased communication,	2+2+2+2	+1				11
	ERM leads to broader understanding	+2					(highest
	and recognition of risks throughout						score)
1.4	the organisation.	0.0	4.4.4			0	E
4.4	Successful ERM implementation can	2+2	1+1+1			-2	5
	reduce an organisation's overall risk						
	profile, which may lower the cost of						
	capital in the organisation. ERM						
	results in an increase in capital efficiency.						
4.5		2,2,2	1+1	0			8
4.5		2+2+2	1+1	U			Ö
	strategically consider the interactive effects of various risk events with the						
	goal of balancing an enterprise's						
	entire portfolio of risks to be within the						
	stakeholders' appetite or tolerance for						
L	standificiers appetite of tolerance for						

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

No	Statements explaining the biggest	Level of agreement with statements					Combined
	value adding benefit or advantage to organisations for implementing Enterprise-wide Risk Management	Strongly agree (2)	Agree (1)	Neither agree nor disagree (0)	Disagree (-1)	Strongly disagree (-2)	Score
4.0	risk.	0.0.0	4.4.4				9
4.6	ERM takes an enterprise-wide focus by strategically looking at risks in a coordinated, consistent manner. ERM enables creating synergies between different risk management activities.	2+2+2	1+1+1				(3 rd highest score)
4.7	Appropriate utilisation of ERM enhances internal audit efforts during the planning and execution phase of their service delivery.	2+2+2	1	0+0			7
4.8	ERM provides expanded opportunities to business due to better informed business decisions. By considering a full range of potential events, through application of ERM principles, management is positioned to identify and proactively realise opportunities.	2+2+2	1	0		-2	5
4.9	ERM assists with the reduction and or minimising of possible financial losses that might be encountered by the organisation.	2+2+2+2	1	0			9 (3 rd highest score)
4.10	ERM enables improved strategic planning by appropriate identification and ranking of risks hampering the achievement of business objectives, thereby not only identifying hazards and uncertainties, but also opportunities that should be fed back to the strategic planning process.	2+2+2	1+1	0			8
4.11	A benefit of ERM is increasing earnings and decreasing stock price volatility		1+1	0+0	-1	-2	-1
4.12	ERM reduces inefficiencies inherent in the traditional risk management approach.	2	1+1	0+0	-1		3
4.13	ERM reduces the expected costs of external capital and regulatory scrutiny.		1	0+0+0+0		-2	-1
4.14	Appropriate application of ERM provides the rigor to identify and select among alternative risk responses – risk avoidance, reduction, sharing, and acceptance.	2+2+2	1+1	0			8
4.15	Appropriate ERM increases market confidence as it is interpreted as high shareholder values, (e.g. ethics and integrity), where markets trusts the management team of these companies	2+2+2	1+1	0			8

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

APPENDICES

No	Statements explaining the biggest value adding benefit or advantage to organisations for implementing Enterprise-wide Risk Management	Strongly agree (2)	_evel of ac Agree (1)	reement wit Neither agree nor disagree (0)	h statements Disagree (-1)	Strongly disagree (-2)	Combined Score
4.16	Developing an urgent and convincing enterprise-wide philosophy towards ERM in a coordinated effort with all stakeholders, and consistently implementing this philosophy, is where the true value of ERM lies.	2	1+1+1	0+0			5

Table 16: Statements explaining the biggest value adding benefit or advantage for implementing ERM within organisations representing the industries tested

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

APPENDICES

APPENDIX 4: COMBINED RESULTS OF DIFFERENT RESEARCH METHODS USED TO DETERMINE THE VALUE OF **ERM**

No	Statements explaining the biggest value	Type of Research Performed			
	adding benefit or advantage to organisations	Literature	Document	Quantitative	Qualitative
	for implementing Enterprise-wide Risk	Review	Review	Information	information
	Management			gathering	gathering
1	ERM assists with the achievement of ERM	√	✓		
	compliance requirements (e.g. with JSE, and	·	·		
	or King 2, and or Basel 2 guidelines, and or				
	Sarbanes Oxley requirements, and or PFMA				
	requirements)				
2	The following benefits intended by COSO				
	EWRM Framework is achieved:				
2.1	> ERM provides assistance with the	√	√		
	achievement of high level goals, aligned	·	·		
	with supporting the mission of the				
	organisation				
2.2	> ERM assists with the effective and	\checkmark		\checkmark	
	efficient use of resources within the				
	organisation				
2.3	> ERM enhances reliability of reporting	\checkmark			
	within the organisation				
2.4	> ERM assists with compliance with	\checkmark	\checkmark	\checkmark	
	applicable laws and regulations.				
3.	Intended value added by ERM in pursuit of				
	an organisations objectives (as set out in				
0.4	COSO):				
3.1	> ERM aligns the organisation's risk	\checkmark		\checkmark	
0.0	appetite / tolerance and strategy				
3.2	> ERM enhances the organisation's risk	✓		✓	
3.3	response decisions				
3.3	> ERM reduces operational surprises and	✓			
3.4	losses ➤ ERM provides assistance with the	/			
3.4	identification and management of multiple	\checkmark	✓	✓	✓
	and cross enterprise risks				
3.5	> ERM assists organisation to pro-actively				
3.5	realise and seize opportunities	✓			
3.6	> ERM assists with the deployment of				
3.0	capital	✓			
4	Potential ERM benefits as identified through				
-	review of articles and publications:				
4.1	ERM supports the corporate governance	-/	-/	-/	
'''	process, which can increase the confidence	¥	Y	Y	
	of stakeholders and regulators.				
4.2	ERM helps control the overall costs of risk	1			
1	management by anchoring activities to key	•			
	business strategies and aggregating risks				
	across the enterprise. This facilitates				
	effective response to the interrelated				
	impacts, and integrated responses to				
-		L	1		

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 Value of Enterprise Risk Management in South African Business Environment

APPENDICES

No	Statements explaining the biggest value				
	adding benefit or advantage to organisations	Literature	Document	Quantitative	Qualitative
	for implementing Enterprise-wide Risk	Review	Review	Information	information
	Management			gathering	gathering
	multiple risks.				
4.3	Through increased communication, ERM	\checkmark		✓	
	leads to broader understanding and				
	recognition of risks throughout the				
	organisation.				
4.4	Successful ERM implementation can reduce	\checkmark			
	an organisation's overall risk profile, which				
	may lower the cost of capital in the				
	organisation. ERM results in an increase in				
4.5	capital efficiency.				
4.5	An ERM approach seeks to strategically	✓			
	consider the interactive effects of various risk				
	events with the goal of balancing an				
	enterprise's entire portfolio of risks to be				
	within the stakeholders' appetite or tolerance for risk.				
4.6	ERM takes an enterprise-wide focus by		1		
4.0	strategically looking at risks in a coordinated,	✓		✓	
	consistent manner. ERM enables creating				
	synergies between different risk				
	management activities.				
4.7	Appropriate utilisation of ERM enhances	√			
	internal audit efforts during the planning and	•			
	execution phase of their service delivery.				
4.8	ERM provides expanded opportunities to	\checkmark			
	business due to better informed business				
	decisions. By considering a full range of				
	potential events, through application of ERM				
	principles, management is positioned to				
4.0	identify and proactively realise opportunities.				
4.9	ERM assists with the reduction and or	\checkmark		✓	✓
	minimising of possible financial losses that				
4.10	might be encountered by the organisation.				
4.10	ERM enables improved strategic planning by	✓			
	appropriate identification and ranking of risks hampering the achievement of business				
	l				
	objectives, thereby not only identifying hazards and uncertainties, but also				
	opportunities that should be fed back to the				
	strategic planning process.				
4.11	A benefit of ERM is increasing earnings and	√			
	decreasing stock price volatility	v			
4.12	ERM reduces inefficiencies inherent in the	√			
	traditional risk management approach.	•			
4.13	ERM reduces the expected costs of external	√			
	capital and regulatory scrutiny.	•			
4.14	Appropriate application of ERM provides the	√			
	rigor to identify and select among alternative	•			
	risk responses - risk avoidance, reduction,				
	sharing, and acceptance.				
4.15	Appropriate ERM increases market	\checkmark			

MBL3 RESEARCH REPORT - ANDRÉ HAVENGA - 7050-545-4 VALUE OF ENTERPRISE RISK MANAGEMENT IN SOUTH AFRICAN BUSINESS ENVIRONMENT

APPENDICES

No	Statements explaining the biggest value	Type of Research Performed				
	adding benefit or advantage to organisations for implementing Enterprise-wide Risk	Literature Review	Document Review	Quantitative Information	Qualitative information	
	Management Enterprise wide Trisk	1 IOVIOW	1 IEVIEW	gathering	gathering	
	confidence as it is interpreted as high shareholder values, (e.g. ethics and integrity), where markets trusts the management team of these companies					
4.16	Developing an urgent and convincing enterprise-wide philosophy towards ERM in a coordinated effort with all stakeholders, and consistently implementing this philosophy, is where the true value of ERM lies.	√				

Table 17: Combined results of different research methods used to determine the value of ERM