# AUDIT RISK ASSESSMENT AND DETECTION OF MISSTATEMENT IN ANNUAL REPORTS FOR AUDIT FIRMS REGISTERED BY RAB IN NAIROBI COUNTY, KENYA

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EGERTON UNIVERSITY.

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# DECLARATION AND APPROVAL

# **DECLARATION**

T	his	Research	Project	is n	ny o	wn	original	work	and	has	not	been	presented	for	any	Degree
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#### **DEDICATION**

This paper is dedicated to my dad, Mr. Barrack Okeyo and my mum, Mrs. Domtila Aoko who have been a source of inspiration and support in the course of my studies, and to my sister Nereah Adhiambo for her financial support and inspiration.



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#### **ABSTRACT**

Audit risk examines the relevant assertions related to balances, classes of transactions, or disclosures contained in misstatements that could be material to the financial statements when aggregated with misstatements in other balances, classes, or disclosures and the risk that the auditor will not detect such misstatements. With the collapse of Enron involving the misstatement of one of the Big 4, Arthur Andersen & Co. in the US and the CMC and Uchumi scandals in Kenya involving the big audit firms Delloitte and PwC, the argument for audits for big audit firms as synonymous with detection of misstatement has become questionable. Despite several studies having been done on overall misstatement risk none of them has addressed pervasive audit risk. The general objective of the study was to examine audit risk assessment and detection of misstatement in annual reports in audit firms registered by RAB in Nairobi County. The study evaluated four audit risk assessment i.e. inherent risk, control risk, engagement risk and detection risk against detection of misstatement. The study adopted a descriptive research design and targeted all the registered audit firms by RAB in Nairobi county.the study employed systematic random sampling and had a sample of 254 firms. Data was collected from primary sources which involved a well structured questionnaire with an average reliability of 0.86. The data collected from the questionnaire was analyzed using SPSS and a regression model so as to establish whether the application of audit risk models statistically and significantly affects the detection of misstatement in financial statements. t-statistic was used to determine the significance level wherby the null hypothesis was rejected if it's less then 0.05. A total of 254 questionnaires were administered and 155 were satisfactorily filled and considered for analysis, this formed 78%. The results revealed that the application of audit risk models statistically and significantly affects the detection of misstatement in financial statements. All the four risks tested had a t-test of less than 0.05, thus all the four null hypotheses were rejected. Hence the study concludes that audit risk model reduces the level of fraudulent financial reporting through detection of misstatement in audit practice and relevant recommendations were provided that would enhance the application of audit risk assessment in the audit of financial statement.

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#### LIST OF ABBREVIATIONS

**AICPA** American Institute of Certified Public Accountants

**AR** Audit risk

**CR** Control risk

**DR** Detection risk

**ER** Engagement risk

**GAAPS** Generally accepted accounting principles

IR Inherent risk

**ISA** International Standard on Auditing

IAASB International Audit and Assurance Standards Board

**IRBA** Independent Regulatory Board of Auditors

**PCAOB** Public Company Accounting Oversight Board

**SAP** Statement of Audit Procedure

SAS Statement on Auditing Standards

**RAB** Registration of accountant board

#### **CHAPTER ONE:**

#### INTRODUCTION

# 1.1 Background of the Study

The auditing profession is one of uncertainty and high level of business, financial and litigation risk and with the collapse of corporations such as Enron, Tyco international, World com, Global crossing, BCCI, there has been more stringent process to ensure that auditors excise due professional care and skill when performing audit assignment. Therefore, the requirement for professional judgment in assessing risk in this uncertain environment is a prerogative to the auditor, therefore, many studies have been suspicious of auditor's professional judgmental ability to distinguish audit evidence and proper response to audit risk (Weustemann, 2004).

The term audit risk is defined by IAASB (2006) as the risk that the auditor expresses an inappropriate audit opinion when the financial statement are materially misstated. Audit risk is a function of material misstatement and detection risk. In the financial context, audit risk is adopted where the term audit risk refers to the probability of the statements not giving a true and fair view after the audit is completed. Just what is true and fair view, this term has been subject to varying interpretations; it means a high, although not absolute, level of audit assurance. The goal of an audit is to form and express an opinion, on whether the financial statement give a true and fair view as a result audit risk is the possibility of a material misstatement remaining undetected even after audit is completed. Such risks can be perceived from the point of management, as well as that of the auditor. From the preceding working definitions, it can be deduced that audit risk is assessed as a function of three variables: the probability that there is threat, the probability that there are any vulnerabilities, the impact to the business (Blay, et.al., 2003).

There is currently a plethora and growing body of literature that seeks to examine the nature of audit risk assessment and detection of misstatement in financial statement (Bronson et al., (2008); (Bhinmani et al., 2009). The audit risk model provides the framework for risk assessment. The auditor follows risk assessment process to identify the risk of material misstatements in the annual reports of organizations Gupta, (2005), the risk of material

misstatement is made up of two components of the audit risk model: inherent risk and control risk. The risk of material misstatement is used to ascertain the acceptable level of risk detection and to plan the audit procedure. According to Austin et al (2002), an assumption underlying risk-based audit is that the presence of certain types of risk factors is indicative of possible misstatement in the clients' annual reports, therefore the auditor needs to asses the risk that are likely to provide material misstatement, and then conduct audit procedures based on this assessment to ascertain the existence of misstatements (Dobler, 2003). It is on the basis of this assertion that the auditors' attempts to examine audit risk assessment and the detection of misstatement in financial statements.

In Kenya, Deloitte after assessing CMC motors financial reports fails to recognize losses from CMC assets that were damaged, failing to disclose the auto firm's subsidiary in South Sudan in the annual reports, abetting the booking of undelivered vehicle sales as revenues and not capturing interest payments for cars sold on credit (Kamau et al. 2012). A final report on CMC's operations by the regulator CMA for the 2009 and 2010 released revealed that directors and management signed misleading financial statements, the accounts were not prepared in compliance with the International Financial Reporting Standards, consequently putting the firm on a precarious business model. Such evidence has raised questions concerning the extent to which audit firms participate in failing to detect misstatement and whether shareholders rights are protected moving forward to avoid recurrences. The Deloite saga marked the second time one of the Big Four audit firms in Kenya was being put on the spotlight over the detection of misstatement of its audit reports after the investigation of PwC in the wake of Uchumi Supermarket's near-collapse in 2006. These latest CMC developments turned the spotlight on the auditors' responsibility in failing to detect the alleged inflation of invoices and diversion of funds from the company by its directors which greatly impacts on the audit risk in detection of misstatement.

The audit of financial statement consists of evaluating the quality of assertion versus specific criteria which in the end result in auditor's opinion on the reliability of the financial statement (Amerongen 2007). The auditors provide reasonable assurance that the financial statements under audit are free from material misstatement. The auditors' opinion on the reliability of the financial statement can be affected from misstatement of errors and fraud. Therefore an effective and efficient audit requires proper assessment of risk and proper allocation of effort

subsequent to risk assessment (Blay, et.al., 2003). Bell et al (2005) stated that the relevance of risk assessment in auditing continues to be emphasized in literature as evidenced by issuance of new risk assessment standards. These standards suggest that financial statement audit is a recursive process in which auditors make risk assessment related to various management assertions based on evidence. Thus the audit team must plan, collect and evaluate audit evidence in response to assessed risks and aggregate the evidence to form an opinion regarding the fair presentation of financial statements (Dechow et al, 2011).

It is therefore necessary for the auditor to ascertain and assess the nature of risk in the accounting records before giving an audit opinion. The level of uncertainty and risk in the audit environment influences audit strategy establishment and an audit plan that provides reasonable assurance of detecting misstatement in corporate financial statement (Asare and Wright, 2002). Monroe and Ng (2000) view auditors risk assessment process as a belief revision task, with prior year assessment serving as a starting point.

According to Eilifsen and Messier (2000), research findings on the association between auditors' assessments of audit risk to detected misstatements are mixed. Kizirian and Sneathen (2003) documented a strong association between overall misstatement risk and the three characteristics of audit evidence using audit file data. However, they did not address pervasive audit risks. Bedard and Johnstone (2004) documents that auditors increase their engagement efforts and billing rates for clients when corporate governance is weak and when earnings manipulation risk is relatively high. Elder et al (2009) find that auditors are more likely to issue modified opinions for firms with internal control weakness. Jaffar (2009) study on fraud detection: moderating role of fraud risk level reveals that the contextual of fraud risk level has a significant effect on the relationship between the external auditors' ability to assess fraud risk and their ability to detect the likelihood of fraud. Mock and Turner (2005) study found that extent, staffing, and nature of audit tests are associated with risk and overall risk assessments. De Martins (2005) found evidence that client business and strategic risks Affect audit production outcomes such as aggregate audit hours, disaggregate audit hours and audit fees. Ruhnke, Buszac and Schmidt (2011) study on detecting misstatements in financial statements revealed that a number factors influencing inherent and control risk have significant impact on the number and size of audit adjustments. Therefore, Lemon et al (2000) stated that many audit firms that once employed separate risk assessment now use combine risk assessment.

#### 1.2 Statement of the Problem

According to Austin et al (2002), an assumption underlying risk-based audit is that the presence of certain types of risk factors is indicative of possible misstatement in the clients' annual reports, therefore the auditor needs to assess the risk that are likely to provide material misstatement, and then conduct audit procedures based on this assessment to ascertain the existence of misstatements (Dobler, 2003). It is on the basis of this assertion that the auditors' attempts to examine audit risk assessment and the detection of misstatement in financial statements.

After the case of CMC whereby the external auditor (Deloitte) was accused of misstating the auto dealer accounts, thereby inflating its earnings, there has been a significant effort to improve misstatement detection and prevention in Kenya. The new standards on auditing have been reviewed and improved with emphasis being the use of assertion to link the risks, controls and audit procedures. A resulting benefit being the Auditor will have a better basis for determining the nature, timing and extent of further procedures and assessing potential fraud risk

Several studies have been carried out on audit risk for instance Eilifsen and Messier (2000), research findings on the association between auditors' assessments of audit risk to detected misstatements are mixed. Kizirian and Sneathen (2003) documented a strong association between overall misstatement risk and the three characteristics of audit evidence using audit file data. However, they did not address pervasive audit risks. This study therefore sought to address this knowledge gap by assessing audit risk assessment and detection of misstatement in annual reports in firms registered by RAB in Nairobi County, Kenya.

## 1.3 Objectives of the Study

The general objective of the study was to examine the relationship between audit risk assessment and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

## 1.3.1 Specific objectives.

- To establish the relationship between auditors' assessment of inherent risk factors and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.
- To determine the effect of auditors' assessment of control risk factors on detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya
- iii. To evaluate the effect of auditors' assessment of engagement risk on detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya
- iv. To find out the impact of auditors' assessment of detection risk on detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.
- v. To examine the overall relationship between audit risk assessment and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

# 1.4 Research hypotheses

Ho1: There is no significant relationship between inherent risk factors and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

Ho2: There is no significant relationship between control risk factors and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

Ho3: There is no significant relationship between engagement risk factors and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

Ho4: There is no significant association between detection risk factors and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

Ho5: There is no significant relationship between auditors risk assessment and detection of misstatement in annual reports for audit firms registered by RAB in Nairobi County, Kenya.

## 1.5 Significance of the study

This study provides an insight to auditors to asses risk as a basis of designing an audit plan that provides reasonable assurances of detecting misstatement in corporate financial institutions.

# 1.6 Justification of the study

The study results may be useful for proper planning and decision-making in corporate financial institutions and manufacturing and allied sector in improving effective performance of external audit in this institutions and most importantly achieving the objectives of detecting misstatements in annual reports. The Registration accounting Board may use the study results in policy issues that may be aimed at improving effectiveness of both internal and external audit which would ensure proper performance of the audit function which is detection of misstatements in annual reports. The internal audit function may use the results of the study in providing appropriate services to corporate institutions, hence promoting effectiveness in management of the institutions resources and effective decision making.

Audit risk assessment, according to best practices provides assurance that business risks are identified, evaluated and treated in a consistent and continuous way. The system of internal controls and the ongoing management monitoring activities over internal controls are well designed and operate effectively, efficiently and economically in managing those risks according to directions provided (or approved) by the management or board of directors. This ensures the timeliness of audit assignments and audit reports and proper use and allocation of resources to audit assignments.

Furthermore, this study was significant because it allows for identification of the concept and framework of Audit risk assessment factors that takes into account the nature of work and environment of the External audit in corporate institutions. The study findings also generated awareness in Audit firms on the importance of having adopted Audit risk assessment as a vehicle to effective performance of Audit function through detection of misstatemebnts in annual reports. The findings of this study added to knowledge and understanding of the subject of Audit risk assessment and its application by audit firms. The study forms a basis for further research on how to enhance effective performance of not only External audit in audit

firms but other institutions such as the government. This leads to the generation of new ideas for the better and more efficient management of public resources in Kenya and globally.

# 1.7 Scope and delimitation of the study

The scope of the study consisted of all audit firms Registered by Registration accounting Board (RAB) In Nairobi County. We have a total of 736 registered audit firms in Nairobi. The study sought information from External auditors because they were in better position to give accurate information to be relied on by the researcher. The study focused on the current system of regionalization of Nairobi County.

At the time of the research, the respondents were busy and others did not understand the questionnaire, however the researcher mitigated this through drop and pick and also made a follow up via phone calls.

# 1.8 Limitation of the study.

The information collected will be a representative of the sample size and therefore cannot be used to generalize the entire population. A variety of issues impacted on the study. Some External auditors were unwilling to fill in the questionnaires without giving any reasons. The researcher, therefore, took the necessary steps and measures to ensure that clear communication was made on the purpose of the study and assured the respondents of confidentiality of the use of information provided. Time was a challenge given that most of the target respondents had very busy schedules, and did not have time to complete the questionnaires. Consequently, the researcher carefully planned and scheduled activities so that the study was accomplished within the specified period. Confirmation of availability (bookings) ensured that time was not wasted in tracking down respondents.

# 1.9 Assumptions of the Study

It was assumed that the respondents would give their frank feelings to the questions posed to them.

## 1.10 Operational definition of terms

**Assertions**: these are representations, by management, explicit or otherwise, that are embodied in the financial statements, as used by the auditor to consider the different types of potential misstatement that may occur.

**Audit risk:** is the risk that the auditor expresses an inappropriate audit opinion when the financial statements are materially misstated. Audit risk is a function of the risk of material misstatement (i.e. the risk that the financial statements are materially misstated prior to audit) and the risk that the auditor will not detect such misstatement ("detection risk")

**Control risk:** is the risk that a misstatement could occur in an assertion and that could be Material, individually or when aggregated with other misstatements, will not be prevented or detected and corrected on a timely basis by the entity's internal control.

**Detection risk:** is the risk that the auditor's procedures will not detect a misstatement that Exists in an assertion that could be material or when aggregated with other misstatements

**Engagement risk:** represents the overall risk associated with an audit engagement. Engagement risk consists of three components: client's business risk (also referred to as Entity's business risk), audit risk and auditor's business risk.

**Inherent risk:** is the susceptibility of an assertion to a misstatement that could be material, individually or when aggregated with other misstatements, assuming that there were no related internal controls.

**Material**: Information is material if its omission or misstatement could influence the economic decisions of users taken on the basis of the financial statements. Materiality depends on the size of the item or error judged in the particular circumstances of its omission or misstatement. Thus, materiality provides a threshold or cutoff point rather than being a primary qualitative characteristic which information must have if it is to be useful

**Misstatement:** A difference between the amounts, classification, presentation, or disclosure of a reported financial statement item and the amount, classification, presentation, or disclosure that is required for the item to be in accordance with the applicable financial reporting framework. A misstatement represents a difference and this difference has different characteristics

#### **CHAPTER TWO:**

#### LITERATURE REVIEW

#### 2.1 Introduction

This chapter examines the literature to develop a framework for this study. It is organized under the following subheadings: annual reports, detection of misstatements, and audit risk assessment, finally this chapter gives a summary and highlights gaps and issues raised and reviewed as well as the conceptual framework of the study.

# 2.2 Annual reports.

There has been a recent burgeoning of literature on annual reports (ARs), from research articles dealing with them from several perspectives (Lord, 2002). This may be because the international market regulations demand companies to present a standardized statement (annual report) of the operation performed during a year, to inform their shareholders and potential investors. The AR is often a long, fairly complicated public piece of disclosure, and developed by different people with diverse responsibilities in the firm. However, a general common content is included when presenting results Plung & Montgomery, (2004) and some countries have organizations regulating its writing e.g. securities and exchange commission (SEC) in the US. Annual reports are the umbrella of financial statements. Financial statement preparation in a company is usually done by internal accountants, the users of financial statements may make certain decisions, based on the information they get, so the fraud possibility implies a risk for financial statements users to make wrong decisions.

Law (2001) took an empirical approach to assessing the usefulness of the annual report as a mechanism of accountability. She analyzed the annual report of Chief Constable for 22 years and found out that for the annual report to be the principal means by which an authority is held to account, it must contain improved measures of performance. Earlier in 1991, Daniels and Daniels surveyed three user groups to find out what they wanted in financial reports. Their study showed that the inclusion of performance information (five or ten year trend) was desirable and would shed more light on the performance of public sector organizations.

Ryan and Ng (2000) also echoed this view when they used the content analysis technique to analyze 18 government agencies annual report. Their study revealed that the disclosure for

accountability in terms of evidence of reporting to stakeholders on performance purposes appeared to be lacking. The above results were also supported by Tooley *et al.* (2010) when they verified that performance information apart from financial statements was of more importance. Stecollini (2004) studied the annual reports of Italian local governments by using a checklist developed on the basis of literature on disclosure and accountability indices. Later, Herawaty and Hoque (2007) extended their study to include federal government and analyzed the annual report of 56 government departments using the content analysis technique and a disclosure index. Their study revealed that there were lower levels of mandatory disclosures than voluntary.

Mack and Ryan (2007) also studied local government departments but extended their study to include government-owned corporations. In their study, a survey instrument was used to find out the actual users of annual report and their information needs. They found out that the annual report was not the most important source of information. Tooley and Hooks (2009) analyzed the annual report of 37 schools in Queensland. In their study, they found that the annual report though useful, had an overemphasized role as a source of information in discharging accountability. They also found that accountability may be discharged more effectively through other media other than the annual report since respondents relied on alternative media such as newsletters and other forms of discussions and interviews.

#### 2.3 Audit risk

The concept of "risk" in the risk-process audit approach is called "risk of material misstatement". The concept of "risk of material misstatement" is not defined in the IAASB Glossary of Terms (2007). Risk of material misstatement is referred to in IAAS, ISA 200 (2006), stating that IAASB, ISA 200, (2006): Audit risk is a function of the risk of material misstatement of the financial statements (or simply, the "risk of material misstatement" i.e. the risk that the financial statements are materially misstated prior to audit) and the risk that the auditor will not detect such misstatement ("detection risk"). According to the above extract, the concept of "risk of material misstatement" is incorporated into the events' structure or decomposition of the concept of "audit risk" that is defined as follows IAASB/IRBA ISA 200 (2007) and IAASB Glossary of terms, 2007): The risk that the auditor expresses an inappropriate audit opinion when the financial statements are materially

misstated is known as 'audit risk'. (This definition of audit risk does not include the risk that the auditor might erroneously express an opinion that the financial statements are materially misstated.)

This creates the impression that the risk-process audit approach is in essence, an adaptation of the inherent risk audit approach. This impression in regard to the definition of "risk of material misstatement" is contradicted in the following instances: First, the decomposition of risk of material misstatement in inherent risk and control risk is mentioned in the Glossary of Terms (2007) as follows: The risk of material misstatement has two components: inherent risk and control risk. Inherent risk is the susceptibility of an assertion to a misstatement that could be material, individually or when aggregated with other misstatements assuming that there were no related internal controls. Control risk is the risk that a misstatement could occur in an assertion and that could be material, individually or when aggregated with other misstatements, will not be prevented or detected and corrected on a timely basis by the entity's internal control.

The concept of "risk of material misstatement" decomposition into inherent risk and control risk is "described at the assertion level", with no explanation given of the definition of the concept of "risk of material misstatement" at the financial statement level or overall level. This therefore, supposedly excludes an assessment of audit risk on the overall level, one of the initial benefits of the audit risk model. This perhaps is confirmed by the fact that the following assessment criteria in IAASB/IRBA ISA 300R (2004) were removed from IAASB/IRBA ISA 300R (2006) and ISA 315R (2006): "The auditor shall develop an audit plan for the audit in order to reduce audit risk to an acceptably low level." Secondly, this decomposition is nullified by the explanation in IAASB/IRBA ISA 200 (2006) that states: The ISAs do not ordinarily refer to inherent risk and control risk separately, but rather to a combined assessment of the 'risk of material misstatement'. Although the ISAs ordinarily describe a combined assessment of the risk of material misstatement, the auditor may make separate or combined assessments of inherent and control risk depending on the preferred audit techniques or methodologies and practical considerations.

Thirdly, risk of material misstatement also includes risk of material misstatement due to fraud and error that are identified and assessed according to the characteristics of fraud. Fraud risks were not incorporated in the definition of audit risk that decomposes into inherent risk,

control risk and detection risk. Fourthly, reference is made in IAASB/IRBA ISA 200 (2006) to the fact that risk of material misstatement is closely related to the business risks of the entity, a different perspective on the concept of "risks of material misstatement" than the decomposition into inherent risk and control risk. The interpretation of IAASB/IRBA ISA 200 (2006) stated hereafter, indicates that inherent risks and control risks are controlled by the entity: "Inherent risk and control risk are the entity's risks; they exist independently of the audit of the financial statements."

It can be construed that "risk of material misstatement" has evolved into a new concept that has no relation to the initial understanding of the events structure in the inherent risk audit approach. (Jackson and Stent 2007), (Rittenberg, et al. 2008), attempted to explain the relationship between risk of material misstatement and audit risk, emphasizing that audit risk and risk of material misstatement are two separate concepts: What is the link between IAASB/IRBA ISA 315R (2006) (the concept of "risk of material misstatement") and audit risk? It is simply that if the auditor fails to identify the factors which give rise to the risk of material misstatement and respond to them, audit risk (the risk of expressing an inappropriate opinion) increases. Furthermore, if the auditor does not understand the entity and its environment he or she is far more likely to fail in identifying potential risk, and audit risk is increased.

The concept of "risk of material misstatement" is perhaps a broader concept than only a revision of the audit risk formula of "audit risk= inherent risk x control risk x detection risk" as suggested by the IAASB/IRBA Glossary of Terms (2007). This concept of "risk of material misstatement" is not clearly defined and described. It is suggested that this was done intentionally by the standard setters, to accommodate the view of the IAASB, in IAASB/IRBA ISA 200 (2006), stating that: "The need for the auditor to make appropriate risk assessments (identify and assess risks) is more important than the different approaches by which they may be made." The concept of "risk of material misstatement" was therefore structured in such a way that it could include both the inherent risk audit approach, the business risk audit approach or for that matter, another approach. This concept of "risk" that could describe the criteria used in the performance of the task of identification of risks and is the guide auditors could follow in performing the task, is in essence, a choice in which the auditor has the freedom to choose an approach.

#### 2.3.1 Inherent risk

Inherent risk relates to the "susceptibility of an assertion to a material misstatement assuming that there are no related controls" (Konrath, 1999). This concept of inherent risk is, according to Arens and Loebbecke (2000), one of the most important concepts in auditing. Graham ((1985) confirms this, stating: "By itself, inherent risk assessments often provide limited audit comfort, but it is an important aspect of the design of an effective and efficient audit." Arens and Loebbecke (2000) further explained the concept of inherent risk as follows: "It implies that auditors should attempt to predict where misstatements are most and least likely to occur in the financial statement segments." In an attempt to predict the above-mentioned, it should be kept in mind that inherent risk refers to all misstatements, including misstatements that are prevented, detected and corrected by the system of internal control. Inherent risk encompasses, therefore, the risk that all possible forms of errors and fraud could occur. To compile a list of risks of all possible forms of errors and fraud for every client is clearly an inefficient approach.

Furthermore, as explained by Graham (1985), this concept of inherent risk is: "more conceptual than practical because it is difficult to assess what errors would be introduced into the system in a hypothetical situation where controls are not present." The implication of ignoring the system of internal control presented a concept of which the ambit was broader than initially anticipated. To resolve the problem, standard setters allowed, according to Graham (1985), that: "If however the process of thinking about and documenting the inherent risk factors is just too taxing or uneconomical, SAS 47 advises us simply to audit as though inherent risk were at the maximum." The assessment of inherent risk, in contrast to setting inherent risk at the maximum level across all audit assertions or balances, presented the opportunity to perform a more efficient audit; an opportunity that auditors took because of the competitive advantage presented by cost-effectively Graham, (1985). Although many audit firms initially chose to ignore the assessment of inherent risk, others decided to interpret and implement the evaluation of inherent risk. During assessment of inherent risk, auditors realized that inherent risk is a broad concept, even broader than the initial understanding of it.

Descriptions of inherent risk in the academic and professional literature varied considerably and addressed different aspects and perspectives simultaneously. In order to describe the concept of inherent risk the three facets of inherent risk that were commonly addressed in the literature were identified. These three facets of inherent risk are considered hereafter. Firstly,

inherent risks in the literature are sorted, organized or classified in different categories that will be discussed in this part of the study. Secondly, the process of identification of inherent risks was an essential part of the planning phase of the auditor, and this resulted in specific processes that were developed to identify these risks.

Thirdly, risk indicators were listed in the literature to assist auditors in the identification of inherent risks. The different categories of inherent risks, processes used for identification of inherent risk, and risk indicators formed the foundation of the different facets of inherent risk. In the study, the three facets of inherent risk are investigated in more depth. The first facet of the concept of inherent risk is explained by Graham (1985) by categorizing inherent risk; firstly into inherent risk characteristics; and secondly, in inherent risk conditions. Graham (1985) described inherent risk characteristics as follows: "Some aspects of inherent risk are peculiar to the specific transaction or account, that is, they are characteristic of the transaction or account."

# 2.3.2 Control risk

The assessment of control risk consists of two elements. Firstly, a consideration of the control design strength of the system of internal control, that consists of an evaluation of the systems design; and secondly, an assessment of the functioning of the system of internal control that is described as the "risk of over reliance on internal control" or test strength (Libby, et al. 1985). Control risk could easily be misunderstood as Senetti (1990) describes in the following example that focuses on the misunderstanding of the concept of control risk: In addition, the SAS 39/47 model and others for example Aldersley (1989) used the term control risk in place of internal control reliance risk, thus confusing the risk of the financial system with the auditor's risk of correctly assessing and testing that system.

The above confusion was addressed in the changes that were made to audit standards, called the expectation standards, in 1988. The changes made to SAS 55 (AICPA, 1988) are explained by Morton and Felix (1991) as follows: First it requires the auditor to assess control risk in relation to financial statement assertions. Second it eliminates a concept that has been viewed by some as a source of misinterpretation by auditors, that of 'reliance'. In essence the shift from reliance to risk is a shift from how reliable a control might be to how great the risk that a control will not work is. Furthermore, as explained by Morton and Felix (1991): It would seem, then, that if confusion and misinterpretation of concepts provided at

least some of the motivation for change, great care would be taken to define and illustrate new concepts in as precise and consistent a manner as possible. Unfortunately, this does not appear to be the case. Rather, it appears that possibly confusing concepts are being replaced with concepts which may be even more confusing, contradictory and ill-defined.

Haskins and Dirsmith (1995) explained that: Given the public pressure brought to bear at the time, and the fact that there were some serious questions as to whether or not the existing internal control standards were appropriately includable in the 'Expectations Gap' project, it may be that SAS No. 55 represented more of a symbolic statement of service ideal rather than as an actual aid for audit practice. If this is true, the question arises as to what sorts of untenable or tenable positions practitioners are being placed in when they seek conceptual and practical guidance from this standard and find it lacking. Morton and Felix (1991) then explained these "possibly confusing concepts" starting with the "first and most critical problem" they identified; namely, the inconsistent use of the term "control risk assessment". Morton and Felix (1991) for example, referred to SAS 55, (AICPA, 1988) that states that control risk may be assessed at the maximum level in the case of an inefficient control environment or system of internal control, mentioning that: Does this mean that the auditor believes that the risk of material misstatement getting through the entity's internal control structure is 100 percent? We think not. An assigned value based on cost efficiency criteria may have little to do with the auditor's belief.

Morton and Felix (1991) stated that the above dilemma occurred because of the following: The interpretational difficulties described above arise largely from an attempt to combine both auditor belief about control risk, in the SAS 47 sense, and an assessment of evidence sufficiency into one 'control risk assessment', where the relative weights of each component may vary widely across audits. Morton and Felix (1991) emphasize that if an audit standard explicitly discusses and mandates the use of the audit risk model, the theoretical basis for the audit risk model should be sound and reasonably specific, which seems not to be the case. Therefore, they suggest considering the following aspects when applying the audit risk model: (Morton & Felix, 1991) It follows from this discussion that evidence provided by tests of controls does not ordinarily change the auditor's assessment of control risk unless such evidence is less favourable than expected. It should also be clear from the above discussion that SAS 55 contains no logical basis for reducing the auditor's assessment of control risk based on test of controls evidence. The auditor may feel that an upward adjustment is

warranted based on contradictory or unexpected findings, but to reduce the control risk assessment in any case, is illogical.

The interpretation of the concept of "control risk" should be undertaken with care to correctly reflect the risk that the design of internal controls is weak, or that they are not operating effectively, in contrast to the misinterpretation of an auditor's reliance on the system of internal control. The task is further complicated by conceptual misinterpretations that are reflected in audit guidance. Although the concept of control risk assessment could be confusing as explained by Morton and Felix (1991), the basic assumption that a good system of control could reduce substantive procedures, were proven by the following studies that will be discussed hereafter. Kreutzfeldt and Wallace (1990) performed a study that investigated the validity of the asserted relationship between internal control and the occurrence of misstatements or errors. They selected a total of 260 engagements randomly from the client base of Arthur Andersen & Co.'s 13 largest United States' offices (Kreutzfeldt & Wallace, 1990). A stratified sampling plan was used to ensure representation of different sized clients, key industry groups of interest to the audit firm and Security Exchange Commission registrants. They tested a total of 75 operational variables for control structure elements by correlating these variables to total error rates and errors at the account level (Kreutzfeldt & Wallace, 1990). Bedard (1990), in discussing the Kreutzfeldt and Wallace (1990) study, commented that only errors discovered above the engagement adjusting journal entries level were included, and that no information is provided as to the way in which the engagement adjusting journal entries level was determined.

# 2.3.3 Detection risk

Graham (1985) described detection risk as the possibility that neither analytical review procedures, nor substantive procedures by themselves, will reduce material misstatements to a cumulatively immaterial amount. A certain amount of risk will remain, namely detection risk. Alderman and Tabor (1989) explain detection risk as follows: Detection risk is related to the effectiveness of an auditing procedure and of its application by the auditor. It arises partly from uncertainties that exist when the auditor does not examine all components of an account balance or class of transactions (sampling risk). Additional risk is present because an auditor might select an inappropriate auditing procedure, misinterpret the audit results or otherwise introduce human error into the process (non-sampling risk). Detection risk is described by Alderman and Tabor (1989) as consisting of both sampling risk and non-sampling risk.

Furthermore, Arens and Loebbecke (2000) indicate two key factors about planned detection risk: Detection risk is the variable the auditor plans to determine, and depends on the other three components: audit risk, inherent risk and control risk. Detection risk is determined by the sufficiency and appropriateness of audit evidence. The size of detection risk is inversely related to the amount of substantive evidence. The determined level of detection risk assists the auditor in judging if sufficient, appropriate audit evidence is obtained. The auditor is able to control detection risk that includes both sampling and non-sampling risk through the performance of audit procedures.

# 2.3.4 Engagement risk

Engagement risk is described by Colbert, Luehlfing and Alderman (1996) as follows: "Engagement risk represents the overall risk associated with an audit engagement. Engagement risk consists of three components: client's business risk (also referred to as entity's business risk), audit risk and auditor's business risk." To address the fact that the audit risk model was not representative of all the risks in the audit engagement, Colbert, et al. (1996) reported that the AICPA included in its 1993 audit risk alerts, the term "engagement risk". Engagement risk described the various risks auditors consider in performing an engagement. Colbert, et al. (1996) stated that the concept of engagement risk serves to formalize the auditor's consideration of the factors and risks affecting an engagement.

An entity's business risk is the risk associated with the entity's survival and profitability. The concept recognizes that because of factors such as rapid changes in the industry, liquidity problems, or speculative ventures, the possibility exists the client may not achieve his/her profit goals or even continue in existence. In the business risk audit approach the entity's business risk replaced the concept of audit risk in the planning phase of the audit. The term "business risk" was formally recognized and defined in the auditing standards in 2003.

The third component of engagement risk, the auditor's business risk, was defined in AU Section 312: Statement on Auditing Standards 47 (Effective June 1984) Footnote 2 (1984) as follows: "In addition to audit risk, the auditor is also exposed to loss or injury to his professional practice from litigation, adverse publicity or other events arising in connection with financial statements that he has audited and reported on." In this part of the chapter the auditor's business risk and other risks that are not included in the audit risk model or engagement risk, for example pre-engagement risk and fraud risk, will be addressed.

#### 2.4 Detection of misstatement

The word "statement" according to the Oxford dictionary (1999) is defined as: "A formal account of facts or views e.g. a report" Rittenberg, et al. (2008) emphasize that a misstatement is a difference between an incorrect balance and a balance that is a fair presentation of the company's operations and position according to an acceptable financial reporting framework IAASB/IRBA ISA 200 (2006). The description of "misstatement" in the Glossary of Terms refers to the sources of misstatements and is as follows: (IAASB/IRBA Glossary of terms (2007): "A misstatement of the financial statements that can arise from fraud or error." IFAC ED ISA 320 and ISA 450 (2007) define a misstatement as (emphasis added): A difference between the amount, classification, presentation, or disclosure of a reported financial statement item and the amount, classification, presentation, or disclosure that is required for the item to be in accordance with the applicable financial reporting framework.

The classification of misstatements illustrates the different components of the concept of "misstatement". Firstly, Konrath (2002) mentions that there are two categories of misstatements that are as follows: "Misstatements that understate financial statement components may be referred to as misstatements due to omission. Misstatements that overstate financial statement components may be referred to as misstatements due to commission." Secondly, misstatements are categorized into factual misstatements, judgmental misstatements and projected misstatements. The different types of misstatements are defined as follows; IFAC ED ISA 320 and ISA 450 (2007). Factual misstatements - Misstatements about which there is no doubt. Judgmental misstatements differences which arise from management's judgments concerning accounting estimates that the auditor considers unreasonable, or the selection or application of accounting policies that the auditor considers inappropriate. Projected misstatements, the auditor's best estimate of misstatements in populations, involving the projection of misstatements identified in audit samples of the entire populations from which the samples were drawn.

Initially misstatements were categorized in known misstatements, consisting of misstatements of fact and misstatements involving subjective decisions, and likely misstatements (IFAC ED ISA 320 (Revised), 2004). In the Basis for Conclusions: ISA 320R and ISA 450 (2006) the IAASB summarized the views and comments received from respondents. In conclusion, the IAASB decided to alter the preliminary categorization of misstatements to factual,

judgmental and projected misstatements. IFAC ED ISA 320 and ISA 450 (2007) require that this classification is used in documenting misstatements, because: "The distinction between factual misstatements, judgmental misstatements and projected misstatements assists the auditor in considering the effects of misstatements accumulated during the audit."

Thirdly, misstatements are also classified according to the different types of potential misstatements that may occur; or stated differently, the misrepresentation of management's assertions is a misstatement. The term "assertions" is defined in IAASB/IRBA ISA 315R (2006) as follows: "Assertions Representations by management, explicit or otherwise, that are embodied in the financial statements, as used by the auditor to consider the different types of potential misstatements that may occur." Morton and Felix (1991) confirm that management assertions are an "accepted scheme" for classifying misstatements. Fourthly, misstatements may be classified according to the causes of misstatements.

Fraud or error causes misstatements in the financial statements (IAASB/IRBA ISA 240, 2006). IAASB/IRBA ISA 240R (2006) explains the difference between fraud and error as follows: "The distinguishing factor between fraud and error is whether the underlying action that results in the misstatement of the financial statements is intentional or unintentional." Material misstatements comprise unintentional and intentional misstatements. With regard to intentional misstatements, only misstatements resulting from fraudulent financial reporting and misstatements resulting from misappropriation of assets are relevant to the auditor (IAASB/IRBA ISA 240, 2006).

## **2.4.1** Financial level (Fraud and errors)

Colbert, et al. (1996) suggested that fraud risk forms part of engagement risk in stating that: The SEC Practice Section Detection and Prevention Task force recently developed a list of circumstances that may lead to a higher assessment of engagement risk and its components. The factors provide additional insights into the concept of engagement risk. These factors are sometimes called red flags or warning signs, because they signal the need for caution on the auditor's part. In a study by Newman, Patterson and Smith (2001) that considered the assessment of fraud risk, they conducted an experiment where auditors assess risk when a possibly fraudulent client anticipates the assessment of risk in the planning process, when compiling an (possibly fraudulent) earnings report. The findings in respect of their experiment show that as the client increases reported earnings, the auditor increases audit

effort and that the client manipulates the reports and earnings in such a way that they maximize earnings and minimize the risk of detection (Newman, et al. 2001)).

The implications are explained by them as follows Newman, et al. (2001): "Thus, because of the dynamic interaction between the auditor and auditee, procedures that aid in assessing audit risk may not reduce that risk or result in more efficient audits." In respect of the study of Newman, et al. (2001) the following could be considered when evaluating the findings: The distinguishing characteristic of this setting is the fraudulent auditee's (client's) ability to anticipate and exploit the auditor's response to this earnings report. The auditee in the model is informationally advantaged and uses that advantage through his reporting strategy.

Although it is suggested that fraud risk forms part of engagement risk, it does not currently form part of the audit risk model and is assessed separately. Consideration should be given to the sensibility of the part of the audit approach that does not consider the impact of the risk of fraud. Auditors' responsibilities have changed in terms of fraud, and the consequent impact on the audit approach. The above argument is supported by Watts (1991) stating: "If a major role of the audit risk model is to develop legally defensible audit strategies, then it may be inappropriate to assume that the auditee will act non-strategically or according to some relaxed rationality postulates." The growing understanding of the interrelationship between audit risk and fraud risk is reflected in the changes to audit risk standards that refer to risks of material misstatement and risks of material misstatement due to fraud and error, clearly indicating that risks of material misstatement due to fraud and error are included in risks of material misstatement.

#### 2.4.2 Assertion level

The second level for the identification and assessment of risks of material misstatement is the assertion level. Rittenberg and Johnstone (2008) and Alderman and Tabor (1989) define assertions, mentioning that these representations of management are: "a positive statement about an action, event, condition or performance over a specified period of time." The assertions were reviewed when the risk standards were established. The assertions were classified in the categories of classes of transactions, account balances, and disclosures (IAASB/IRBA ISA 315R, 2006) and IAASB/IRBA ISA 500, 2004). Assertions that relate to the category of presentation and disclosure were added to improve the implementation of the assertions in the risk-process audit approach (Fogarty, Graham & Schubert, 2006).

The definition of "assertions" in IAASB/IRBA ISA 315R (2006) is as follows: "Assertions-Representations, by management, explicit or otherwise, that are embodied in the financial statements, as used by the auditor to consider the different types of potential misstatement that may occur." Assertions as defined by the IAASB/IRBA ISA 315R (2006) emphasize three aspects of "assertions": Firstly, representations of management; Secondly, fair representation is determined by the criteria as set out in the international financial reporting standards (Rittenberg, et al. 2008); and thirdly, it is indicative of the "different types of potential misstatements that may occur". In conclusion, Fogarty, Graham and Schubert (2007) warn that certain audit approaches followed by auditors do not integrate the assertions into identifying risks, assessing controls and determining the appropriate response; a requirement in the current audit risk standards.

## 2.5 Obtaining an understanding of internal control

Rittenberg, et al. (2008) assess the quality of internal controls after developing informed expectations and before assessing the risk that an account is misstated and the managing of audit risk and detection risk. Inherent risk and control risk is assessed separately by Arens, et al. (2008). This entails the assessment of internal controls after inherent risk is considered for every account. Arens, et al. (2008) follows the steps of: firstly, the set of materiality and assessing acceptable audit risk and inherent risk. Secondly, an understanding of internal control is obtained that result in an assessment of control risk. Ricchute (2006) also considers internal control, the performance of tests of controls and the assessment of control risk to be a separate task.

# 2.6 Materiality level for the financial statements.

Included in the overall audit strategy of an audit engagement, is a materiality level for the financial statements as a whole IFAC ED ISA 320 and ISA 450, (2007). The former practice of determining planning materiality for the financial statements taken as a whole is now explicitly required Carmichael, (2006). The basis on which the planning materiality level was determined, and any changes thereto should be documented Carmichael, (2006). Concerns identified by the study of Messier, et al. (2005) indicate that audit firms differ on the methods used to establish overall planning materiality and in allocating planning materiality to financial statement accounts or to the assertion level; and that this will influence the extent of the audit procedures planned. The methods or approaches to determine planning materiality

are discussed in two parts: firstly, quantitative percentages or benchmarks; and secondly, the consideration of qualitative factors. Materiality levels for particular classes of transactions, account balances or disclosures.

The auditor may set materiality levels for particular classes of transactions, account balances or disclosures, also called the tolerable misstatement level IFAC ED 320 (2004); Carmichael (2006). The reason for setting a tolerable misstatement level is the possibility of the aggregating effects of immaterial misstatements, and to assist auditors in designing audit procedures at the assertion level (Fogarty, et al. 2006). Auditors can follow a selection of approaches to establish materiality at the assertion or account level. The following approaches are summarized by McKee, et al. (2000): Judgmental approach: The auditor sets the account materiality on a purely judgmental basis; Ratio approach: The auditor sets the account tolerable misstatement at a range that depends on the auditor's assessment of risk; Adjusting entry assessment: The auditor sets the account tolerable misstatement at some fraction of overall financial statement materiality, depending upon the number of adjusting entries from the previous year's audit; Formula approach: Some auditors use a formula that assigns some proportion of overall materiality to the individual accounts based on their relative size and the possibility of offsetting errors.

## 2.7 Audit risk model theory

AICPA (1983) defined that audit risk consists of inherent risk, control risk, and detection risk. The so-called inherent risk means that under the condition without internal control, the possibility of serious misstatement in financial statements is present. Wustemann (2004) pointed out that the factors influencing inherent risk included asset flow; the assessment method established according to accounting assumption; general economic situation; and technical development. Control risk means that the internal control of auditee could not immediately prevent or detect the risk of serious errors.

Bedard and Graham (2002) also indicated that the following factors would influence the assessment of control risk: the organizations and staff of accounting department of auditees; the internal conditions of auditees, which were beneficial for detecting or preventing fraudulence; safety of EDP system; and management information for detecting corporate activities. Detection risk means that the audit personnel's test could not detect the serious

misstatement in the financial statements. Audit Criteria Bulletin No. 24 (1993) indicated that the factors affecting detection risk assessment are selecting improper audit process; error execution; misunderstanding the audit results; the adoption of random inspection.

Audit personnel's assessment of audit risk would affect the design of the following audit strategies. At the initial stage of audit planning, improper audit risk assessment would lead to wrong resource distribution and inefficient or ineffective audit results Low (2004). At present, the common basic audit risk assessment methods include Wustemann (2004): risk factor analysis; fuzzy combined assessment; internal control assessment; analytical audit; audit risk model; qualitative risk assessment; and risk rate assessment. AICPA's (1983) audit risk model provided the major conceptual framework of the audit process, which described that when the audit personnel plan the audit work, according to their understanding of the auditees' business, they should professionally judge and set up the audit risk level, which could affect submit proper audit opinions for the financial statements, consider the remaining sum of each subject or various exchange factors and related internal control, and assess the degrees of inherent risk and control risk.

According to the study of Arens et al. (2005), the factors influencing the accountants' professional judgment include the audit work environment, audit personnel's characteristics, audit evidence, decision-making process and quality characteristics determined. Therefore, the audit personnel should follow the audit risk limit accepted, the remaining sum of each subject or different exchanges, inherent risk and control risk to set up the acceptable detection risk limit for establishing the audit process. The audit risk model is expressed as AR =IR\*CR\*DR. In the audit risk model, the items of (*IR\*CR*) are sometimes called "auditee risk" or "occurrence risk", since these two risks mean the risk that before the audit, the misstatement has already existed in the financial statement (Low 2004; Khurana and Raman 2004). The audit personnel could not control these two risks; however, they must assess their levels in order to determine the scale of audit test in the regulated audit risk level (Messier and Austen ,2000). Taiwan Audit Criteria Bulletin No. 24 (1993) also allowed the audit personnel to individually or collectively consider inherent risk and control risk. The determination of detection risk on audit risk model is expressed as: DR= AR/(IR\*CR). The criteria also indicated that when the audit personnel plan the audit work, they should initially judge the

acceptable audit risk and significance standard in order to acquire sufficient and proper audit evidence.

AICPA (1983) also defined significance as the degree of influence that when certain information was neglected, in error or unexposed, it might not be beneficial for the resource distribution policy making of the financial statement users. When the audit personnel distribute overall significant level to the remaining sum or each account or exchange, it is called tolerable misstatement. In the audit risk model, we realize that there is a positive relation between detection risk and audit risk; however, it has reverse relations with inherent risk and control risk Arens et al. (2005). When the audit personnel decide the remaining sum of certain subject or the process property, time, and scale of exchange patterns, the lower the significant level is, the higher the degree of audit personnel's acceptable audit risk. On the contrary, the higher the remaining sum of the subject or significant level of exchange pattern is, the higher the degree of audit personnel's acceptable audit risk. Therefore, there is reverse relation between audit risk and significance and there is also reverse relation between detection risk and significant level Arens et al. (2005). The audit evidence refers to the data collected by the audit personnel upon their professional judgment in order to render opinions with respect to the propriety of financial statements. The sufficiency and propriety of audit evidence determine the amount and reliability of the evidence acquired. There is also reverse relation between audit evidence and audit risk Khurana and Raman (2004).

### 2.7.1 The fuzzy theory

Zadeh (1965) proposed the Fuzzy Theory and introduced the concept of membership function in order to deal with the difference of linguistic variable. He thought that there was a certain degree of fuzziness in terms of people's thoughts, inference and perception. Its aim is to solve the data of uncertainty or fuzziness in the environment. The fuzzy theory has had considerable theoretical base for studying uncertain and subjective issues. The theory was later widely applied to fields such as AI, control engineering, expert systems, managerial science, business studies, multi-principle decision making and risk assessment, etc. Akhter et al. (2005). The content related to the fuzzy theory is Fuzzy set meaning the set signifying things with specific properties and unclear boundaries. The fuzzy sets theory aims to solve the uncertainty or fuzzy data in realistic environment. The Fuzzy theory introduced the concept of membership function in order to deal with the differences of linguistic variables

was proposed by Zadeh (1965). He thought that there was a certain degree of fuzziness in terms of people perception and inference. The purpose of this theory is to solve the uncertainty of data or fuzziness in the environment. The theory is also used in risk assessment Akhter et al. (2005).

### 2.7.2 Context theory

The context theory of classification states that judgments are assumed to be derived exclusively from stored exemplar information. The general idea of the context model is that classification judgments are based on the retrieval of stored information. The context model attempts to represents the effects of strategies and hypotheses on the ease of storage and retrieval of information associated with the stimulus dimension. The context model of classification as applied in this study is assumed that the ability to detect the likelihood of misstatements is derived from the auditors' stored exemplar information on the occurrence of misstatements. It is assumed that the level of misstatements of a clients company serves as a stimulus that the auditors will rely on to decide the likelihood of misstatements in the client's organization Jaffar, (2009).

# 2.7.3 Attribution Theory

As in the work of Jaffar et al. (2008), attribution theory is adopted in this study to explain the effect of the internal auditor's ability to assess the fraud risk on his/her ability to detect the likelihood of fraud. This theory suggests that the expected level of future performance in a particular task depends mainly on the particular causes to which prior success or failure in the same task are attributed. Weiner, et al (1971) argues that the effect of previous success or failure on subsequent expectations varies according to whether the attribution is internal. He proposed that following a success experience, there is a positive relationship between attribution to stable causes and expected future performance, and following a failure experience, there is a positive relationship between attributions to unstable causes and expected future performance. For success prediction, the argument is that prior successes that are perceived as due to stable causes, will be viewed as having a greater chance of being repeated than successes due to unstable causes, since stable factors are seen as more likely to continue in the future than unstable ones (Weiner et al., 1971). For failure experience, on the other hand, the argument is that prior failures perceived as being due to unstable causes, will

be viewed as easier to overcome in the future than failures due to stable causes, and hence likely to have less of a depressive effect on anticipations of future performance.

# 2.8 Empirical Studies.

Dusenbury *et al.* (1996) compared three risk assessment approaches: the model used in the standards (with quantified probabilities), a model they claim to be company specific (where risk assessment was performed using four qualitative categories; the model was effectively used by a company for purposes of auditing, and risk assessment conducted on the basis of the belief function theory. 80 auditors participated in the survey, all of them working for one of the Big6 companies. In the course of the survey they had to perform risk assessment twice in respect of tangible assets and accounts receivable and the authors compared the results of the two assessment. Substantial differences came to light between the risk sensitivity of tangible assets and receivables: the risk assessment of accounts receivable reacted much more vividly to the results of the control tests. The study concluded that the comparison of the model used by the standards and of the company specific model supports the view that audit risk is not routinely underestimated in practice. The authors conclude that a 'reliability of evidence' element should be integrated into the audit risk assessment model. Belief functions might be efficiently used for this purpose.

Daniel (1988) examined how risks related to accounts receivable are broken down to the level of the components of the risk model with the cooperation of 33 auditors. Based on this, he analyzed how these elements are combined in order to assess audit risk. In the experiment, the participants had to assess the inherent and control risk as well as the components of the detection risk (risk related to the test of details and to the analytic procedures) and the comprehensive audit risk itself, giving the results on a 5-point scale and in a percentage form. The author then calculated the risk values of the individual components on the basis of the models and found that these are significantly lower than the auditors' comprehensive assessments. From this he drew the conclusion that professionals do not use the formulas defined in either SAS 39 or SAS 47 or by CICA. At the same time more than half of the test subjects (18 auditors) assessed the ultimate audit risk to be 5%. The author thinks there are several possible reasons for this: this value might be just a desired level of risk; or the companies the auditors in question work for accept this value as maximal risk level; or

perhaps they saw this value in professional literature so many times that they automatically gave that as the ultimate result.

Waller (1993) also made a research on the assessment of inherent and control risks, which brought surprising results. In his research, Waller examined 385 engagements of KPMG USA using a questionnaire method. The results show that as opposed to expectations, there is no important relationship between the assessment of inherent and control risk. The author thinks this is partly due to the fact that in most cases the control risk was taken to be 1 as the auditors did not want to rely on internal controls in the course of the audit work. This leaves open the possibility that such a relationship may exist if control risk is not set to 1. In this respect, Waller also notes that this practice although in compliance with the requirements of the standards raises the question whether risk assessment should corroborate or direct the auditor's acts. It seems that in this case the first possibility prevails which is rather odd considering that we deem risk assessment to be a planning tool. The research also shows that the risk assessments are not different from each other for every assertion concerning the individual asset elements, i.e. risk assessment is not performed on an assertion basis. There was no clear confirmation of the third hypothesis either, claiming the existence of a positive relationship between the estimated extent of inherent risk and the rate of detected errors.

Schultz *et al.* (2010) examined to what extent the approaches applied by auditors support the consideration of the client's business risks when assessing the audit risk. In their research, they compared the Transaction-Focused Approach (TFA) and the Strategic Systems Approach (SSA) with the participation of 93 auditors. TFA primarily focuses on the operating cycle of businesses and its elements, such as the revenue process or the purchasing process etc., while SSA devotes a central role to certain key benchmark performance indicators. With the help of these auditors seek for circumstances that may give rise to an increased probability of misstatements. According to the hypothesis of the authors, auditors who have been trained to use the strategic approach and who accordingly base their work on structured data, directly integrate their assessment of business risk into the assessment of the risk of material misstatement.

Houston *et al.* (1999) in a study to examine the extent the audit risk model described in the standards is appropriate to forecast the behavior of auditors (i.e. the actual performance of the audit).in his analysis in a research involving 34 audit partners working for Big5 companies

they reached the conclusion that the explanatory power of the audit risk model largely depends on the reason of the alleged misstatement. If there is a greater chance that the error is due to a mistake, the model has a suitable explanatory power and the auditor's business risk does not possess any further explanatory power. However, in case of suspicion of fraud the business risk model dominates over the audit risk. The authors concluded from this that the business risk model takes into consideration some factors that the standard audit risk model fails to recognize.

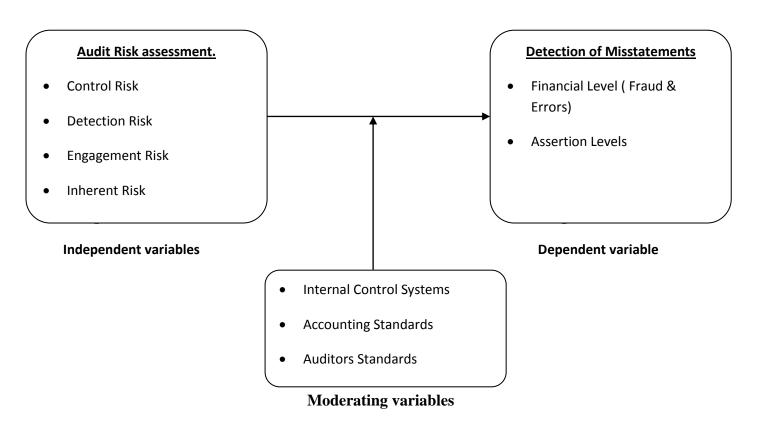
Low's (2004) research results, examined the impact of the auditors' industrial specialization on risk assessment. His subjects were 98 senior audit partners working for a Big5 company, who had to solve two versions (low and high risk) of a case study related to a credit institution. 36 of the participants specialized in this industry, the others did not. The versions of the case studies were assigned to the test subjects on a random basis. The author found that the auditors working in the given field day by day were better able to differentiate between the two cases on the basis of risk (also their risk assessment was more accurate) and they also made more adjustments to the ready-made audit programs than their colleagues working in other fields of specialization.

Mack and Ryan (2007) studied local government departments but extended their study to include government-owned corporations. In their study, a survey instrument was used to find out the actual users of annual report and their information needs. They found out that the annual report was not the most important source of information.

Allen D. Blay,et.,al(2007) studied the association between the auditors' preliminary assessment of going concern and fraud risk and the planning and performance of the financial statement audit. This study used audit file data to analyze the above mentioned objective they analyzed the association between the above risks and the auditor's assessment of the risk of material misstatement (RMM) within the revenue cycle, and examine whether going-concern and fraud risk assessments have an effect on the persuasiveness, timing and extent of audit evidence gathered. There results indicated that both fraud risk and going-concern risk are significantly related to RMM. The results also indicate that although the effect of fraud risk is fully mediated by the RMM, moderate going-concern risk remains significantly related to their proxies for the persuasiveness and timing of audit evidence, even after controlling for RMM.

# 2.9 Conceptual Framework

Figure 2.1 Conceptual Framework



Source: Author (2013)

The researcher sought to establish the relationship between Audit Risk Assessment and Detection Of misstatements in Annual Reports. The testes risks were control risk, detection risk, enagement risk and inherent risk ans independent variables while detection of material misstatement was the dependent variable. Further the study looked at internal control systems, accounting standards and auditors standards as moderating variables.

#### **CHAPTER THREE:**

#### RESEARCH METHODOLOGY

#### 3.1 Introduction

This chapter defines the design of the study and the research method, which was used to get responses from the target population. It further highlights data collection procedures including a data collection instrument that was used. The chapter concludes with highlighting how data was analyzed.

# 3.2 Research design

The research design was descriptive survey design. Descriptive studies are usually the best methods for collecting information that will demonstrate relationships and describe the world as it exists. These types of studies are often done before an experiment to know what specific things to manipulate and include in an experiment. Bickman and Rog (1998) suggest that descriptive studies can answer questions such as "what is" or "what was." Experiments can typically answer "why" or "how." Survey on the other hand allowed the researcher to accommodate large sample sizes' generalizability of results; ability to distinguish small differences between diverse samples groups; ease of administering and recording questions and answers; increased capabilities of using advanced statistical analysis; and abilities of tapping into latent factors and relationships. The design was appropriate for the study because the study came up with findings that show the relationship between the audit risk assessment and detection of misstatement in annual reports in Nairobi County, Kenya.

# 3.2.1 Location of the Study

The study was carried out in Nairobi County, Kenya. According to Registration Accounting Board (RAB) Records (2013) Nairobi County had a total of 736 audit firms. The Nairobi county region was chosen because it was diverse as regards the number of audit firms. All this means that the respondents were not biased in terms of ethnic background, gender or locality. This implied that the population is rich in information that was being sought in this study.

#### 3.3 Population of the study

The target population of this study was all External auditors in charge of audit firms in Nairobi County because they are typically the most knowledgeable people in audit risk assessment and detection of misstatements in annual reports. It had a population of 736 Audit firms. The study employed systematic sample design thereby targeting 254 audit firms.

### 3.4 Sample design

The researcher employed a systematic sample design in which a list of the population was used as a sampling frame and cases were selected by skipping through the list at regular interval.systematic sampling guaranteed the researcher that the population was evenly sampled. The researcher arranged the sample size alphabetically and picked every 3rd firm from the sample.the starting point for choosing the sample size was firms whose names began with letter A.

### 3.4.1 Sample size

According to Robert and Daryle (2006) formular for determining sample size for research activities is as follows:

$$S=X^2NP (1-P)/d^2 (N-1)+X^2P(1-P)$$

Where:

S=required sample size

 $X^2$ =the table value of chi-squre for degree of freedom desired confidence level (3.841)

N= The population size

P= The population proportional assumed (.05)

d = the degree of accuracy expressed as a proportion (.05)

From a population of 736 using the above formular the sample size is 254

#### 3.5 Data instrumentation

This study was aimed at evaluating the relationship between audit risk assessment and detection of misstatements in annual reports. In order to get these data, the researcher used questionnaires which was used to evaluate their response on relationship of audit risk

assessment and detection of misstatement by indicating scores along a 5 point Likert scale ranging from 'strongly disagree' to 'strongly agree. This instrument was used to collect information about the respondents' perception on audit risk factors on the detection of misstatements in annual reports for audit firms registered by RAB in Nairobi County, Kenya. This type is used to measure perceptions, attitudes, values and behaviour (Mugenda & Mugenda, 1999). The questionnaire had five sections. Each section was developed to address a specific objective. Part A was aimed at collecting data about inherent risk factors. Part B was on detection risk factors, Part C solicited data on engagement risk factors, part D focused on control risk factors and part E looked at material misstatements in annual reports. The study used a self-administered questionnaire to gather information from the respondents. A period of one month was used to carry out the study.

#### 3.5.1 Data Collection Procedures

The questionnaires were self-administered thus the respondents were asked to complete the questionnaires themselves. The researcher arranged with the respondents to collect the completed questionnaire after two weeks. External auditors who were in charge of the departments were in a better position to give in-depth information concerning the relationship between audit risk assessment and detection of misstatements in annual reports.

### 3.6 Data analysis and presentation

The data collected was analyzed by the use of descriptive statistics. Descriptive statistics describe data on variable numbers while analysis of variance (ANOVA) tests for any significance, the arithmetic mean is the average value in an observation used to represent the entire data by a single value, the median is the middlemost value of a variable when arranged in order of magnitude and is used to measure positional average, the minimum and maximum statistics describe the respective lower and upper values of a variable, the standard deviation is used to determine how the mean is representative of the observation. Quantitative data was analyzed using the Statistical Packages for Social Scientists (SPSS) version 12 which is all-inclusive and offers wide-range data handling capability.

A simple regression analysis was used whereby the independent variable was regressed against the dependent variable in order to establish the relationship between the two variables.

The model began with audit risk assessment measurement scale, consisting of four-dimensional structure (inherent risk, detection risk, engagement risk and control risk), to assess detection of misstatements. Next, the researcher developed a set of hypotheses surrounding mediating variables (accounting standards, auditing standards and internal control systems). Then, the researcher examined the effect of these variables by exploring the correlation among dependent variable (detection of misstatements) and the independent variables (audit risk assessment). Finally, a discussion was presented in support of the hypothesized influence of the various variables on audit risk assessment and detection of misstatements.

The model is presented below:

$$DRaf = \alpha + b1IR + b2CR + b3DR + b4ER + E$$

Where:

DRaf = Detection of misstatement

IR = Inherent risk

CR = Control risk

DR = Detection risk

ER = Engagement risk

E = Error

The study sought to test the following null hypothesis:

H0: There is no relationship between audit risk assessment and detection of misstatement in annual reports in Nairobi County

T test was used to test for significance of each predictor variable (Risk assessment) in the model. The null hypothesis was rejected when the significance value t: statistics is less than 0.05(significance level)

# 3.7 Data validity and reliability

In this study, ensuring validity of the data collection instrument involved going through the questionnaire in relation to the set objectives and making sure that they contained all the

information that could enable answer these objectives. The tools were developed by the researcher and content and face validity established. The content validity established was to ensure accuracy of the instruments (Leeds, 1993). The face validity ensured that the instrument appeared to measure what it purported to measure. This was accomplished with the help of experts and examiners in Faculty of commerce at Egerton University.

The instruments were piloted in audit firms from the researchers population region that were not included in the actual study. This enhanced the reliability and validity of the instruments (Mugenda & Mugenda, 1999). The results of the piloted instruments were used to calculate the reliability coefficient. Reliability was established to ensure accuracy or the consistency of the instrument, that is, the extent to which the results remain similar over different forms of the same instruments (Mcmillan & Schumacher 1993). This was calculated using the Cronbach formula and reliability of 0.7 and above was acceptable, (Selltiz, Wrightsman & Cook, cited in Githua, 2000). Mcmillan and Schumacher, (1993) viewed Cronbach alpha as the most appropriate type of reliability for survey research. Therefore, the Cronbach alpha test for reliability was used because it is superior to all others and can be used for both dichotomous-type and large-scale data. The reliability coefficient from the piloted instruments was 0.86.

#### **CHAPTER FOUR**

#### RESULTS AND DISCUSSION

#### 4.1 Introduction

This study set out to evaluate the relationship between audit risk assessment and detection of misstatements in annual reports in Nairobi County, Kenya. The data was collected using questionnaires targeting external auditors in audit firms registered by the registration accounting board (RAB) in Nairobi County. Out off 254 questionnaires issued 155 were returned back duly filled representing 78% response.

The data was analyzed and discussed under the following research objectives: To establish whether there is any significant relationship between auditors' assessment of inherent risk factors at the financial level to the incidence and magnitude of auditors detected misstatement, to establish whether there is any significant relationship between auditors' assessment of control risk factors to the incidence and magnitude of auditors detected misstatement, to establish whether there is any significant relationship between auditors' assessment of engagement risk to the incidence and magnitude of auditors detected misstatement, to establish whether there is any significant relationship between auditors' assessment of detection risk to the incidence and magnitude of auditors detected misstatement, and to examine the overall relationship between audit risk assessment to the incidence and magnitude of auditors detected misstatement in annual reports in Nairobi County.

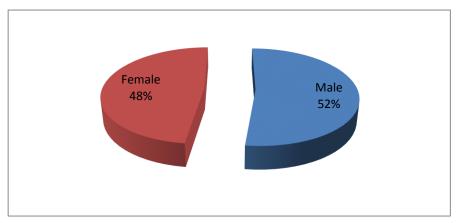
# 4.2 Background Information of the Study Respondents

This section presents a brief description of the demographic characteristics of the sampled respondents involved in this study. Such a description is considered to be very important in providing a better understanding of the respondents included in the study and therefore provide a good foundation for a detailed discussion of the results based on the stipulated objectives of the study. The demographic characteristics included designation, gender, level of education and years of service.

#### 4.2.1 Respondents Gender

This research sought to find distribution of external auditors by gender in audit firms in Nairobi County, the findings are presented in figure 4.1 and table 4.1 below.

Figure 4.1 Respondent's Gender



Source: Research Data 2013

The Study findings indicated the uneven distribution of the respondents by gender. There were 155 respondents in total. The distribution is as shown in the figure below, 52% male and 48% female. This implies that there is equal employment of staff within the audit firms in Kenya in terms of gender and thus an objective view of the research questions was obtained.

Table 4.1 Respondents gender

	Frequency	requency Percentage Valid Pe			
Male	80	52.0	50.0		
Female	75	48.0	50.0		
Total	155	100.0	100.0		

Source: Research Data 2013

# 4.2.2 Respondents Age bracket

Age bracket is an important factor with significant influence on understanding of audit risk assessment factors and detection of misstatements. The results are tabulated in table 4.2 below.

Table 4.2 Respondents Age bracket

	Frequency	Percentage	Valid Percent
24-33 years	78	50.0	50.0
34-43 years	39	25.0	25.0
44-53 years	19	12.5	12.5
Above 53 years	19	12.5	12.5
Total	155	100.0	100.0

Source: Research Data 2013

The Study found out that 50% of the respondents were between 24-33 years and they marked to be majority. About 25% of the respondents were of the age between 34-43 years whereas 12.5% each were in the age bracket between 44-53 year and above 53 years respectively. These findings indicate that majority of respondents were young considerably vibrant to understand the new standards on audit risk assessment and detection of misstatements in annual reports; hence most of the external auditors had the prerequisite knowledge of the audit risk assessment factors.

### 4.2.3 Duration in the organization

The researcher sought to establish the number of years the respondents had worked in their current stations, the results is presented in table 4.3 below.

Table 4.3 Respondents duration in the organization

Frequency	Percentage	Valid Percent
39	25.0	25.0
78	50.0	50.0
38	25.0	25.0
155	100.0	100.0
	39 78 38	39 25.0 78 50.0 38 25.0

Source: Research Data 2013

Fifty percent of the respondents had worked for between 2-5 years while 25% had worked for between 1-2 years and 5-10 years respectively. Working experience in the same organization is an important factor with significant influence on understanding of operations of audit firms as well as clients annual reports thereby understanding the audit risk assessment factors, the findings supports the earlier indication that most of the employees were youth who definitely have worked for less than five years.

#### 4.2.4 Number of years employed

The researcher went ahead to establish the duration the respondents had worked, the findings are presented in table 4.4 below.

Table 4.4 Respondents years in employment

	Frequency	Percentage	Valid Percent
1-2 years	19	12.5	12.5
2-5 years	58	37.5	37.5
5-10 years	78	50.0	50.0
Total	155	100.0	100.0

Source: Research Data 2013

Majority indicated to have worked for between 5-10 years. The researcher was also interested in determining the distribution of Auditors by experience as measured by number of years in service. Working experience is an important factor with significant influence on understanding of the audit risk assessment factors and detection of misstatements in annual reports.

The Study found out that 50% of the respondents had a working experience of 5-10 years. About 37.5% of the respondent had a working experience of 2-5 years whereas 12.5% had experience between 1-2 years. None of the respondents had a working experience of less than one year meaning the external auditors had a proper understanding of the audit risk factors. These findings indicate that majority of respondents had worked considerably long to understand audit risk assessment factors and detection of misstatements in annual reports

### 4.3 Evaluation of the audit risk assessment and detection of misstatements

The general objective of the study was to evaluate the relationship between audit risk assessment and detection of missstatements in annual reports in Nairobi County, Kenya. To achieve this objective, the respondents were asked to indicate the extent to which they agree to the various factors of the audit risk assessment. The audit risk assessed include: inherent risk, control risk, detection risk and engagement risk

## 4.3.1 Inherent risks and detection of misstatement in annual reports

Based on a five likert scale of Strongly disagree, Disagree, Neutral, Agree and strongly agree, the researcher sought to establish the agreement of the respondents with the various variables under inherent risks, the findings are presented in table 4.5 below.

Table 4.5 Inherent risks

	Strongly	Disagree	Neutral	Agree	Strongly
Variables	Disagree				Agree
Management's attitude toward financial					
reporting is unduly aggressive	25%	13%	0%	38%	25%
Personal turnover in accounting, finance and					
operations (especially in senior accounting					
positions) is high	0%	0%	63%	13%	25%
Personnel are inexperienced or inadequate in					
number	0%	13%	0%	63%	25%
Evidence of personnel dishonesty is present	0%	0%	38%	13%	50%
Management has undue emphasis on meeting					
earnings projections	0%	13%	13%	25%	50%
The management is not considered respectable					
by the business community	13%	0%	25%	13%	50%
Management is not concerned with reporting					
accurate financial information	0%	12%	12%	38%	38%
Evidence of management overiding significant					
internal accounting controls is present	0%	0%	50%	0%	50%
Members of management are experiencing					
personal financial difficulties	13%	13%	0%	37%	37%

Management is not concerned with providing					
additional information to improve the clarity					
and comprehensiveness of the company's					
financial statements	12%	0%	38%	13%	36%
Management's operating and financing					
decisions are dominated by a single individual					
or a few persons acting in concert	0%	25%	0%	50%	25%

Source: Research Data 2013

The respondents were not quite happy with aggressiveness of management's attitude toward financial reporting, where 25% disagreed and 13% were neutral while 63% agreed. When asked whether personnel turnover in accounting, finance and operations (especially in senior accounting positions) is high, majority of the respondents, 63% remained neutral implying it is an area of great concern and only38% agreed. It was noted that personnel are inexperienced or inadequate in number where 88% of the respondents agreed, this causes an alarm on the detection of inherent risks which will in turn affect the material misstatements in the finacial reports. A good number of respondents decided to be silent when asked whether there was presence of evidence of personnel dishonesty with 63% agreeing that there is dishonesty. 75% agreed that the management has undue emphasis on meeting earnings projections, 63% agreed that the management is not considered respectable by the business community and 76% said that management is not concerned with reporting accurate financial information. Half of the respondents agreed that evidence of management overiding significant internal accounting controls is present while the remaining half were neutral. 26% did not agree that members of management are experiencing personal financial difficulties while 74% agreed to the statement. Only 49% of the respondents agreed that management is not concerned with providing additional information to improve the clarity and comprehensiveness of the company's financial statements, 38% remained neutral and 12% dissagreed. 75% agreed that Management's operating and financing decisions are dominated by a single individual or a few persons acting in concert while 25% dissagreed. The findings clearly shows that analysis of inherent risks plays a crucial roles in detection of misstatements in financial reports, teha duitor should therefore place more ephasis on inherent risks before undertaking an audit exercise, a good number of respondents though chose to be neutral, this could be explained

by the less number of years, less than five years, that they had been engaged in their current employment, thus unable to give a clear view on the subject question.

# 4.3.2 Detection risks and detection of misstatement in annual reports

Based on a five likert scale of Striongly dissagre, Dissagree, Neutral, Agree and strongly agree, the researcher sought to establish the agreement of the respondents with the various variables under detection risks, the results are presented in table 4.6 below.

Table 4.6Detection risks

	Strongly	Disagree	Neutral	Agree	Strongly
Variables	Disagree				Agree
The organization has inadequate or inconsistent					
profitability relative to the industry	0%	0%	13%	63%	25%
The organization operating results are particularly					
sensitive to economic factors	13%	0%	13%	25%	50%
There are adverse legal or regulatory problems					
confronting the organization of industry	13%	0%	25%	38%	25%
There are adverse political, social or economic					
conditions confronting the industry	13%	0%	38%	13%	38%
The flow of products or services from the					
organization's suppliers is susceptible to cost, quality					
and or quantity fluctuations	0%	13%	25%	50%	13%
There is potential for the organization's product to					
become technologically obsolete	0%	13%	25%	25%	38%
Production cylces are longer than the organization's					
fiscal year	0%	13%	13%	38%	38%
Physical location of the organization's operations					
makes effective management difficult	13%	0%	25%	50%	13%
The organization has a complex capital structure	0%	0%	25%	50%	25%
The organization is experiencing solvency problems or					
other factors that bring into question the entity's ability					
to continue as a going concern	13%	13%	0%	63%	13%
Organization's success depends on a single product or	0%	13%	0%	63%	25%

a small number of products or transactions					
Industry is subject to strict environmental controls	0%	0%	0%	37%	63%

Source: Research Data 2013

The respondents were not happy with the inconsistency or inadequacy of the profitability of the organization as 63% agreed to this inconsistency an indication of detection risk meaning that the auditor will not be able to detect misstatements in annual reports and 25% strongly echoed the same with 13% remaining neutral. when asked about the organizations operating results being particularly sensitive to economic factors (such as inflation and interest rates) 50% strongly agreed to this factor meaning that it highly contributed to detection risk with 13% remaining neutral to this dimension and another 13% strongly disagree to this dimension of sensitivity of economic factors. A good number of respondents agreed to the adverse legal or regulatory problems confronting the organization with a value of 38% and supported with another 25% who strongly agreed to the same. 25% of the respondents remained neutral to mean that the legal problems was a key factor in determining detection of risks.when asked about the adverse political, social or economic conditions confronting the industry, 38% strongly agreed to this dimension meaning that political, Social or economic factors affected the industry thus prescence of detection risk and as a result misstatements in annual reports, another 38% of the respondents remained neutral on this dimension with 13% strongly disagree in this dimension.half of the respondents agreed that the flow of products or services from the organizations suppliers is susceptible to cost, quality, and/or quantity fluctuations with 13% echoing on the same,25% remained neutral and another 13% disagreed on this dimension.38% of the respondents strongly agreed to the potential of the organizations product to become technologically obsolete and they were supported by another 25% who agreed to this factor with 13% remaining neutral.when asked about the production cycle of the organizations fiscal year 38% agreed with a strong support of another 38% who thought that the cycle production of the organization was a factor of detection risk,13% remaining neutral and another 13% disagreed that the production cycle had an effect on the detection risk .half of the respondents agreed that the physical location of the organization operations makes effective management difficult with 25% remaining neutral and and 13% disagreeing to this dimension. when asked about the organization having a complex capital structure 50% agreed that this resulted to detection risk and as a result material misstatements in annual

reports this was supported by an additional 25% and another 25% remaining neutral.63% of the respondents agreed to the fact that the organizations experience solvency problems or other factors that bring into question the entitys ability to continue as a going concern resulted to detection risk thereby misstatements in annual reports, another 13% echoed this factor with none being neutral and additional 13% disagreed to organizations solvency problem as a factor of detection risk in annual reports.63% agreed that the organizations success depends on a single product or a small number of products or transaction this was supported by an additional 25% who strongly agreed to this dimension however 13% disagreed that that the organizations success to a single product resulted to detection risk.finally when asked about industry being subject to strict environmental controls 63% strongly agreed to this dimension and an additional 37% supported the fact of strict environmental controls resulted to detection risk therby misstatements in annual reports. The findings clearly shows than consideration of detection risks is very key in detection of material misstatements in the financial reports, it thus calls for the auditors to give more consideration on the analysis of detection risks, before undertaking the audit of the annual reports from their clients.

# 4.3.3 Engagement risks and detection of misstatements in annual reports

Based on a five likert scale of Striongly dissagre, Dissagree, Neutral, Agree and strongly agree, the researcher sought to establish the agreement of the respondents with the various variables under engagement risks, the findings are presented in table 4.7 below.

Table 4.7 Engagement risks

	Strongly	Disagree	Neutral	Agree	Strongly
Variables	Disagree				Agree
Physical location of the organization's operations makes					
effective adequate monitoring and reporting system difficult	13%	13%	13%	63%	0%
Electronic processing of accounting data has resulted in					
comples accounting and or auditing problems	0%	0%	50%	0%	50%
There are significant and or unusual related party					
transactions	0%	0%	12%	50%	38%
There have been material, complex accounting estimates	0%	25%	13%	38%	25%

There is existing or pending material litigation between					
shareholders and management	0%	0%	25%	63%	13%
The assets are susceptibility to loss or misappropriation	0%	25%	25%	38%	13%
The organization has completed unusual and comples					
transactions particularly at or near the end of the accounting					
period	0%	13%	13%	38%	38%
Management places undue pressure on the auditors with					
regard to the time and or fees	0%	13%	25%	25%	38%
The accounts required adjustments in prior period	13%	13%	13%	25%	38%
There are significant and comples tax issues	0%	13%	13%	50%	25%
There is considerable manual intervention required in					
capturing and or summarizing data	0%	0%	0%	63%	38%

Source: Research Data 2013

When asked about engagement risk, 63% of the respondents agreed that the physical location of the organizations operations makes effective adequate monitoring and a reporting system difficult with 13% remaining neutral and another 13% disagreeing on the fact thet physical location of the organization does not make an effective adequate and monitoring diffulct thus no result of engagement risk. When asked whether electronic processing (e.g., EDIelectronic data intrchange) of accounting data has resulted in complex accounting and/or auditing problems ,50% remained neutral and another 50% strongly agreed that electronic processing of accounting data had resulted to complex accounting and auditing as a result engagement risk thus misstatements in annual reports. It was noted that there are significant and/or unusual related party transaction with 50% agreeing and an additional 38% strongly supporting the same dimension and 13% remaining neutral, when asked about Material, complex accounting estimates 38% agreed that indeed complex accounting estimates resulted to engagement risk with 13% remaining neutral and another 25% disagreeing. A good number of respondents agreed that there is existing or pending material litigation between shareholders and management with a value of 63% this was supported by an additional 25% who strongly agreed on the same dimension with 25% remaining neutral on the issue of material litigation between shareholders and nmanagement. 38% of the respondents felt that the assets are susceptible to loss or misappropriation was a factor of engagement risk thus

resulting to misstatements in annual reports, this was supported by an additional 13% who strongly agreed to this factor with 25% remaining neutral and another 25% disagreeing to this factor.when asked about the organization having completed unusual and complex transactions, particularly at or near the end of the accounting period 38% agreed and was supported by an additional 38% this implies the risk of engagement risk in annual reports thus causing misstatements,13% of the respondents remained neutral and another 13% disagreed to this factor. 38% of the respondents strongly agreed that the management placed undue pressure on the auditors with regard to the time and/or fee thus resulting to engagement risk this was supported by an additionaal 25% who also agreed to this factor,25% of the respondents remained neutral with 13% disagreeing to the fact that management places undue pressure on the auditors with regard to time and/or fees.when asked whether accounting required adjustments in prior period,38% strongly agreed to this factor with an additional 25% supporting to agreeing on the same,13% remained neutral with another 13% strongly disagreeing that the accounts required adjustment in prior periods.50% agreed that there were significant and complex tax issue thus an indication of engagement risk,13% of the respondents remained neutral with another 13% disagreeing to this factor. finally when asked whether there was a considerable manual intervention required to capturing, processing, and/or summarizing data, 63% of the respondents agreed to this factor thus an indication of engagement risk thereby causing misstatements in annual reports this was supported by an additional 38% who strongly agreed on the same dimension. Similar to inherent and detection risks, the analysis of engagement risks by the auditors prior to the audit engagement plays a crucial role in the detection of material misstatement, most of the respondents agreed to the statements on the engagement risks which calls upon the auditors to give more emphasis on the analysis of the engagements risks in their assignemnts.

### 4.3.4 Control risks and detection of misstatements in annual reports

Based on a five likert scale of Striongly dissagre, Dissagree, Neutral, Agree and strongly agree, the researcher sought to establish the agreement of the respondents with the various variables under control risks, the results are presented in table 4.8 below.

Table 4.8 Control risks

	Strongly	Disagree	Neutral	Agree	Strongly
Variables	Disagree				Agree
Appropriate controls are missing	25%	0%	0%	63%	13%
The controls are performed on a test basis	0%	13%	13%	50%	25%
The controls are poorly designed	0%	13%	13%	50%	25%
Controls are nor properly applied	0%	0%	25%	50%	25%
The misstatement is caused by incorrect date					
which is manually determined or calculated	13%	0%	13%	25%	50%

Source: Research Data 2013

When asked about control risk, 63% of the respondents agreed that missing of appropriate controls was a key factor to control risk, going by the response this implies an indication of control risk therby resulting to misstatements in annual reports, this was supported by an additional 13% who strongly agreed to this factor with 25% strongly disagreeing on the factor of appropriate controls missing the researcher also asked whether the controls are performed on a test basis,50% agreed and it was supporteed by 25% who strongly agreed on the same, 13% remained neutral and another 13% disagreed to the fact that the controls are performed on a test basis.the researcher went ahead to ask whether the controls were poorly designed, 50% agreed implying prescence of control risk, this was strongly supported by another 25%, however 25% remained neutral.50% of the respondents thought that the controls were not properly applied with 25% remaining neutral on this factor, finally when asked whether the misstatements was caused by incorrect date which is manually determined or calculated,50% strongly agreed indicating prescence of control risk thereby resulting to misstatements in annual reports, this was supported by an additional 25% with 13% remaining neutral and another 13% disagreeing to the fact that misstatements was caused by incorrect date which was manually determined or calculated. The findings indicates that analysis of control risks prior to the performance of the audit work plays an important role in the detection of matrial misstatements in the annual reports, thus a need of auditors to critically consider the control risks analysis while undertaking their duties.

### 4.3.5 Material misstatement by audit risk assessment.

Based on a five likert scale of Striongly dissagre, Dissagree, Neutral, Agree and strongly agree, the researcher sought to establish the agreement of the respondents with the various variables under material misstatement, the findings are presented in table 4.9 below.

**Table 4.9** Material misstatement

	Strongly	Disagree	Neutral	Agree	Strongly
Variables	Disagree				Agree
Because the workload of accounting personnel does not					
permit satisfactory job performance	13%	0%	25%	50%	13%
Because the segregation of duties among accounting					
personnel is inadequate	0%	13%	13%	50%	25%
Because the methods used to select, train and supervise					
accounting personnel is inadequate	0%	0%	38%	38%	25%
Misstatements occurs during input into the computer					
system	0%	0%	13%	25%	63%
Because of erroneous data in an exchange or source					
document	0%	0%	38%	50%	13%
Because the auditor disagreed with management's					
judgment	0%	0%	0%	63%	38%
Bacause of inadequate physical security over movable					
and valuable assets	0%	13%	13%	63%	13%
Because of management override of the control system	13%	0%	25%	25%	38%
Because the methods used to select, train and supervise					
management personnel were inadequate	0%	0%	25%	50%	25%
Misstatement occurs at the boundary of an information					
stream	0%	0%	25%	63%	13%

Source: Research Data 2013

When asked about material misstatements, 50% agreed to the fact that because the workload of accounting does not permit satisfactory job performance hence misstatements of annual reports, 25% remained neutral with 13% disagreeing. When asked whether segregation of

duties among accounting personnel was inadequate,50% agreed and they were supported by another 25% who strongly agreed with 13% remaining neutral and another 13% disagreeing.38% of the respondents agreed and others remaining neutral respectively when asked whether the methods used to select, train and supervise accounting personnel was inadequate this implies a high degree of material misstatements as this factor was supported by 25% of the respondents who strongly agreed. When asked whether misstatements occur during input in the computer system, 63% strongly agreed implying the risk of not giving a true and fair view of the clients financial statements, this was supported by 25% of the respondents who also agreed with 13% remaining neutral.50% of the respondents agreed that material misstatements was as a result of erroneous data in an exchange or source document,13% supported this by strongly agreeing with 38% of the respondents remaining neutral.when asked whether material misstatements was as a result of the the auditor disagreeing with management's judgment 63% agreed this implies that the relationship between auditor and management is key in determining the position of the financial reports,13% remained neutral with another 13% disagreeing.when asked whether inadequate physical security over movable and valuable assets resulted to material misstatements 63% of the respondents agreed with 13% strongly agreeing, remaining neutral and disagreeing respectively.38% of the respondents strongly agreed that management override was a key factor in material misstatements, this was supported by 25% who agreed to this factor with 25% and 13% remaining neutral respectively.when asked about the methods used to select,train and supervise management personnel,50% agreed that this methods were inadequate and hence a risk of material misstatements in annual reports this was supported by 25% of the respondents who strongly agreed with 25% remaining neutral.finally the researcher wanted to find out whether misstatements occured at the boundary of an information stream,63% agreed to this factor implying that boundary information is a key factor to material misstatements, they were supported by another 13% with 25 % remaining neutral. Overall the findings indicates that the analysis of risks plays a crucial roles in detection of material misstatements in the financial reports, thus it is important for the auditors to consider all the four types of risks; inherent, detection, engagement and control risks while undertaking an audit assignment as they will simplify their work in detection of material misstatements in the financial reports.

### 4.3.6 Audit risk assessment and detection of misstatements in annual reports

After evaluating the frequency of the various audit risk assessment, the researcher gave the summary of the descriptive statistics, the results in table 4.10 below evaluates minimum and maximum value, mean, median, std. deviation, kurtosis and skewness.

Table 4.10 Audit risk assessment

	N	Minim um	Maxi mum	Mean	medi an	Std. Deviation	skewn ess	kurtos is
Inherent risk	155	32.00	103.00	1.6000	0.7	1.14018	0.139	-0.228
Detection risk	155	41.00	127.00	1.2000	0.71	1.30384	0.678	-0.892
Engagement risk	155	30.00	133.00	1.4000	0.76	1.14018	1.007	-0.984
Control risk	155	73.00	104.00	1.6000	0.74	1.51658	0.74	-0.845
Material misstatement	155	48.00	124.00	1.6000	0.6	1.67332	0.957	-1.266
Valid N (listwise)	155							

Source: Research Data 2013

Measures of distribution such as skewness and kurtosis indicate how much a distribution varies from a normal distribution. In general, a skewness value greater than one indicates a distribution that differs significantly from normal symmetric distribution.

Inherent risk had a minimum of 32 and a maximum of 103.the average score was 1.600 meaning that inherent risk influences the detection of misstatements in annual reports and the median gap is 0.7. The standard deviation is 1.14018 indicating the spread of gaps away from the mean. The distribution is positively skewed with a skewness of 0.139 which indicates that the figures are deviated more to the right. The kurtosis value is -0.228 which means that the measure of the heaviness of the tails of distribution about the mean is minimal.

Detection risk had a minimum value of 41 and a maximum of 127. The mean is 1.2000 meaning that detection risk influences the detection of misstatement and the median is 0.71. The standard deviation is 1.30384 which means that the gaps are spread away from the mean. The distribution is positively skewed with a value of 0.678 indicating the gaps are deviated to the right of the mean and the gaps are clustered away from the mean with a kurtosis value of 0.892.

Engagement risk has a minimum value of 30 and a maximum of 133. The mean is 1.4000 meaning engagement risk has an impact on the detection of material misstatement and median is 0.76. The standard deviation of engagement risk is 1.14018 which indicates that the gaps are not very widely deviated from the mean. The deviation is to the right with a positive skewness of 1.007. The gaps are also clustered at a point different from the mean of the distribution because the kurtosis value is -0.984.

Control risk has a minimum of 73 and a maximum of 104. The average gap for this dimension is 1.6000 depicting material misstatement. The median gap is 0.74. The standard deviation is 1.51658 showing little deviation from the mean which is spread towards the right as the distribution is positively skewed with a value of 0.74 and the gaps cluster at some point away from the mean with a kurtosis value of 0.845.

Material misstatement has a minimum value of 48 and a maximum of 124. The average gap score for the material misstatement dimension is 1.6000. The median gap for this distribution is 0.6. It has a standard deviation of 1.67332 which means that the gaps are not deviated away from the mean not. They are deviated to the right because the distribution is positively skewed with a value of 0.9587 and clustered at a value away from the mean with a kurtosis value of -1.266.

### 4.4 Audit risk assessment and detection of misstatement in annual reports

The researcher sought to find out the relationship between the variables. Using 0.05 significance level, the results are presented in table 4.11 below.

Table 4.11 Relationship between audit risk assessment and detection of misstatement N=155 Sign. 0.05

	Inherent	Detection	Engagement	Control	Material
	risk	risk	risk	risk	misstatement
Inherent risk	1				
Detection risk	.740 .153	1			
Engagement risk	.731	.942(*)	1		
Control risk	.463	.936(*) .019	.839	1	
Material misstatement	.681	.963(**)	.891(*) .042	.906(*)	1

<sup>\*</sup> Correlation is significant at the 0.05 level (2-tailed).

Source: Research Data 2013

The results established that detection risk and inherent risk were positively related at 0.740 with a significance level of 0.153 this implies that the internal controls systems and the auditor's procedures greatly influence the detection of material misstatement in annual reports. The relationship between detection risk and inherent risk was not significant meaning that the the organizations operating results are particularly sensitive to economic factors (such as inflation and interest rates) other than the internal control systems. Engagement risk was positively related to inherent risk at 0.731 p-value and sig. of 0.161 meaning clients business

risk and the internal control system have a positive influence on the detection of misstatement in annual reports though not significant as seen by the significance level, for engagement risk and detection risk they were positively related at 0.942 at sig. 0.017 meaning that the Physical location of the organization's operations makes effective adequate monitoring and a reporting system difficult thus making audit procedures cumbersome and the result is misstatement in annual reports. Control risk and inherent risk were positively related at 0.463 with sig. of 0.433 impliying that the relationship between control risk and inherent risk was not significant meaning that the internal control system may not be sufficient enough to detect material misstatement in annual reports . For control risk and detection risk, they were positively related at 0.936 with sig. of 0.019 meaning that auditors procedures influence the detection of material misstatement, for control risk and engagement risk they were positively related at 0.839 with sig. of 0.076 this implied that there is considerable manual intervention required in capturing, processing, and/or summarizing data. the relationship between material misstatement and inherent risk was a positive relation with a p-value of 0.681 with sig. 0.205 this implied that internal control system have a positive influence on detection of material misstatement but not very significant.detection risk and material misstatement were positively related at 0.963 with sig. of 0.009 meaning that auditors procedures had a significant influence on material misstatement. For material misstatement and engagement risk they were positively related at 0.891 with a sig. of 0.042 again the researcher found out that clients business risk had a significant influence on material misstatement.for material misstatement and control risk they were positively related at 0.906 with sig. of 0.034 meaning that the missing of appropriate controls control has an influence on material misstatement. In general The relationship between all the measurers of variables was found to be significant as for all the variables, the significance level was below 0.05, with the exception of detection and inherent risk, control risk and inherent risk, material misstatement and inherent risk and control risk and engagement risk whose significance value were above 0.05. Further all the measures of variables were positively related to one another as depicted by the positive signs of the Pearson correlations.

### 4.5 Effect of audit risk assessment and detection of misstatements in annual report

The researcher sought to test the hypotheses by regressing audit risk assessment against material misstatements where t – test was used to test for the significance of each predictor variables (Audit risk assessment) in the model, the findings are presented in table 4.12 below.

### Coefficients(a)

		Unstandardized		Standardized		
Model		Coefficients		Coefficients	t	Sig.
		Std.				
		В	Error	Beta		
1	(Constant)	6.000	5.380		1.115	0.290
	Inherent risk	-4.000	0.54772	-2.726	0.000	0.024
	Detection risk	12.000	.24495	9.350	-1.633	0.008
	Engageme nt risk	-2.000	.37417	-1.363	-0.535	0.002
	Control risk	-6.000	0.31623	-5.438	0.000	0.015

a Dependent Variable: Material misstatement

Source: Research Data 2013

The null hypothesis (i.e. the model lacking explanatory power) was rejected when the significance value t – statistic was less than 0.05 (significance level).

The above table, shows the relationship between the dependent variable (detection of misstatement) and the independent variables (inherent risk, control risk, detection risk and engagement risk). In using the regression model DRaf =  $\alpha$  + b1IR + b2CR + b3DR + b4ER + E

The following regression equation was formulated from the above study; DRaf= 6.000 - 4.000 IR - 6.000 CR + 12.000 DR - 2.000 ER + 0.000. On the basis of the significance values shown on the table above, the independent variables; Inherent risk (P=0.024), control risk (P=0.015) , detection risk (P= 0.008) and Engagement risk (P=0.002). All the four hypotheses were rejected as they had a t-value of below 0.05 significant level, meaning the

study established that there is a significant relationship between auditors risk assessment and detection of misstatement in annual reports in Nairobi County.

From the study above, the coefficient for Inherent risk is -4.000 hence for every unit increase in Inherent risk, a -4.000 unit increase in detection of material misstatement is predicted, the coefficients for control risk and detection risk are -6.000 and 12.000 coefficients respectively. This shows that there is -6.000 and 12.000 predicted unit increase detection of material misstatement and for engagement risk is -2.000 meaning that for every unit increase in engagement risk, a -2.000 unit increase in detection of material misstatement. The null hypothesis (i.e. the model lacking explanatory power) was rejected when the significance value t – statistic was less than 0.05 (significance level).

On the basis of the significance values (Table 4.12), audit risk factors namely; inherent risk (P=0.024, p < 0.05) detection risk (P=0.008, p < 0.05), engagement risk (P=0.002, p < 0.05) and control risk (P=0.015, p < 0.05). This means inherent risk, detection risk, engagement risk and control risk contributed significantly to the material misstatement in annual reports since in all the four factors of audit riskthe model lacking explanatory power was rejected since the significance value t-statistic was less than 0.05.

According to the regression summary model (Table 4.12), the co-efficient of determination (R) indicated a value of 0.462 and  $R^2 = 0.225$  or 22.5%. These findings confirm that the observed change in material misstatement attributed to the audit risk factors was 22.5% while the remaining percentage could be explained by other intervening factors such as the internal control system, accounting standard and auditor's standard.

### 4.5.1 Effect of inherent risk on material misstatement

Ho1: There is no significant relationship between inherent risk factors and detection of misstatement in Nairobi County. The regression for inherent risk against the material misstatement, the t-value was 0.000 which was below the significant level of 0.05, thus the

null hypothesis was rejected, this means that the prescence of internal control systems was important in detection of misstatement in annual reports.

The study is supported by AICPA (1983) who found out that inherent risks has a significant impact on material misstatement, the findings does not agree with findings of Arens et al. (2005), who established that inherent risks does not affect material misstatement. Similar to Waller (1993) whose results show that as opposed to expectations, there is no important relationship between the assessments of inherent and control risk, which does not support this findigs. A study by Buszac and Schmidt (2011) study on detecting misstatements in financial statements revealed that a number factors influencing inherent and control risk have significant impact on the number and size of audit adjustments, which supports the current findings.

#### 4.5.2 Effect of control risk on material misstatement

Ho2: There is no significant relationship between control risk factors and detection of misstatement in Nairobi County. The researcher went ahead to test the control risk against the material misstatement and the t-value was found as 0.000, thus the null hypothesis was rejected, this implies that analysis of appropriate controls, controls done on test bassis and inputing of incorrect data contributes significantly to the detection of material misstatement by the auditors.

The findings is supported by AICPA (1983), the study is further supported by Brazel and Agoglia (2007), Wright and Wright (2002), Bulkeley (2006) studies who noted that control risk can also increase as the focus shifts from segregation of duties to greater access to information, supervisory review and supplemental internal control applications. However the study contradicts Arens et al. (2005) findings.

### 4.5.3 Effect of engagement risk on material misstatement

Ho3: There is no significant relationship between engagement risk factors and detection of material misstatement in Nairobi County. For the engagement risk against material misstatement, the t-value was found as -0.535, the null hypothesis was again rejected for the value was below 0.05, this implies that Physical location of the organization's operations makes effective adequate monitoring and a reporting system difficult and also there are

significant and/or unusual related party transactions. Thus analysis of engagement risks by the auditors greatly assists them in detecting material misstatement in the financial reports.

The findings is supported by Mock and Turner (2005) and De Martins (2005) studies who found that overall risk assessments affects detection of material misstatements in the financial reports.

#### 4.5.4 Effect of detection risk on material misstatement

Ho4: There is no significant association between detection risk factors and detection of misstatement in financial reports in Nairobi County. The hypothesis for detection risk against the material misstatement, the t-value was found as -1.633, thus the null hypothesis was rejected as it was below 0.05, and this shows that the organizations operating results are particularly sensitive to economic factors (such as inflation and interest rates) other than the internal control systems and thus the analysis of detection risk clearly helps in detection of material misstatement in the financial reports.

The findings is supported by studies of (Gupta, 2005; Okezie, 2008), who found that detection risk assessments would be influence material misstatements in the financial reports.

#### 4.5.5 Overall effect of audit risk assessment and detection of misstatements

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics					Durbin- Watson
					R Square Change	F Change	df1	df2	Sig. F Change	
1	0.462( a)	0.225	0.201	4.719	1.000	3.696	4	0	0.14	1.286

a Predictors: (Constant), Control risk, Inherent risk, Engagement risk, Detection risk

b Dependent Variable: Material misstatement

Source: Research Data 2013

The Durbin-Watson Statistic was used to test for the presence of serial correlation among the residuals. The value of the Durbin-Watson statistic ranges from 0 to 4. As a general rule of thumb, the residuals are uncorrelated if the Durbin-Watson statistic is approximately 2. A value close to 0 indicates strong positive correlation, while a value of 4 indicates strong negative correlation. Durbin-Watson should be between 1.5 and 2.5 indicating the values are independent (Statistica). The researcher established a Durbin Watson value of 1.286, this implies that the independent variables and the dependent variable were positively correlated

in the model. Thus in conclusion the auditors have to put more emphasis on the risk assessment as they highly contribute to their ability to detect material misstatement in the annual reports.

The results of multiple regression analysis obtained multiple correlation coefficient (R) of 0.462 indicates multiple correlations (control risk, inherent risk, engagement risk, detection risk) with the material misstatement. Adjusted R2 value of 0.201 indicates the extent of the role of contribution of independent variables is able to explain the dependent variable at the extent of 20.1% meaning that there are other factors other than the audity risk factors that influence the detection of misstatement in annual reports.. The standard error of the estimate was significant at 4.719

#### **CHAPTER FIVE**

### SUMMARY OF FINDINGS, CONCLUSION AND RECOMMENDATIONS

### 5.1 Summary of Findings

This study set out to evaluate the relationshiop between audit risk assessment and detection of misstatements in annual reports in Nairobi County, Kenya. The data was collected using questionnaires targeting external auditors in audit firms registered by the registration accounting board (RAB) in Nairobi County. Out off 254 questionnaires issued 155 were returned back duly filled representing 78% response.

The data was analyzed and discussed under the following research objectives: To establish whether there is any significant relationship between auditors' assessment of inherent risk factors at the financial level to the incidence and magnitude of auditors detected misstatement, to establish whether there is any significant relationship between auditors' assessment of control risk factors to the incidence and magnitude of auditors detected misstatement, to establish whether there is any significant relationship between auditors' assessment of engagement risk to the incidence and magnitude of auditors detected misstatement, to establish whether there is any significant relationship between auditors' assessment of detection risk to the incidence and magnitude of auditors detected misstatement, and to examine the overall relationship between audit risk assessment to the incidence and magnitude of auditors detected misstatement in annual reports in Nairobi County.

The Study findings indicated the uneven distribution of the respondents by gender. There were 155 respondents in total. The distribution is as shown in the figure below, 52% male and 48% female. This implies that gender Equality was almost achieved in the study area.

The Study found out that 50% of the respondents were between 24-33 years and they marked to be majority. About 25% of the respondents were of the age between 34-43 years whereas 12.5% each were in the age bracket between 44-53 year and above 54 years respectively. These findings indicate that majority of respondents were young considerably vibrant to understand the new standards on audit risk assessment and detection of misstatements in annual reports; hence most of the external auditors had the prerequisite knowledge of the audit risk assessment factors.

The researcher sought to establish the number of years the respondents had worked in their current stations, 50% of the respondents had worked for between 2-5 years while 25% had worked for between 1-2 years and 5-10 years respectively. Working experience in the same organization is an important factor with significant influence on understanding of operations of audit firms as well as clients annual rerports therby understanding the audit risk assessment factors.

The Study found out that 50% of the respondents had a working experience of 5-10 years. About 37.5% of the respondent had a working experience of 2-5 years whereas 12.5% had experience between 1-2 years. None of the respondents had a working experience of less than one year meaning the external auditors had a proper understanding of the audit risk factors. These findings indicate that majority of respondents had worked considerably long to understand audit risk assessment factors and detection of misstatements in annual reports

Under the descriptive statistics the minimum for inherent risk was 32, the maximum was 103, the mean 1.6 and standard deviation was 1.14, for detection risk the minimum was 41, the maximum was 127, the mean 1.2 and standard deviation 1.30, for engagement risk the minimum was 30, the maximum 133, the mean 1.4 and standard deviation was 1.14, for control risk the minimum was 73, the maximum 104, the mean 1.6, the standard deviation 1.51 while for material misstatement the minimum was 48, the maximum 124, the mean 1.6 and standard deviation was 1.67.

## 5.1.1 Audit risk assessment and detection of misstatement in annual reports

The results established that detection risk and inherent risk were positively related at 0.740 with a significance level of 0.153 this implies that the internal controls systems and the auditor's procedures greatly influence the detection of material misstatement in annual reports. The relationship between detection risk and inherent risk was not significant meaning that the the organizations operating results are particularly sensitive to economic factors (such as inflation and interest rates) other than the internal control systems. Engagement risk was positively related to inherent risk at 0.731 p-value and sig. of 0.161 meaning clients business risk and the internal control system have a positive influence on the detection of misstatement in annual reports though not significant as seen by the significance level, for engagement risk and detection risk they were positively related at 0.942 at sig. 0.017 meaning that the Physical location of the organization's operations makes effective adequate

monitoring and a reporting system difficult thus making audit procedures cumbersome and the result is misstatement in annual reports. Control risk and inherent risk were positively related at 0.463 with sig. of 0.433 impliying that the relationship between control risk and inherent risk was not significant meaning that the internal control system may not be sufficient enough to detect material misstatement in annual reports. For control risk and detection risk, they were positively related at 0.936 with sig. of 0.019 meaning that auditor's procedures influence the detection of material misstatement, for control risk and engagement risk they were positively related at 0.839 with sig. of 0.076 this implied that there is considerable manual intervention required in capturing, processing, and/or summarizing data. .the relationship between material misstatement and inherent risk was a positive relation with a p-value of 0.681 with sig. 0.205 this implied that internal control system have a positive influence on detection of material misstatement but not very significant.detection risk and material misstatement were positively related at 0.963 with sig. of 0.009 meaning that auditors procedures had a significant influence on material misstatement. For material misstatement and engagement risk they were positively related at 0.891 with a sig. of 0.042 again the researcher found out that clients business risk had a significant influence on material misstatement.for material misstatement and control risk they were positively related at 0.906 with sig.of 0.034 meaning that the missing of appropriate controls control has an influence on material misstatement. In general The relationship between all the measurers of variables was found to be significant as for all the variables, the significance level was below 0.05, with the exception of detection and inherent risk, control risk and inherent risk, material misstatement and inherent risk and control risk and engagement risk whose significance value were above 0.05. Further all the measures of variables were positively related to one another as depicted by the positive signs of the Pearson correlations.

## 5.1.2 Effect of inherent risk on material misstatement

The researcher sought to test the hypotheses by regressing audit risk assessment against material misstatements where t – test was used to test for the significance of each predictor variables (Audit risk assessment) in the model. The null hypothesis (i.e. the model lacking explanatory power) was rejected when the significance value t – statistic was less than 0.05 (significance level).

Ho1: There is no significant relationship between inherent risk factors and detection of misstatement in Nairobi County. The regression for inherent risk against the material

misstatement, the t –value was 0.000 which was below the significant level of 0.05, thus the null hypothesis was rejected, and this means that the prescence of internal control systems was important in detection of misstatement in annual reports.

The study is supported by AICPA (1983) who found out that inherent risks has a significant impact on material misstatement, the findings does not agree with findings of Arens et al. (2005), who established that inherent risks does not affect material misstatement. Similar to Waller (1993) whose results show that as opposed to expectations, there is no important relationship between the assessments of inherent and control risk, which does not support this findigs. A study by Buszac and Schmidt (2011) study on detecting misstatements in financial statements revealed that a number factors influencing inherent and control risk have significant impact on the number and size of audit adjustments, which supports the current findings.

#### **5.1.3** Effect of control risk on material misstatement

Ho2: There is no significant relationship between control risk factors and detection of misstatement in Nairobi County. The researcher went ahead to test the control risk against the material misstatement and the t-value was found as 0.000, thus the null hypothesis was rejected, this implies that analysis of appropriate controls, controls done on test bassis and inputing of incorrect data contributes significantly to the detection of material misstatement by the auditors.

The findings is supported by AICPA (1983), the study is further supported by Brazel and Agoglia (2007), Wright and Wright (2002), Bulkeley (2006) studies who noted that control risk can also increase as the focus shifts from segregation of duties to greater access to information, supervisory review and supplemental internal control applications. However the study contradicts Arens et al. (2005) findings.

## 5.1.4 Effect of engagement risk on material misstatement

Ho3: There is no significant relationship between engagement risk factors and detection of material misstatement in Nairobi County. For the engagement risk against material misstatement, the t-value was found as -0.535, the null hypothesis was again rejected for the value was below 0.05, this implies that Physical location of the organization's operations makes effective adequate monitoring and a reporting system difficult and also there are

significant and/or unusual related party transactions. Thus analysis of engagement risks by the auditors greatly assists them in detecting material misstatement in the financial reports.

The findings is supported by Mock and Turner (2005) and De Martins (2005) studies who found that overall risk assessments affects detection of material misstatements in the financial reports.

### 5.1.5 Effect of detection risk on material misstatement

Ho4: There is no significant association between detection risk factors and detection of misstatement in financial reports in Nairobi County. The hypothesis for detection risk against the material misstatement, the t-value was found as -1.633, thus the null hypothesis was rejected as it was below 0.05, and this shows that the organizations operating results are particularly sensitive to economic factors (such as inflation and interest rates) other than the internal control systems and thus the analysis of detection risk clearly helps in detection of material misstatement in the financial reports.

The findings is supported by studies of (Gupta, 2005; Okezie, 2008), who found that detection risk assessments would be influence material misstatements in the financial reports.

#### 5.2 Conclusion

The results established that detection risk and inherent risk were positively related at 0.740 with a significance level of 0.153 this implies that the internal controls systems and the auditor's procedures greatly influence the detection of material misstatement in annual reports. The relationship between detection risk and inherent risk was not significant meaning that the organizations operating results are particularly sensitive to economic factors (such as inflation and interest rates) other than the internal control systems. Engagement risk was positively related to inherent risk at 0.731 p-value and sig. of 0.161 meaning clients business risk and the internal control system have a positive influence on the detection of misstatement in annual reports though not significant as seen by the significance level, for engagement risk and detection risk they were positively related at 0.942 at sig. 0.017 meaning that the Physical location of the organization's operations makes effective adequate monitoring and a reporting system difficult thus making audit procedures cumbersome and

the result is misstatement in annual reports. Control risk and inherent risk were positively related at 0.463 with sig. of 0.433 impliying that the relationship between control risk and inherent risk was not significant meaning that the internal control system may not be sufficient enough to detect material misstatement in annual reports. For control risk and detection risk, they were positively related at 0.936 with sig. of 0.019 meaning that auditor's procedures influence the detection of material misstatement, for control risk and engagement risk they were positively related at 0.839 with sig. of 0.076 this implied that there is considerable manual intervention required in capturing, processing, and/or summarizing data. .the relationship between material misstatement and inherent risk was a positive relation with a p-value of 0.681 with sig. 0.205 this implied that internal control system have a positive influence on detection of material misstatement but not very significant.detection risk and material misstatement were positively related at 0.963 with sig.of 0.009 meaning that auditors procedures had a significant influence on material misstatement. For material misstatement and engagement risk they were positively related at 0.891 with a sig. of 0.042 again the researcher found out that clients business risk had a significant influence on material misstatement.for material misstatement and control risk they were positively related at 0.906 with sig. of 0.034 meaning that the missing of appropriate controls control has an influence on material misstatement. In general The relationship between all the measurers of variables was found to be significant as for all the variables, the significance level was below 0.05, with the exception of detection and inherent risk, control risk and inherent risk, material misstatement and inherent risk and control risk and engagement risk whose significance value were above 0.05. Further all the measures of variables were positively related to one another as depicted by the positive signs of the Pearson correlations.

According to the regression summary model, the co-efficient of determination (R) indicated a value of 0.462 and  $R^2 = 0.225$  or 22.5%. These findings confirm that the observed change in material misstatement attributed to the audit risk factors was 22.5% while the remaining percentage could be explained by other intervening factors such as the internal control system, accounting standard and auditor's standard.

The Durbin-Watson Statistic was used to test for the presence of serial correlation among the residuals. From the Durbin Watson finding, the independent variables and the dependent variable were positively correlated in the model. Thus in conclusion the auditors have to put more emphasis on the risk assessment as they highly contribute to their ability to detect material misstatement in the annual reports.

#### **5.3** Recommendations

The research will form a basis for consideration by the auditors to place more emphasis on risk assessment as it greatly influences the detection of material misstatements in the financial reports as depicted from the findings. The study will be used as a basis by the Institute of Public Accountants (ICPAK) when designing training courses in the area of risk management, the courses will place more emphasis on the four types of risks, inherent riks, detection risk, engagement rik and control risk and their positive impact on detection of material misstatements in the financial reports, thus emphasis by the auditors to consider the risks should be communicated through the courses.

## **5.4** Suggestions for Further Research

The current study established the effect of risk assessment on material misstatement and looked at only four risks, control risk, detection risk, engagement risk and inherent risk, it is suggested that a smilar study be undertaken looking at the other types of risks in relation to material misstatement. Further the current study established the effect of risk assessment on material misstament from the perspective of the external auditors, it is suggested that a smilar study be undertaked to establish the effect of risk assessment on detection of misstatement from the perspective of the internal auditors. The study was carried out in the Nairobi County; it is recommended that a similar study be undertaken in the other counties to establish the relationship between risk assessment and detection of material misstatement in annual reports. It is further recommended that a similar study be undertaken in the other countries of East Africa to establish the relationship between risk assessment and material misstatement given that a number of companies operate across the region.

#### REFERENCE

- Adeniji, A.A. (2004). Auditing and Investigation, Lagos: Value Analysis Consult Publishers.
- Amerongen, N.V.N. (2007) Auditors' Performance in Risk and Control Judgments: An Empirical Study. Unpublished Ph.D. Dissertation, Vrije Universiteit Amsterdam
- American Institute of Certified Public Accountants (AICPA): SAS 47(1996), Audit Risk and Materiality in Conducting an Audit.
- American Institute of Certified Public Accountants (AICPA). (1983). *Audit risk and materiality in conducting an audit*: SAS No. 47. New York: AICPA.
- Akhter, F., Hobbs, D., and Maamar, Z. (2005) A fuzzy logic-based system for assessing the level of business-to-consumer (B2C) trust in electronic commerce. Expert Systems with Applications (28:4), 2005,pp. 623-628.
- Alderman, C.W. & Tabor, R.H. March (1989). The Case for Risk-driven Audits. *Journal of Accountancy*. 55-61.
- Aldersley, S.J. (1989). Discussion of Achieved Audit Risk and the Audit Outcome Space. Auditing: *A Journal of Practice & Theory*, 8 (Supplement): 85 97.
- Arens, A.A. & Loebbecke, J.K. (2000). *Auditing: An Integrated Approach*. First Edition. New Jersey, USA. Prentice-Hall Inc.
- Allen, R. D., Blay, D. R., Kozloski, T. M., & Ramsay, R. J. (2007). *Auditor Risk Assessment: Insights from the Academic Literature*. Accounting Horizons
- Asare, S.K. and Wright, A. (2002). *The Effectiveness of Alternative Risk Assessment and Program Planning Tools in a fraud setting*. A Paper presented at the 2002 American Accounting Association, AAA Conference held in San Antonio, Texas.
- Austin, L.A., Eilifsen, A. and Messier, Jr. W.F. (2002). *The Relationship of Risk Assessments and Information Technology to Detected Misstatements*.
- Bhimani, A., Gulamhussen, M.A. and Lopes, S. (2009). The effectiveness of auditors going concern evaluation as an external governance mechanism: Evidence from loan defaulters. *International Journal of Accounting*, 44(3): 239-255.

- Bronson, S.N., Hogan, C.E., Johnson, M.E. and Ramesh, K. (2008). The value of auditing: Evidence from the timing of earnings announcements and audit report dates. Working paper, Michigan State University.
- Bedard, J.C. and Graham (2002). An Archival Investigation of Audit Program Planning. Auditing: *A Journal of Practice & Theory*. 9(1): 57-71.
- Bedard, J. (1990). Discussion of Control Risk Assessments: Do They Relate to Errors? Auditing: *A Journal of Practice & Theory*. (Supplement). 27-32.
- Bell, T. & O'Marrs & F. Solomon. (2005). Auditing Organizations through a Strategic-Systems Lens. The KPMG Business Measurement Process. KPMG LLP. The development and evaluation of risk-based audit approaches
- Bickman and Rog. (1998). Empirical analyses of errors discovered in audits of property and casualty insurers. Auditing: *A Journal of Practice & Theory 13* (Spring): 84-100
- Blay, A., Kizirian, T., & S., Dwight, (2003). Evidential Effort And Risk Assessment In Auditing, *Journal of Business & Economics Research*, 6, 39-59.
- Brody, R.G. & Lowe, D.J. & Pany, K. (2005). *Could \$51 million be immaterial when Enron reports income of \$105 million?* Accounting Horizons. 17(2): 153-160.
- Colbert, J. L. (1996). *Audit Risk Tracing the Evolution*. Accounting Horizons, évfolyam, 3. szám; pp. 49-57.
- Carmichael, D. (2006). *How new risk standards differ from past practice*. Accounting Today. 1(2006): 14,16,33.
- Colbert, J.L. & Luehlfing, M.S. & Alderman, C.W. March (1996). Engagement Risk. *CPA Journal*. 66 (3): 54-56.
- Daniel, S. J. (1988). Some Empirical Evidence about the Assessment of Audit Risk in Practice. Auditing: *A Journal of Practice & Theory*, 7. évfolyam, 2. szám; pp. 174-180.
- Dechow, P., Dichev, D. (2011). The Quality of Accruals and Earnings: The Role of Accrual Estimation Errors. The *Accounting Review*, Vol. 77, Supplement, p. 35-59

- Dobler, M. (2003). *Auditing Corporate Risk Management: A Critical Analysis of a German Particulairty*. A paper presented at the first European Auditing Research Network Symposium in Wuppertal.
- Dusenbury, R. & Reimers, J.L & Wheeler, S. Fall (1996). The Audit Risk Model: An Empirical Test for Conditional Dependencies among Assessed Component Risks. Auditing: *A Journal of Practice & Theory*. 19(2): 105 117.
- Gupta, K. (2005). Contemporary Auditing, New Delhi: Tata McGraw-Hill Company.
- Fogarty, J.A. & Graham, L. & Schubert, D.R. July (2006). Assessing and Responding to Risks in a Financial Statement Audit. *Journal of Accountancy*: 43.
- Fogarty, J.A. & Graham, L. & Schubert, D.R. January (2007). Assessing and Responding to Risks in a Financial Statement Audit: Part II. *Journal of Accountancy*
- Haskins, E. H., and Dirsmith, M. W. (1995) *Control and inherent risk assessments in client engagements*: an examination of their interdependencies, Journal of Accounting and Public Policy (14), 1993, pp. 63-83.
- Herawaty and Hoque (2007). Inherent risk. Auditing: A Journal of Practice & Theory (Spring): 1-21
- Graham, L. (1985). Audit Risk Part I V. *The CPA Journal*, augusztus, pp.12-21; szeptember pp. 34-40; október pp. 36-43; November pp. 38-46.; December pp. 26-33.
- Gist W.E & Shastri T. & Colson. November (2003). Revisiting Materiality. *CPA Journal*. 73(11): 60 63.
- Houston, R. W., Peters, M. F., & Pratt, J. H. (1999). *The Audit Risk Model, Business Risk and Audit-Planning Decisions*. The Accounting Review , 74. évfolyam, 3. szám; pp. 281-298.
- IAASB (2006) *Brief History of Its Development and Progress*. július). Letöltés dátuma: 2011. október 29., forrás: IFAC:
- IAAS, ISA 200 (2006). *International Standard on Auditing*: ISA 200. The South African Institute of Chartered Accountants. Johannesburg, South Africa.

- IAASB/IRBA. (2007). *Proposed International Standard on Auditing* 320 (Revised and redrafted) /Exposure Draft: ISA 320R and ISA 450. The South African Institute of Chartered Accountants. Johannesburg, South Africa.
- Jaffar, N. (2009). Fraud Detection: *The moderating role of fraud risk level*, Journal of Business and Public Affairs, 3(1): 1-15.
- Konrath, L.F. (2002). Auditing: *a risk-analysis approach*. Fifth edition. Cincinnati, Ohio: International Thomson Publishing: 1 809.
- Konrath, L.F. (1999). The predictive power of limited information in preliminary analytical review: An empirical study', *Journal of Accounting Research* (Supplement), pp. 148-65.
- Khurana, I.K., & Raman, K.K., (2004). Litigation risk and the financial reporting credibility of big 4 versus non-big 4 audits: evidence from Anglo-American countries, The Accounting Review, 79(2),473-495.
- Kreutzfeldt, R.W. & Wallace, W. (1990). Control Risk Assessments: Do They Relate to Errors? Auditing: *A Journal of Practice & Theory*. (Supplement). 1-26.
- Krejcie, Robert V. and Morgan, Daryle W. (2006) Determining Sample Size for Research Activities. Educational and Psychological Measurement (2006): pg 30
- Law, P., (2001). Auditors' perceptions of reasonable assurance in audit work and the effectiveness of the audit risk model, Asian Review of Accounting, 16(2), 160-178.
- Libby R. & Artman J.T. & Willingham J.J. April (1985). *Process Susceptibility, Control Risk, and Audit Planning*. The Accounting Review. LX (2): 212 230.
- Low, K.-Y. (2004). The Effects of Industry Specialization on Audit Risk Assessments and Audit-Planning Decisions. The Accounting Review, 79. évfolyam, 1. szám; pp. 201-219.
- Lord (2002). Auditors' experience with material irregularities: frequency, nature, and delectability. Auditing: *A Journal of Practice & Theory* 9 (Fall): 1-28.
- Mack and Ryan (2007) Are audit program plans risk-adjusted? Auditing: A *Journal of Practice & Theory* (Spring): 55-74.

- Mautz, R. K. & Sharaf H. A. (1961). *The Philosophy of Auditing*. Ninth Printing, First Edition, Florida: American Accounting Association: 1-247.
- McKee, T.E. & Eilifsen, A. & Hitzig, N.B. & Klein, J.M. July (2000). Current Materiality Guidance for Auditors. *CPA Journal*. 70(7): 54 57.
- Monroe, G., and J. Ng. (2000). *The descriptive ability of models of audit risk*. In Belief Functions in Business Decisions, edited by R. P. Srivastava, and T. J. Mock, 161 183. New York, NY: Physica-Verlag Heidelberg.
- Messier, W.F. & Austen, L.A. Fall (2000). Inherent and Control Risk Assessments: Evidence on the Effect of Pervasive and Specific Risk Factors. Auditing: *A Journal of Practice & Theory*. 19(2): 119-131.
- Messier, W.F. & Martinov-Bennie, N. & Eilifsen, A. November (2005). A Review and Integration of Empirical Research on Materiality: Two Decades Later. Auditing: *A Journal of Practice & Theory*. 24(2): 153-187.
- Morton, J.E. & Felix, W.L.(Jnr). March (1991). A Critique of Statement on Auditing Standards No. 55. Accounting Horizons. 1-10.
- Mugenda Olive M. and A.G.Mugenda (1999), Research Methods: *Quantitative and Qualitative approaches*, African Centre of Technology Studies, Nairobi.
- Mugenda, Olive M. and Abel G. Mugenda, (2003). Research Methods: *Quantitative & Qualitative Approaches*. 256 pages
- Newman, D. P. & Patterson, E. & Smith, R. Jan (2001). *The Influence of Potentially Fraudulent Reports on Audit Risk Assessment and Planning*. Accounting Review. 76(1):59-80.
- Nolan, R. April (2005). *Materiality and Misstatements. Accountancy* Ireland. 37(2): 18.
- Patterson, E. & Smith, R. (2001). *Materiality Uncertainty and Earnings Misstatement*. Accounting Review. 78(3): 819-846.
- Plung and Montgomery (2004). The relation of inherent and control risks to audit adjustments. *Journal of Accounting*, Auditing & Finance (Summer): 459-484.

- Rittenberg, L.E. & Schwieger, B.J. & Johnstone, K.M. (2008). *Auditing A Business Risk Approach*. Sixth Edition. International Student Edition. Thomson Learning. United States: 1 793.
- Ricchute (2006). *Audit detection of financial statement errors*. The Accounting Review (October): 751-765.
- Ryan and NG (2000). *Transforming audit technologies: Business risk audit methodologies and the audit field.* Accounting, Organizations and Society.
- Sennetti, J.T. (1990). Toward a more consistent model for audit risk. Auditing: *A Journal of Practice & Theory*. Spring: 86 93.
- Schultz Jr., J. J., Bierstaker, J. L., & O'Donnell, E. (2010). *Integrating business risk into auditor judgment about the risk of material misstatement*: The influence of a strategic-systems-audit approach. Accounting, Organizations and Society, 35. évfolyam, 2. szám; pp. 238-251.
- Stecollini (2004). *Auditing Principles*. Third Edition. New Jersey, USA. Prentice-Hall Inc. 1 472.
- Tooley and Hooks (2009). Risk-based Internal Audit Priorities Toolset for Small Departments and Agencies.
- Tooley, Srivastava, R.P & Mock, T.J. March (2010). Why we should consider Belief Functions in Auditing Research and Practice. The Auditor's Report. 28(2). 1 8.
- Watts, R.L. (191). Positive Accounting Theory, Prentice Hall (1986)
- Waller, W. S. (1993). *Auditors' Assessment of Inherent and Control Risk in Field Settings*. The Accounting Review, 68. Évfolyam, 4. Szám; pp. 783-803.
- Weiner, B., Frieze, I., Kukla, A., Reed, L., Rest, S., & Rosenbaum, R. M. (1971). *Perceiving the causes of success and failure*. (pp. 95–120). Morristown, NJ: General Learning Press.
- Wustemann, J., (2005). Evaluation and Response to Risk in International Accounting and Audit Systems: Framework and German Experiences.

Zadeh (1965). How the U.S. Accounting Profession Got Where It Is Today: Part II. Accounting Horizons. 17(4). 267-286.

APPENDIX I: QUESTIONNAIRE COVER LETTER

**AUDIT RISK ASSESMENT AND DETECTION OF MISSTATEMENT QUESTIONNAIRE** 

**Egerton University** 

Department of Accounting, finance and management science,

Faculty of Commerce

P.O BOX 536-20115

**EGERTON** 

**Dear Participant** 

I am a Masters student at Egerton University, Faculty of Commerce. In order to fulfill the degree requirements, I am undertaking a management research project on "Audit risk assessment and detection of misstatements in annual reports in Nairobi county".

To this end, I kindly request you that you complete the following questionnaire regarding your perception of audit risk assessment and detection of misstatement in annual reports.

Your response is of the utmost importance to me and will be used exclusively for academic purposes.

Should you have any enquiries or comments regarding this project, you are welcome to contact me directly on 0724-318-079. E-mail: linda.okeyo@yahoo.com

Yours Sincerely,

Linda Awino Okeyo.

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## APPENDIX II: QUESTIONNAIRE

Please answer all the questions honestly and exhaustively. All the information given will strictly be used for academic purpose/research only and will be treated with the utmost confidentiality.

## SECTION A: BACKGROUND INFORMATION

This section of the questionnaire refers to background or biological information. Although I am aware of the sensitivity of the questions in this section, the information will allow me to compare group's respondents. Once again I assure you that your response will remain anonymous. Your co-operation is much appreciated.

## **Demographic Data**

No.	Questions	Answer categories	Tick
1.	Gender	1. Male	
		2. Female	
2.	Age bracket	1. 18-30 years	
		2. 30- 40 years	
		3. 40-50 years	
		4. Above 50 years	
3.	How many years have you been working in your	1. Less than 1 year	
	current organization?	2. 1-2 years	
		3. 2-5 years	
		4. 5-10 years	
		5. Over 10 years	
4.	For how long have you been employed (in years)	1. Less than 1 year	
		2. 1-2 years	
		3. 2-5 years	
		4. 5-10 years	
		5. Over 10 years	

## SECTION B: AUDIT RISK ASSESMENT AND DETECTION OF MISSTATEMENTS

The questions are ranked on a five likert scale ranging from 1. Strongly Disagree 2. Disagree 3. Neutral 4. Agree 5. Strongly Agree, please tick the number in the boxes that corresponds the likert scale.

A. INHERENT RISK	1	2	3	4	5
1. Management's attitude toward financial reporting is					
unduly aggressive.					
2. Personnel turnover in accounting, finance, and					
operations (especially in senior accounting positions) is					
high					
3. Personnel are inexperienced or inadequate in number					
4. Evidence of personnel dishonesty is present					
5. Management has undue emphasis on meeting earnings					
projections (consider desire to support the price of the					
client's stock, maintain the market value of securities, or					
receive bonuses and other forms of compensation).					
6. The management is not considered respectable by the					
business community.					
7. Management is not concerned with reporting accurate					
financial information					
8. Evidence of management overriding significant					
internal accounting controls is present.					
9. Members of management are experiencing personal					
financial difficulties					
10. Management is not concerned with providing					
additional information to improve the clarity and					
comprehensiveness of the company's financial					
statements.					
11. Management's operating and financing decisions are					
dominated by a single individual or a few persons acting					

in concert.	
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B. DETECTION RISK	1	2	3	4	5
1. The organization has inadequate or inconsistent					
profitability relative to the industry.					
2. The organizations operating results are particularly					
sensitive to economic factors (such as inflation and interest rates).					
3. There are adverse legal or regulatory problems confronting the organization or industry.					
4. There are adverse political, social or economic					
conditions confronting the industry.					
5. The flow of products or services from the					
organization's suppliers is susceptible to cost, quality,					
and/or quantity fluctuations					
6. There is potential for the organization's product to become technologically obsolete.					
7. Production cycles are longer than the organization's					
fiscal year.					
8. Physical location of the organization's operations					
makes effective management difficult.					
9. The organization has a complex capital structure					
10. The organization is experiencing solvency problems					
or other factors that bring into question the entity's ability to continue as a going concern					
11. Organization's success depends on a single product					

or a small number of products or transactions.			
12. Industry is subject to strict environmental controls.			

C. ENGAGEMENT RISK	1	2	3	4	5
1. Physical location of the organization's operations					
makes effective adequate monitoring and a reporting					
system difficult.					
2. Electronic processing (e.g., EDI - electronic data					
interchange) of accounting data has resulted in complex					
accounting and/or auditing problems.					
3. There are significant and/or unusual related party					
transactions.					
4. There are material loss contingencies					
5. There have been material, complex accounting					
estimates					
6. There is existing or pending material litigation					
between shareholders and management.					
7. The assets are susceptibility to loss or					
misappropriation					
8. The organization has completed unusual and complex					
transactions, particularly at or near the end of the					
accounting period.					
9. Management places undue pressure on the auditors					
with regard to the time and/or fees.					
10. The accounts required adjustments in prior period.					
<u>L</u>				•	

11. There are significant and complex tax issues					
12. There is considerable manual intervention required in					
capturing, processing, and/or summarizing data.					
D. CONTROL RISK	1	2	3	4	5
D. CONTROL RISK  1. Appropriate controls are missing	1	2	3	4	5

5. The misstatement is caused by incorrect data which is manually determined or calculated

**Detection of Misstatements:** This section deals with the extent to which the auditor is able to detect material misstatement. Please, show the extent to which you are agree with the following misstatement statements. Rankings are 1. Strongly Disagree 2. Disagree 3. Neutral 4. Agree 5. Strongly Agree.

## Did the misstatement occur:

3. The controls are poorly designed

4. Controls are not properly applied

D. MATERIAL MISSTATEMENT	1	2	3	4	5
Because the workload of accounting personnel does not permit satisfactory job performance					
2. Because the segregation of duties among accounting personnel is inadequate					
3. Because the methods used to select, train and supervise accounting personnel is inadequate					
4. Misstatements occurs during input into the computer					

system			
5. Because of erroneous data in an exchange or source			
document			
6. Because the auditor disagreed with management's			
judgment			
7. Because of inadequate physical security over movable			
and valuable assets			
8. Because of management override of the control system			
9. Because the methods used to select, train and			
supervise management personnel were inadequate			
10. Misstatements occurs at the boundary of an		 	
information stream			

APPENDIX III: RAW DATA

# **Correlation Analysis** Correlations

		Inherent risk	Detectio n risk	Engagement risk	Control risk	Material misstatement
Inherent risk	Pearson Correlation	1	.740	.731	.463	.681
	Sig. (2-tailed)		.153	.161	.433	.205
	N	155	155	155	155	155
Detection risk	Pearson Correlation	.740	1	.942(*)	.936(*)	.963(**)
	Sig. (2-tailed)	.153		.017	.019	.009
	N	155	155	155	155	155
Engagem ent risk	Pearson Correlation	.731	.942(*)	1	.839	.891(*)
	Sig. (2-tailed)	.161	.017		.076	.042
	N	155	155	155	155	155
Control risk	Pearson Correlation	.463	.936(*)	.839	1	.906(*)
	Sig. (2-tailed)	.433	.019	.076		.034
	N	155	155	155	155	155
Material misstate ment	Pearson Correlation	.681	.963(**)	.891(*)	.906(*)	1
	Sig. (2-tailed)	.205	.009	.042	.034	
	N	155	155	155	155	155

<sup>\*</sup> Correlation is significant at the 0.05 level (2-tailed)

# APPENDIX VI: VALIDITY OF THE QUESTIONNAIRE

Judges	Relevant	Irrelevant
Judge 1	155	45
Judge 2	187	13