

**ELECTRONIC MARKETING PRACTICES, CORPORATE CULTURE,  
COMPETITIVE ENVIRONMENT AND PERFORMANCE OF  
TELECOMMUNICATIONS COMPANIES IN KENYA**

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## DECLARATION


I declare that the work contained in this thesis is my original work and has not been presented for a degree in any other University or Institution.

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## **DEDICATION**

To my father, Daudi Otiato Magambo and Mother, Mrs. Dinah Magambo who used their meagre resources to ensure I achieved my education up to Bachelors level. To my sisters and brothers who encouraged me through the long journey to keep focusing on to the end. To my in-laws who never stopped asking when I would be through. I am glad to report with gladness that the journey is now over. Glory and Honour be to our God.

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## **ABBREVIATIONS AND ACRONYMS**

<b>ASP</b>	-	Application Service Providers
<b>B2B</b>	-	Business to Business
<b>CAK</b>	-	Communications Authority of Kenya
<b>CCK</b>	-	Communications Commission of Kenya
<b>CEO</b>	-	Chief Executive Officer
<b>CSP</b>		Content Service Providers
<b>CV</b>	-	Coefficient of Variation
<b>DIT</b>	-	Diffusion of Innovation Theory
<b>E-Marketing</b>	-	Electronic Marketing
<b>ICT</b>	-	Information Communications Technology
<b>IDRC</b>	-	International Development Research Centre of Canada
<b>IGSS</b>	-	International Electronic Communications Gateway Services
<b>IOT</b>	-	Industrial Organization Theory
<b>IT</b>	-	Information Technology
<b>LDCs</b>	-	Least Developed Countries
<b>NFP</b>	-	Network Facilities Provider
<b>OCP</b>	-	Organization Culture Profile
<b>PCK</b>	-	Postal Corporations of Kenya
<b>RBT</b>	-	Resource Based Theory
<b>SCR</b>	-	Submarine Cable Landing Rights
<b>SD</b>	-	Standard Deviation
<b>UK</b>	-	United Kingdom
<b>USA</b>	-	United States of America

## ABSTRACT

The broad objective of the study was to determine the influence of e-marketing practices, corporate culture and competitive environment on the performance of telecommunications companies in Kenya. Four specific objectives were used to determine the relationships among e-marketing practices, corporate culture, competitive environment and organizational performance. Four hypotheses which were derived from the objectives and the literature were tested using simple and multiple regression analyses. A descriptive cross-sectional survey design was used and the population of the study was composed of 408 telecommunications companies licenced by the Communications Authority of Kenya (CAK) as at June 2015. Primary data were collected from three managers in every organization using a semi-structured questionnaire. The data were analyzed using descriptive statistics, factor analysis and regression analysis. The study results revealed a positive and significant relationship ( $F=50.405$ ,  $p=0.00$ ) between e-marketing practices and organizational performance. The moderation effects of corporate culture and competitive environment on the relationship between e-marketing practices and organizational performance were also statistically significant ( $p<0.05$ ). Similarly, the test results for the joint effects were statistically significant ( $p=0.016$ ). The results supported findings of previous studies regarding the positive influence of e-marketing practices on performance of organizations. The findings also revealed that both corporate culture and competitive environment have significant influence on the relationship between e-marketing practices and organizational performance. The study contributes to theory of e-marketing and organization performance by adding two variables, corporate culture and competitive environment. Specifically, the study adds to theory on the joint effects of e-marketing practices, corporate culture, competitive environment and performance. The study findings also make contributions to policy and practice. The study had some limitations. The use of cross-sectional research design had limitations as it could not measure changes in e-marketing practices and performance over time. Additionally, use of structured survey instrument could not reveal the extent of investment in and engagement of organizational members for the adoption of e-marketing practices. It was recommended that future studies should use both structured and unstructured survey instruments in data collection. Additionally, longitudinal research design could be applied in assessing changes in e-marketing practices and organizational performance over time.

# CHAPTER ONE

## INTRODUCTION

### 1.1 Background

Organizations operate within environments characterized by complexity, uncertainty, diversity and competitiveness. This requires development of coping mechanisms and winning strategies, especially e-marketing practices, that enable success. Management is often concerned with developing strategies that assure them of competitiveness and realization of superior performance. Adoption of e-marketing practices results into better performance in sales, distribution and customer acquisition (Hossinpour et al., 2014; Brodie et al., 2007). E-marketing translates to organizational performance when backed by corporate culture that encourages innovation and adoption of organizational strategies (Asikhia, 2009). The competitive environment faced by organizations requires adaptation for success. Corporate culture inculcates behavioural dispositions that encourage members to adapt to the dynamisms in the competitive environment for success. Understanding of the influence of organizational strategies and specifically adoption of e-marketing practices and alignment of the strategies and corporate culture is vital in positively influencing the performance of organizations.

The study is anchored on the Electronics Marketing Theory (EMT), the Diffusion of Innovations Theory (DIT), Industrial Organization Theory (IOT) and Resource-Based Theory (RBT). EMT details the use of electronics technology on the Ps of marketing for the realization of organizational objectives (Dann & Dann, 2011) while the DIT tries to explore why, how and the rate at which new ideas and technology spread through a social system (Rogers, 1995). E-marketing is a relatively new concept (Ellis-Chadwick & Doherty, 2012) whose adoption can be explained by the DIT. Corporate culture, as an internal resource, shapes members' behavior while driving organizational adaptation to environmental changes. Organizations can apply the RBT in moulding their culture in order to enhance their competitiveness in dynamic environments. Competitive environments within which organizations operate have effects on their performance (Asikhia, 2009). Knowledge of the forces that drive competition within a business environment is important thereby underscoring the relevance of IOT to the study.



Information Communications Technology (ICT) revolution is driving global development with technological advancements, improvements on infrastructure and reduced prices resulting into higher growth and access to ICT. This has enabled higher rate of connectivity of ICT to individuals and organizational users throughout the world (Afande, 2015). Use of the internet is growing globally with Least Developed Countries (LDCs) recording commendable up-take. Penetration of mobile telephony globally stood at 97% by end of 2014 (Alleman et al., 2012). In Sub Saharan Africa, mobile telephony continues to revolutionize the uptake of ICT services with mobile broadband and mobile money transfer services being widely adopted by individuals, governments and organizations (Communications Authority of Kenya, 2015). Telecommunication increases the efficiency of economic, commercial, and administrative activities within a country. It also improves the effectiveness of social services while distributing the social, cultural and economic benefits of development more equitably throughout a country (Alleman et al., 2012).

Telecommunications is a growing industry in Kenya that is making increasingly significant contribution to the economy based on pillars of Kenya Vision 2030. The companies are made up of International Network Facility Providers, National Network Facility Providers (NFP) and Non-Infrastructure Based Service Providers (Communications Authority of Kenya, 2015). Liberalization of the industry in 1990s resulted into increased competition, dwindling resources, technological advancements, changing stakeholder demands and globalization (Letangule & Letting, 2012). This requires players to be more innovative, transform from being product-driven to customer-driven and effectively target their customers in order to remain competitive (Lwiza & Nwankwo, 2002).

### **1.1.1 Electronic Marketing Practices**

E-marketing practices refer to a company's efforts in applying marketing principles and techniques in promoting and selling its products while using internet technology (Kotler, 2003; Harridge-March, 2004). Ellis-Chadwick and Doherty (2012) view e-marketing practices as the use of the internet and any other interactive technologies in creating and mediating dialogue between the organization and its customers. It encompasses all activities a business conducts via the worldwide web with the aim of attracting new businesses, retaining current ones and developing corporate brand identity (El-Gohary, 2010).

Banerjee and Dash (2011) contend that e-marketing practices use the internet as a platform that allows firms to adapt to the needs of customers, reduces transaction costs, and allows customers to move from time-and location-based behaviours toward non-temporal and non-locational behaviour. E-marketing practices therefore manage the consumer's online experience of the product from the first encounter on the internet through purchase to delivery and subsequently the after sales service (Siegel, 2003; Kotler, 2010).

In as much as e-marketing practices have been linked mainly to the use of the internet to meet marketing objectives, some authors (Baker & Sinkula, 2005; Smith & Zook, 2011) maintain that e-marketing practices utilize electronic technology to achieve marketing objectives. Electronic technology in this case includes both online and offline networks that include digital platforms, electronic mails, websites, telephones and automated vending technology. Dann and Dann (2011) add that e-marketing practices are marketing activities, approaches or mechanisms that need some form of interactivity for their implementation. In this case, e-marketing practices rely on some form of technology and uses core set of rules that include electronic, interactivity and marketing for implementation. E-marketing practices therefore go beyond the internet and the use of a company's website to promote and sell a company's products and services while managing customer relationships (Dann and Dann, 2011; Ellis-Chadwick & Doherty, 2012). This makes it the e-selling side of e-commerce (Kotler, 2010). E-marketing is therefore a modern and evolving marketing practice that involves marketing of products, services, ideas and information through the internet and any form of electronic media (El-Gohary, 2010). The study adopted the concept of e-marketing practices to include application of both online and offline technologies in achievement of a company's marketing objectives as advanced by Dann & Dann, 2011; Ellis-Chadwick & Doherty, 2012)

Electronic Marketing Theory (EMT) and the Diffusion of Innovations Theory (DIT) have been used as background theories for this study. E-marketing practices available to companies range from telephone marketing, interactive marketing, mobile marketing and digital screens to fully engaging internet marketing practices that include online advertising, e-distribution, online marketing research, email marketing, social media marketing and digital marketing. When applied appropriately, the practice translates to both financial and non-financial performance of companies (Siegel, 2003).

### **1.1.2 Corporate Culture**

Corporate culture entails shared philosophies, assumptions, norms, value systems and unique ways by which organizations undertake business activities in ways that differentiate them from one another (Egan et al., 2004; Skerlavaj et al., 2007). It is the persistent underlying structure that guides perception and behavior of members of an organization and the binding factor that influences employees' interaction with organization's stakeholders (Jelinek et al., 1983). Corporate culture is a body of solutions to problems that have worked consistently within the organization. These are then passed on to new members for internalization and use whenever such problems occur (Schein, 1990; Kotter, 2008). It manifests itself through visible artifacts within the organization in terms of its structure, technology, rules of conduct, dress code, physical layout, stories and rituals. Beneath these are the invisible organizational values, and finally the underlying assumptions about the nature of organizational reality that are deeper manifestations of value systems (Schein, 1990; Cameron & Quinn, 2006).

Different scholars have viewed the concept of corporate culture from different perspectives. O'Reilly et al (1991) introduced the Organizational Culture Profile (OCP) that details person-culture fit and its implications for organizational members' work attitudes and behaviour. The fit, in this case, is achieved when aspects of individuals including values and expectations interact with situational facets like organizational incentive systems and norms to affect attitude and behavioural responses by individuals. They developed the Organizational Culture Profile Item Set as a guide to managers in the assessment of person-culture fit in any given organizational situations. Peters (1982) on the other hand, proposes the McKinsey's 7S model that illustrates corporate culture in terms of organization's structure, system, style, staff, skills, strategy and shared values. On their part, Lusthaus et al. (1999) through the International Development Research Centre (IDRC) model express corporate culture in terms of attitudes, values, beliefs, tradition, customs, norms, leadership and structures within the organization.

Leadership plays a vital role in influencing adoption of corporate culture through emphasis on positive values and reward systems that enable entrenchment and diffusion of required cultural values (Owino, 2014). Top management is capable of inculcating an innovative culture that in effect translates to better organizational performance. Study by Skerlavaj et al. (2007) reveals that strong corporate culture enables goal alignment which motivates employees to improve their performance. The current study has adopted the concept of corporate culture as provided by McKinsey's 7S model (Peters, 1982). The seven perspectives that make the model provide a more inclusive approach in reviewing aspects of corporate culture. It is therefore a more wholesome way of understanding the culture of an organization

### **1.1.3 Competitive Environment**

Competitiveness of an environment describes how firms seek to achieve better performance than their competitors (Pereira-Moliner et al., 2015). Inter-firm competition is due to rivalries between incumbent firms and new entrants. Intensity of competition is dependent on entry barriers, organization's size, industry regulations and organization's brand image (Afande, 2015). Organizations operate within complex, dynamic and rapidly changing environments that require constant modification of strategies and operations to reflect the changing circumstances (Kennerly & Neely, 2003). High degree of complexity comes from uncertainty in the environment which is made up of diversity of agents, inputs and outputs, heterogeneity of markets and technologies used in the organization (Barrales-Molina et al., 2010). Technological advancements and market turbulence also affect the environment while competitiveness of organizations is determined by their adaptation to the turbulent environments. Cost structure within an economy determines industry competitiveness and lowers cost of capital, land, labour and lax policy, relative to the competing industries - this leads to improved competitiveness of industries (Solvell, 2015).

Pereira-Moliner et al (2015) measured competitive environment in terms of cost and differentiation. On their part, Sanders et al. (2015) viewed it in terms of intensity, dynamism and complexity while Barrales-Molina et al. (2010) described it in terms of dynamism, complexity and munificence. Porter (1980) introduced the competitive forces

within an environment that detail the level of competition within an industry, behavior of existing industry players and the structure of an industry environment that can influence organizational performance. An organization's competitive environment can provide opportunities for growth, development, value, wealth creation as well as threats (Njeru, 2013). It is therefore a source of constraints, contingencies, problems and opportunities that influence the way organizations transact business thereby affecting their performance (Bourgeois, 1980). The way managers respond to the competitive environment through adoption of innovative strategies has influence on the performance of such organizations. The study operationalized competitive environment around Porter's (1980) five forces.

#### **1.1.4 Organizational Performance**

There is no consensus among scholars and practitioners on a universal definition of the term performance. According to McCann (2004) and Firer (2003), organizational performance is the efficiency and effectiveness with which an organization converts inputs into outputs. This notion is also held by Bourne et al. (2003) who argue that organizational performance should be viewed not only in terms of efficiency and effectiveness but also in terms of adaptability and financial perspectives. Kaplan and Norton (1987) introduced the balanced score card that details four perspectives; financial, customer, innovation and learning and internal process perspectives that allow managers to view business performance in a holistic and balanced way. Hubbard (2009) propagated the Triple Bottom Line that incorporates natural environment and social responsibility as vital measures of performance.

On their part, Lusthaus et al. (1999) presented the International Development Research Centre (IDRC) model that introduced effectiveness, efficiency, relevance and financial indicators as important measures of performance. Effectiveness in this case is the degree to which an organization moves towards the attainment of its mission and realization of its goals. Efficiency is the provision of exceptional services within an appropriate cost structure. Relevance refers to the adaptation of an organization to changing environmental contexts and capacities and the ability of the organization to keep its mission, goals, programmes and activities agreeable to its stakeholders. On the other hand, financial performance is the organization's ability of ensuring that its in-flow resources are greater than the out-flow resources in a way that it is able to realize financial surplus.

Different studies have reported varied factors that influence performance of telecommunication companies (Afande, 2015; Letangule & Letting, 2012). Ikiara et al. (2008) revealed how competition brought about by liberalization of the industry attracted many players whose profitability and survival depended on the effectiveness and efficiency with which they targeted the customers. Competition forces organizations to embrace innovative culture that translates into customer satisfaction that eventually impacts financial performance. The study operationalized organizational performance around the IDRC model (Lusthaus, 1999) that viewed performance from four perspectives including effectiveness, efficiency, adaptability and financial viability.

### **1.1.5 Telecommunications Companies in Kenya**

The telecommunications industry is considered among the major pillars that have made immense contribution to the economic wellbeing of many countries today (Afande, 2015). In 2011, the Chinese telecommunication industry contributed approximately 16 percent of the total Chinese Gross Domestic Product (GDP) when compared to the 9% which was contributed by the Kenyan telecommunication industry over the same period (Communications Commission of Kenya, 2012; Venkatram & Zhu, 2012). Study by Venkatram and Zhu (2012) indicated that the telecommunications industry is both a major contributor to the economic growth of countries as well as a main growth pillar for other industries.

A great number of developing nations have experienced increased growth in their economies due to the impact of the telecommunications sector with the Chinese and Indian economies being among the main economies that have benefitted from the expansive growth of the telecommunications industry in the last decade (Afande, 2015). A similar trend is emerging in Africa though the industry has not achieved such economic transformation observed in Chinese and Indian economies. In the East African region, growth of the industry has equally not been rapid and most of the telecommunications companies are multinational companies that employ growth strategies of the origin countries. The mismatch of the strategies and the environments has resulted to poor growth of most of the companies resulting into the collapse of others (Institute of Economic Affairs, 2002).

The telecommunications sector in Kenya has undergone several transformations since 1990s. Prior to 1998, the mode of telecommunication in the country was limited and mainly composed of poor quality and low coverage public fixed telephones, faxes and telex. Telkom Kenya had a monopoly of the infrastructure for various telecommunications services including landline, international and internet facilities until 2004 (Communications Authority of Kenya, 2015). Liberalization of the economy in 1990s attracted several players and resulted into enhanced product range and improved service delivery that has seen the advent and widespread use of internet and entry of mobile telephony companies into the sector (Ikiara et al., 2008).

Telecommunications companies in Kenya fall under three broad categories namely International Network Facility Providers that is composed of International Electronic Communications Gateway Services (IGSS) and Submarine Cable Landing Rights (SCR); National Network Facility Providers (NFP) whose companies fall into three tiers (tier 1, 2 and 3). The last category is Non-Infrastructure Based Service Providers that is composed of Applications Service Providers (ASP) and Content Service Provider (CSP). IGSS and SCR companies provide both Voice and Data within and out of the country. NFPs are companies that carry out the construction, installation and operation of electronic communication systems within the country at different turnover capacities as outlined in the respective tiers. NFPs own their own infrastructure including base stations and towers. ASPs are companies offering only internet or applications that are accessed through the internet. CSPs undertake specifically content carriage services and not necessarily internet provision (Communications Authority of Kenya, 2015).

Telecommunications companies have revolutionized the economy thereby contributing towards economic goals of Kenya Vision 2030. The advent of the internet and mobile telephony services has opened new horizons for faster and cheaper communication in the country (Afande, 2015). Internet services are offered through mobile networks, fixed wireless access, satellite networks, fibre optic and cable networks. The increased uptake of data-enabled devices as well as the reduction in prices of data services has led to the increased access and usage of the internet in the country (Communications Authority of Kenya, 2015). The fast and steady internet connectivity has enhanced organizations' accessibility to global markets cost effectively and efficiently.

Mobile money transfer markets have experienced transformation to include mobile money platforms through which not only person to person money transfers are executed but also array of other financial transactions that include withdrawal and deposit of cash to bank accounts, utilities payment, purchase of goods and services and micro-credit services (Ikiara et al., 2008). Traditional banking institutions have also ventured into the telecommunications space in order to provide a convenient mobile payment platform for their customers at competitive prices (Communications Authority of Kenya, 2015).

The Telecommunications industry is characterized by technological and market dynamics that require players to be flexible and innovative. Intense competition and effects from the competitive environment also present challenges to the companies in terms of shrinking market share and reduced profitability (Afande, 2015). Organizations therefore need to develop more innovative ways that assure them of competitiveness and success.

## **1.2 Research Problem**

Marketing environment is characterized by complexity, increased competition, globalization and changing customer needs. This requires organizations to develop strategies that assure them of competitiveness and survival. Electronic marketing practices result into organizational performance when it is backed by corporate culture and behavioural dispositions that include market orientation (Asikhia, 2009). Corporate culture details the principles and values that should inform behaviour of employees and complement organizations' traditional control systems. Widely shared corporate culture influences performance as shared values instil discipline in objective achievement (Egan et al., 2004). The contribution of organizational resources and specifically corporate culture and the adoption of marketing strategies like e-marketing practices have attracted considerable research attention (El-Gahory, 2010; Cameron & Quinn, 2006).

Liberalization of the telecommunications sector implies that players need to market themselves in a climate characterized by competition and dynamism. The dynamic competitive environment within which organizations operate also influence their performance by presenting opportunities for growth, development, value, wealth creation and threats that organizations must address in order to survive (Njeru, 2013).



Telecommunications companies are developing innovative strategies such as e-marketing practices that assure them of competitiveness and survival (Letangule & Leting, 2012). E-marketing practices influence performance when the organization is able to develop mechanisms and strategies that enable integration and adaptation to the competitive environment (Egan, 2004). While companies seek to invest in e-marketing practices to enhance their performance, the role of competitive environment in the relationship has not been adequately addressed.

Several studies have depicted the relationship between e-marketing practices and organizational performance; however, differences in concepts, direction and magnitude of the relationship between the variables are evident thereby exposing several gaps and contradictions. Conceptually, Harridge-March, (2004) used the 7 Ps of marketing and demonstrated that electronic marketing should be considered the ‘New Kid on the Block’ and a modern marketing strategy being adopted by marketing companies globally. The study did not however consider the specific elements that constitute e-marketing and how the elements can be aligned to the 7ps for competitiveness. The study therefore failed to demonstrate how elements of e-marketing practices that include telephone marketing, email marketing, interactive marketing, digital marketing and internet marketing (Dann & Dann, 2011), among others, can be integrated with the 7ps to create more value to a company and its customers. Hossinpour et al., (2014) sought to determine the influence of electronic marketing on sales of Life and Investment Insurance while emphasizing on the role of the Internet. Like Harridge-Mach (2004), the study failed to consider the effects of other e-marketing elements but over relied on internet marketing. Brodie et al., (2007), on the other hand, examined the relationship between the penetration of electronic marketing and organizational performance and established that most companies are adopting e-marketing practices at a very fast rate and this has immense contribution to their efficiency and effectiveness. The study however failed to demonstrate any financial gains through the improved efficiency and effectiveness of the companies that had adopted e-marketing practices.

Asikhia, (2009) studied the moderating role of electronic marketing on the consequences of market orientation in Nigerian firms while Raoofi (2012) studied the moderating role of electronic marketing on the consequences of market orientation in Iranian firms. In both studies, e-marketing was treated as a moderating variable while the current study has treated it as an independent variable. This gives e-marketing a pedestal position on the study compared to rest of the study variables. Studies that seek to establish the moderation role of both corporate culture and competitive environment on the relationship between electronic marketing practices and organizational performance are few. Moreover, the current study is anchored on both the Electronics Marketing Theory (EMT) that explains how organizations apply electronic technologies on the marketing mix elements for competitiveness (Dann & Dann, 2011) and the Diffusion of Innovations Theory (DIT) that provides foundation for understanding the process by which innovations are adopted by different users (Rogers, 1995). Studies on e-marketing practices that are anchored on both the EMT and DIT are also few and have not received adequate research attention.

Studies linking e-marketing practices and organizational performance present contradictory findings with some showing positive relationship (Brodie, 2007; Trainor et al, 2010; Hossinpour et al., 2014). Other studies have contradicted this position and maintain that there is no evidence on contribution of adoption of e-marketing practices to performance of organizations (Tsotsou & Vlachopoulou, 2009; Raoofi, 2012). Hossinpour et al. (2014) and Trainor et al, (2010) have indicated a positive relationship in improved sales and distribution performance of organizations that have adopted e-marketing practices. On the other hand, Avlonitis and Karanyani (2000); Brodie et al. (2007) maintain that there is no competitive advantage that e-marketing practices contribute to organizational performance while adding that organizations that adopt e-marketing practices have no assurance of improved performance. Asikhia (2009) posits that e-marketing contributes to better delivery of customer offerings and obtaining of marketing intelligence. On the contrary, Salem et al. (2013) maintain that there is no evidence of any positive results on the performance of five star hotels in Alexandria that have adopted e-marketing practices. These contradictory positions present gaps that call for further research for a more conclusive position.

Research studies focusing on the moderating role of corporate culture and competitive environment are few and the area has not been adequately addressed. Njeru (2013) considered the moderating effect of external environment on market orientation and firm performance relationship. The study incorporated other elements including government policy and turbulence within the external environment besides competition. On his part, Owino (2014) focused on the moderating effect of market orientation and industry competition on organizational culture and firm performance relationship. Whereas the study focused on the moderating effect of industry competition, it considered corporate culture as an independent variable and not a moderating variable. Building on the same argument, Ogbanna (2000) and Skerlavaj et al. (2007) proposed that corporate culture can only be linked to superior organizational performance if it is able to adapt to changes in environmental conditions. Their study focused on wider environmental factors with no linkages to competitive environment. Moreover, they considered corporate culture as an independent variable in their model. The current study will consider corporate culture as a moderating variable on the relationship between e-marketing practices and organizational performance.

Contextually, gaps exist on studies linking e-marketing practices and performance of Telecommunications companies in Kenya. Brodie et al. (2007) conducted studies among service firms in USA; Hossinpour et al. (2014) studied Life and Investment companies in Germany while Tsiotsou and Vlachopolous (2011) considered the Travel and Tourism companies in Greece. On their part, Salem et al. (2013) conducted their study on Hotels in Egypt while Asikhia (2009) studied service firms in Nigerian. This shows that the relationship between E-marketing Practices and Telecommunications companies in Kenya have not been adequately researched.

Methodological gaps have also been revealed from empirical studies with Hossinpour et al. (2014) focusing only on non-financial indicators of performance. Brodie et al (2007) used a single source (Marketing Managers) of respondents for data collection while Afande (2015) focused his study on mobile telephony companies in Meru, Kenya. This study bridges the gaps and considers financial as well as non-financial indicators in measuring performance of Telecommunications companies. Data were collected from multiple

respondents including those responsible for management of finance, human resources and marketing. The context of the study was telecommunications companies in Kenya. These companies are licensed by the Communications Authority of Kenya as at June 2015 (Appendix 3).

Studies reveal that scholars have devoted more attention to examining direct relationship among organizational variables. The relationship between e-marketing practices, corporate culture, competitive environment and organizational performance has not been adequately explained. This thesis incorporates corporate culture and competitive environment as moderating variables in the relationship between e-marketing practices and organizational performance. The question answered by this study was: What is the effect of e-marketing practices, corporate culture and competitive environment on the performance of telecommunications companies in Kenya? This question was addressed by analyzing direct and indirect relationships among e-marketing practices, corporate culture, competitive environment and organizational performance.

### **1.3 Research Objectives**

The broad objective of the study was to determine the influence of electronic marketing practices, corporate culture and competitive environment on the performance of telecommunications companies in Kenya. The specific objectives were to: -

- i. Establish the effect of electronic marketing practices on performance of Telecommunications Companies in Kenya
- ii. Determine the influence of corporate culture on the relationship between e-marketing practices and performance of Telecommunications Companies
- iii. Establish the influence of competitive environment on the relationship between e-marketing practices and performance of Telecommunications Companies
- iv. Determine the joint effect of e-marketing practices, corporate culture and competitive environment on performance of Telecommunications Companies

#### **1.4 Value of the Study**

Organizational performance is of great importance to scholars, policy makers and practitioners alike. Managers need to appreciate that performance is impacted by a combination of organizational variables and the interaction of the variables with the competitive environment. The findings link e-marketing practices, corporate culture, competitive environment and organizational performance in an integrated framework. The study was anchored on the Electronics Marketing Theory, the Diffusion of Innovations Theory, Resource Based Theory and Industrial Organization Theory.

The results will help organizations to understand the components and importance of e-marketing practices, corporate culture and competitive environment in the achievement of superior performance. The findings contribute to knowledge by testing the joint influence of e-marketing practices, corporate culture, competitive environment and performance of Telecommunications companies in Kenya. The relationship between e-marketing practices and organizational performance has been studied in different contexts in developed countries. However, the contribution of e-marketing practices to performance of Telecommunications companies in Kenyan has not achieved adequate attention.

The findings of this study will equip scholars, policy makers and practitioners with an understanding of the relationship between the variables. To scholars, the findings present a sound framework through which knowledge can be expanded. The study presents a unique opportunity for expanding theoretical development based on electronics marketing theory, diffusion of innovations theory, resource-based theory and industrial organization theory to explain how e-marketing practices lead to organizational performance. The results add to the limited evidence available on e-marketing practices and performance relationship in the Kenyan context. Moreover, studies linking e-marketing practices, corporate culture, competitive environment and organization performance are very few. Limitations of the study findings will also emerge as areas for further research.

Every industry requires effective regulations capable of driving government agenda while presenting favourable investment climate that stimulates growth. Telecommunications industry in Kenya is regulated by Communications Authority of Kenya that is mandated by the government of Kenya to formulate and enforce policies that guide the industry. Reliable and adequate information is vital in the formulation and enforcement of policies.

The findings from the study will offer insights while providing contributions that will enable development and implementation of strategic marketing policies within the sector. Policy makers will therefore use the findings to evaluate how well the sector can be leveraged through e-marketing practices in order to contribute to increased economic growth.

The study findings contribute to practice by guiding managers of Telecommunications companies with strategic marketing knowledge and its applicability in decision-making. Top management is directly responsible for the formulation and implementation of strategies and nurturing of corporate culture that enable adaptation to the competitive environment for improved performance. The findings will therefore improve the managers' skills in analysis, selection and application of appropriate marketing practices that assure the companies of competitiveness and success. The results will offer valuable insights to management and aid in understanding how to exploit competitive environment to create value and gain sustainable advantage. Research findings will also guide consultants in the sector in identifying opportunities for training and development. By examining the contribution of e-marketing practices, corporate culture, competitive environment and organizational performance relationship in the context of telecommunications companies, the study extends the generalizability of research findings to related contexts.

## **CHAPTER TWO**

### **LITERATURE REVIEW**

#### **2.1 Introduction**

This chapter presents theoretical foundation of the study on e-marketing practices, corporate culture, competitive environment and organizational performance. It further discusses research gaps, conceptual framework as well as conceptual hypotheses.

#### **2.2 Theoretical Foundation**

Managerial perception of the environment within which an organization operates can influence the choice of marketing strategies adopted by the organization that enable it achieve greater performance (Njeru, 2013). The study is anchored on two theories namely Electronic Marketing Theory (EMT) and the Diffusion of Innovations Theory (DIT). E-marketing Theory focuses on the application of electronic technology on the marketing mix elements for the realization of marketing objectives while DIT seeks to explain adoption of e-marketing practices against competitive environment that telecommunication companies operate in. Other supporting theories include Industrial Organization Theory (IOT) and Resource-Based Theory (RBT).

##### **2.2.1 Electronic Marketing Theory**

Electronic Marketing Theory (EMT) is the application of electronic technologies on the marketing mix elements (Dann & Dann, 2011). It is an extension of the Marketing Theory which seeks to explain how marketing managers make and interpret decision in terms of decision models. The marketing theory emphasizes that the decisions made by marketing managers revolve around four variables popularly known as the marketing mix elements or the four Ps of marketing that include products, place, promotion and place (Kotler, 2003). In services marketing, the marketing mix elements are extended to 7 with the addition of physical evidence, people and process making the 7 Ps of marketing.

Electronic Marketing Theory builds on the marketing theory by arguing that the advancement of technology and changes in the marketing environment make it possible for managers to use electronic technologies in making decisions that relate to the Ps of marketing (Harridge-March, 2004). The theory holds that organizations that effectively

apply both online and offline strategies in management of the marketing mix elements are also able to meet their marketing objectives better (Harridge-March, 2004). EMT is relevant to the current study as it aids understanding of how organizations can benefit from adoption of electronic marketing practices.

### **2.2.2 Diffusion of Innovations Theory**

Diffusion of Innovations Theory (DIT) explains the process by which innovations are adopted by users. According to Rogers (1995), diffusion is the process by which new ideas are communicated to members of a social system over a period of time through different channels. Schiffman and Kanuk (2010) posit that innovations do not always have equal potential for consumer acceptance; some innovations are readily accepted, others take longer while yet still some are rejected altogether thus have no chance of adoption.

Marketers may not determine with certainty the likelihood of acceptance of innovations. Diffusion process introduces five characteristics that help in consumer acceptance of innovations and these include relative advantage, compatibility, complexity, trialability and observability (Rogers, 1995; Schiffman & Kanuk, 2010; Armstrong & Kotler, 2003). Relative advantage is the degree to which potential customers perceive an innovation as superior to existing substitutes. Compatibility is the extent to which potential consumers feel an innovation is consistent with their present needs, values and practices. Complexity is how an innovation is difficult to understand or use. Trialability is the extent to which an innovation is capable of being tried on limited basis while observability is the ease with which a product's benefits and attributes can be observed, imagined or described to potential consumers.

The environment within which organizations operate is dynamic which implies that management needs to align corporate strategies to the competitive environment for organizational success. Adoption of corporate culture that enables adaptation to the competitive environment is therefore vital to every organization. Moreover, adopter categories outlined by the DIT provide useful framework that guide in the likely rate of adoption of the corporate values, systems and practices implemented by an organization. Consequently, the diffusion process becomes most appropriate in implementation of strategies that enable effective scanning of the environment for competitiveness.



The DIT is applicable to the study considering the relative novelty of e-marketing practices (Ellis-Chadwick and Doherty (2012) as a marketing strategy. The theory guides organizations in understanding how adoption of e-marketing practices alongside new systems, innovations and ideas is guided by characteristics depicted by the theory. Moreover, not all employees adopt the innovations, systems and e-marketing practices at the same time but at different stages based on their evaluation of the innovations.

### **2.2.3 The Industrial Organization Theory**

The theory emphasizes industry forces that drive competition within a business environment. Organizational performance is determined not only by internal forces but also by competitive forces. Espoused by Pecotich et al. (1999), the theory suggests that the success of an organization can be explained by the structural forces within an industry. Industry structures explain the competitive rules as well as strategies available to an organization (Njeru, 2013). Analysis of the competitive industry of any organization relates to the behavior of existing organizations as well as the structure within that industry (Sanders et al., 2014). Porter's (1980) five forces model presents the bargaining power of buyers, bargaining power of suppliers, rivalry among existing firms, threat of new entrants and threat of substitute products; all of which determine the competitive intensity and therefore attractiveness of a market.

The competitive forces determine the market attractiveness and profitability of the industry. The forces can assist a firm find its position within the industry while guiding it not only in defending its position but also influencing the environment in its favour (Porters, 1980). Teece et al. (1997) add that the five forces competitive framework provides a systematic way of how competitive forces work at the industry level and how they determine profitability. The theory has received criticism in that although it forms a basis for analysis of industry and competition, this alone is not sufficient in assuring a company of competitiveness and that competitive advantage can only occur when a firm is capable of implementing a value creating strategy that is unique to either the current or potential competitors (Brown, 1991). Despite the critique, the theory is applicable within the telecommunications industry in Kenya that is characterized by intense competition, dynamism and technological turbulence (Afande, 2015).

#### **2.2.4 Resource Based Theory**

The theory assumes that organizational performance is driven by the resource profile of the organization and that the source of superior performance by an organization is embedded in the possession and deployment of distinct resources held by the firm (Barney, 1991). The theory holds that sustainable competitive advantage is obtained through accumulation of valuable resources that are difficult to imitate or duplicate by competitors. Organizations can therefore achieve competitive advantage if their resources have attributes of inimitability, durability, appropriability, sustainability and competitive superiority (Collis & Montgomery, 1995). According to Grant (1991), levels of durability, transparency, transferability and replicability are key determinants of the RBT. On their part, Amit and Schoemaker (1993) argue that complementarity, scarcity, low tradability, inimitability, limited sustainability, appropriability, durability and industry factors constitute organization's key resources.

The RBT holds that organizations are able to enjoy competitive advantage when they have rare, high value and unique resources that lead to superior performance. Critiques of the theory however point out that it does not detail the ways in which resources can be developed and deployed in order to enable achievement of competitive advantage (Priem & Butler, 2001). Moreover, it does not consider the impact of dynamic marketing environment (Lengnick-Hall & Wolf, 1999). In spite of the critiques, corporate culture is a unique resource that an organization can employ for competitiveness. Unlike other organizational resources that can be imitated by competition, corporate culture is unique to an organization and can be learned and passed to members through company laid down systems and engagements.

#### **2.3 Electronic Marketing Practices and Organizational Performance**

E-marketing practices entail using the internet and other interactive technologies to create and mediate dialogue between organizations and identified customers. It differs from other marketing practices due to its reliance on technology to enable interactivity. E-marketing practices have benefits that go beyond communication to embracing different aspects of marketing including marketing research, sales activities, customer relationship management, analysis and planning (Brodie et al., 2007). It is considered the latest type of

marketing (Ellis-Chadwick & Doherty, 2012) with valuable potential in contributing to organizations' marketing activities. Harridge-March (2004) details its potential and argues that although it may not replace traditional marketing efforts, it plays a valuable and complementary role thus it should be embraced by organizations due to its ability in creating greater customer value.

Studies linking e-marketing practices to organizational performance have reported divergent findings with Hossinpour et al. (2014) maintaining that the use of e-marketing practices improves sales, distribution, marketing research and reach which eventually positively affects overall sales performance of organizations. The same position is held by Trainor et al. (2011) who argue that organizations that have adopted e-marketing practices are able to navigate the turbulent and dynamic business environments for success. They concluded in their study of Belgian firms that e-marketing practices have a positive influence on organizational performance.

Brodie et al (2007) also maintain that there is a strong positive relationship between e-marketing practices and organizational performance. They add that organizations with higher penetration of e-marketing practices fair better in terms of customer acquisition. They however challenge the notion that information technology enabled business process innovations lead to rapid business performance and posit that success of e-marketing practices on performance comes from enhancement and support of existing practices and firms that adopt e-marketing and integrate it with other marketing practices perform better. On their part, Avlonitis and Karanyani (2000) posit that e-marketing practices enhance business performance in terms of sales performance and efficiency. They are however quick to add that despite this, its adoption does not automatically lead to competitive advantage in efficiency but enables implementation of interactive sales management activities and customized product offerings without sacrificing efficiency. These divergent views make it necessary to conduct a study to determine the relationship between e-marketing practices and organizational performance.

## **2.4 Electronic Marketing Practices, Corporate Culture and Organizational Performance**

The relationships among e-marketing practices, corporate culture and organizational performance are rarely investigated using an integrative approach. This leads to constrained understanding of the complex relationship among the variables. E-marketing practices enhance organizational performance if backed with corporate culture that enables ease of adoption. Organizations strive to create unique, complex and strong culture that drive behaviour of members towards achievement of superior performance (Owino, 2014). Corporate culture can enhance performance by encouraging and motivating employees, promoting cohesion within the organization while shaping behaviour of members (Daft, 2007). The influence of corporate culture on performance depends on the nature and strength of shared values, norms, and assumptions within the organization.

E-marketing practices translate into organizational performance when supported by organizational culture and behavioral dispositions that include market orientation (Asikhia, 2009). Market-oriented culture encourages adoption of e-marketing practices thereby contributing to a firm's superior marketing competencies (Raoofti, 2012). Jaworski and Kohli (2004) hold similar views and argue that organizations that are market oriented have a culture of tracking and responding to customers' needs; responding with relevant strategies that results into better performance. Setting aside and putting in money, time and management efforts into initiatives that encourage adoption of a learning-oriented culture results into better organizational performance in terms of improved relationships within and outside the company as well as in the company's profitability (Skerlavaj et al., 2007). Although the above studies reveal relationship among e-marketing, corporate culture and performance, none of them have considered the three variables together with focus being on e-marketing - culture linkage on the one hand and culture-performance linkage on the other hand.

## **2.5 Electronic Marketing Practices, Competitive Environment and Organizational Performance**

The need for organizations to respond to changes within the competitive environment has led to increased attention to the way organization's resources are utilized to influence organizational performance (Owino, 2014). Competitive environment plays a vital role in the determination of success or failure of an organization due to the volatility and complexity in the environment. Organizations that are able to adapt to the challenges within the competitive environment often develop winning strategies that enable them report better performance (Njeru, 2013). On the contrary, when organizations fail to check and respond to competitive environments appropriately, competition is capable of undermining the strength of the marketing strategies put in place. Competition therefore affects organizations differently and this depends mainly on the industry structure and conditions of the market. Asikhia and Binuyo (2012) contend that increased intensity of competition is experienced in industries that allow easy market entry and shrinking growth opportunities. Such industries experience stiff competition that requires organizations to be more proactive in every sphere. In the long-run, organizational performance affects the structure of the market as inefficient organizations diminish and are replaced by more efficient ones (Findley & Sparks, 2002).

E-marketing practices influence performance when the organization is able to develop mechanisms and strategies that enable integration and adaptation to the competitive environment (Egan et al., 2004). Market and technology orientation lead to electronic marketing capability that favourably influences organizational performance through improved customer retention and satisfaction due to the organization's ability to use e-marketing capability to scan and respond to the competitive environments (Trainor et al., 2011). Organizations that seek to gain from e-marketing capabilities therefore need to invest in resources that enable adoption of e-marketing practices. Such resources are varied and include development of skills that enable effective use and adaptation of e-marketing practices as well as physical resources required in establishment of e-marketing practices.

It is notable that studies have considered e-marketing - performance linkage on the one hand and competitive environment – performance linkage on the other hand. The current study however considered all the three variables and sought to determine the linkage among e-marketing practices, competitive environment and organization performance.

## **2.6 Electronic Marketing Practices, Corporate Culture, Competitive Environment and Organizational Performance**

Today's turbulent business environment characterized by intense competition, changing customer needs and wants and technological advancements exert pressure on organizations to devise means of responding to the marketing environment, enhance their competitive advantage and achieve superior performance. Extant theoretical and empirical studies indicate a positive e-marketing and organization performance relationship (Avlonitis & Karanyani, 2000; Krishnamurthy & Sing, 2006; Brodie et al., 2007). There is also growing suggestion that integration of and adaptation to the competitive environment significantly influence organizational performance (Barrales-Molina et al, 2010; Sanders et al., 2014). A number of scholars also posit that there is a significant relationship between corporate culture and performance (Denison & Mishra, 1990; Ogbanna & Harris, 2000).

Different scholars view culture from different perspectives with one group considering it as an organizational resource that can be nurtured to enhance performance (Narver & Slater, 1990; Deshpande et al., 1993). On the other hand, Legge (1994) sees culture as what the organization really is and in this case it can neither be created nor changed. Better still, scholars have considered person – situation fit to be integral to organizational performance (O'Reilly et al, 1991). In this case, scholars have taken two broad paths with one leading to the exploration of individual characteristics and broad occupational attributes while the other has explored the fit between specific characteristics of an organization and the people within the organization (O'Reilly et al., 1991). In spite of these positions, majority of marketing researchers regard corporate culture as an intangible strategic resource that can be manipulated by management in order to improve performance of an organization (Owino, 2014).

Past studies have looked at relationships between two of the variables at a time and in which case organizational performance has been treated as the dependent variable while others as the independent variables. Moreover, findings on studies depicting relationships between e-marketing practices, corporate culture, competitive environment and organizational performance have been contradictory while those linking e-marketing practices and organizational performance have been found to be positive. Several researchers have also considered direct link between e-marketing practices and organizational performance or corporate culture and organizational performance. This study sought to determine combined influence among the variables in the context of telecommunications companies in Kenya.

## **2.7 Knowledge Gaps**

A review of extant literature discussed relationships among e-marketing practices, corporate culture, competitive environment and organizational performance. The review also discussed theories relevant to the study. The literature suggests that e-marketing practices have direct positive effect on performance of organizations. This linkage is moderated by corporate culture and competitive environment. The pertinent studies and knowledge gaps are summarized in Table 2.1.

**Table 2.1: Summary of Knowledge Gaps**

<b>Study</b>	<b>Focus</b>	<b>Findings</b>	<b>Knowledge Gap</b>	<b>Focus of proposed study</b>
Afande F. O. (2015)	Constraints to expansion of the telecommunication sector in Kenya	Changes in customers' taste and preference, Inter-firm competition and technological changes are responsible for slow growth of the industry	Focus of the study was on mobile telephony companies in Kenya with study covering Meru county only	Study will focus on all telecommunications companies in Kenya
Hossinpour M., Hasanzade M., Feizi M. (2014)	The Impact of E-Marketing on Life and Investment Insurance Sales with emphasis on Internet	There's significant relationship between e-marketing and life investment in sales in relation to clients, distribution channels and marketing research	Study focused only on non-financial indicators of performance of the organizations that adopted e-marketing	Focus will be on both financial and non-financial indicators of organizational performance
Salem, El-Said and Nabil (2013)	Determinants and Effects of Applying Electronic Marketing in Alexandria Hotels: Current Status and Future Trends	No evidence of improved performance by Five star hotels that have adopted e-marketing practices	Context of study is on hotels in Alexandria	Study will focus on Telecommunications companies in Kenya
Raofi M. (2012)	Moderating role of E-marketing on organizational performance of Iranian firms.	E-marketing translates more to organizational performance when supported by corporate culture and behavioural dispositions like market orientation.	Focus of the study was on Iranian firms and findings limit generalizations	The study will focus on telecommunications companies in Kenya
Tsiotsou R. H. and Vlachopoulou M. (2011)	Understanding the effects of market orientation and E-marketing on service performance.	Market orientation determines service performance through dual mechanism of direct and indirect effect, mediated by e-marketing resources	Operationalized e-marketing practices in terms of internet (online) marketing tools only	The study will focus on both online and offline tools of e-marketing practices
Trainor K.J, Rapp A., Beitelspacher L.S, Schillewaert N (2011)	Integrating Information Technology and Marketing: An examination of the drivers of E-marketing capability	E-marketing capabilities have direct influence on firm profitability, cost reduction, return on investment and customer relationship performance	Applied random sampling of array of companies in goods and service industries that make industry generalization inappropriate	Study will apply stratified random sampling and will focus on telecommunications companies



<b>Study</b>	<b>Focus</b>	<b>Findings</b>	<b>Knowledge Gap</b>	<b>Focus of proposed study</b>
Asikhia (2009)	The Moderating Role of E-Marketing on the Consequences of Market Orientation in Nigerian Firms	E-marketing enables better delivery of customer offerings and obtaining of marketing intelligence and capabilities that facilitate effective marketing decisions. E-marketing moderates market orientation firm performance linkage	Operationalized e-marketing on the basis of product, price and e-CRM only	Operationalization will be based on e-marketing tools thus online and offline marketing activities
Brodie et al. (2007)	Is e-marketing coming of Age? An examination of the penetration of e-marketing and organizational performance.	There is increase in penetration of e-marketing in organizations. E-marketing contributes to improved efficiency and effectiveness of B2B service firms through improved customer acquisition and retention	Respondents were drawn from a single source where only marketing managers were interviewed	Study will use multiple respondents from different functions responsible for management of marketing, finance and human resources
Krishnamurthy S. and Singh N. (2005)	Introducing E-MARKPLAN: A Practical Methodology To Plan E-Marketing Activities	Provides managers with a comprehensive actionable and practical methodology to plan, implement and analyse e-marketing activities	Focus on adoption of e-plan without indicating expected contribution of effective use of the e-plan	Study will focus on expected contribution on performance of organizations based on e-marketing adoption
Harridge-March S. (2004)	Electronic marketing: the new kid on the block	E-marketing is a valuable tool when integrated among organization's marketing strategies	Has not specified the relevant e-marketing tools that the marketing elements can be applied to	The study will use various e-marketing practices to illustrate how organizations can apply them
Ogbonna E. and Harris L.C. (2000)	Leadership style, organizational culture and performance: empirical evidence from UK companies	Relationship between leadership style and performance is mediated by the form of corporate culture present in an organization	Did not consider place of environmental factors that may influence leadership and performance relationship	Study that considers influence of competitive environment and culture in the relationship between e-marketing and performance

**Source:** Current Researcher

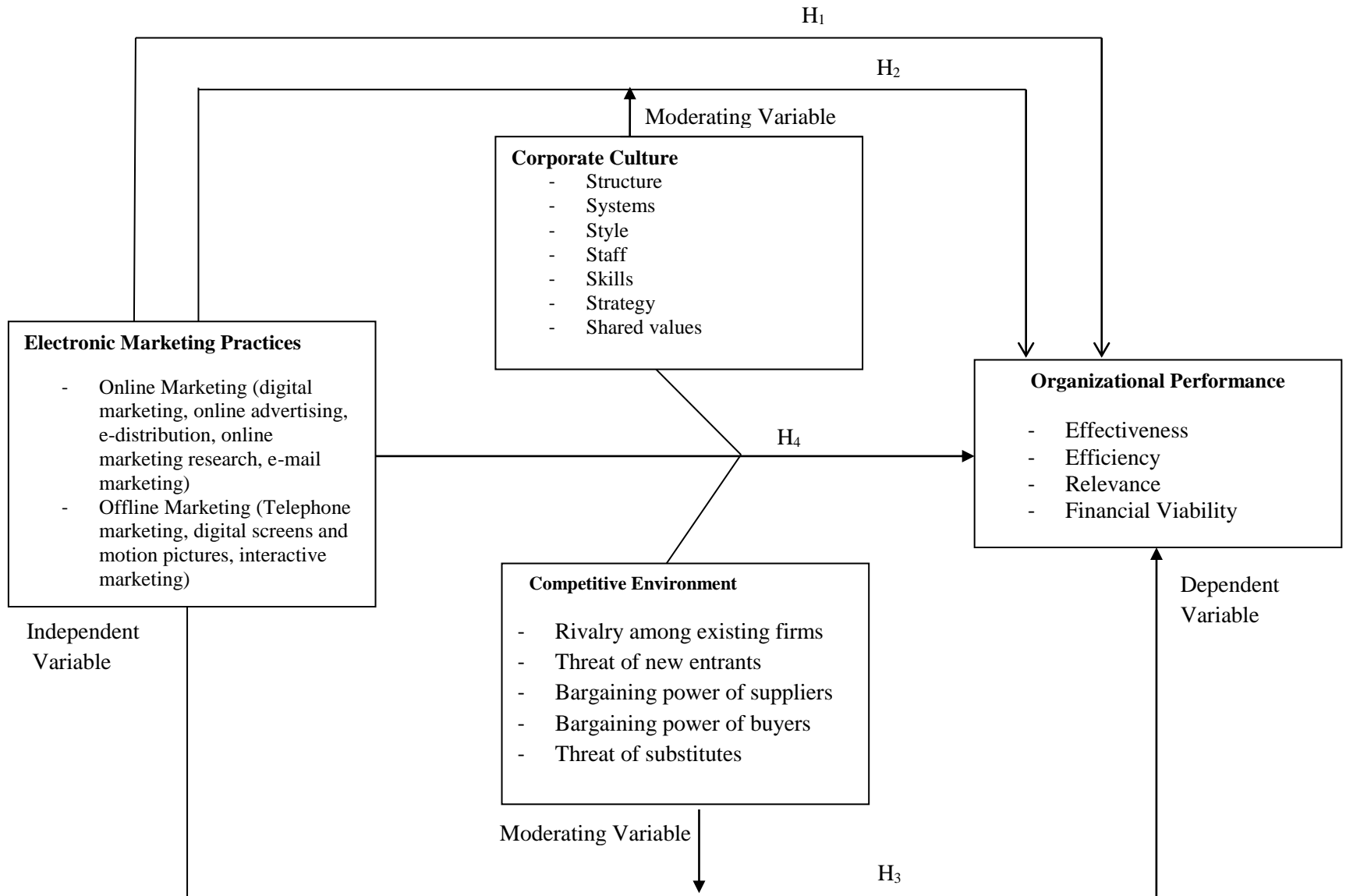
## **2.8 Conceptual Framework and Hypotheses**

This section presents details on conceptual framework of the study depicting relationships among the variables of the study. It further discusses conceptual hypotheses derived from the conceptual model.

### **2.8.1 Conceptual Framework**

The conceptual framework shown in Figure 2.1 is based on reviewed theoretical models including Electronic Marketing Theory, Diffusion of Innovations Theory, Industrial Organization Theory, Resource-Based Theory. Electronic Marketing theory (Dann and Dann, 2011) explains the use of electronic technologies for the achievement of marketing objectives. Diffusion of Innovations Theory espoused by Rogers (1995) details the process by which new ideas are communicated among members of a social system over a period of time through certain channels. The Industrial Organization Theory as demonstrated by Porter's (1980) five competitive forces suggests the forces that shape industry competition. On the other hand, Resource-Based Theory (Barney, 1991) suggests how competitive advantage within firms is achieved and how that advantage might be sustained over time.

Previous studies supported the positive relationship between e-marketing practices and Organizational performance. Similarly, this study hypothesizes that Telecommunications companies in Kenya may enhance their performance by implementing e-marketing practices. However, this relationship may be moderated by corporate culture and competitive environment. The joint effect of the moderating variables affects the relationship between e-marketing practices and performance of the organizations. The framework integrates e-marketing practices, corporate culture, competitive environment and organizational performance into a single model as shown in Figure 2.1



**Figure 2.1 Conceptual Model**

Source: Current Researcher

### **2.8.2 Conceptual Hypotheses**

The following conceptual hypotheses were derived from the pertinent literature on the basis of the relationship depicted in the conceptual model in Figure 2.1.

- H<sub>1</sub> There is a significant relationship between e-marketing practices and performance of telecommunications companies in Kenya
- H<sub>2</sub> The relationship between e-marketing practices and performance of telecommunications companies in Kenya is significantly moderated by corporate culture
- H<sub>3</sub> The relationship between e-marketing practices and performance of telecommunications companies in Kenya is significantly moderated by competitive environment
- H<sub>4</sub> The joint effect of e-marketing practices, corporate culture, competitive environment and performance of telecommunications companies in Kenya is statistically significant.

From the conceptual model illustrated in Figure 2.1, e-marketing practices is hypothesized to be the independent variable while organizational performance is the dependent variable. Organizational performance is independently influenced by e-marketing practices. The conceptual framework shows the inter-relationships among e-marketing practices, corporate culture, competitive environment and organizational performance. Corporate culture and competitive environment are hypothesized to have moderating role in the relationship between e-marketing practices and organizational performance. Finally, e-marketing practices, corporate culture and competitive environment are hypothesized to jointly influence organizational performance.

The hypotheses were derived from theory, conceptual and empirical literature. Literature suggests that e-marketing practices, corporate culture and competitive environment are positively associated with organizational performance. Electronic marketing theory, the diffusion of innovations theory, industrial organization theory and the resource based theory constitute the theoretical underpinnings of the study. The conceptual framework is based on the derived hypotheses and the study will seek to test them.

## **CHAPTER THREE**

### **RESEARCH METHODOLOGY**

#### **3.1 Introduction**

This chapter discusses research philosophy, design, population of the study, data collection and analysis techniques. Reliability and validity tests of the research instruments are also discussed.

#### **3.2 Research Philosophy**

Research philosophy relates to the development of knowledge as well as nature of that knowledge and contains assumptions about the way in which researchers view the world (Saunders et al., 2007). There are two main epistemological research philosophies that underpin research in social sciences and these are positivism and interpretivism. Interpretivism postulates that reality can only be understood through subjective interpretation of interventions and admits existence of multiple interpretations of reality as part of scientific knowledge being pursued. The theory argues that acquired knowledge is socially constructed and not objectively determined or perceived. Its goal is to interpret and understand meaning in human behaviour rather than to generalize and predict causes and effects. Interpretivism uses interviews and observations as popular methods of data collection and data is heavily impacted by personal viewpoint and values. The philosophy enables studies on qualitative research (Cooper & Schindler, 2006).

Positivism on the other hand is based on assumption that the observer is independent of what is being observed and holds that measurement should be done through objective criterion. It is based on real facts, neutrality, measurements and validity of results and attempts to gain predictive and explanatory knowledge of the world through determination of cause and effects in relationships (Uddin & Hamiduzzaman, 2009). Research using the positivist approach begins with theory where data is collected and analyzed through statistical techniques and results used to falsify a theory. It entails deduction and formulation of research through variables based on existing theory and is concerned with hypotheses testing.

This study was guided by positivism. It involved objective testing of hypotheses with the intent of falsifying theory. Positivism is the preferred philosophy for studies that involve hypotheses testing like the current one and has been employed in previous related studies (Barrels-Molina et al., 2010; Njeru, 2013).

### **3.3 Research Design**

The study adopted a descriptive cross-sectional survey design. A descriptive research design seeks to obtain information that describes existing phenomena associated with a subject population. It ascertains and describes the characteristics of the variables while enabling data collection and drawing of objective conclusions (Cooper & Schindler, 2006). It also determines the strength of relationships between variables. Descriptive research design was chosen because the study sought to determine the relationship between e-marketing practices, corporate culture, competitive environment and organizational performance.

Cross-sectional research design involves collection of data at one point in time (Zikmund, 2003). It enables assessment of relationships between and among variables and possible identification of moderators among the variables. This was the aim of the current study thus the choice of cross-sectional design. Cross-sectional design has been employed in similar studies by different researchers including Narver and Slater (2000) and Owino (2014).

### **3.4 Population of the Study**

The population of the study was composed of all telecommunications companies falling under three broad categories namely International Network Facility Providers that is made up of International Electronic Communications Gateway Services (IGSS) and Submarine Cable Landing Rights (SCR); National Network Facility Providers (NFP) and Non-Infrastructure Based Service Providers that consists of Applications Service Providers (ASP) and Content Service Provider (CSP). IGSS and SCR companies provide both Voice and Data within and out of the country.

NFPs have their own infrastructure and carry out construction, installation and operation of electronic communication systems at different turnover capacities. ASPs offer only internet or applications that are accessed through the internet while CSPs undertake specifically content carriage services and not necessarily internet provision

(Communications Authority of Kenya, 2015). The population was made up of 408 companies and was derived from the directory of Communications Authority of Kenya as at June 2015.

### 3.5 Sample Design

The sample size for the study was arrived at using an approach recommended by Krejcie and Morgan (1970) as provided in the table for determining sample size (Appendix 4). From the table, the sample size consisted of 205 telecommunications companies. Selection of representative companies was arrived at using stratified random sampling technique advocated by Cooper and Schindler (2010). Proportionate sampling was used to determine the desired sample size for each stratum to enable adequate representation of every stratum (Table 3.1).

**Table 3.1 Sample Design**

<b>Operator Category</b>	<b>No. of companies</b>	<b>% Representation</b>	<b>n</b>
International Electronic Communication Gateway services (IGSS)	14	3.5	7
Submarine Cable Landing Rights (SCR)	3	0.5	2
Network Facility Provider Tier 1 (NFP T1)	4	1.0	2
Network Facility Provider Tier 2 (NFP T2)	20	5.0	10
Network Facility Provider Tier 3 (NFP T2)	15	3.5	8
Applications Service Providers	132	32.3	66
Content Service Providers	220	54.2	110
<b>Total</b>	<b>408</b>	<b>100</b>	<b>205</b>

**Source: Communications Authority of Kenya (June, 2015)**

Table 3.1 shows the sample size by stratum as drawn from the population of the study. The table by Krejcie and Morgan (1970) in sample size determination is based on assumptions that include population being finite and normally distributed. The assumptions are in line with the current study that drew its sample from the sample frame provided in Appendix 3.

### **3.6 Data Collection**

Data was obtained from primary sources and were collected through structured questionnaire targeting three managers responsible for management of finance, marketing and human resource activities within the organizations. Use of multiple respondents improves reliability of data collected resulting into reduced bias. The choice of the respondents was informed by the top positions they hold that make them custodians of information about e-marketing practices, corporate culture, competitive environment and organizational performance.

The questionnaire was divided into five sections and these captured data on key variables of the study. The researcher pre-tested the questionnaire among managers in five telecommunications companies that were not included in the study. The drop and pick up later method was used in the administration of the questionnaire. An introductory letter explaining the purpose of data collection and confidentiality of data collected accompanied the questionnaire. Follow up was made by research assistants who received prior training on interviewing skills, rapport building and convincing respondents to complete the questionnaire. Research assistants made follow up with respondents through emails and telephone calls to increase response rate. The research assistants also made appointments with the respondents prior to picking the completed questionnaire.

### **3.7 Reliability and Validity Tests**

#### **3.7.1 Reliability Tests**

Reliability is a measure of the extent to which an instrument yields consistent results under a variety of conditions (Zikmund, 1997; Nunally, 1978). The study adopted measures from previous studies that were tested for reliability with adjustments made to suit the objectives and context of the study. A pilot study was conducted among Application Service Providers to assess the reliability of measurement scale.

Reliability was tested through internal consistency technique by computing Cronbach's alpha that ranges from 0 to 1. The closer the coefficient is to 1 the higher the reliability. Cooper and Schindler (2006) assert that Cronbach's alpha coefficient ranging between 0.7 and 0.9 is considered 'good' for reliability test. Gliem and Gliem, (2003) indicate



that Cronbach value of 0.7 is considered reliable while Asikhia (2009) recommends reliability cut off point of 0.6. On their part, Bagozzi and Yi (2012) recommend a value of 0.5 as reliable. The study interpreted alpha coefficient of 0.6 and above as satisfactory and acceptable reliability.

### **3.7.2 Validity Tests**

Validity is the accuracy with which data obtained in a study captures what it was designed to measure (Doodley, 2003). Types of validity in research are face (content) validity, concurrent validity, predictive validity, construct validity and convergent validity (Churchill & Iacobucci, 2005; Babbie, 2010). Face validity was assessed by discussing the questionnaire with scholars and practitioners in marketing, organization behaviour and strategy. It entailed determination of whether the questions measured the expected theorized variables as contained in the conceptual framework provided in Table 2.1. Content validity was tested by conducting a pilot test on selected managers from two companies within the Content Service Providers category. The respondents' comments on the clarity of the questionnaire and the length of time it took to adequately respond to the questions and complete the whole exercise were noted. Adjustments were then made on the questionnaire in line with the feedback from the pilot test and a final version was adopted for the study. Construct validity was established through factor analysis that enabled determination of underlying constructs of the variables.

### **3.8 Operationalization of Study Variables**

This section discusses operationalization of the variables of the study with each variable measured using its component indicators. Table 3.2 provides operational indicators of the variables and their measurement scales.

**Table 3.2 Operationalization and Measures of Variables**

<b>Variable</b>	<b>Nature of Variable</b>	<b>Indicators</b>	<b>Measures (Scales)</b>	<b>Supporting Literature</b>	<b>Questions</b>
Electronic Marketing Practices	Independent	Online marketing (digital marketing, online advertising, online marketing research, e-business, email marketing) Off-line marketing (Telephone marketing, interactive marketing – CDs, MP3, Flash Disks; digital screens and motion pictures)	5 point Likert-type scale	Ellis-Chandwick (2012)  El-Gahory (2011)  Dann and Dann (2011)  Baker (2003)	Part 2 (i) - (iv)
Corporate Culture	Moderating	Structure Systems Style Staff Skills Strategy Shared values	5 point Likert-type scale	Peters (1982)  Schein (1990)  Skerlavaj ( et al (2007)	Part 3 (i) - (vi)
Competitive Environment	Moderating	Rivalry intensity Threat of new entrants Bargaining power of buyers Bargaining power of suppliers Threat of substitutes	5 point Likert-type scale	Porter (1980)  INDUSTRIAL PESTICIDES Pecotich (1999)	Part 4 (i) - (vii)
Organizational Performance	Dependent	Efficiency Effectiveness Relevance Financial viability	5 point Likert-type scale	Lusthaus (1999)	Part 5 (i) - (iv)

**Source: Developed by Researcher from the Literature**

### 3.9 Diagnostic Tests

Statistical tests are based on a set of assumptions and application of diagnostic tests provides assurance that data does not fail the assumptions. The assumption of regression analysis is that the study variables have normal distribution and free from outliers that may distort relationships and significance tests. To avoid distortion of test results and reduction of measurement errors, outliers detected on the study variables were removed. The relationship between the variables was examined for linearity which was tested through graphical analysis. In this case, scatter plots and Q-Q plots were used. The study tested for normality using Shapiro Wilks tests while Multicollinearity was tested using Tolerance and Variance Inflation Factor (VIF) with Tolerance greater than 0.1 showing multicollinearity (Saunders et al., 2011). Autocollinearity was assessed using Durbin-Watson Statistics while Homoscedasticity was tested by visually examining the standardized residual values.

### 3.10 Data Analysis

Collected data was cleaned by removing outliers that could distort the findings. Incomplete data was also removed after which coding was done. Data analysis was done using both descriptive and inferential statistics. It was conducted at two levels with the first level involving descriptive analysis where measures of central tendency and measures of spread were used with the mean, standard deviation and coefficient of variation being specifically applied. The second level involved testing the relationship between the variables using regression analysis. Simple regression analysis was used to test for the direct relationship while multiple regression analysis was used in testing for the indirect relationships (Fairchild & Mackinnon, 2009).

From the analysis, the general regression model arrived at was:

$$y = \beta_0 + \beta_{1x1} + \beta_{2x2} + \beta_{3x3} + \dots + \beta_{n xn} + \epsilon$$

*Where:*

$y$  = the dependent variable

$\beta_0$  = Regression constant

$\beta_1, \beta_2, \beta_3, \dots, \beta_n$  = The coefficients that measured the change in the dependent variable in respect of a unit change in the explanatory variable

$\epsilon$  = the error term (accounts for the variables other than those indicated in the model that explain the changes in the dependent variable).

The regression model used in testing the influence of the explanatory variables on organizational performance was:

$$\text{Organizational Performance} = \beta_0 + \beta_1 \text{ Electronic Marketing Practices} + \beta_2 \text{ Corporate Culture} + \beta_3 \text{ Competitive Environment} + \varepsilon$$

The analytical framework is presented in Table 3.3.

**Table 3.3: Research Objectives, Hypotheses and Data Analytical Models**

<b>Objective</b>	<b>Hypothesis</b>	<b>Analysis Method</b>	<b>Interpretation</b>
Establish the effect of e-marketing practices on performance of Telecommunication companies in Kenya	H <sub>1</sub> : There is a significant relationship between e-marketing practices and performance of telecommunications companies in Kenya	Simple Regression Analysis $y = \beta_0 + \beta_1 EM + \varepsilon$ <b>Where:</b> y = composite score of performance $\beta_0$ = regression constant $\beta_1$ = regression coefficient EM = composite score of e-marketing practices $\varepsilon$ = error term	R <sup>2</sup> to assess how much change in performance is due to e-marketing practices t-test to determine significance of organizational performance p-value to determine statistical significance
Determine the influence of corporate culture on the relationship between e-marketing practices and performance of Telecommunication companies in Kenya	H <sub>2</sub> : The relationship between e-marketing practices and organizational performance is significantly moderated by corporate culture	Stepwise Regression Analysis $y = \beta_0 + \beta_{21} EM + \beta_{22} CC + \beta_{23} U + \varepsilon$ <b>Where</b> y = Composite score of performance $\beta_0$ = regression constant $\beta_{21} \dots \beta_{23}$ = regression coefficients EM = composite score of e-marketing practices CC – Corporate Culture U = Interaction term of EM practices and corporate culture $\varepsilon$ – Error term	Change in R <sup>2</sup> to assess how much change in performance is due to corporate culture F-test to assess overall robustness and significance of the regression model t-test to determine significance of individual variables p-value to determine statistical significance

<b>Objective</b>	<b>Hypothesis</b>	<b>Analysis Method</b>	<b>Interpretation</b>
Establish the influence of competitive environment on the relationship between e-marketing practices and performance of Telecommunication companies in Kenya	H <sub>3</sub> :The relationship between e-marketing practices and organizational performance is significantly moderated by competitive environment	Stepwise Regression Analysis $y = \beta_0 + \beta_{31}EM + \beta_{32}CE + \beta_{33}Z + \varepsilon$ <b>Where</b> y= Composite score of Performance CE- Competitive Environment Z= Interaction term of EM and CE $\beta_0$ = Regression constant $\beta_{31} \dots \beta_{33}$ = Regression coefficients $\varepsilon$ = Error term	Change in R <sup>2</sup> to assess how much change in performance is due to e-marketing and competitive environment  F-test to assess overall robustness and significance of the regression model  t-test to determine significance of individual variables  p-value to determine statistical significance
Determine the joint effect of e-marketing practices, corporate culture and competitive environment on performance of Telecommunication companies in Kenya	H <sub>4</sub> :The joint effect of e-marketing, corporate culture, competitive environment and organizational performance is statistically significant	Stepwise Regression Analysis $y = \beta_0 + \beta_{41}EM + \beta_{42}CC + \beta_{43}CE + \varepsilon$ y=Composite score of Performance $\beta_0$ =Regression constant $\beta_{41} \dots \beta_{43}$ = Regression coefficients EM= Composite score of e-marketing practices CC=Corporate Culture CE=Competitive Environment $\varepsilon$ = Error term	Change in R <sup>2</sup> to assess relative incremental contributions of each of the variables  F-test to assess overall robustness and significance of the regression model  t-test to determine significance of individual variables

**Source: Current Researcher**

## **CHAPTER FOUR**

### **DATA ANALYSIS, FINDINGS AND DISCUSSION**

#### **4.1 Introduction**

The broad objective of this study was to determine the influence of e-marketing practices, corporate culture and competitive environment on the performance of telecommunications companies in Kenya. It also sought to establish the nature and magnitude of the relationships between these variables as well as testing the hypothesized relationships. This chapter is made up of descriptive statistics and hypotheses testing results which will enable analysis of the variables involved in order to estimate the model described in the previous chapter. The chapter therefore presents the results of the data analysis and findings in line with the objectives of the study. Regression analysis was used in testing the hypotheses of the study. The chapter begins with the presentation of information on the profile of the respondents and organizations that formed the population of the study. It also presents the reliability and validity tests conducted on the study elements followed by detailed results drawn through descriptive and a variety of inferential statistics.

#### **4.2 Descriptive Statistics**

##### **4.2.1 Response Rate**

Data used for the research was derived from the directory of Communications Authority of Kenya as at June 2015 that placed the number of telecommunications companies at 408. One of the companies, Essar Telecom Kenya Limited, had ceased operations by the time of data collection. A total of 205 Questionnaires were sent out to representative companies that formed the sample size. Out of the Questionnaires sent out, 160 were returned but 5 of them were incomplete and were therefore not used in the analysis. The sample response rate was 75.6%.

This response rate was considered adequate for the study. Fowler (1984) recommends a response rate of 60% as representative for any study. The response rate is considered high compared to similar studies by Sanders (2014) at 65%, Njeru (2013) at 60% and Asikhia (2009) at 39.6%. The Questionnaire targeted three managers responsible for the management of finance, marketing and human resource activities within the organizations. Aggregate scores were computed from the three individual respondents from every company and scores used to reduce single source response bias.

#### 4.2.2 Reliability Tests

Reliability requires that the internal consistency of the questionnaire is established in order to assess the quality of the instruments used in the study. Cronbach's Alpha technique was used in testing for reliability. A number of scholars are in consensus that Cronbach's value from 0.5 is sufficient and good for reliability test (Cooper & Schindler, 2006; Gliem & Gliem, 2003; Asikhia, 2009; Bagozzi & Yi, 2012). The study interpreted alpha coefficient of 0.6 and above as satisfactory and acceptable reliability. The results are summarized in Table 4.1.

**Table 4.1: Summary of Reliability Tests**

Variable	Indicators	N	Grand Mean	No. of Items	Cronbach's Alpha
Electronic Marketing	<ul style="list-style-type: none"> <li>• Online Marketing</li> <li>• Offline Marketing</li> </ul>	155	4.62	18	.852
Corporate Culture	<ul style="list-style-type: none"> <li>• Structure</li> <li>• Systems</li> <li>• Style</li> <li>• Staff</li> <li>• Skills</li> <li>• Strategy</li> <li>• Shared Value</li> </ul>	155	4.64	56	.936
Competitive Environment	<ul style="list-style-type: none"> <li>• Rivalry Intensity</li> <li>• Threat of New Entrants</li> <li>• Power of Buyers</li> <li>• Power of Suppliers</li> <li>• Substitute Products</li> </ul>	155	4.21	30	.763
Organizational Performance	<ul style="list-style-type: none"> <li>• Efficiency</li> <li>• Effectiveness</li> <li>• Relevance</li> <li>• Financial Viability</li> </ul>	155	4.47	27	.772

**Source: Primary Data**

The results in Table 4.1 show that Cronbach's Alpha coefficient ranged between .763 (Competitive Environment) and .936 (Corporate Culture). The results reveal high degree of reliability of the measurement scales used in the study. Corporate Culture had the highest reliability followed by Electronic Marketing Practices while Competitive Environment had the lowest reliability. Notably, the variable with the lowest reliability also scored above the cut-off point of 0.6 that was adopted by this study. All the scores presented in Table 4.1 are above those recommended by Gliem and Gliem (2003) and Bagozzi and Yi (2012).

#### 4.2.3 Validity Tests

Validity is the accuracy with which data obtained in a study captures what it was designed to measure (Doodley, 2003). Face validity was assessed by discussing the questionnaire with scholars and practitioners in marketing, organization behaviour and strategy. Construct validity was established through factor analysis which enabled data reduction through factor loading thereby revealing statements with highest contribution on the variables. Sampling adequacy tests that show appropriateness of items for further analysis was also undertaken. Kaiser-Meyer-Olkin (KMO) test of sampling adequacy and Bartlett's test of sphericity were conducted and summary of the results is presented in Table 4.2.

**Table 4.2: Kaiser-Meyer-Olkin (KMO) and Bartlett's test**

Factors	KMO Test	Bartlett's test of Sphericity			Determinant
		Approx. Chi-Square	df	Sig.	
Electronic Marketing Practices	.791	953.293	153	.000	0.002
Corporate culture	.724	3130.549	1540	.000	0.207
Competitive Environment	.749	839.161	435	.000	0.010
Organizational Performance	.769	930.668	351	.000	0.002

**Source: Primary Data**



The results from the test presented in Table 4.2 indicate that the scales had KMO values above the threshold of 0.7 advocated for by Williams et al. (2012) who recommends any values from 0.5 and above as acceptable for sampling adequacy. The results show the KMO values for all the variables of the study as above 0.7 with electronic marketing practices scoring 0.791, corporate culture was at 0.724, competitive environment was 0.749 while organizational performance was 0.769. Bartlett's Test of sphericity which analyzes if the samples are from populations with equal variances also produced p-values less than 0.05 thereby indicating acceptable degree of sampling adequacy. Electronic marketing practices had a chi-square value of 953.293 ( $p < 0.05$ ), corporate culture (3130.549,  $p < 0.05$ ), competitive environment (839.161,  $p < 0.05$ ) and organizational performance (930.668,  $p < 0.05$ ). Determinant values closer to 0 depict computational problems with factor analysis which imply multicollinearity of the data (Saunders et al., 2011). The results present determinant values above 0 with electronic marketing practices at 0.002, corporate culture (0.207), competitive environment (0.010) and organizational performance (0.002). All the study findings were acceptable thereby paving way for further analysis.

Further test on validity using principal component analysis was used in extracting the factors. The factors were then rotated through Varimax Rotation method. Six factors loaded on electronic marketing practices, fifteen factors loaded on corporate culture, nine factors loaded on competitive environment while ten factors loaded on organizational performance. The results show that the factors for all the variables under study were valid indicators of the study constructs (Appendix 6).

#### **4.2.4 Tests of Statistical Assumptions**

Statistical tests are based on a set of assumptions and application of diagnostic tests provides assurance that data does not fail the assumptions. The study tested for normality using Shapiro Wilks tests while linearity was tested through graphical analysis using Q-Q plots (Appendix 6). Multicollinearity was measured using Tolerance and Variance Inflation Factor (VIF) with Tolerance greater than 0.1 showing multicollinearity (Saunders et al., 2011). Autocollinearity was measured using Durbin-Watson Statistics (Baron & Kenny, 1986). Table 4.3 presents the summary of the findings.

**Table 4.3: Results of Tests of Statistical Assumptions**

		N	Normality ( <i>Shapiro-Wilk test</i> )	Independence ( <i>Durbin-Watson test</i> )	Homogeneity ( <i>Levene test</i> )	Collinearity <i>VIF (Tolerance test)</i>
<b>Threshold: Assumption is met if</b>			p > 0.05	1.5- 2.5	p > 0.05	VIF 10 max
E-marketing Practices	Online Marketing Offline Marketing	155	0.250	1.80	0.65	1.33 (0.75)
Corporate Culture	Structure Systems Style Staff Skills Strategy Shared Values	155	0.363	2.24	0.34	1.20 (0.83)
Competitive Environment	Rivalry Intensity New Entrants Buyer Bargains Supplier Bargains Substitute Products	155	0.141	1.98	0.59	1.20 (0.84)
Organizational Performance	Effectiveness Efficiency Relevance Financial Viability	155	0.217	2.04	0.30	1.18 (0.72)

**Source: Primary Data**

The results show that all the readings were above 0.05 confirming Normality. The Q-Q plots (Appendix 6) indicate linearity of the study variables. The Durbin-Watson test results ranged between 1.18 and 2.24 which supports the independence of error terms. The Levene's test of homogeneity variance ( $p > 0.05$ ) showed homogeneity of the study variables with all values being above 0.05. The test for Homoscedasticity was therefore not significant at  $\alpha = 0.05$  confirming homogeneity. The multicollinearity tolerance ranged from 0.72 to 0.84 while its reciprocal, the VIF, ranged between 1.18 and 1.33, which is below the threshold recommended by Robinson and Schumacker (2009).

### 4.3 Respondent Characteristics

Respondent characteristics were analysed using descriptive statistics. The study sought to examine the respondent's gender, age and length of service in the organization as presented in the following sub sections.

#### 4.3.1 Respondent's Gender and Age

The gender and age of the respondents were assessed to determine their distribution among the top management of the telecommunications companies and results are presented in table 4.4

**Table 4.4: Distribution of Respondents by Gender and Age**

Age	Gender of Respondent				Total %
	Male		Female		
	f	%	f	%	
25-29	7	4.5	5	3.2	7.7
30-34	23	14.8	23	14.8	29.7
35-39	37	23.9	13	8.4	32.3
40-44	21	13.5	7	4.5	18.1
45-49	13	8.4	3	1.9	10.3
50 and Above	3	1.9	0	0	1.9
<b>Total</b>	<b>104</b>	<b>67.1</b>	<b>51</b>	<b>32.9</b>	<b>100</b>

**Source: Primary Data**

The results in Table 4.4 show that only 7.7 percent of the sampled top management is aged below 30 years while those aged above 50 years were only men who accounted for 1.9 percent. This means that majority of the top management in the telecommunications companies in Kenya is aged between ages 30 and 49 (90.4%) with those between 30 and 39 accounting for the majority at 62 percent. This age bracket is composed of mature and well experienced managers capable of making sound management decisions that are necessary in driving success of the organizations. The results also reveal that the youth aged below 35 years account for 37.4 per cent which shows the confidence and commitment of the industry in developing the youth into top management positions. This is likely due to the association of the youth with greater strategic change and vibrancy that is necessary in the telecommunications industry which is characterized by rapid technological changes. Involvement of the youth in top management is also likely to enhance adoption of new cultural norms and values by members within the organization.

The gender distribution as presented by the results from Table 4.4 reveals that 67.1 per cent of the respondents were males while females constituted 32.9 per cent. The results are a representation of the situation on the ground where representation of females in top management positions in both private and public organizations in Kenya is still low. It is however expected that female representation in top management positions result to better organizational performance.

#### **4.3.2 Respondent's Gender and Length of Service in Telecommunication**

##### **Companies**

Length of service in an organization and industry explains level of acquisition of relevant skills, experience and knowledge which can lead to better performance. It also depicts level of adoption of culture of the organization that is necessary in boosting organizational performance. The results on the distribution of respondents by gender and length of service are presented in Table 4.5.

**Table 4.5: Distribution of Respondents by Gender and Length of Service**

Length of Service	Gender of Respondent				Total %
	Male		Female		
	f	%	f	%	
Less than 5 Years	25	16.1	17	11	27.1
5-9	40	25.8	28	18.1	43.9
10-14	35	22.6	5	3.2	25.8
15 and above	4	2.6	1	0.6	3.2
<b>Total</b>	<b>104</b>	<b>65.2</b>	<b>51</b>	<b>32.9</b>	<b>100</b>

**Source: Primary Data**

The results in Table 4.5 reveal that 71 per cent of the respondents had been with the current organizations for up to 9 years with 3.2 percent having over 15 years of service in the telecommunications companies. This shows relatively low levels of cumulative industry experience among the top management of telecommunications companies. Moreover, only 3.8 per cent of the females had worked in the telecommunication companies for 10 years and above. This explains the underrepresentation of the females in top management positions in telecommunications companies with results showing that 88.2 per cent of them had worked in the current organizations for less than Ten (10) years. The results also explain the dominance of male respondents in the top management positions of Telecommunications companies.

#### **4.4 Profile of Respondent Companies**

The profile of respondent companies in the study consisted of age of the company, size and ownership structure. The age of the company was measured by number of years the company had been in operation Kenya; size was determined by the number of permanent employees that were employed by the company while the ownership structure was measured in terms of whether the telecommunications company had local ownership, foreign ownership or whether it was jointly owned by both local and foreign investors. The results of the findings are presented in the sub-sections that follow.

##### **4.4.1 Age of the Company**

It was assumed that the age of the company represented the company's industry experience. The respondents were therefore asked to indicate the number of years their company had been in existence in Kenya and the results are presented in Table 4.6.

**Table 4.6: Age of Company**

<b>Age Category</b>	<b>No. of Years</b>	<b>Percentage %</b>
Less than 5 Years	6	3.8
5-9	36	22.8
10-14	89	56.3
15 and above	24	15.2
<b>Total</b>	<b>155</b>	<b>100</b>

**Source: Primary Data**

Results in Table 4.6 reveal that 26.6 per cent of the companies have been in operation in Kenya for less than 10 years while 71.5 percent have been in operation for over 10 years. Specifically, those with less than five years were 3.8 per cent, five to nine years were 22.8 per cent, ten to fourteen years were 56.3 per cent while those that had operated in Kenya for fifteen years and above were 15.2 per cent. This demonstrates the diversity of age among companies within the telecommunications industry with 71.5 percent having a great deal of industry experience that should positively impact their performance. Older organizations are expected to enjoy benefit of experience and learning that enables them to achieve superior performance. It would therefore be expected that at least the 15 per cent of the companies that have existed for over fifteen years should have superior performance. The relationship between age of an organization and its performance can be explained further with full knowledge and understanding of both the context and environmental factors surrounding the organizations.

#### **4.4.2 Products offered by Companies**

The telecommunications companies offer a diverse range of products that include International Networks, Local Networks, Application Service Provision and Content Service Provision. The range of products offered by the companies is presented on Table 4.7.

**Table 4.7: Products offered by Telecommunications Companies**

<b>Product Range</b>	<b>Frequency</b>	<b>Percentage (%)</b>
International Networks, Local Networks, Application Provision, Contents Provision	10	6.5
International Networks, Application Provision, Content Provision	11	7.1
Local Networks, Application Provision, Content Provision	28	18.1
Application Provision, Content Provision	30	19.4
Application Provision	20	12.9
Content Provision	56	36.1
<b>Total</b>	<b>155</b>	<b>100</b>

**Source: Primary Data**

Table 4.7 shows that only 6.5 per cent of the telecommunications companies offer full range of products available in the industry. The companies under this category lay infrastructure that enables realization of both international and local communications and at the same time avail applications and contents that are applied by different users. The highest number of companies (56) offers contents provision only and they account for 36.1 per cent. This is followed by companies that offer both applications and contents provision at 19.4 per cent.

#### **4.4.3 Age of Company and Range of Products**

Analysis was done to determine the relationship between the age of the telecommunications companies in Kenya and the range of products they offer in the market. The results are presented in Table 4.8.

**Table 4.8: Age of Company and Range of Products**

Age of Company	Company Products						
	International Networks, Local Networks, Applications, Contents	International Networks, Application Provision, Content Provision	Local Networks, Application Provision, Content Provision	Application Provision, Content Provision	Application Provision	Content Provision	Total
Less than 5	0	1	1	2	0	2	6
5-9	1	2	7	11	4	11	36
10-14	4	6	17	15	12	35	89
Above 15	5	2	3	2	4	8	24
<b>Total</b>	<b>10</b>	<b>11</b>	<b>28</b>	<b>30</b>	<b>20</b>	<b>56</b>	<b>155</b>

**Source: Primary Data**

The results in Table 4.8 show that out of the companies that offer full range of products available in the industry, none of them has been in existence for less than Five years. The findings also reveal that at least 5.8 per cent of companies with over ten years existence offer full range of products. This is in line with organizational growth strategies applied by organizations where management enlarge their product range as the companies stay longer in business to enable growth and sustainability.

#### **4.4.4 Number of Permanent Employees**

The size of the company was measured by the number of permanent employees that are currently employed by the telecommunications companies. Engagement of employees on permanent basis depicts the level of commitment and financial ability of the organizations in meeting employee expectations. This makes it an appropriate measure of size of a company. Employees are also considered key pillars of every organization and the companies that employ staff and managers with superior skills, knowledge and appropriate positive attitude can improve their competitive advantage. Size of a company is also purported to be a reflection of its ability to cope with environmental changes as well as how it organizes and copes with its internal processes. Results of the number of permanent employees that are employed by the telecommunications companies are presented in Table 4.9.



**Table 4.9: Number of Permanent Employees**

No. of Employees	Frequency	Percentage (%)
Up to 50	89	57.4
51-100	40	25.8
101-150	11	7.1
151-200	7	4.5
201 and Above	8	5.2
<b>Total</b>	<b>155</b>	<b>100.0</b>

**Source: Primary Data**

Table 4.9 illustrates that 57.4 per cent of the telecommunications companies have less than 50 permanent employees with only 16.8 per cent of the companies employing more than 101 permanent employees. This shows that the telecommunications industry has three categories of companies (small, medium and large) with the majority of them being small companies that employ less than 51 employees.

#### **4.4.5 Company Ownership Structure**

The telecommunications companies were classified into three categories of ownership that include fully locally owned, fully foreign owned and jointly local and foreign owned. The findings are presented in Table 4.10.

**Table 4.10: Company Ownership Structure**

Ownership Structure	Frequency	Percentage (%)
Fully Locally Owned	131	84.5
Fully Foreign Owned	3	1.9
Jointly Local and Foreign Owned	21	13.5
<b>Total</b>	<b>155</b>	<b>100.0</b>

**Source: Primary Data**

The findings in Table 4.10 reveal that more than 84% of the companies are fully locally owned and only 1.9 per cent are fully foreign owned. The remaining 13.5 per cent are jointly locally and foreign owned.

#### 4.4.6 Scope of Operations

The scope of the companies was measured by the accessibility of the companies' services. The respondents were asked to indicate the scope of operations performed by their respective telecommunications companies based on whether the companies operated nationally, regionally (within East Africa), continentally (Africa only) or globally. The findings are presented in Table 4.11.

**Table 4.11: Scope of Operations**

Scope	Frequency	Percentage (%)
National	119	76.8
Regional	20	12.9
Continental	8	5.2
Global	8	5.2
<b>Total</b>	<b>155</b>	<b>100.0</b>

**Source: Primary Data**

Table 4.11 shows that 76.8 per cent of the companies operate locally while 12.9 per cent operated regionally. Those with continental and global operations accounted for only 5.2 per cent each.

#### 4.5 Descriptive Statistics for Electronic Marketing Practices

The study sought to determine the degree of adoption of electronic marketing practices among telecommunications companies in Kenya. The respondents were asked to indicate the extent to which their organizations focused on electronic marketing practices, specifically online and offline marketing practices. The questions were rated on a 5-point Likert scale ranging from 1 - 'not at all' to 5 - 'very large extent'. The questions comprised 18 statements and the respondents were to choose only one of the statements that best describes the situations in their organizations.

The responses were analyzed using descriptive measures that include mean, standard deviation and coefficient of variation. Mean is a measure of central tendency used in describing the average number in a set of values. The standard deviation (SD) is used to measure the dispersion of data around the mean. The coefficient of variation (Cv) is a measure of dispersion of frequency distribution and is useful in comparing the degree of variation from one data series to another. A Coefficient of Variance (Cv) of 50% (0.5) and below is considered statistically acceptable for internal consistency of variability in a series of data (Nunnally, 1978). The responses on Electronic Marketing Practices are presented in Table 4.12 that follows.

**Table 4.12: Mean Scores and Standard Deviations for Electronic Marketing Practices**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
<b>Online Marketing Practices</b>				
The company seeks customers' views on its products/services using the internet	155	4.83	.413	8.6
The company uses social media marketing technology (facebook and twitter) to reach its customers	155	4.79	.437	9.1
Advertising the company's products on-line is cheaper than all other forms of marketing	155	4.66	.540	11.6
The company gets more customer enquiries when using internet technology	155	4.53	.648	14.3
The company uses online advertising whenever it runs its promotions	155	4.49	.715	15.9
The company has an online Marketing Information System (MkIS) that it employs for collecting marketing intelligence / information	155	4.44	.748	16.8
The company uses online qualitative research to collect information from its customers	155	4.42	.711	16.1
The company has dedicated personnel that handle company's online marketing activities	155	4.42	.692	15.7
The company actively advertises its products/services using the internet	155	4.41	.850	19.3
The company advertises its products /services through other companies' websites	155	4.14	.146	27.7
The company has an active and interactive website through which it engages its customers /stakeholders	155	4.39	.929	21.2
Using internet to market the company has reduced our company's marketing expenditure	155	4.07	.685	16.8
<b>Average Score</b>		<b>4.47</b>	<b>0.710</b>	<b>16.1</b>
<b>Offline Marketing</b>				
The company uses short messages (SMS) to communicate with its customers	155	4.80	.432	9.0
The company obtains wider reach through SMS marketing	155	4.76	.548	11.5
The company spends less money and time in reaching its customers by SMS than through other forms of communication	155	4.74	.545	11.5
The company gets more customer enquiries/ feedback through short messages (SMS)	155	4.71	.546	11.6
How actively does the company use telephone / mobile phone to market its products/services?	155	4.66	.540	11.6
The company uses digital screens and motion pictures in marketing its products and activities	155	4.31	.872	20.2
<b>Average Score</b>		<b>4.66</b>	<b>0.581</b>	<b>12.6</b>

**Source: Primary Data**

Table 4.12 details respondents' scores on e-marketing practices. It has been divided into online and offline marketing activities. The results reveal that the overall mean score for online marketing practices was 4.47 with a standard deviation of 0.710 and a  $C_v$  of 16.1%. It shows that online marketing practices are highly adopted by telecommunications companies with the statement 'the company seeks customers on its products/services using the internet' being the most highly rated with a mean score of 4.79 ( $SD = 0.437$ ,  $C_v = 9.1\%$ ) while the statement 'using internet to market the company has reduced our company's marketing expenditure' scoring the least with a mean score of 4.07 ( $SD = 0.685$ ,  $C_v = 16.8\%$ ). All the other statements scored a mean above 4.00 indicating that telecommunications companies have largely adopted online marketing practice. This can be attributed to the relative affordability of online practices and the wide reach it accords its users.

The results also show an overall mean score for offline marketing practices as 4.66 with  $SD$  of 0.581 and  $C_v$  of 12.6%. All the statements had a mean score above 4.5 revealing that offline marketing was equally highly adopted by the telecommunications companies with the statement 'the company uses short messages (SMS) to communicate with its customers' scoring highest with a mean of 4.80 ( $SD = 0.432$ ,  $C_v = 9\%$ ). The statement that scored lowest was 'the company uses digital screens and motion pictures in marketing its products and activities' which had a mean score of 4.31 ( $SD = 0.872$ ,  $C_v = 0.202$ ). The results reveal that the use of telephone, mobile phones, digital screens and motion pictures in marketing telecommunications companies' products and services has been widely adopted. This can be attributed to the wide adoption of mobile telephones in the country that has enhanced reach and usage by both individuals and organizations. The telecommunications companies have therefore taken advantage of this wide usage of mobile telephones to reach their customers.

#### **4.6 Summary of Electronic Marketing Practices**

The summary of results from the respondents' scores on e-marketing practices that details individual scores on online and offline marketing practices has been presented in Table 4.13.

**Table 4.13: Summary of Electronic Marketing Practices**

<b>E-Marketing Practices</b>	<b>N</b>	<b>Mean</b>	<b>SD</b>	<b>Cv (%)</b>
Offline Marketing	155	4.66	0.581	12.6
Online Marketing	155	4.47	0.710	16.1
<b>Average Score</b>		<b>4.56</b>	<b>0.646</b>	<b>14.4</b>

**Source: Primary Data**

Table 4.13 reveals a mean score of 4.56 with a SD of 0.646 and a Cv of 14.4%. This shows the high level of adoption of e-marketing practices by telecommunications companies in Kenya. The results demonstrate that e-marketing is an equally important marketing strategy used by the companies in marketing their products and services. Whereas the scores on offline marketing activities are higher than those of online marketing activities, the difference is marginal. This shows that majority of the telecommunications companies consider both activities integral with more value being achieved when both are utilized alongside each other.

#### **4.7 Descriptive Statistics for Corporate Culture**

Leadership plays a vital role in influencing adoption of corporate culture through emphasis of positive values and reward systems that enable entrenchment and diffusion of required cultural values (Owino, 2014). Top management is capable of inculcating an innovative culture that in effect translates to better organizational performance. Corporate culture was measured around McKinsey's 7s Model that describes culture in terms of Structure, Systems, Style, Staff, Skills, Strategy and Shared Values. The results are presented in the following sub sections.

##### **4.7.1 Structure**

The measurement scale on structure comprised four question items. The respondents were required to indicate the extent to which each of the statements matched the structure of their organizations. The results are presented in Table 4.14.

**Table 4.14: Mean Scores and Standard Deviations for Structure**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
All departments in the company are headed by relevant managers responsible for achievement of departmental goals	155	4.30	0.678	15.8
The company is organized into different functions /departments in line with roles	155	4.26	0.78	18.3
Every employee in the organization has well specified job descriptions that guide job performance and territory demarcations	155	4.22	0.627	14.9
Management carries out adjustments to the organization structure from time to time to make it more responsive to changes in the environment	155	4.13	0.671	16.2
<b>Average Score</b>		<b>4.23</b>	<b>0.689</b>	<b>16.3</b>

**Source: Primary Data**

Results in Table 4.14 show very high and close scores on structure of the telecommunications companies with an overall mean score of 4.23 (SD = 0.689 and C<sub>v</sub> = 16.3%). The highest scores were from the statement ‘all departments in the company are headed by relevant managers who are responsible for the achievement of departmental goals’ that scored a mean of 4.30 (SD = 0.678, C<sub>v</sub> = 15.8%) with the lowest scoring statement being ‘management carries out adjustments to the organization structure from time to time to make it more responsive to changes in the environment’ that had a mean score of 4.13 (SD = 0.671, C<sub>v</sub> = 16.2%). The results equally revealed relatively high scores on companies being organized into different functions (Mean = 3.26, SD = 0.78, C<sub>v</sub> = 18%) and employees having well specified job descriptions that guide job performance (Mean = 4.22, SD = 0.627, C<sub>v</sub> = 14.9%) that were rated second and third respectively. The overall results show that the telecommunications companies in Kenya have structures in place with companies organized along departmental lines headed by respective managers responsible for goal achievements. The employees also have well specified job descriptions that guide on job performance. These well aligned structures are therefore ordinarily expected to impact positively on performance of the organizations.

#### **4.7.2 Systems**

The measurement scales on systems comprised nine question items. The respondents were asked to indicate the extent to which each of the statements matched the systems applied within their companies. The results are presented in Table 4.15.

**Table 4.15: Mean Scores and Standard Deviations for Systems**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
The company has stable systems that assures it of sustainability	155	4.45	0.572	12.9
The company has well established and widely shared systems, policies, procedures and guidelines that direct job performance	155	4.39	0.618	14.1
The company has put in place evaluation and appraisal systems for all its activities	155	4.38	0.627	14.3
The company has implemented Information Technology systems that enable efficient work performance	155	4.37	0.614	14.1
Our well aligned systems have earned our company a good reputation	155	4.36	0.612	14.0
The company recognizes flexibility and constantly reviews its systems, policies and procedures in line with environmental changes	155	4.33	0.656	15.2
The company has a reward system for all job performances	155	4.31	0.689	16.0
The company has established a system that encourages and rewards innovative ideas and performances	155	4.23	0.717	17.0
Our systems are highly bureaucratic with many rules that constrain performance	155	3.01	0.587	19.5
<b>Average Scores</b>		<b>4.20</b>	<b>0.632</b>	<b>15.2</b>

**Source: Primary Data**

The results in Table 4.15 show the mean scores as ranging from mean of 3.01 to 4.45 with overall mean scores of 4.20 (SD = 0.632, CV = 15.2%). The statement ‘company has stable systems’ had the highest rating with a Mean score of 4.45 (SD = 0.572, Cv = 12.9%) followed by statement ‘company has well established and widely shared systems, policies, procedures and guidelines that direct job performance’ that scored Mean of 4.39 (SD = 0.618, Cv = 14.1%. The third rating came from the statement ‘the company has put in place evaluation and appraisal systems’ with Mean = 4.38, SD = 0.627, Cv = 14.3% followed by statement ‘the company has implemented information technology systems’ that has a Mean of 4.37, SD = 0.614, Cv = 14.1%. The rest of the statements equally scored high ratings ranging from Mean of 4.37 to 4.23. The statement that scored lowest was on company systems being bureaucratic that had a Mean score of 3.01 (SD = 0.587, Cv = 19.5%). This low rating is a positive rating which implies that the telecommunication companies are less bureaucratic and therefore able to make decisions faster while acting swiftly in response to environmental changes.

The high scores from the individual statements reveal that the telecommunications companies have very good systems in place ranging from widely shared policies and procedures that guide job performance to evaluation and appraisal systems, information systems and reward systems all of which are well aligned. The systems have also earned the companies good image as depicted from the high Mean scores (Mean = 4.36, SD = .612, C<sub>v</sub> = 14.0%) from statement ‘our aligned systems have earned our company a good reputation’. The well aligned systems with minimal bureaucracy can be attributed to not only the small sizes of most of the telecommunications companies (Table 4.8) but also to the likelihood of fewer layers of reporting levels. This accords the organizations flatter structures with the leadership brought closer to the employees thereby enabling closer engagements.

#### 4.7.3 Style

The measurement scale for style was made up of ten question items and the respondents were required to indicate the extent to which each of the statements matched their company’s style of management. The results are presented in Table 4.16.

**Table 4.16 Mean Scores and Standard Deviations for Style**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
The CEO has an open door policy that allows ease of access by any cadre of employee	155	4.56	0.548	12.0
The departmental heads encourage staff consultations	155	4.47	0.550	12.3
Management has high expectations for performance	155	4.47	0.596	13.3
The company's departmental heads explain job requirements to every staff function	155	4.43	0.570	12.9
The management emphasizes delivery of superior value to customers	155	4.40	0.620	14.1
Top management is supportive of goal achievement	155	4.39	0.585	13.3
The company emphasizes focus on customers, competitors and suppliers across all departments	155	4.35	0.651	15.0
The employees are rewarded on good job performance	155	4.30	0.697	16.2
Employee inputs are considered in management decisions	155	4.28	0.691	16.1
The management is decisive in every aspect	155	4.25	0.706	16.6
<b>Average Scores</b>		<b>4.39</b>	<b>0.621</b>	<b>14.2</b>

**Source: Primary Data**



Table 4.16 reveals very close and high scores on all the statements ranging from a Mean of 4.28 to 4.56 with an overall mean score of 4.39 (SD = 0.621, CV = 14.2%). The highest scores were on the Chief Executive Officers (CEO) of the telecommunications companies having open door policy that enabled ease of accessibility. This statement scored a Mean of 4.56 with a SD of 0.548 and a CV of 12% with the lowest scores being recorded from statement on management being decisive that had a Mean Score of 4.28 (SD = 0.706, CV = 16.6%). Apart from these two statements, three others scored mean above 4.40, that is, management emphasizes on delivery of quality services (Mean = 4.40, SD = 0.620, CV = 24.1%), departmental heads explain job requirements to employees (Mean = 4.43, SD = 0.570, CV = 12.9%), management encourages staff consultations (Mean = 4.47, SD = 0.596, CV = 23%) and management having high expectations on performance (Mean = 4.47, SD = 0.596, CV = 13.3%). The scores on the remaining two statements were equally impressive with employees being rewarded on good performance scoring a mean of 4.30 with SD of 0.697 and CV of 16.2% while employees inputs being considered in management decisions scored a mean of 4.28 (SD = 0.691, CV = 16.1%). The high scores on management style portray the telecommunications companies as having open and democratic style of management.

#### **4.7.4 Staff**

Nine statements were presented to the respondents to indicate the extent to which each one of them reflected the staff characteristics within their companies. The results are presented in Table 4.17.

**Table 4.17: Mean Scores and Standard Deviations for Staff**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
The company has adequate number of staff to handle job requirements	155	4.61	0.528	11.5
The company has qualified staff for every job position	155	4.45	0.548	12.3
The company is people oriented and treats employees with respect	155	4.36	0.580	13.3
Our staff have analytical minds and able to take initiative for goal achievement	155	4.35	0.680	15.6
The company appraises its employees systematically and periodically	155	4.35	0.630	14.5
Our company assures all staff of security of employment	155	4.34	0.688	15.9
The company encourages employees to be calm yet careful when handling tasks and customers	155	4.32	0.652	15.1
Our employees are aggressive and quick in taking advantage of opportunities	155	4.26	0.730	17.1
Management tolerates reasonable degree of risk and error committed by employees	155	4.24	0.869	20.5
<b>Average Score</b>		<b>4.364</b>	<b>0.656</b>	<b>15.0</b>

**Source: Primary Data**

The results presented in Table 4.17 show the mean scores on all the statements ranging between 4.24 and 4.61 with an overall mean score of 4.364 (SD = 0.656, C<sub>v</sub> = 15%). The statement that scored highest was the company having adequate staff with a mean score of 4.61, SD = 0.528 and C<sub>v</sub> = 11.5% while the lowest scores came from the management's intolerance to risk and error (Mean = 4.24, SD = 0.869, C<sub>v</sub> = 20.5%). The second best rating was on telecommunications companies having qualified staff for every job position that scored a mean of 4.45, SD = 0.548 and C<sub>v</sub> = 12.3%. The scores on company appraising its staff periodically and staff having analytical minds both scored a mean of 4.35 while scores on company being people oriented and treating staff with respect and company encouraging staff to be calm when handling tasks scored a mean of 4.3 (SD = 0.580, C<sub>v</sub> = 13.3%) and 4.32 (SD = 0.652, C<sub>v</sub> = 15.1%) respectively. The results show that telecommunications companies regard employees highly; they employ adequate number of staff to ensure that there are no gaps in job performance. They also treat their employees with respect and allow them reasonable degree of error. The high ratings on staff perspectives detailed in Table 4.20 are likely to contribute to employees liking the companies and serving in the companies for longer. It is no

wonder that most of the employees had worked in their respective companies for over 5years (Table 4.6). This is likely to contribute to more industry experience and knowledge that should have a positive impact on company performance.

#### 4.7.5 Skills

The measurement scale on Skills comprised of seven question items and the respondents were required to indicate on a 5 point Likert scale the statements that matched the skills found in their company. The results are contained in Table 4.18.

**Table 4.18: Mean Scores and Standard Deviations for Skills**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
The company focuses highly on skills and competencies required for every job	155	4.57	0.570	12.5
The company benchmarks its skills with leaders in the industry and beyond	155	4.51	0.563	12.5
The company has a well-documented training programme for all its employees	155	4.41	0.578	13.1
The company offers opportunities for professional growth to all employees	155	4.41	0.578	13.1
All positions within the company have well spelt out skill expectations	155	4.37	0.560	12.8
The managers carry out skill gaps analysis periodically in line with environmental changes	155	4.36	0.580	13.3
The company invests adequately on skills development of its employees	155	4.30	0.514	12.0
<b>Average Scores</b>		<b>4.42</b>	<b>0.563</b>	<b>12.7</b>

**Source: Primary Data**

Table 4.18 reveals very high ratings for the statements ranging from 4.30 to 4.57 with an overall mean score of 4.42 (SD = 0.563, C<sub>v</sub> = 12.7%). The measurement with the highest mean score was on companies focusing on skills and competencies (Mean = 4.57, SD = 0.570, C<sub>v</sub> = 12.5%) while that with the lowest score was companies' investment on skills and development that had a mean score of 4.30 (SD = 0.514, C<sub>v</sub> = 12%). It is notable that even the lowest scores among the measurement scales under skills were equally very high. These ranged from mean scores on companies carrying out skill gap analysis (Mean = 4.36, SD = 0,580, C<sub>v</sub> = 13.3%), followed closely by management spelling out skill expectations (Mean = 4.37, SD = 0.560, C<sub>v</sub> = 12.8%) to

companies having well documented training programmes (Mean = 4.41, SD = 0.578, Cv = 13.1%) and finally to companies benchmarking their skills with the industry (Mean = 4.51, SD = 0.563, Cv 12.5%). The scores on the measurement scales relate quite closely with the telecommunication companies focusing on skills and competencies that make them benchmark with best practice within the industry through which they are able to spell out the skills expected to deliver their objectives for competitiveness. This results into companies being able to identify existing skill gaps that lead them to developing and documenting relevant training programmes and investing on the skills through relevant training. These are likely to result not only into highly skilled staff capable of handling business challenges but also enable them grow professionally in the company.

#### 4.7.6 Strategy

Respondents were presented with eight statements to indicate the extent to which each of the statements relates to the strategy adopted by their organizations. The findings are presented in Table 4.19.

**Table 4.19: Mean Scores and Standard Deviations for Strategy**

Statement	N	Mean Score	SD	Cv (%)
The company has documented and communicated its objectives that guide strategy formulation	155	4.68	0.480	10.3
The company's strategies are distinct thus enable our activities and programmes to be different from others	155	4.63	0.559	12.1
Our strategies assure us of competitiveness in the industry	155	4.59	0.520	11.3
Our strategies emphasize on quality performance	155	4.57	0.547	12.0
The company's strategies are aligned to industry feedback	155	4.50	0.585	13.0
The management reviews company's strategies periodically to make them more adaptive to changes in the environment	155	4.48	0.574	12.8
The company has a strategy for monitoring the environment periodically	155	4.46	0.627	14.1
The company has a position that is charged with strategy implementation	155	4.39	0.658	15.0
<b>Average Scores</b>		<b>4.54</b>	<b>0.569</b>	<b>12.6</b>

**Source: Primary Data**

Table 4.19 shows an overall average mean score of 4.54 (SD = 0.569, C<sub>v</sub> = 12.6%) with the scores from all the measurement scales ranging from 4.39 (SD = 0.658, C<sub>v</sub> = 15%) to 4.68 (SD = 0.480, C<sub>v</sub> = 10.3%). The statement that had the highest mean score was the company having documented and communicated its objectives from which all activities and programmes resonate ( Mean = 4.68, SD = 0.480, C<sub>v</sub> = 10.3%) while the lowest scores were from statement on company having a management position that is responsible for strategy implementation (Mean = 4.39, SD = 0.658, C<sub>v</sub> = 15%). The high scores on all the elements on strategy reveal the importance that the telecommunications companies have placed on strategy.

#### 4.7.7 Shared Value

Table 4.20 presents findings of descriptive statistics on shared value. The statements sought to demonstrate the extent to which telecommunications companies embrace togetherness and teamwork spirit. The summary of the respondents' scores are detailed in Table 4.20.

**Table 4.20: Mean Scores and Standard Deviations for Shared Values**

Statement	N	Mean Score	SD	C <sub>v</sub> (%)
Our company cares for the society and participates in community activities	155	4.62	0.561	12.1
Top management encourages togetherness and ownership of company activities by all employees	155	4.61	0.539	11.7
Working in collaboration with others from different departments is highly encouraged at our company	155	4.52	0.551	12.2
The company celebrates its achievement by both management and employees	155	4.47	0.573	12.8
The CEO ensures all departments engage in yearly team building activities	155	4.46	0.595	13.3
The company is more focused on external environment than internal environment	155	4.46	0.584	13.1
Company directors, top management and employees participate in yearly staff parties	155	4.46	0.550	12.3
The company encourages teamwork spirit / team orientation of its employees	155	4.45	0.536	12.0
The company shares relevant information freely among respective members	155	4.44	0.582	13.1
<b>Average Scores</b>		<b>4.50</b>	<b>0.563</b>	<b>12.5</b>

**Source: Primary Data**

The overall mean score on shared value perspective was 4.5 with SD of 0.563 and Cv of 12.5%. The question with the highest rating expected the respondents to indicate the extent to which the company cares for the society and participates in community activities. The mean score was 4.62 (SD = 0.561, Cv = 12.1%) indicating high level of participation which show that the telecommunications companies do not only regard own employees highly but also the society around them. The second rating came from the statement that sought to determine whether the company encouraged togetherness and ownership of company activities by employees. The mean score was 4.61 (SD = 0.506, Cv = 11.7%) indicating the companies' high regard for togetherness of their members.

Third rating was on question that tested whether different departments within the company worked in collaboration with one another. The scores showed Mean of 4.52 (SD = 0.551, Cv = 12.2%) indicating that the companies encouraged departmental collaboration. Question on whether the company celebrated its achievements was rated fourth (Mean = 4.47, SD = 0.573, CV = 12.8%) which further demonstrates commitment of telecommunications companies in togetherness and ownership of results. This commitment is demonstrated by results from questions rated 5 and 7 that sought to understand the extent of the management's engagement in yearly team building activities and participation of company's directors, management and employees on yearly staff parties. The ratings from each of the questions were very impressive, tying at a mean score of 4.46. The results demonstrate that telecommunications companies have a collaborative culture that encourages togetherness and teamwork spirit as supported by the ratings on question that sought to gauge the extent of the company's commitment to teamwork spirit that was rated highly (SD = 4.45, SD = 0,536, Cv = 12%). The teamwork spirit demonstrated is enhanced through regular bonding sessions and interpersonal interactions during team-building activities and yearly staff parties. Item 7 sought to demonstrate the level at which management of telecommunications companies freely shared relevant information with the employees and the results (Mean = 4.44, SD = 0.582 and Cv = 13.1%) were very impressive.

#### 4.7.8 Summary of Corporate Culture

Summary of overall respondents' scores on corporate culture are shown on Table 4.21.

**Table 4.21: Summary of Mean Scores and Standard Deviations for Corporate Culture**

Description	N	Mean Score	SD	Cv (%)
Strategy	155	4.54	0.569	12.6
Shared Values	155	4.50	0.563	12.5
Skills	155	4.42	0.563	12.7
Style	155	4.39	0.621	14.2
Staff	155	4.36	0.656	15.0
Systems	155	4.35	0.663	15.3
Structure	155	4.23	0.689	16.3
<b>Average Scores</b>		<b>4.40</b>	<b>0.618</b>	<b>14.1</b>

**Source: Primary Data**

Table 4.21 presents a summary of the respondents' overall scores on corporate culture of the telecommunication companies and the results reveal an overall mean average score of 4.4 with Cv of 14.1%. Among the seven items used as measurement scales for corporate culture, Strategy scored the highest ratings (Mean 4.54, Cv 12.6%) followed by Shared value (Mean 4.5, Cv 12.5%), Skills (Mean 4.42, Cv 12.7%), Style (4.39, Cv 14.2), Staff (4.36, Cv 15%), Systems (Mean 4.35, Cv 15.3%) and Structure (Mean 4.23, Cv 16.3%) in that order. The overall high ratings reveal that majority of the telecommunications companies have embraced cultural values which are reflected in the well aligned systems and structures. The companies also have a collaborative culture that encourages consultative minds among members. Lack of bureaucracy in the management style enables faster decision making, innovation and entrepreneurial culture.

#### 4.8 Descriptive Statistics for Competitive Environment

The way in which competition affects organizations differs based on industry characteristics. Competition can have either positive or negative impact on the organizations. Competition can on one hand lead to extinction of organizations while on the other hand it can force organizations to be more innovative thereby adopting

strategies that enable delivery of superior value to customers. The way organizations perceive and interpret the competitive environment varies and this in turn has overall effect on organizational performance. The study sought to establish the effect of selected competitive environmental factors on the relationship between e-marketing practices and performance of telecommunications companies.

Competitive environmental factors are expected to interact in a complex manner that can either strengthen or weaken the strength of the relationship between e-marketing practices and organizational performance. In order to assess the selected competitive environmental factors, the respondents were asked to indicate the extent to which a given set of statements affected the performance of their organizations. The study borrowed heavily from Pecotich's et al., (1999) INDUSTRUCT scale that used Porter's (1980) five competitive forces as measurement scales for competitive environment. The respondents were required to indicate the extent to which their organizations were affected by selected statements that depicted competitive environment. A 5-point Likert-type scale ranging from 1 which symbolized 'Not at all' to 5 which represented 'to a very large extent' was used. The responses were analysed using mean scores, standard deviation and coefficient of variance. The respondents' scores on each of the competitive industry measures are detailed in the following sub-sections.

#### **4.8.1 Intensity of Rivalry**

Intensity of rivalry in an industry refers to the way players within an industry compete intensively in order to have an edge over one another. It can be characterised by retaliations and high levels of aggressiveness in the form of counter offers. The respondents were presented with statements that depict rivalry competitiveness and were required to indicate the extent to which they felt the statements characterized the telecommunications industry. The scores are presented in Table 4.22.



**Table 4.22: Mean Scores and Standard Deviations for Intensity of Rivalry**

<b>Statement</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
Firms in the industry compete intensely to hold/increase their market share	155	4.21	0.702	16.7
There are many promotion wars in the industry	155	4.19	0.694	16.6
Competition in the industry is describe by terms like 'war-like', 'bitter', and 'cut-throat	155	4.17	0.692	16.6
Rate of introduction of new products and services in the industry is rapid	155	4.16	0.751	18.1
Anything that one competitor can offer the market, others can readily match it	155	4.14	0.625	15.1
Competitors react fast to moves by any single company within the industry	155	4.14	0.697	16.8
Price competition is highly intense and price cuts are quickly and easily matched in the industry	155	4.11	0.752	18.3
Advertising battles occur frequently and with high intensity in the industry	155	4.09	0.706	17.3
Firms within the industry have massive resources for vigorous and sustained competitive action and retaliation against competitors	155	4.04	0.821	20.3
<b>Average Scores</b>		<b>4.14</b>	<b>0.716</b>	<b>17.3</b>

**Source: Primary Data**

The mean scores for the question items on the scale ranged from 4.04 to 4.21. Item that scored the highest had a Mean = 4.21, SD = 0.702, Cv =16.7% and sought to determine if the firms within the industry compete intensely in holding their market share. This was followed by the statement showing availability of promotion wars within the telecommunications industry that scored Mean = 4.19 (SD = 0.694, Cv = 16.6%). The results reveal that competition within the industry was very intense thus the descriptors in item that was rated third (war-like, cut-throat and bitter) with Mean = 4.17, SD = 0.692, Cv = 16.6% being very relevant. The fourth rating (Mean 4.16, SD = 0.751, Cv = 18.1%) was on the statement that sought to determine if rate of introduction of new products and services in the industry was rapid. The fifth and sixth ratings came from statements that sought to determine the extent to which actions and offerings by

competing companies can be easily matched within the industry. The Mean score for both statements was 4.14. This revealed that majority of the industry players tended to readily match offers made by the competition. This implies that distinctiveness in offerings is not easily achieved in the industry and that majority of the telecommunications companies react fiercely to marketing activities by competitors in order to dilute any moves that may give their rivals an edge.

Items that were rated seventh and eighth sought to assess the extent to which pricing wars and advertising battles play within the industry. The seventh rating was on pricing wars and had a Mean score of 4.11, SD = 0.752 and Cv = 18.3%. The scores reveal that majority of the companies within the industry applied pricing as a competitive tool in order to encourage switching among customers. This means that price is a factor that significantly influences consumer purchase behaviour in the telecommunications industry. Therefore, failure to respond to changes in prices by competitors can have negative consequences on performance of the companies. The high rating on advertising battles with a Mean = 4.09, SD = 0.706, Cv = 17.3% shows that majority of the telecommunications companies engage in frequent advertising wars thereby revealing the intensity of competition within the industry. The last item sought to establish the extent to which the industry players had resource that were specifically used to sustain competitive action and retaliate against competition. The scores (Mean=4.04, SD=0.821, CV=20.3%) reveal that majority of the industry players have set aside massive resources that are channelled towards defending their markets and fighting back whenever their positions are threatened by the competition.

#### **4.8.2 Threat of New Entrants**

Threat of entry into an industry refers to the ease with which prospective players can enter into an industry. Industries with minimal entry restrictions easily attract many players resulting into intensely competitive environments. The respondents were presented with a set of statements that described threat of entry into the industry and were required to indicate on a 5-point Likert scale the extent to which the statements described the telecommunications industry. Results are presented in Table 4.23.

**Table 4.23: Mean Scores and Standard Deviations for Threat of New Entrants**

<b>Statement</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
Established companies in our industry have substantial resources which are used to prevent entry of new competitors	155	4.37	0.766	17.5
New entrants into the industry have to spend heavily to build their brands and overcome existing brand loyalties	155	4.27	0.732	17.1
New companies joining the industry must spend a lot of resources on research and development	155	4.22	0.824	19.5
New companies entering the industry as small scale firms must accept a considerable cost advantage	155	4.19	0.701	16.7
New companies have to enter at a highly visible scale to be recognized by customers	155	4.14	0.814	19.7
Setting up a company within our industry requires large star-up costs in form of finances, research and development, capital and human resources	155	4.07	0.920	22.6
<b>Average Scores</b>		<b>4.21</b>	<b>0.793</b>	<b>18.8</b>

**Source: Primary Data**

Results in Table 4.23 present an overall mean score of 4.21 (SD = 0.793, C<sub>v</sub> = 18.8%) with the highest ratings being on statement that sought to establish the extent to which existing companies set aside substantial resources to prevent entry of new competitors that had a mean score of 4.37 (SD = 0.766, C<sub>v</sub> = 17.5%). The results show that existing firms are willing to use their resources in blocking entry of competing firms into the industry.

The second rating (Mean = 4.27, SD = 0.732, C<sub>v</sub> = 17.1%) came from the statement that sought to determine the extent to which new entrants into the industry have to spend heavily to build their brands and overcome existing brand loyalties. This means that telecommunications companies that enter the industry must spend heavily in order to build their brands. The third rating was from the statement on new companies joining the industry having to spend a lot of resources on research and development that scored a mean of 4.22, SD = 0.824, C<sub>v</sub> = 19.5%. Like the second rated statement, the results reveal that the majority of telecommunications companies have to spend heavily on research and development in order to make an impact in the industry. It also implies that the industry places a lot of emphasis on research and development.

The fourth rating was on the statement that sought to establish the extent to which new companies entering the industry must accept a considerable cost advantage. This statement scored a mean of 4.19,  $SD = 0.701$ ,  $C_v = 16.7\%$  which reveals the cost disadvantage that small scale firms are exposed to in the industry. The second last rating was on statement that sought the respondents' view on the extent to which new companies have to enter at a highly visible scale to be recognized by customers. The ratings were equally high with Mean = 4.14,  $SD = 0.814$ ,  $C_v = 19.7\%$  which reveal that visibility within the industry requires considerable spending by the industry players. The last scores came from the statement that sought to establish the extent to which setting up a company within the industry requires large star-up costs in form of finances, research and development, capital and human resources. The ratings were high with the mean = 4.07,  $SD = 0.920$ ,  $C_v = 22.6\%$  revealing that setting up a company within the telecommunications industry requires considerable resource. The overall results imply that majority of telecommunications companies need substantial resource for set up, research and development and visibility.

#### **4.8.3 Bargaining Power of Buyers**

In industries where buyers have high bargaining power, the players must be very innovative in order to meet the high expectations from buyers. This requires huge investment on activities that enable unmatched value delivery to customers and differentiation of offerings. Whereas investment in such activities may enable companies to stand out in the industry, it is also likely to result into shrinking profits. The respondents were presented with measurement items on bargaining power of buyers and were required to indicate on a 5-Point Likert scale the extent to which the statements described the telecommunications industry. Results are presented on Table 4.24.

**Table 4.24: Mean Scores and Standard Deviations for Bargaining Power of Buyers**

<b>Statement</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
Buyers and buyer groups are very powerful in the industry	155	4.23	0.901	21.3
There is a small number of buyers in the industry that form a large proportion of our industry's sales	155	4.19	0.876	20.9
Buyers in the industry demand better services	155	4.17	0.710	17.0
Buyers in the industry's products are in a position to demand concessions and large discounts	155	4.06	0.972	23.9
Buyers in the industry's products are in a position to demand concessions and large discounts	155	4.06	0.972	23.9
Buyers in our industry do not dictate any terms and go by what companies offer them	155	3.70	0.839	22.7
<b>Average Scores</b>		<b>4.070</b>	<b>0.860</b>	<b>21.2</b>

**Source: Primary Data**

Results presented in Table 4.24 show diverse ratings that range from mean of 3.70 to 4.23 with the overall means score of 4.07 (SD = 0.860, Cv = 21.2%) revealing that buyers within the industry have a high bargaining power and therefore can influence offerings of the industry players. The first statement sought to determine the power of buyers in the industry and the scores (Mean = 4.23, SD = 0.901, Cv = 21.3%) were the highest rating from the respondents confirming that the buyers are generally powerful. The statement that was rated second (Mean = 4.19, SD = 0.876, Cv = 2.9%) sought to establish existence of a few buyers who make up the largest part of the sales within the industry. The results reveal existence of a small number of buyers who are responsible for the bulk of the industry's sales. This implies that this group of buyer are capable of driving the whole industry and even dictate the direction the industry takes in form of products, pricing and general service delivery.

The third rating was from the statement that sought to establish the extent to which buyers demand for better services and the results (Mean = 4.17, SD = 0.710, Cv = 17%) confirmed the statement. This can be aligned to the fourth rated statement that sought to assess the extent to which buyers are in a position to demand concessions and large discounts from the industry players. The scores were equally high with a mean = 4.06,

SD = 0.972,  $C_v = 23.9\%$  revealing the high power that the buyers command in the industry. The last rating was from a statement that sought to determine the extent to which the buyers in the industry do not dictate any terms and go by what companies offer them. The scores (Mean = 3.70, SD = 0.839,  $C_v = 22.7\%$ ) demonstrate that majority of the buyers within the telecommunications industry dictate terms and do not go by what industry players offer and that the companies have to establish customers' needs in order to align their offerings with the market. This explains the high ratings of research and development highlighted in Table 4.23.

#### 4.8.4 Bargaining Power of Suppliers

Industries characterized by high bargaining power of suppliers present players with diverse challenges and negative impacts. Suppliers may dictate the market and even opt to charge excessively high prices for unique resources and supplies. This results into low value delivery in the whole industry and shrinking profits realized by players. This study presented the respondents with measurement items on bargaining power of suppliers and were required to indicate on a 5-Point Likert scale the extent to which the statements described the telecommunications industry. Results are presented on Table 4.25.

**Table 4.25: Mean Scores and Standard Deviations for Bargaining Power of Suppliers**

Statement	N	Mean Score	SD	Cv (%)
In our industry, the suppliers' product quality has great effect on quality of our company's products	155	4.55	0.695	15.3
The industry has a small number of suppliers who contribute to a large proportion of the industry's inputs	155	4.24	0.703	16.6
The suppliers' products/offerings are an important input into our company's products/offerings	155	4.10	0.896	21.9
The suppliers' / supplier groups in our industry are very powerful	155	3.93	0.974	24.8
Suppliers in our industry demand and gain high concessions	155	3.81	0.952	25.0
<b>Average Scores</b>		<b>4.13</b>	<b>0.844</b>	<b>20.7</b>

Source: Primary Data (2016)

Results presented in Table 4.25 show an overall mean score of 4.13 ( $SD = 0.844$ ,  $C_V = 20.7\%$ ) with the scores having a range between 3.81 and 4.55. The highest scores were from ratings on statement that sought to assess the extent to which the suppliers' products' quality have great effects on quality of the company's products. The scores were high with Mean = 4.55,  $SD = 0.695$  and  $C_V = 20.7\%$ . This reveals the strong link between the quality of the suppliers' products and the final products released in the general market. The statement was closely related to the one that was rated third (Mean = 4.10,  $SD = 0.896$ ,  $C_V = 21.9\%$ ) that sought to establish the extent to which the suppliers' products were important input into the telecommunications company's products. The results imply that to a large extent, the telecommunications companies must work closely with the suppliers in order to ensure that the whole industry receives and delivers quality products.

The second scores were from the statement that sought to establish the existence of a few suppliers who make the greatest contribution to the sales within the industry. The high scores (Mean = 4.24,  $SD = 0.703$ ,  $C_V = 16.6\%$ ) reveal existence of the small proportion of suppliers that are likely to dictate the industry supplies thereby implying their importance to the industry players. The overall power of the suppliers and their ability to demand and gain concessions rated moderately with lowest ratings being on the suppliers ability to gain and receive concessions (Mean = 3.81,  $SD = 0.952$ ,  $C_V = 25\%$ ) followed by the overall power of suppliers that rated second last (Mean = 3.93,  $SD = 0.974$ ,  $C_V = 24.8\%$ ). These ratings mean that the suppliers still have influence on the industry supplies, albeit moderately.

#### **4.8.5 Threat of Substitute Products**

Availability of substitute products in an industry means that customers have alternative products that can meet their needs and do not have to rely very much on a company's products. This translates to need for industry players to come up with products and strategies that enable customers to consistently choose their products without switching to alternatives. The respondents were presented with measurement items on the power of substitute products and were required to indicate on a 5-Point Likert scale the extent to which the statements described the telecommunications industry. Results are presented on Table 4.26.

**Table 4.26: Mean Scores and Standard Deviations for Threat of Substitute****Products**

<b>Statement</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
The products from our industry have intrinsic characteristics from which it is difficult to find substitutes	155	4.59	0.532	11.6
All companies in our industry are aware of the strong substitutes that are easily available to our customers	155	3.86	0.871	22.6
There is considerable pressure from substitute products in our industry	155	3.79	0.798	21.1
The needs that our industry products satisfy may be easily satisfied by products from many other sources and industries	155	3.47	0.715	20.6
The availability of substitute products in our industry limits the potential return on investment in the industry	155	3.34	0.942	28.2
<b>Average Scores</b>		<b>3.81</b>	<b>0.772</b>	<b>20.8</b>

**Source: Primary Data**

The results in Table 4.26 reveal moderate ratings on power of substitute products within the telecommunications industry with an overall mean scores of 3.81 (SD = 0.772, C<sub>v</sub> = 20.8%). The scores ranged from a low mean of 3.34 (SD = 0.942, C<sub>v</sub> = 20.6%) to a high of 4.59 (SD = 0.532, C<sub>v</sub> = 11.6%). The statement that received the highest ratings sought to assess whether the products from the industry have intrinsic characteristics from which it is difficult to find substitutes. The high scores revealed the uniqueness of the industry products that makes it difficult for buyers to find close substitutes. This means that industry players face no threat from substitute products and competition is majorly amongst the telecommunication companies themselves. Closely related to this statement was the statement that sought to determine whether availability of substitute products in the industry limits the potential return on investment within the industry. The ratings were moderate (Mean = 3.34, SD = 0.942, C<sub>v</sub> = 28.2%) implying that return on investment within the telecommunications industry is not affected by availability of substitutes but any other elements.



The respondents were also required to indicate the extent to which companies within the industry are aware of the strong substitutes available to the customers and the scores (Mean = 3.86, SD = 0.871,  $C_v$  = 22.6%) reveal moderate awareness. Respondents' ratings on pressure from substitute products within the industry equally rated moderately with a mean score of 3.79, SD = 0.798 and  $C_v$  = 21.1%. The moderate results reveal that the pressure experienced within the industry may come from other sources including buyers, suppliers, and the competition but not from substitute products. The second last rating was on the statement that sought the respondents' views on whether the industry needs can be met through offerings from different origins and industries. The results (Mean= 3.47, SD = 0.715,  $C_v$  = 20.6%) reveal otherwise meaning that other industry products are unlikely to meet the needs that are met by the telecommunication companies.

#### 4.8.6 Summary of Competitive Environment

Porter's (1980) five competitive forces framework posits that analysis of the competitive environment of any industry revolves around the behaviour of existing organizations and the structure of the industry's environment. The telecommunications companies' composite score of competitive environment was computed as the average of the mean scores of the Porter's (1980) five competitive forces (bargaining power of buyers, threat of substitute goods, bargaining power of suppliers, rivalry amongst existing firms and the threat of new entrants). The Porter's (1980) five competitive forces put together explain the perceived dynamics of the competitive intensity of an industry. The respondents' scores on the measurement scales of competitive environment are summarized in Table 4.27.

**Table 4.27: Summary of Mean Scores and Standard Deviations of Competitive Environment**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b><math>C_v</math> (%)</b>
Threat of new entrants	155	4.21	0.793	18.8
Rivalry Intensity	155	4.14	0.716	17.3
Bargaining Power of Suppliers	155	4.13	0.844	20.7
Bargaining Power of Buyers	155	4.07	0.860	21.2
Threat of Substitute Products	155	3.81	0.772	20.8
<b>Average Scores</b>		<b>4.07</b>	<b>0.797</b>	<b>19.8</b>

**Source: Primary Data**

The results in Table 4.27 show the overall mean scores on competitive environment as 4.07 with SD of 0.797 and Cv of 19.8%. The results imply that all the five competitive forces were highly rated as shaping telecommunications industry competition. The threat of substitute products had the lowest scores (Mean = 3.81, SD = 0.772, Cv = 20.8%) while threat of new entrants into the industry was rated highest (Mean 4.21, SD = 0.793, Cv = 18.8%). Whereas substitute products are a moderate threat in the industry, new entrants are a real threat to the majority of the industry players and this is mainly among the content service providers who form the majority of the companies. The second rating was on rivalry intensity (Mean = 4.14, SD = 0.716, Cv = 17.3%) whose mean score indicates that majority of the telecommunications companies believed that intensity of competition was very high. This can be linked to the threat of new entrants that was also rated highly. The results suggest that players within the industry have to compete fiercely in order to retain their market positions. Results imply that the industry is attractive thus the new entrants getting easily attracted into the market.

The bargaining power of suppliers was rated third with Mean = 4.13, SD = 0.844, Cv = 20.7%). Higher supplier bargaining power present challenges and complexities to companies and can drive down value while reducing overall industry profitability. These force industry players to be more innovative in dealing with suppliers, develop relationship marketing tactics and have close partnerships with suppliers in order to maintain quality suppliers. The bargaining power of buyers that refers to the extent to which the actions of organizational buyers can influence the general wellbeing of the organization was equally highly rated (Mean = 4.07, SD = 0.860, Cv = 21.2%) at third position. The high scores suggest that customers within the telecommunications industry have constantly changing tastes and preferences and are continuously in search of innovative products that will meet their ever changing needs and wants. Porter (1980) advises that powerful customers can capture more value by driving down prices, demanding better quality and playing companies against one another. This implies that industry players must be more innovative, continually scan the environment and align their offerings with the market requirement. This is likely to enable them remain competitive and profitable in the long run.

## **4.9 Descriptive Statistics for Organizational Performance**

Organizational performance can be assessed using both objective and subjective measures. Objective measures apply secondary data retrieved from different sources including accounting documents within the organization. Subjective measures, on the other hand, are respondents' perceptions that are collected through primary data collection techniques. The study adopted IDRC model originally founded by Lusthaus (1999) in operationalizing organizational performance. Drawing from the model; Efficiency, Effectiveness and Relevance of the organizations constituted the non-financial indicators used to measure performance of the telecommunications companies. On the other hand, financial performance was measured using financial viability of the organizations based on parameters recommended by Lusthaus (1999).

### **4.9.1 Organizational Non-Financial Performance**

These were made up of Organizational Efficiency, Effectiveness and Relevance as guided by the IDRC model (Lusthaus, 1999). The respondents were presented with statements under each of the measurement scales and were to rate them on a 5-point Likert scale ranging from 1- 'Not at all' to 5- 'to a very large extent' based on their perception of how the statements were in line with their organization's offerings. The following sub-sections detail the measurement scales under each of the non-financial perspectives.

#### **4.9.1.1. Organizational Efficiency**

Organizational Efficiency refers to the extent to which an organization can provide exceptional services to its customers within an appropriate cost structure. The respondents were presented with statements that depict organizational efficiency and they were to rate the same on a 5-point Likert scale ranging from 1 'not at all' to 5 'to a very large extent' the statements that they perceived related to their companies. The findings are presented in Table 4.28.

**Table 4.28: Mean Scores and Standard Deviations for Organizational Efficiency**

<b>Statement</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
Our company monitors employee absenteeism and turnover rates	155	4.86	0.343	7.1
The company monitors timeliness of service delivery by the employees	155	4.79	0.406	8.5
Our company makes optimal use of its financial resources	155	4.66	0.500	10.7
Our company makes best use of the employees to the best of their abilities	155	4.64	0.482	10.4
Our company makes best use of its physical resources	155	4.61	0.490	10.6
All departments within the company make benchmark comparisons of the progress achieved	155	4.55	0.583	12.8
High quality administrative systems are in place to support efficiency	155	4.33	0.694	16.0
<b>Average Scores</b>		<b>4.63</b>	<b>0.500</b>	<b>10.9</b>

**Source: Primary Data**

The results in Table 4.28 show that the average mean score for organizational efficiency was 4.63, SD = .500 and Cv 10.9%. Responses on individual organizational efficiency indicators varied with the highest score being the statement that sought to assess the extent to which the company monitors employee absenteeism and turnover rates (Mean = 4.86, SD = 0.343, Cv = 7.1%) with the lowest rating among the statements being quality administrative systems being in place at the company (Mean = 4.33, SD = 0.694, Cv = 16%). Notably, all the statements scored very high ratings with the second best rating being ‘company monitors timeliness of service delivery’ (Mean = 4.79, SD = 0.406, Cv = 8.5%), followed by company making optimal use of its financial resources (Mean = 4.66, SD = 0.500, Cv = 10.7%). The fourth best rating was on company making the best use of its employees that scored a Mean of 4.64 (SD = 0.482, Cv = 10.4%) followed by company making best use of its physical resources that came fifth with a Mean of 4.61 (SD = 0.490, Cv = 10.6%) with the second last rating being on company’s departments making benchmark comparisons on their performances (Mean = 4.55, SD = 0.583, Cv = 12.8%). The results show that the majority of the telecommunications companies were very keen on ensuring efficiency in most facets of the organizations; ranging from the utilization of organizational resources through to activities that support the running of the organizations.

#### 4.9.1.2. Organizational Effectiveness

Organizational effectiveness is the degree to which an organization moves towards the attainment of its mission and realization of its goals. The respondents were presented with measurement scales comprising of eight items and were to rate the same on a 5-point Likert scale based on the extent to which the statements matched the effectiveness of their companies. Table 4.29 shows the details of the results.

**Table 4.29: Mean Scores and Standard Deviations for Organizational Effectiveness**

Statement	N	Mean Score	SD	Cv (%)
The mission statement provides the reason for the existence of our company	155	4.54	0.55	12.1
The company uses feedback from its stakeholders to improve its performance	155	4.41	0.622	14.1
The company uses qualitative and quantitative indicators to capture the essence of the mission	155	4.39	0.585	13.3
The company mission is known and widely shared by all staff	155	4.39	0.65	14.8
The company has a system in place that measures effectiveness of its programmes and activities	155	4.38	0.584	13.3
Our company mission is measured in terms of corporate goals and objectives with detailed strategies in different programmes and activities	155	4.30	0.551	12.8
The company products/services are highly rated in the industry	155	3.99	0.734	18.4
The company is able to meet needs of most of its customers	155	3.80	0.785	20.7
<b>Average Scores</b>		<b>4.28</b>	<b>0.633</b>	<b>14.9</b>

**Source: Primary Data**

Table 4.29 shows ratings from organizational effectiveness statements, ranging from lowest mean score of 3.80 to highest of 4.54 with average overall mean rating of 4.28, SD=0.633, Cv=14.9%. The highest rating (Mean = 4.54, SD = 0.55, Cv = 12.1%) was the statement that sought to establish the existence of a mission statement in the company which was followed at number two with a statement on company using

feedback from its stakeholders to improve its performance that scored Mean = 4.41, SD = 0.622, Cv = 14.1%. The high rating on existence of a mission statement shows that the companies' activities are guided towards a specified goal. The second rating means that a good number of Telecommunications companies are customer focused thus their interest in seeking and inclusion of customer feedback in company operations.

Two statements were rated moderately by majority of the telecommunications companies with the last rating being the statement that sought to establish whether the company was able to satisfy the needs of most of its customers (Mean = 3.80, SD = 0.875, Cv = 20.7%) followed by the statement on the company products/services being highly rated in the industry (Mean = 3.99, SD = 0.734, Cv = 18.4%) being second last in rating. The moderate ratings depict the companies as being customer focused thus striving to meet their customers' needs. It also means that majority of the telecommunications companies engage in marketing research that enables them understand customer needs.

The rest of the ratings were very high and ranged between 4.30 and 4.39. The statements that were rated fourth and sixth were aligned to the mission of the company with the former statement seeking to establish the extent to which the company mission was being measured in terms of corporate goals, objectives, strategies and activities registering the highest ratings (Mean = 4.30, SD = 0.551, Cv = 12.8%) while the later statement seeking to determine the extent to which the company mission was known and widely shared that registered equally high ratings (Mean = 4.39, SD = 0.65, Cv = 14.8%). These results show that majority of the telecommunications companies have documented and widely shared company mission that give direction to the company operations.

The statement that sought to assess the extent to which the companies had a system in place that measured effectiveness of their programmes and activities also had high ratings (Mean = 4.38, SD = 0.584, Cv = 13.3%). Having systems in place for measuring effectiveness enable alignment of goals and taking of corrective action for the shortfalls noted. This depicts the telecommunications companies as organized and goal oriented. The high ratings (Mean = 4.39, SD = 0.585, Cv = 13.3%) on the statement 'the company uses qualitative and quantitative indicators to capture the essence of the mission' also depict efficiency of the companies. The overall high rating on organizational efficiency by majority of the telecommunications companies was therefore evident from the overall results.

### 4.9.1.3 Organizational Relevance

Organizational relevance is the ability of an organization to adapt to changing organizational contexts as well as to keep its mission, goals, programmes and activities agreeable to its key stakeholders. It is also a measure of how well an organization's mission continues to serve the purpose of its key stakeholders. Complexities and dynamisms of the competitive environment present organizations with challenges that result into some organizations becoming irrelevant and facing extinction. On the other hand, other organizations have become innovative, adapted to the environment and remained relevant. This has resulted into them being able to cut an edge in the industry in which they have become leaders. The respondents were presented with 10 statements on organizational relevance and were required to indicate on a 5-point Likert scale the extent to which the statements represented their companies. The results from the respondents are presented in Table 4.30.

**Table 4.30: Mean Scores and Standard Deviations for Organizational Relevance**

<b>Statement</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
The company carries out stakeholder (customers, suppliers) satisfaction surveys regularly	155	4.60	0.554	12.0
The company regularly trains employees in line with environmental changes	155	4.57	0.559	12.2
The company's products and services reflect changes in customer needs and wants	155	4.50	0.574	12.8
The company strongly encourages and embraces innovation	155	4.45	0.605	13.6
The company monitors its image and reputation regularly	155	4.42	0.623	14.1
The company has an innovation team that develops and guides on implementation of new ideas	155	4.41	0.691	15.7
The company adopts to new technology easily	155	4.39	0.608	13.8
The company products/services reflect changing environmental conditions	155	4.30	0.636	14.8
The company introduces new products/services regularly	155	3.68	0.719	19.5
The company regularly monitors and adapts to the business environment	155	3.61	0.668	18.5
<b>Average Scores</b>		<b>4.29</b>	<b>0.624</b>	<b>14.7</b>

**Source: Primary Data**

Results presented in Table 4.30 show an overall mean score of 4.29, SD = 0.624, Cv = 14.7%. The mean scores from individual statements ranged from a high of 4.60 (SD = 0.554, Cv = 12%) to a low of 3.61 (SD = 0.668, Cv = 18.5%). The highest rating came from the statement that sought to determine if the company carries out stakeholder satisfaction surveys with the lowest rated statement being ‘company monitors and adopts to the business environment’. The second last rating also scored moderately with a Mean = 3.68, SD = 0.719, Cv = 19.5% and was on the statement that sought to determine whether the company introduces new products/services regularly. Notable is that the rest of the statements were rated highly with mean scores ranging between 4.30 and 4.60. The results portray majority of telecommunications companies as striving to achieve relevance through aligning their activities with market trends. This enables them remain competitive and relevant.

The specific ratings of the statements from the second best rated statement to third last were: the company regularly trains its employees based on environmental changes (Mean = 4.57, SD = 0.559, Cv=12.2%); the company's products and services reflect changes in customer needs and wants (mean = 4.50, SD = 0.574, Cv = 12.8%); the company regularly monitors its image and reputation (Mean = 4.42, SD = 0.623, Cv = 14.1%); company has an innovation team that develops and guides on implementation of new ideas and products (Mean=4.41, SD=0.691, Cv=15.7%); company easily adopts new technology (Mean=4.39, SD=0.608, Cv=13.8); company products reflect changing environmental conditions (Mean=4.30, SD=0.636, Cv=14.8%). The high ratings noted from the results imply that, to a large extent, majority of the telecommunications companies regularly monitor changes in customer requirements and the competitive environment in order to remain relevant. Table 4.31 presents summary of the respondents’ scores on non-financial performance.

**Table 4.31: Summary of Mean Scores and Standard Deviations of Non-Financial Organizational Performance Indicators**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
Efficiency	155	4.63	0.500	10.9
Effectiveness	155	4.42	0.591	13.4
Relevance	155	4.40	0.625	14.2
<b>Average Scores</b>		<b>4.48</b>	<b>0.572</b>	<b>12.8</b>

**Source: Primary Data**



The results presented in Table 4.31 were computed by deriving average scores from each of the measurements scales (Efficiency, Effectiveness and Relevance) and later getting an average of the three. The results indicate an average mean score of 4.48, SD = 0.572, Cv = 12.8% which show that the non-financial performance of majority of the telecommunications companies was rated very high. From the three measures of non-financial performance, organizational efficiency had the highest rating (Mean = 4.63, SD=0.500, Cv = 10.9%) followed by organizational effectiveness (Mean = 4.42, SD = 0.591, Cv = 13.4%) and organizational relevance (Mean = 4.40, SD = 0.625, Cv = 14.2%) in that order. The results reveal that majority of the telecommunications companies performed very highly on Non-Financial perspectives.

#### 4.9.2 Organizational Financial Performance

The study sought to establish the financial viability of the telecommunications companies. Respondents were presented with a range of statements and were to indicate on a scale of 1 to 5 the statement that closely described their organizations with 1 – ‘Not at all’ and 5 ‘to a very large extent’. The results are presented on Table 4.32.

**Table 4.32: Mean Scores and Standard Deviation on Organizational Financial Performance**

<b>Statement</b>	<b>No</b>	<b>Mean</b>	<b>SD</b>	<b>Cv (%)</b>
Our staff are among the best paid in this industry	155	4.34	0.639	14.7
Our firm consistently has more revenue than expenses	155	4.21	0.700	16.6
We pay our suppliers on time	155	4.20	0.708	16.8
Our firm keeps a reasonable surplus of money to use during difficult times	155	4.17	0.685	16.4
Our firm rarely gets short/long term loans from financial institutions	155	4.15	0.740	17.8
Our profit margins have been increasing over the years	155	4.13	0.753	18.2
Our firm monitors finances on a regular basis	155	4.11	0.761	18.5
Our assets are greater than liabilities	155	4.09	0.648	15.9
Our firm diversifies levels of funding sources	155	4.06	0.732	18
<b>Average Score</b>		<b>4.16</b>	<b>0.707</b>	<b>16.99</b>

**Source: Primary Data**

The results in Table 4.32 reveal that the overall financial performance of telecommunications companies was 4.16 (SD = .707, Cv = 16.99%). The statement that scored highest rating sought to determine if the staff were the best paid in the industry that scored a mean of 4.34 (SD 0.639, Cv14.7). The second score was from the statement that sought to establish if the company had more revenue compared to expenses that scored a mean of 4.21 (SD = 0.700, Cv= 16.6%) with the third being statement on company's suppliers being paid on time with a mean score of 4.20 (SD = 0.708, Cv =16.8). The lowest rating was from the statement that sought to establish if the companies diversified levels of funding that had a mean of 4.06 (SD = 0.732, Cv = 18%) with the second last rating being from statement 'our assets are greater than liabilities' that scored mean of 4.09 (SD = 0,648, Cv = 15.9%. The financial performance indicators had very high scores which imply that majority of the telecommunications companies in Kenya are doing very well financially.

#### 4.9.3 Summary of Organizational Performance

This was arrived at by computing average scores from both Non-Financial and Financial measures then getting the mean of the combined measures. The results are presented in Table 4.33

**Table 4.33: Summary of Respondents' Scores on Organizational Performance**

<b>Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>Cv (%)</b>
Non-Financial Performance	155	4.48	0.572	12.8
Financial Performance	155	4.16	0.707	16.99
<b>Average Score</b>		<b>4.32</b>	<b>0.639</b>	<b>14.89</b>

**Source: Primary Data**

Table 4.33 shows an average Mean = 4.32, SD = 0.639, Cv = 14.89% with the Non-Financial measures scoring slightly higher ratings (Mean = 4.48, SD = 0.572, Cv = 12.8%) than the Financial measures (Mean = 4.16, SD = 0.707, Cv = 16.99%). The results reveal that majority of the telecommunications companies perform better in non-financial perspectives when compared with their performance on financial perspectives. Despite this, it can also be noted from the results that the difference in the two is very minimal and both are rated to be very high.

#### 4.9.4 Summary of Descriptive Statistics

Table 4.34 presents results from the three independent variables (e-marketing practices, corporate culture and competitive environment) and the dependent variable (organizational performance). Whereas the results of the independent variables were based on respondents' perceptions as rated on a 5-point Likert scale, the results on the dependent variable was a mix of both respondents' perceptual ratings and performance retrieved from secondary data depicting Return on Equity.

**Table 4.34: Summary of Descriptive Statistics**

<b>Thematic Area</b>	<b>Item Description</b>	<b>N</b>	<b>Mean Score</b>	<b>SD</b>	<b>C<sub>v</sub> (%)</b>
<b>Electronic Marketing Practices</b>	Online Marketing	155	4.47	<b>0.710</b>	16.1
	Offline Marketing	155	4.66	0.581	12.6
<b>Average Scores</b>			<b>4.565</b>	<b>0.646</b>	<b>14.4</b>
<b>Corporate Culture</b>	Structure	155	4.23	0.689	16.3
	Systems	155	4.35	0.663	15.3
	Style	155	4.39	0.621	14.2
	Staff	155	4.36	0.656	15.0
	Skills	155	4.42	0.563	12.7
	Strategy	155	4.54	0.569	12.6
	Shared Values	155	4.50	0.563	12.5
<b>Average Scores</b>			<b>4.40</b>	<b>0.618</b>	<b>14.1</b>
<b>Competitive environment</b>	Rivalry Intensity	155	4.14	0.716	17.3
	Threat of Entry	155	4.21	0.793	18.8
	Bargaining Power of Buyers	155	4.07	0.860	21.2
	Bargaining Power of Suppliers	155	4.13	0.844	20.7
	Threat of Substitute Products	155	3.81	0.772	20.8
<b>Average Scores</b>			<b>4.07</b>	<b>0.797</b>	<b>19.8</b>
<b>Organizational Performance</b>	Non-Financial Performance	155	4.48	0.572	12.8
	Financial Performance	155	4.16	0.707	16.99
<b>Average Scores</b>			<b>4.32</b>	<b>0.639</b>	<b>14.89</b>

**Source: Primary Data**

The results on Table 4.34 reveal the average mean scores for the selected study variables. The results revealed that electronic marketing practices scored the highest mean of 4.56, SD = 0.646, C<sub>v</sub> = 14.4% followed by corporate culture (Mean 4.40, SD = 0.618, C<sub>v</sub> = 14.1%) while the third position was taken by Organizational Performance (Mean = 4.32, SD = 0.639, C<sub>v</sub> = 14.89 with competitive environment coming last (Mean = 4.07, SD = 0.797, C<sub>v</sub> = 19.8%). This implies that due to the competitive environment within which the telecommunications companies operate, they have had to adopt an appropriate corporate culture that enables them to anticipate and respond to

changing customer needs. They also have had to implement robust marketing practices that include e-marketing practices while adapting to changes in the business environment in order to improve their performance.

#### **4.10 Tests of Hypotheses**

The premise of this study was that there is a relationship between e-marketing practices and performance of telecommunications companies with this relationship being moderated by corporate culture and competitive environment. This section presents results of tests of hypotheses derived from the study variables. The section begins by presenting results of direct relationship followed by indirect relationships. The section concludes by providing results of the joint effect of e-marketing practices, corporate culture, competitive environment and organizational performance. Inferential statistics including simple regression analysis, multiple regression analysis and correlation analysis were used to test the hypotheses. Direct relationship between the variables of the study was tested through simple regression analysis while multiple regression analysis was used to test for indirect relationships. In addition, moderation effect was tested through stepwise regression analysis. The choice of analytical tools was guided by the objectives of the study, type of data and measurement scales.

##### **4.10.1 Electronic Marketing Practices and Organizational Performance**

The first objective of the study was to establish the effect of e-marketing practices on performance of telecommunications companies in Kenya. The study depicted electronic marketing practices as comprising online marketing and offline marketing practices. Respondents had been asked to indicate the extent to which their individual organizations focused on e-marketing practices. On the other hand, organizational performance measures were composed of non-financial and financial performance indicators. Non-financial indicators included efficiency, effectiveness and relevance while financial performance was based on financial viability. The respondents were asked to indicate the extent to which their companies performed in relation to both the financial and non-financial perspectives.

In order to assess e-marketing practices and organizational performance relationship, three sub-hypotheses were derived and tested. The first one focused on e-marketing practices and non-financial organizational performance of the telecommunications companies, second one sought to determine the relationship between e-marketing practices and financial performance while the third one sought to establish the

relationship between e-marketing practices and overall organizational performance. The first hypothesis was therefore derived and tested as follows:

**Hypothesis 1a:** There is a significant relationship between e-marketing practices and non-financial performance of telecommunications companies

The results of regression analysis for the relationship between e-marketing practices and non-financial organizational performance are contained in Table 4.35.

**Table 4.35: Summary of Regression Results for the Relationship between E-marketing Practices and Non-Financial Organizational Performance**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.531 <sup>a</sup>	.282	.277	.28900

a. Dependent Variable: Non-financial Performance

Table 4.35 shows that 28.2% of the variance in non-financial organizational performance is explained by e-marketing practices ( $R = .531$ ,  $R^2 = .282$ ,  $p\text{-value} < 0.05$ ). This reveals that the relationship is statistically significant. The results of the test of significance of the variables is represented in Table 3.46

**Table 4.36: Test of Significance of Electronic Marketing Practices and Organizational Non-Financial Performance**

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	5.015	1	5.015	60.040	.000 <sup>a</sup>
	Residual	12.779	153	.084		
	Total	17.794	154			

a. Predictors: (Constant), E-marketing Practices

b. Dependent Variable: Non-Financial Performance

Table 4.36 shows that F ratio was significant ( $F = 60.040$ ,  $p\text{-value} < 0.05$ ) with the results demonstrating high robustness of the regression model. This implies that the relationship between e-marketing practices and organizational non-financial performance is statically significant at  $p < 0.05$  level of significance.

The regression coefficients of the test is presented in Table 4.37

**Table 4.37: Regression Coefficients of electronic Marketing Practices and Organizational Non-Financial Performance**

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	2.665	.227		11.723	.000
Emarketing Practices	.411	.053	.531	7.749	.000

a. Dependent Variable: Non-Financial Performance

In Table 4.37, the beta ( $\beta$ ) coefficient indicates that e-marketing practices contribute substantially to the change in the organizational non-financial performance ( $\beta=.531$ ,  $t=7.449$ ,  $p\text{-value}<0.05$ ). This illustrates that, for one unit change in e-marketing practices there is a corresponding 0.531 variation in organizational non-financial performance. From these results, the hypothesized influence of e-marketing practices on organizational non-financial performance is therefore confirmed. The hypothesis was therefore supported.

The regression model that explained the above relationship was arrived at as follows:

$$Y = 2.665 + .498 \text{ EMP}$$

Where:

Y = Non-Financial Organizational Performance

EMP = Electronic Marketing Practices

The study applied a number of statements to depict financial performance. Direct relationship between e-marketing practices and financial performance was therefore analyzed. This was to show the relationship between e-marketing practices the financial performance of the telecommunications companies. Study by Hossinpour et al., (2014) maintains that adoption of e-marketing practices results into increased sales and overall organizational financial performance. The second sub-hypothesis was tested as follows.

**Hypothesis 1b:** There is significant relationship between electronic marketing practices and financial performance of telecommunications companies

Table 4.38 presents results of regression analysis for the relationship between e-marketing practices and organizational financial performance of the telecommunications companies.

**Table 4.38: Summary of Regression Results of the Relationship between Electronic Marketing Practices and Organizational Financial Performance**

<b>a) Model Summary</b>						
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate		
1	.313 <sup>a</sup>	.098	.092	.56416		
<b>b) ANOVA</b>						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	5.281	1	5.281	16.592	.000 <sup>a</sup>
	Residual	48.697	153	.318		
	Total	53.977	154			
<b>c) Regression coefficients</b>						
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	2.644	.444		5.958	.000
	E-marketing Practices	.422	.103	.313	4.073	.000
a. Predictors: (Constant), E-marketing Practices						
b. Dependent Variable: Organizational Financial Performance						

The results presented in Table 4.38 show that e-marketing practices had a positive and significant effect on organizational financial performance with a correlation coefficient of .313,  $R^2=.098$ . This implies that electronic marketing practices explained 9.8% of the variance in organizational financial performance. The F statistics was significant at 0.000 with  $F=16.592$ . This shows fitness of the regression model. The relationship was therefore positive and statistically significant. The standardized beta coefficient indicates that electronic marketing practices make significant contribution to organizational financial performance (Beta = .313,  $t = 4.073$ ,  $p < 0.05$ ). This shows electronic marketing practices as a good predictor of organizational financial performance. The hypothesis was therefore supported.

The regression model that explained the above relationship was arrived at as follows:

$$y = 2.644 + .313 \text{ EMP}$$

Where:

Y = Organizational Financial Performance

EMP = Electronic Marketing Practices

Lastly, the study considered the relationship between e-marketing practices on the overall organizational performance. Overall organizational performance was arrived at by computing the mean scores from both non-financial and financial performance indicators. The following hypothesis was therefore tested.

**Hypothesis 1c:** There is significant relationship between electronic marketing practices and overall organizational performance of telecommunications companies

Table 4.39 presents results of regression analysis for the relationship between e-marketing practices and overall performance of telecommunication companies.

**Table 4.39: Summary of Regression Results for the Relationship between E-Marketing Practices and overall Organizational Performance**

a) Model Summary						
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate		
1	.498 <sup>a</sup>	.248	.243	.31955		
b) ANOVA						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	5.147	1	5.147	50.405	.000 <sup>b</sup>
	Residual	15.623	153	.102		
	Total	20.770	154			
c) Coefficients						
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	2.654	.251		10.560	.000
	E-marketing Practices	.416	.059	.498	7.100	.000
a. Predictors: (Constant), E-marketing Practices						
b. Dependent Variable: Overall Organizational Performance						

The results presented in Table 4.39 reveal that e-marketing practices had a positive and significant effect on overall organizational performance with a correlation coefficient of .498,  $R^2 = .248$ . This implies that electronic marketing practices explained 24.8% of the variance in overall organizational performance. The F statistics was significant at 0.000 with a value of 50.405. This shows fitness of the regression model. The relationship was therefore positive and statistically significant. The standardized beta coefficient indicate that electronic marketing practices make significant contribution to overall organizational performance (Beta = .498,  $t = 7.100$ ,  $p < 0.05$ ). This implies that



electronic marketing practices is a good predictor of overall organizational performance. The hypothesis was therefore supported.

The regression model that explained the above relationship was arrived at as follows:

$$y = 2.654 + .498 \text{ EMP}$$

*Where:*

Y = Overall Organizational Performance

EMP = Electronic Marketing Practices

#### **4.10.2 Electronic Marketing Practices, Corporate Culture and Organizational Performance**

The second objective of the study aimed at determining the influence of corporate culture on the relationship between e-marketing practices and performance of Telecommunication Companies. The study tested the influence of corporate culture on non-financial performance of the telecommunication companies as well as on financial performance. Corporate culture was hypothesized to moderate the relationship between e-marketing practices and organizational performance. Three sub hypotheses were derived and tested with the first one seeking to test the moderating influence of corporate culture on the relationship between e-marketing practices and non-financial performance of the telecommunications companies. The following hypothesis was therefore tested.

**Hypothesis 2a:** The relationship between e-marketing practices and non-financial performance of telecommunications companies is significantly moderated by corporate culture.

The moderating effect was tested using method proposed by Baron and Kenny (1986). It involved testing the main effects of the independent variable (e-marketing practices) and moderator variable (corporate culture) on the dependent variable (organizational non-financial performance) and the interaction between e-marketing practices and corporate culture. The interaction term was computed by obtaining the product of standardized scores of e-marketing practices and corporate culture. Moderation is assumed to take place if the interaction between e-marketing practices and corporate culture is significant.

The analysis was undertaken in two steps where the first step involved testing the influence of e-marketing practices and corporate culture on organizational non-financial performance. The second step involved introduction of the interaction term through stepwise regression analysis. Regression results for the influence of corporate culture on the relationship between e-marketing practices and organizational non-financial performance are contained in Table 4.40.

**Table 4.40: Summary of Regression Results of Electronic Marketing Practices, Corporate Culture and Organizational Non-Financial Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.715 <sup>a</sup>	.512	.505	.23911	.512	79.617	2	152	.000
2	.786 <sup>b</sup>	.617	.610	.21233	.106	41.749	1	151	.000
<b>b) ANOVA – Test of Significance</b>									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	9.104	2	4.552	79.617	.000 <sup>a</sup>			
	Residual	8.690	152	.057					
	Total	17.794	154						
2	Regression	10.986	3	3.662	81.224	.000 <sup>b</sup>			
	Residual	6.808	151	.045					
	Total	17.794	154						
<b>c) Regression Coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	-.081	.375		-.215	.830			
	E-marketing Practices	.139	.054	.179	2.549	.012			
	Corporate Culture	.816	.096	.595	8.457	.000			
2	(Constant)	-15.480	2.407		-6.433	.000			
	E-marketing Practices	4.538	.683	5.864	6.648	.000			
	Corporate Culture	4.097	.515	2.987	7.955	.000			
	Interaction term of E-marketing and corporate Culture	-.931	.144	-7.365	-6.461	.000			
a. Predictors: (Constant), Corporate Culture, E-marketing Practices b. Predictors: (Constant), Corporate Culture, E-marketing Practices, Interaction term of E-marketing and Corporate Culture c. Dependent Variable: Non-Financial Performance									

The results in Table 4.40 show that model 1 is significant ( $F = 79.617$ ,  $p\text{-value} < 0.05$ , Adjusted  $R^2 = .505$ ) implying that corporate culture and e-marketing practices jointly explain 50.5% of the variation in organizational non-financial performance. Notably, when the interaction term was introduced, the model remains significant ( $p\text{-value} = .000$ ) with the change statistics revealing that  $R^2$  change moved to .106 ( $R^2$  change = .106). Coefficient results reveal that the Beta value however dropped from 5.864 to -7.365 after introduction of the interaction term indicating that for every unit increase of corporate culture in the relationship, the organizational non-financial performance changed by -7.365 units. This is an inverse relationship. The results however illustrate that the moderation model is significant. The hypothesis was therefore supported.

The regression model that explains variations in organizational non-financial performance as a result of the moderating influence of corporate culture was fitted as follows:

$$y = 15.480 + 5.864EMP + 2.987CC - 7.365U$$

*Where:*

Y = Organizational Non-financial Performance

EMP = Electronic Marketing Practices

CC = Composite Score of Corporate Culture

U = Interaction term of e-marketing practices and corporate culture

The study further sought to determine the influence of corporate culture on organizational financial performance. The following sub-hypothesis was tested.

**Hypothesis 2b:** The relationship between e-marketing practices and financial performance of telecommunications companies is significantly moderated by corporate culture.

Regression results for the influence of corporate culture on the relationship between e-marketing practices and organizational financial performance are contained in Table 4.41.

**Table 4.41: Summary of Regression Results of Electronic Marketing Practices, Corporate Culture and Organizational Financial Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.316 <sup>a</sup>	.100	.088	.56539	.100	8.428	2	152	.000
2	.343 <sup>b</sup>	.118	.100	.56159	.018	3.065	1	151	.082
<b>b) ANOVA</b>									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	5.388	2	2.694	8.428	.000 <sup>a</sup>			
	Residual	48.589	152	.320					
	Total	53.977	154						
2	Regression	6.355	3	2.118	6.717	.000 <sup>b</sup>			
	Residual	47.622	151	.315					
	Total	53.977	154						
<b>c) Coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	2.198	.887		2.478	.014			
	E-marketing Practices	.377	.129	.280	2.934	.004			
	Corporate Culture	.132	.228	.055	.580	.563			
2	(Constant)	-8.838	6.365		-1.388	.167			
	E-marketing Practices	3.530	1.805	2.619	1.955	.052			
	Corporate Culture	2.484	1.362	1.040	1.823	.070			
	Interaction Term (E-marketing and Corporate Culture)	-.667	.381	-3.030	-1.751	.082			
a. Predictors: (Constant), Corporate Culture, E-marketing Practices									
b. Predictors: (Constant), Corporate Culture, E-marketing Practices, Interaction term of E-marketing and Corporate Culture									
c. Dependent Variable: Organizational Financial Performance									

The results in Table 4.41 show that model 1 is significant ( $F = 8.428$ ,  $p\text{-value} < 0.05$ ,  $\text{Adjusted } R^2 = .088$ ) implying that corporate culture and e-marketing practices jointly explain 8.8% of the variation in organizational financial performance. Upon the introduction of the interaction term, the model becomes statistically insignificant ( $p\text{-value} = .082$ ). The coefficient results further revealed that the Beta value dropped from 2.619 to -3.030 after introduction of the interaction term ( $\text{Beta} = -3.030$ ,  $t = -1.751$ ,  $p = .082$ ) which reveals an inverse relationship. The hypothesis was not supported.

The influence of corporate culture on the relationship between e-marketing practices and overall organizational performance was also tested. The sub-hypothesis that follows was used in testing the relationship.

**Hypothesis 2c:** The relationship between e-marketing practices and overall performance of telecommunications companies is significantly moderated by corporate culture

Regression results for the influence of corporate culture on the relationship between e-marketing practices and overall organizational performance are contained in Table 4.42.

**Table 4.42: Summary of Regression Results of Electronic Marketing Practices, Corporate Culture and Overall Organizational Performance**

a) Model Summary									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.561 <sup>a</sup>	.314	.305	.30610	.314	34.834	2	152	.000
2	.617 <sup>b</sup>	.381	.369	.29178	.067	16.288	1	151	.000
b) ANOVA – Test of Significance									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	6.528	2	3.264	34.834	.000 <sup>a</sup>			
	Residual	14.242	152	.094					
	Total	20.770	154						
2	Regression	7.914	3	2.638	30.988	.000 <sup>b</sup>			
	Residual	12.855	151	.085					
	Total	20.770	154						
c) Coefficients									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	1.059	.480		2.204	.029			
	E-marketing Practices	.258	.070	.309	3.705	.000			
	Corporate Culture	.474	.123	.320	3.839	.000			
2	(Constant)	-12.159	3.307		-3.677	.000			
	E-marketing Practices	4.034	.938	4.825	4.301	.000			
	Corporate Culture	3.291	.708	2.220	4.649	.000			
	Interaction E-marketing and Corporate Culture	-.799	.198	-5.851	-4.036	.000			
a. Predictors: (Constant), Corporate Culture, E-marketing Practices									
b. Predictors: (Constant), Corporate Culture, E-marketing Practices, Interaction Term for E-marketing and Corporate Culture									
c. Dependent Variable: Overall Organizational Performance									

The results in Table 4.424 show that model 1 is statistically significant with e-marketing practices contributing 31.4% in the variations on overall performance of telecommunications companies. The results are statistically significant at  $F= 34.834$ ,  $p<0.05$ ,  $R^2 = .314$ . When corporate culture was introduced into the equation, the adjusted  $R^2 = .369$  which reveals that both e-marketing practices and corporate culture contribute 36.9% in the variations of overall performance of telecommunications companies. It is notable that upon the introduction of the interaction term between e-marketing practices and corporate culture, the  $R^2$  change moves to .067 and the model is statistically significant ( $F$  change =16.288,  $p = .000$ ).

The coefficient results reveal that the Beta value dropped from 4.825 to -5.851 after introduction of the interaction term (Beta =-5.851,  $t = -4.036$ ,  $p = .000$ ). This further reveals that for every unit increase of corporate culture in the relationship, the overall organizational performance changed by -5.851units. This shows an inverse relationship which implies that e-marketing practices and corporate culture affect overall organizational performance inversely. The findings further illustrate that the moderation model is statistically significant. The hypothesis was therefore supported.

The regression model that explains variations of overall organizational performance as a result of the moderating influence of corporate culture was fitted as follows:

$$y = 12.159 + 4.825EMP + 2.220CC - 5.851U$$

*Where:*

y = Overall Organizational Performance

EMP = Electronic Marketing Practices

CC = Composite Score of Corporate Culture

U = interaction term of e-marketing practices and corporate culture

#### **4.10.3 Electronic Marketing Practices, Competitive Environment and Organizational Performance**

The third objective of the study aimed at establishing the extent to which competitive environment influences the relationship between e-marketing practices and performance of telecommunications companies. Empirical literature present mixed evidence which led to the belief that competitive environment moderates the relationship between e-

marketing practices and organizational performance. Researchers who support the view of positive influence of competitive environment on organizational performance contend that it enhances innovativeness thereby improving competitiveness of the organization. Consequently, the proponents argue that competitive environment leads to the demise of organizations that are unable to devise competitive strategies that can assure them of success and survival (Pereira-Moliner et al, 2015). Due to the divergent views on the influence of competitive environment on the relationship between e-marketing and performance of telecommunication companies, the study sought to establish the moderating influence of competitive environment on the relationship.

Considering that organizational performance was measured by both non-financial and financial indicators, the testing of the objective was based on three sub-hypotheses that follow with the first one assessing the impact of competitive environment on the relationship between e-marketing practices and non-financial performance of the companies as follows.

**Hypothesis 3<sub>a</sub>:** The relationship between e-marketing practices and non-financial performance of telecommunication companies is significantly moderated by competitive environment.

E-marketing practices were measured through 18 indicators aligned around online and offline marketing activities. Competitive environment was measured using Porter's (1980) five forces competitive model and 30 question items based on Pecotich's et al (1991) INDUSTRUST scale was used. Organizational performance was measured using a total of 36 indicators out of which 25 items related to the non-financial measures while the remaining 9 items was used to measure financial viability of the telecommunications companies.

Table 4.43 presents a summary of regression analysis results assessing for the influence of competitive environment on the relationship between e-marketing practices and non-financial performance.

**Table 4.43: Summary of Regression Results of Electronic Marketing Practices, Competitive Environment and Non-Financial Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.740 <sup>a</sup>	.548	.542	.23014	.548	91.974	2	152	.000
2	.759 <sup>b</sup>	.577	.568	.22334	.029	10.398	1	151	.002
<b>b) Test of Significance</b>									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	9.743	2	4.871	91.974	.000 <sup>a</sup>			
	Residual	8.051	152	.053					
	Total	17.794	154						
2	Regression	10.262	3	3.421	68.573	.000 <sup>b</sup>			
	Residual	7.532	151	.050					
	Total	17.794	154						
<b>c) Regression coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	-.602	.390		-1.543	.125			
	E-marketing Practices	.146	.051	.189	2.886	.004			
	Competitive Environment	.932	.099	.619	9.448	.000			
2	(Constant)	-13.070	3.885		-3.364	.001			
	E-marketing Practices	3.935	1.176	5.085	3.346	.001			
	Competitive Environment	3.592	.831	2.385	4.325	.000			
	Interaction	-.805	.250	-6.056	-3.225	.002			
<p>a. Predictors: (Constant), Competitive environment, E-marketing Practices</p> <p>b. Predictors: (Constant), Competitive Environment, E-marketing Practices, Interaction Term of E-marketing and competitive environment</p> <p>c. Dependent Variable: Non-Financial Performance</p>									

The results in Table 4.43 show that model 1 is statistically significant with e-marketing practices contributing 54.8% in the variations on non-financial performance of telecommunication companies. The results are statistically significant at  $F = 91.974$ ,  $p < 0.05$ ,  $R^2 = .548$ . When competitive environment was added, the adjusted  $R^2 = .568$



which reveals that both e-marketing and competitive environment contribute 56.8% in the variability of non-financial organizational performance of the telecommunications companies. Notably, upon the introduction of the interaction term of e-marketing practices and competitive environment, the  $R^2$  change is .029 and the model is statistically significant (F change = 10.398,  $p = .002$ ).

The coefficient results reveal that the Beta value dropped from 5.085 to -6.056 after introduction of the interaction term (Beta = -6.056,  $t = -3.225$ ,  $p = .002$ ). The results reveal that for every unit increase of competitive environment in the relationship between e-marketing practices and non-financial organizational performance, the growth in the non-financial organizational performance changed by -6.056 units. This shows an inverse relationship which implies that e-marketing practices and competitive environment affect organizational non-financial performance inversely. The findings further illustrate that the moderation model is statistically significant. The hypothesis was therefore supported.

From the study findings the regression model explaining the variations in non-financial performance due to the moderating effects of competitive environment was stated as follows:

$$y = 13.070 + 5.085 \text{ EMP} + 2.385 \text{ CE} - 6.056X$$

*Where*

Y = Non-financial Performance

EMP = Electronic Marketing Practices

CE = Competitive Environment

X = Interaction Term of E-marketing practices and Competitive Environment

The study further tested the effect of competitive environment on the relationship between electronic marketing practices and financial performance of telecommunications companies. The following sub hypothesis was derived to guide the test.

**Hypothesis 3b:** The relationship between e-marketing practices and financial performance of telecommunications companies is significantly moderated by competitive environment.

The regression results on the relationship between e-marketing practices, competitive environment and organizational financial performance are presented in Table 4.44

**Table 4.44: Summary of Regression Results for Electronic Marketing Practices, Competitive Environment and Organizational Financial Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.322 <sup>a</sup>	.104	.092	.56416	.104	8.796	2	152	.000
2	.359 <sup>b</sup>	.129	.112	.55793	.025	4.413	1	151	.037
<b>b) ANOVA</b>									
Model		Sum Squares	df	Mean Square	F	Sig.			
1	Regression	5.599	2	2.800	8.796	.000 <sup>a</sup>			
	Residual	48.378	152	.318					
	Total	53.977	154						
2	Regression	6.973	3	2.324	7.466	.000 <sup>b</sup>			
	Residual	47.005	151	.311					
	Total	53.977	154						
<b>c) Coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	1.796	.957		1.877	.062			
	E-marketing Practices	.353	.124	.262	2.842	.005			
	Competitive Environment	.242	.242	.092	1.000	.319			
2	(Constant)	-18.493	9.705		-1.906	.059			
	E-marketing Practices	6.519	2.938	4.836	2.219	.028			
	Competitive environment	4.572	2.075	1.742	2.203	.029			
	Interaction Term of e-marketing and competitive Environment	-1.310	.624	-5.659	-2.101	.037			
a. Predictors: (Constant), Competitive Environment, E-marketing Practices									
b. Predictors: (Constant), Competitive Environment, E-marketing Practices, Interaction Term of E-marketing and Competitive Environment									
c. Dependent Variable: Organizational Financial Performance									

The results of the analysis in Table 4.44 demonstrate that e-marketing practices and competitive environment jointly explain 10.4% of the variability in organizational financial performance with  $R^2$  change = .104. This relationship is statistically significant at  $F = 8.796$ ,  $p < 0.05$ . When the interaction term was introduced, the model remained statistically significant ( $F = 4.413$ ,  $p = .037$ ) while the beta coefficient dropped from 4.836 to -5.659 indicating an inverse relationship. The moderating effect of competitive environment was however statistically significant at  $p = .037$ . The coefficient results (Beta = -5.659,  $t = -2.101$ ,  $p = .037$ ) imply that for every unit increase in competitive environment, organizational financial performance changes by -5.659. The hypothesis was supported.

From the study findings the regression model explaining the variations in organizational financial performance due to the moderating effects of competitive environment was stated as follows:

$$y = 18.493 + 4.836 \text{ EMP} + 1.742 \text{ CE} - 5.659X$$

*Where:*

Y = Organizational Financial Performance

EMP = Electronic Marketing Practices

CE = Competitive Environment

X = Interaction Term of E-marketing practices and Competitive Environment

The effect of competitive environment on the relationship between e-marketing practices and overall organizational performance was tested. The following sub-hypothesis was derived and tested.

**Hypothesis 3c:** The relationship between e-marketing practices and overall performance of telecommunications companies is significantly moderated by competitive environment

The regression results on the relationship between e-marketing practices, competitive environment and overall organizational performance are presented in Table 4.45.

**Table 4.45: Summary of Regression Results for Electronic Marketing Practices, Competitive Environment and Overall Organizational Performance**

a) Model Summary									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.581 <sup>a</sup>	.338	.329	.30074	.338	38.818	2	152	.000
2	.617 <sup>b</sup>	.381	.369	.29175	.043	10.516	1	151	.001
b) ANOVA <sup>c</sup>									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	7.022	2	3.511	38.818	.000 <sup>a</sup>			
	Residual	13.748	152	.090					
	Total	20.770	154						
2	Regression	7.917	3	2.639	31.004	.000 <sup>b</sup>			
	Residual	12.853	151	.085					
	Total	20.770	154						
c) Coefficients									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	.597	.510		1.170	.244			
	E-marketing Practices	.250	.066	.299	3.770	.000			
	Competitive Environment	.587	.129	.361	4.553	.000			
2	(Constant)	-15.782	5.075		-3.110	.002			
	E-marketing Practices	5.227	1.536	6.252	3.403	.001			
	Competitive Environment	4.082	1.085	2.508	3.762	.000			
	Interaction Term of e-marketing and Competitive environment	-1.058	.326	-7.364	-3.243	.001			
a. Predictors: (Constant), Competitive Environment, E-marketing Practices									
b. Predictors: (Constant), Competitive Environment, E-marketing Practices, Interaction Term of E-marketing and Competitive Environment									
c. Dependent Variable: Overall Organizational Performance									

The results in Table 4.45 reveal that e-marketing practices contributes 33.8% in the variability of overall organizational performance with  $R^2=.338$ . The relationship is statistically significant at  $F=38.818$ ,  $p<0.05$ . The relationship remains statistically significant when the interaction term was introduced with adjusted  $R^2=.369$ ,  $F= 10.516$ ,  $p=.001$  meaning that both e-marketing practices and competitive environment contribute 36.9% in the variability of the overall organizational performance. The coefficient

results (Beta = -7.364, t=-3.243, p=.001) show statistical significance of the moderating effect of competitive environment on the relationship between e-marketing practices and overall organizational performance. It is notable that the Beta value moves from 6.252 to -7.364 upon introduction of the interaction term. The coefficient results imply that for every unit increase in competitive environment, overall organizational performance changes by -7.364 revealing an inverse relationship. The hypothesis was therefore supported.

From the study findings the regression model explaining the variations in overall organizational performance due to the moderating effect of competitive environment was stated as follows:

$$y = 15.782 + 6.252 \text{ EMP} + 2.508 \text{ CE} - 7.364 \text{ X}$$

*Where:*

Y = Overall Organizational Performance

EMP = Electronic Marketing Practices

CE = Competitive Environment

X = Interaction Term of E-marketing Practices and Competitive Environment

#### **4.10.4 The Joint Effect of E-marketing Practices, Corporate Culture, Competitive Environment and Organizational Performance**

The fourth objective of the study was to determine the joint effect of e-marketing practices, corporate culture, competitive environment and organizational performance. To assess the joint effect, hypothesis four was formulated as follows:

**Hypothesis 4:** The joint effect of e-marketing practices, corporate culture, competitive environment and performance of telecommunications companies is statistically significant

Considering that organizational performance was measured through non-financial and financial indicators, three sub-hypotheses were derived and tested. The first sub-hypothesis sought to assess the joint effects of e-marketing practices, corporate culture, and competitive environment on non-financial performance of the telecommunications companies as provided below.

**Hypothesis 4a:** The joint effect of e-marketing practices, corporate culture and competitive environment on non-financial performance of telecommunications companies is statistically significant.

The relevant results for the joint effect of e-marketing practices, corporate culture, competitive environment and non-financial organizational performance are as summarized in Table 4.46.

**Table 4.46: Summary of Regression Results for the Joint Effect of Electronic Marketing Practices, Corporate Culture, Competitive Environment and Non-financial Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.531 <sup>a</sup>	.282	.277	.28900	.282	60.040	1	153	.000
2	.715 <sup>b</sup>	.512	.505	.23911	.230	71.521	1	152	.000
3	.752 <sup>c</sup>	.565	.557	.22634	.054	18.627	1	151	.000
<b>b) Analysis of Variance</b>									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	5.015	1	5.015	60.040	.000 <sup>a</sup>			
	Residual	12.779	153	.084					
	Total	17.794	154						
2	Regression	9.104	2	4.552	79.617	.000 <sup>b</sup>			
	Residual	8.690	152	.057					
	Total	17.794	154						
3	Regression	10.058	3	3.353	65.442	.000 <sup>c</sup>			
	Residual	7.736	151	.051					
	Total	17.794	154						
<b>c) Coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	2.665	.227		11.723	.000			
	E-marketing Practices	.411	.053	.531	7.749	.000			
2	(Constant)	-.081	.375		-.215	.830			
	E-marketing Practices	.139	.054	.179	2.549	.012			
	Corporate Culture	.816	.096	.595	8.457	.000			
3	(Constant)	-.786	.391		-2.010	.046			
	E-marketing Practices	.110	.052	.142	2.118	.036			
	Corporate Culture	.350	.141	.255	2.480	.014			
	Competitive Environment	.648	.150	.430	4.316	.000			
a. Predictors: (Constant), E-marketing Practices b. Predictors: (Constant), E-marketing Practices, Corporate Culture c. Predictors: (Constant), E-marketing Practices, Corporate Culture, Competitive Environment d. Dependent Variable: Non-Financial Organizational Performance									

The results displayed in Table 4.46 reveal that the effect of e-marketing practices on organizational non-financial performance was statistically significant ( $F=60.040$ ,  $p=.000$ ). The results show that e-marketing practices independently explains 28.2% of the variability in organizational non-financial performance ( $R^2=.282$ ). In model 3, the results further show that the relationship is statistically significant when corporate culture and competitive environment are introduced ( $F= 18.627$ ,  $p=.000$ ). This means that e-marketing practices, corporate culture and competitive environment jointly explain 55.7% of the variability in non-financial performance (adjusted  $R^2 = .557$ ) and the effect is statistically significant ( $p<.05$ ).

The beta coefficients illustrate that competitive environment ( $\beta = .430$ ) contributes more than the rest of the variables in explaining organizational non-financial performance. The contribution of corporate culture ( $\beta = .255$ ) to organizational non-financial performance is greater than the contribution of e-marketing practices ( $\beta = .142$ ) that makes the lowest contribution to the variability in organizational non-financial performance. The findings supported the influence of e-marketing practices on organizational non-financial performance and sufficiently explained the joint effect of e-marketing practices, corporate culture and competitive environment on organizational non-financial performance. The results were statistically significant and the hypothesis was supported. It can therefore be concluded that the joint effect of e-marketing practices, corporate culture, competitive environment and organizational non-financial performance is greater than the contribution of individual variables.

The regression model used to explain the joint effect of e-marketing practices, corporate culture and competitive environment on organizational non-financial performance was fitted as follows:

$$y = .786 + .142EMP + .255CC + .430CE$$

*Where:*

y = Organizational Non-financial Performance

EMP = Electronic Marketing Practices

CC = Corporate Culture

CE = Competitive Environment

The research further established the joint effect of e-marketing practices, corporate culture and competitive environment on financial organizational performance. The following sub-hypothesis was derived and tested.

**Hypothesis 4b:** The joint effect of e-marketing practices, corporate culture, competitive environment and financial performance of telecommunications companies is statistically significant.

The results of the joint effect of e-marketing practices, corporate culture and competitive environment on organizational financial performance are presented in Table 4.47

**Table 4.47: Summary of Regression Results for the Joint Effect of Electronic Marketing Practices, Corporate Culture, Competitive Environment and Organizational Financial Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.313 <sup>a</sup>	.098	.092	.56416	.098	16.592	1	153	.000
2	.316 <sup>b</sup>	.100	.088	.56539	.002	.337	1	152	.563
3	.323 <sup>c</sup>	.104	.086	.56588	.004	.737	1	151	.392
<b>b) ANOVA</b>									
Model		Sum Squares	df	Mean Square	F	Sig.			
1	Regression	5.281	1	5.281	16.592	.000 <sup>a</sup>			
	Residual	48.697	153	.318					
	Total	53.977	154						
2	Regression	5.388	2	2.694	8.428	.000 <sup>b</sup>			
	Residual	48.589	152	.320					
	Total	53.977	154						
3	Regression	5.624	3	1.875	5.855	.001 <sup>c</sup>			
	Residual	48.353	151	.320					
	Total	53.977	154						
<b>c) Coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients		t	Sig.		
		B	Std. Error	Beta					
1	(Constant)	2.644	.444			5.958	.000		
	E-marketing Practices	.422	.103	.313		4.073	.000		
2	(Constant)	2.198	.887			2.478	.014		
	E-marketing Practices	.377	.129	.280		2.934	.004		
	Corporate Culture	.132	.228	.055		.580	.563		
3	(Constant)	1.848	.977			1.891	.061		
	E-marketing Practices	.363	.130	.269		2.797	.006		
	Corporate Culture	-.099	.353	-.041		-.280	.780		
	Competitive Environment	.322	.375	.123		.858	.392		
a. Predictors: (Constant), E-marketing Practices									
b. Predictors: (Constant), E-marketing Practices, Corporate Culture									
c. Predictors: (Constant), E-marketing Practices, Corporate Culture, Competitive Environment									
d. Dependent Variable: Organizational Financial Performance									



The results presented in Table 4.47 reveal that model 1 is significant with e-marketing practices individually contributing 9.8% in the variability of organizational financial performance ( $F = 16.593$ ,  $p = .000$ ). Consequently, e-marketing practices, corporate culture and competitive environment jointly explained 8.6 % of the variability of organizational financial performance. However, this effect was not statistically significant ( $F$  change = .737,  $p = .392$ ). The hypothesis was therefore not supported.

The study also assessed the joint effect of e-marketing practices, corporate culture and competitive environment on overall organizational performance. The following hypothesis was tested.

**Hypothesis 4b:** The joint effect of e-marketing practices, corporate culture and competitive environment on overall performance of telecommunications companies is statistically significant.

The results of the joint effect of e-marketing practices, corporate culture and competitive environment on overall organizational performance are presented in Table 4.48.

**Table 4.48: Summary of Regression Results for the Joint Effect of Electronic Marketing Practices, Corporate Culture, Competitive Environment and Overall Organizational Performance**

<b>a) Model Summary</b>									
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Change Statistics				
					R Square Change	F Change	df1	df2	Sig. F Change
1	.498 <sup>a</sup>	.248	.243	.31955	.248	50.405	1	153	.000
2	.561 <sup>b</sup>	.314	.305	.30610	.066	14.737	1	152	.000
3	.583 <sup>c</sup>	.340	.327	.30129	.026	5.891	1	151	.016
<b>b) ANOVA</b>									
Model		Sum of Squares	df	Mean Square	F	Sig.			
1	Regression	5.147	1	5.147	50.405	.000 <sup>a</sup>			
	Residual	15.623	153	.102					
	Total	20.770	154						
2	Regression	6.528	2	3.264	34.834	.000 <sup>b</sup>			
	Residual	14.242	152	.094					
	Total	20.770	154						
3	Regression	7.062	3	2.354	25.933	.000 <sup>c</sup>			
	Residual	13.707	151	.091					
	Total	20.770	154						
<b>c) Coefficients</b>									
Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.			
		B	Std. Error	Beta					
1	(Constant)	2.654	.251		10.560	.000			
	E-marketing Practices	.416	.059	.498	7.100	.000			
2	(Constant)	1.059	.480		2.204	.029			
	E-marketing Practices	.258	.070	.309	3.705	.000			
	Corporate Culture	.474	.123	.320	3.839	.000			
3	(Constant)	.531	.520		1.021	.309			
	E-marketing Practices	.237	.069	.283	3.423	.001			
	Corporate Culture	.126	.188	.085	.668	.505			
	Competitive Environment	.485	.200	.298	2.427	.016			
<p>a. Predictors: (Constant), E-marketing Practices  b. Predictors: (Constant), E-marketing Practices, Corporate Culture  c. Predictors: (Constant), E-marketing Practices, Corporate Culture, Competitive Environment  d. Dependent Variable: Overall Organizational Performance</p>									

The results presented in Table 4.48 reveal that e-marketing practices, corporate culture and competitive environment jointly explained 32.7% of the variability of overall organizational performance. This effect was statistically significant (F change = 5.891,  $p = .016$ ) implying that the hypothesis was supported. E-marketing practices independently explained 24.8% ( $R^2 = .248$ ) of the variability. It can also be noted that the contribution of corporate culture to the overall organizational performance was equally statistically significant as the joint contribution of both e-marketing practices and corporate culture was 30.5% (Adjusted  $R^2 = .305$ ,  $p < .05$ ).

The results of the regression coefficients as illustrated in model 3 (Beta=.298,  $t = 2.427$ ,  $p = .016$ ) imply that for every unit increase in e-marketing, corporate culture and competitive environment, the overall organizational performance changes by .298 units. This means that any changes in e-marketing practices, corporate culture and competitive environment positively affect the overall organizational performance. The results were therefore statistically significant as  $p < 0.05$ . It can be concluded that the joint effect of e-marketing practices, corporate culture, competitive environment and overall organizational performance is greater than the contribution of individual variables.

The regression model that was used to estimate the overall organizational performance in respect to the joint effect of e-marketing practices, corporate culture and competitive environment is as follows.

$$y = .531 + .283EMP + .085CC + .298CE$$

*Where:*

$y$  = Overall Organizational Performance

EMP = Electronic Marketing Practices

CC = Corporate Culture

CE = Competitive Environment

Summary of research objectives, test of hypotheses, results and conclusions of the study are presented in Table 4.49.

**Table 4.49: Summary of Research Objectives, Test of Hypotheses, Results and Conclusions**

Objective	Hypotheses	R <sup>2</sup>	p-value	F Statistic	Conclusion
Establish the effect of e-marketing practices on performance of Telecommunications Companies in Kenya	<b>H1<sub>a</sub></b> : There is a significant relationship between e-marketing practices and non-financial performance of telecommunications companies	282	.000	60.040	E-marketing practices is a statistical predictor of organizational non-financial performance Hypothesis 1 <sub>a</sub> is supported
	<b>Hypothesis 1<sub>b</sub></b> : There is significant relationship between electronic marketing practices and financial performance of Telecommunications companies	.098	.000	16.592	E-marketing practices is a statistical predictor of organizational financial performance. Hypothesis 1 <sub>b</sub> is supported
	<b>Hypothesis 1<sub>c</sub></b> : There is significant relationship between electronic marketing practices and overall performance of Telecommunications companies	.248	.000	50.405	E-marketing practices is a statistical predictor of overall organizational performance Hypothesis 1 <sub>c</sub> is supported
Determine the influence of corporate culture on the relationship between e-marketing practices and performance of Telecommunications Companies	<b>Hypothesis 2<sub>a</sub></b> : The relationship between e-marketing practices and non-financial performance of telecommunications companies is significantly moderated by corporate culture.	.617	.000	41.749	Moderating influence of corporate culture on the relationship between e-marketing practices and organizational non-financial performance is statistically significant Hypothesis 2 <sub>a</sub> supported
	<b>Hypothesis 2<sub>b</sub></b> : The relationship between e-marketing practices and financial performance of telecommunications companies is significantly	.118	.082	3.065	Moderating influence of corporate culture on relationship between e-marketing practices and organizational financial

Objective	Hypotheses	R <sup>2</sup>	p-value	F Statistic	Conclusion
	moderated by corporate culture				performance is not statistically significant Hypothesis 2 <sub>b</sub> is not supported
	<b>Hypothesis 2<sub>c</sub>:</b> The relationship between e-marketing practices and overall performance of telecommunications companies is significantly moderated by corporate culture	.381	.000	16.288	Moderating influence of corporate culture on relationship between e-marketing practices and overall organizational performance is statistically significant. Hypothesis 2 <sub>c</sub> is supported
Establish the influence of competitive environment on the relationship between e-marketing practices and performance of Telecommunications Companies	<b>Hypothesis 3<sub>a</sub>:</b> The relationship between e-marketing practices and non-financial performance of telecommunications companies is significantly moderated by competitive environment	.577	.002	10.398	Moderating influence of competitive environment on relationship between e-marketing practices and organizational non-financial performance is statistically significant. Hypothesis 3 <sub>a</sub> is supported
	<b>Hypothesis 3<sub>b</sub></b> The relationship between e-marketing practices and financial performance of telecommunications companies is significantly moderated by competitive environment.	.129	.037	4.413	Moderation of competitive environment on relationship between e-marketing practices and organizational financial performance is statistically significant.  Hypothesis 3 <sub>b</sub> is supported
	<b>Hypothesis 3<sub>c</sub>:</b> The relationship between e-marketing practices and overall performance of telecommunications	.381	.001	10.516	Moderation of competitive environment on relationship between e-marketing practices and overall

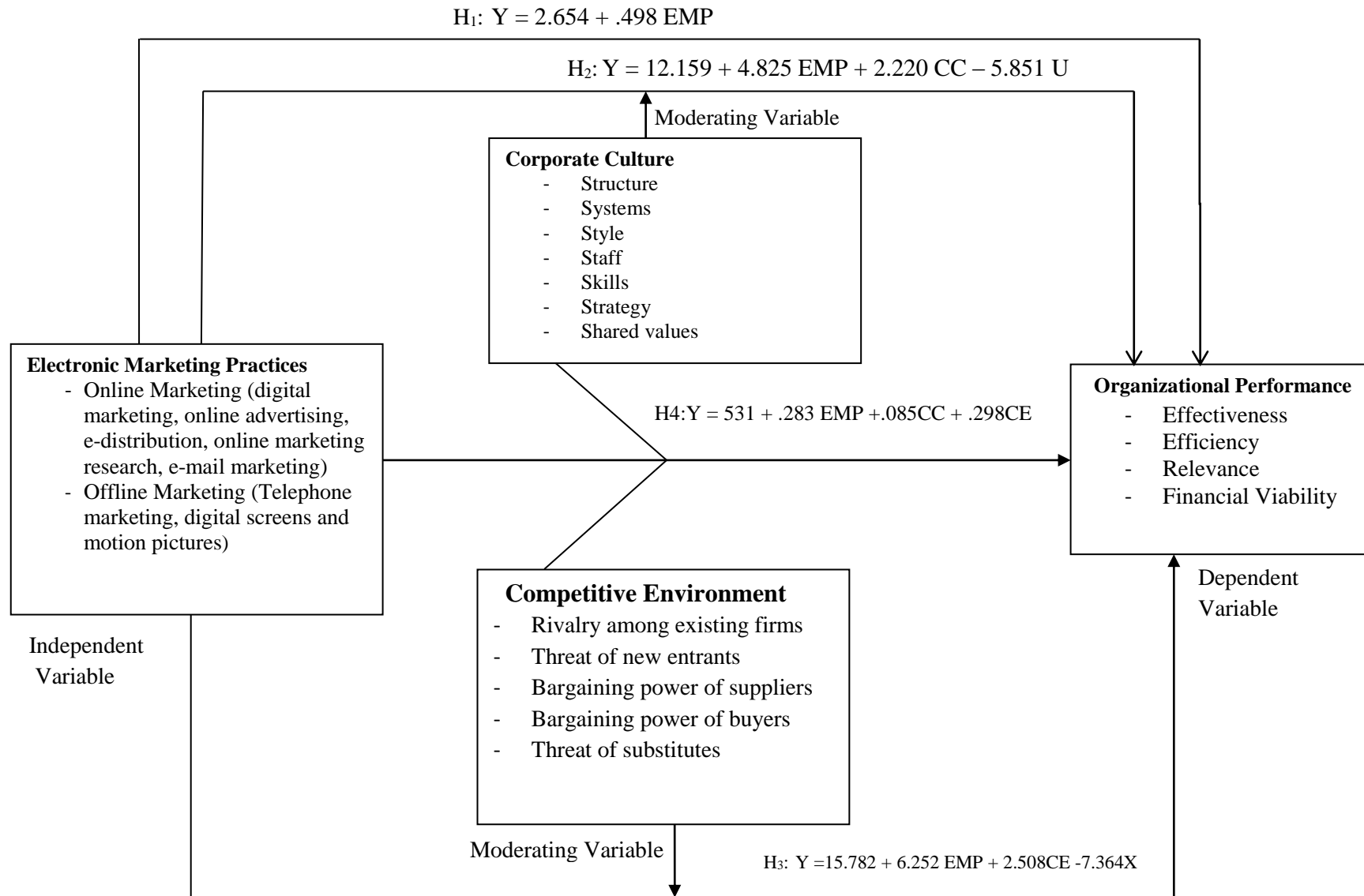
Objective	Hypotheses	R <sup>2</sup>	p-value	F Statistic	Conclusion
	companies is significantly moderated by competitive environment				organizational performance is statistically significant.  Hypothesis 3 <sub>c</sub> is supported
Determine the joint effect of e-marketing practices, corporate culture and competitive environment on performance of Telecommunications Companies	<b>Hypothesis 4<sub>a</sub>:</b> The joint effect of e-marketing practices, corporate culture, competitive environment and non-financial performance of telecommunications companies is statistically significant.	.565	.000	18.627	Joint effect of e-marketing practices, corporate culture, competitive environment and organizational non-financial performance is statistically significant. Hypothesis 4 <sub>a</sub> is supported
	<b>Hypothesis 4<sub>b</sub></b> The joint effect of e-marketing practices, corporate culture, competitive environment and financial performance of telecommunications companies is statistically significant	.104	.392	737	Joint effect of e-marketing practices, corporate culture, competitive environment and organizational financial performance is not statistically significant.  Hypothesis 4 <sub>b</sub> is not supported
	<b>Hypothesis 4<sub>c</sub></b> The joint effect of e-marketing practices, corporate culture, competitive environment and overall performance of telecommunications companies is statistically significant.	.026	.016	5.891	Joint effect of e-marketing practices, corporate culture, competitive environment and overall performance is statistically significant  Hypothesis 4 <sub>c</sub> is supported

Source: Primary Data

The results in Table 4.49 show statistically significant and positive relationship between e-marketing practices and overall performance of telecommunications companies. The study therefore supported hypothesis 1. The results also showed that both corporate culture and competitive environment moderated the relationship between e-marketing practices and overall organizational performance. Hypothesis 2 and 3 were equally statistically significant and were therefore supported. Notable is that the moderating role of corporate culture on the relationship between e-marketing practices and organizational financial performance was not statistically significant. The sub-hypothesis was therefore not supported. The results also revealed that the joint effect of e-marketing practices, corporate culture, competitive environment and overall organizational performance were statistically significant. Hypothesis 4 was therefore also supported. On the contrary, the joint effect of e-marketing practices, corporate culture, competitive environment and organizational financial performance was not statistically significant. The sub-hypothesis was therefore not supported.

Based on the findings as well as the conclusion of the study, a modified conceptual model was derived and is presented in Figure 4.1.

**Fig. 4.1: Empirical (Revised) Model of E-marketing Practices, Corporate Culture, Competitive Environment and Organizational Performance**





## **4.11 Discussion of Study Findings**

Discussion of findings of the study is presented in this section and is guided by the study objectives and the conceptual hypotheses. The primary objective of this study was to determine the effect of e-marketing practices on the performance of telecommunications companies in Kenya. Four main hypotheses were developed to accomplish the objectives of the study and they were tested through regression analysis and findings presented. The results showed that there is significant relationship between e-marketing practices and the overall performance of telecommunications companies in Kenya. The discussions on the findings are presented on the sections that follow.

### **4.11.1 Electronic Marketing Practices and Performance of Telecommunications**

#### **Companies**

The influence of e-marketing practices on organizational performance has attracted considerable research attention. Previous studies (Brodie et al, 2007; Trainor et al, 2010; Hossinpour et al., 2014) established that e-marketing practices are associated with long term organizational performance. The current study revealed a positive relationship between e-marketing practices and organizational performance when organizational performance was measured by both perceptual and objective indicators. E-marketing practices were based on both online and offline marketing practices while organizational performance measures were guided by the IDRC model (Lusthaus, 1999) that provides a holistic approach to organizational performance measurement and entails measurements around efficiency, effectiveness, relevance and financial viability.

The study reveals positive relationship between e-marketing practices and non-financial organizational performance indicators ( $R^2 = .282$ ,  $p < 0.05$ ) as well as with financial organizational performance indicators ( $R^2 = .098$ ,  $p < 0.05$ ). The findings from the study further reveal that as organizations adopt e-marketing practices, they are able to reach more customers. Notably, their engagement with the customers equally improves through interactive communications with an overall reduction on marketing expenditure.

These findings are consistent with results obtained by Brodie et al. (2007) and Trainor et al. (2010) who established a positive association between e-marketing practices and organizational performance. Specifically, Trainor et al. (2010) found a positive relationship in improved sales and distribution of organizations that had adopted e-marketing practices. These findings are consistent with the current study that revealed

how organizations that have adopted e-marketing practices have reported improved financial performance. Asikhia (2009) indicated that e-marketing practices contribute to better delivery of customer offerings and obtaining of marketing intelligence while Trainor et al (2010) stated that e-marketing practices lead to improved customer reach, engagement and retention. The consistency between the studies and the current one can be noted in that e-marketing practices were reported to not only enable wider customer reach but also proved cheaper than use of traditional marketing practices. Adoption of e-marketing practices therefore positively influences the overall organizational performance through both non-financial and financial performance indicators.

Notably, the findings are contrary to results obtained by Avlonitis and Karanyani (2000) who found that there is no competitive advantage that e-marketing practices contribute to organizational performance while adding that organizations that adopted e-marketing practices have no assurance of improved performance. Similar sentiments were held by Salem et al. (2013) who maintained that there is no evidence of positive impact on the performance of five star hotels in Alexandria that had adopted e-marketing practices. Hossinpour et al. (2014), while basing their studies on Iranian Insurance companies concluded that whereas e-marketing practices facilitate market oriented strategies that enable interactive sales activities and customized product offerings in business to business markets, there is no evidence that the improved sales performance is a direct influence of adoption of e-marketing practices. Moreover, adoption of e-marketing practices does not automatically lead to competitive advantage.

Despite the contrary opinions presented in the above studies, empirical evidence presented in the current study as well as in majority of previous studies reveal that e-marketing practices as a marketing strategy cannot be ignored by organizations that seek to improve their overall performance along both non-financial and financial perspectives. The findings are also consistent with the position held by Rogers (1995) in espousing the factors that determine acceptance of innovations through the Diffusion of Innovations Theory which details how innovations with higher relative advantage are easily adopted. Organizations have increasingly discovered that e-marketing practices have relative advantage over traditional marketing practices through wider customer reach, reduced marketing costs, improved interactivity with the customers and overall

marketing efficiency. It is therefore no wonder that organizations have adopted e-marketing practices as an unmatched marketing strategy and a resource for superior performance.

#### **4.11.2 Influence of Corporate Culture on the Relationship Between E-marketing Practices and Performance of Telecommunications Companies**

It is theoretically held that e-marketing practices enhance organizational performance if backed by corporate culture that enables ease of adoption. The findings from the current study have corroborated the same and showed that the relationship between e-marketing practices and organizational performance is moderated by corporate culture. Specifically, the findings revealed a statistically significant relationship ( $F= 34.834$ ,  $p<0.05$ ,  $R^2 = .314$ ) between e-marketing practices and overall organizational performance with e-marketing practices contributing 31.4% in the variations of overall organizations' performance. Moreover, with the introduction of corporate culture, the adjusted  $R^2 = .369$  which reveals that both e-marketing practices and corporate culture contribute 36.9% in the variations of overall performance of telecommunications companies. The statistical significance is noted further upon the introduction of the interaction term between e-marketing practices and corporate culture with the  $R^2$  change = .067,  $p<0.05$ .

Further findings revealed statistical significance of the moderating effect of corporate culture on the relationship between e-marketing practices and non-financial organizational performance. Specifically, the findings showed that e-marketing practices contributed 51.2% on the variation of non-financial performance of the telecommunications companies with  $R^2 = .512$ ,  $p<0.05$ . The same results were noted with the introduction of the interaction term of e-marketing practices and corporate culture in the relationship (adjusted  $R^2 = .610$ ,  $p<0.05$ ) revealing that both e-marketing practices and corporate culture contributed 61% on the variation of organizational non-financial performance.

These findings are supported by empirical studies which hold that e-marketing practices translate into organizational performance when supported by organizational culture and behavioral dispositions that include market orientation (Asikhia, 2009). Market-

oriented culture therefore encourages adoption of e-marketing practices thereby contributing to an organization's superior marketing competencies (Raofi, 2012). Further study by Tsiosou and Vlachopoulou (2011) hold that marketing oriented culture enables incorporation of new technologies (that include e-marketing practices) which ultimately improve organizational performance. Basing their study on Travel and Tourism firms in Greece, they concluded that organizations that adopted market-oriented culture invested in marketing resources that include e-marketing practices. This resulted into reduced marketing expenditure through direct communication and engagement with customers. This had an overall positive effect on service performance of the organizations.

The findings however contradict the study by Ogbonna and Harris (2000) who reported that corporate culture does not moderate the relationship between e-marketing practices and organizational performance. Their study which specifically focused on UK firms concluded that corporate culture mediates the relationship between leadership and organizational performance. They added that bureaucratic and community cultures are not directly related to organizational performance but are linked to creation of strong cultures through integration and cohesiveness of members.

It can be further noted that whereas the findings of the current study show statistical significance in the relationship between e-marketing practices and overall organizational performance, the coefficient results reveal that the Beta value dropped from 4.825 to -5.851 after introduction of the interaction term (Beta = -5.851,  $t = -4.036$ ,  $p = .000$ ). This shows that for every unit increase of corporate culture in the relationship, the overall organizational performance changed by -5.851 units. This is an inverse relationship which implies that e-marketing practices and corporate culture affect overall organizational performance inversely. Specifically, the findings reveal that as organizations develop strong and widely shared culture, the members find it increasingly difficult to adopt new technologies (including e-marketing practices) as the new practices are seen to contradict the members' value systems. This reluctance in adopting new technologies in the short run negatively affects organizations' performance.

The findings therefore imply that organizations that have invested in positive corporate culture and are also more willing to invest in and adopt new technologies, including e-marketing practices, are also able to report better and improved overall performance. The positive culture, in this case, enables the organizations develop leading e-marketing strategies that have impacts on reduced costs, improved customer interaction and better overall performance. On the contrary, the organizations whose strong culture discourages them from adopting new technologies are unlikely to report better performance.

#### **4.11.3 Influence of Competitive Environment on the Relationship between Electronic Marketing Practices and Performance of Telecommunications Companies**

Previous studies provide evidence that competitive environment has both positive and negative influence on organizational performance. With relatively scanty studies on relationship between competitive environment and performance of telecommunications companies, it was necessary to undertake the current study. The findings revealed statistical significance of e-marketing practices and overall organizational performance relationship ( $F = 38.818$ ,  $p=0.000$ ). The same position is held after the introduction of competitive environment in the relationship (adjusted  $R^2 = .369$ ,  $F = 10.516$ ,  $p = 0.001$ ). Notably, statistical significance was equally revealed in the relationship between e-marketing practices and organizational non-financial performance ( $R^2 = .548$ ,  $F = 91.974$ ,  $p<0.05$ ). The relationship remained statistically significant upon the introduction of the interaction term of e-marketing practices and competitive environment (adjusted  $R^2 = .568$ ,  $F = 10.398$ ,  $p<0.05$ ). When the tests were extended to include organizational financial performance (growth in sales), the relationship remained statistically significant ( $R^2 = .101$ ,  $F = 8.769$ ,  $p<0.05$ ).

These findings revealed that competitive environment moderates the relationship. E-marketing practices therefore influence performance when the organization is able to develop mechanisms and strategies that enable integration and adaptation to the competitive environment. Organizations that have adopted orientation towards technology and market have been able to develop capabilities on e-marketing. This has positively influenced their performance through improved customer retention and satisfaction due to the ability of the organizations to use e-marketing capability to scan and respond to competitive environments (Trainor et al., 2011).

Whereas Trainor et al. (2011) admit that there is a moderating influence of competitive environment on relationship between e-marketing practices and organizational performance; they are quick to add that competitive intensity and market turbulence have a negative relationship with customer service. This implies that customer loyalty and satisfaction are difficult to achieve in industries that experience rapid changes as customer expectations and demands are forever changing. This means that intensity of competition has a negative effect on organizational performance because achieving corporate goals and objectives are much harder when competition in an industry increases. Organizations must therefore seek to gain competitive advantage through distinct capabilities that enable them navigate competitive environments for success (Felzensztein et al., 2015).

The findings from the current study upon introduction of the interaction term of e-marketing practices and competitive environment ( $\beta=-7.364$ ,  $t = -3.243$ ,  $p=.001$ ) support the above sentiments. The findings imply that although the model is statistically significant, there is an inverse relationship which means that the changes in the competitive environment negatively affect e-marketing practices and organizational performance relationship. Specifically, when organizations operate in highly competitive environments characterized by cut throat competition with ease of entry into the industry and where players aggressively defend their positions and swiftly match offerings of one another, it is more difficult for the industry players to record favourable performance.

Pereira-Moliner et al. (2015) maintain that an increase in the number of market players reduces overall performance and that intense competition increases the chances that organizations are unlikely to meet their goals and are therefore likely to fail. This is likely to result into their failure. On the contrary, Porter (1990) holds that competition improves organizational performance as highly competitive environments force players to be more innovative in order to succeed in the market. Moreover, organizations faced with stiff competition learn to respond to environmental pressures by developing appropriate strategies that enable better performance.

#### **4.11.4 Joint Effect of E-marketing Practices, Corporate Culture, Competitive Environment and Performance of Telecommunication Companies**

The study findings revealed that the joint effect of e-marketing practices, corporate culture, competitive environment and overall performance of telecommunications companies was statistically significant ( $R^2 = .340$ ,  $F = 5.891$ ,  $p = .016$ ). The study showed that all explanatory variables had statistically significant influence on overall organizational performance ( $p < 0.05$ ). The contribution of competitive environment to the overall performance was the highest ( $\beta = .298$ ) followed by the contribution of e-marketing practices ( $\beta = .283$ ) while the contribution of corporate culture was the least at  $\beta = .085$ .

The study reveals the need for organizations to develop mechanisms that enable integration of and adaptation to the competitive environment as this would significantly influence their performance (Barrales-Molina et al., 2010; Sanders et al., 2014). Organizations that seek to gain from e-marketing capabilities also need to invest in resources that enable adoption of e-marketing practices. Corporate culture is an intangible resource that can be nurtured to enable monitoring of the competitive environment and development of effective strategies that include e-marketing practices. This would in turn positively influence organizational performance. As Jaworski and Kohli (2004) argued, the organizations that are market oriented have a culture of tracking and responding to customers' needs; responding with relevant strategies that results into better performance.

Organizations need to realize that corporate culture is a resource that plays an important role in generating competitive advantage. This can only be achieved when the corporate culture is not only unique but also superior that the competition cannot imitate it. Culture can also be linked to superior organizational performance if it is able to adapt to changes in the competitive environment. The adoption of appropriate and superior strategies that include e-marketing practices require cultural orientation that recognizes the need to not only invest in the appropriate strategy but also capable of scanning the marketing environment for appropriate responses. As detailed in the Resource Based Theory, organizations can invest in corporate culture and make it more difficult for the competition to imitate it. Moreover, the recognition that failure to respond to the competitive environment with the right strategies can easily result into the extinction of an organization.

#### **4.12 Summary of the Chapter**

Chapter four presented results of the study together with the tests of hypotheses. Regression analysis was specifically used in testing the hypotheses. There were a total of twelve hypotheses out of which four were considered as the major hypotheses of the study while eight were sub-hypotheses. Three hypotheses were used in testing the direct relationship; six were for the moderation effects while three were for the joint effect of the relationships. From the findings, out of the four major hypotheses tested, all of them were fully supported by the empirical evidence. Notably, two out of the eight sub-hypotheses tested were however not supported by the empirical evidence. Specifically, the results of the regression analysis for moderation tests revealed that both the major hypotheses were statistically significant leading to hypothesis 2<sub>c</sub> and 3<sub>c</sub> being supported. On the same note, hypothesis 4<sub>c</sub> that sought to establish the joint effect of e-marketing practices, corporate culture, competitive environment and overall organizational performance was also supported. Univariate analysis performed on e-marketing practices and overall organizational performance showed that e-marketing practices had a positive and statistically significant influence on overall organizational performance thereby supporting hypothesis 1<sub>c</sub>. The study findings were consistent with those of other previous studies. Chapter five that follows presents summary, conclusion and recommendations.



## **CHAPTER FIVE**

### **SUMMARY, CONCLUSION AND RECOMMENDATIONS**

#### **5.1 Introduction**

The broad objective of the study was to determine the influence of e-marketing practices, corporate culture and competitive environment on the performance of telecommunications companies in Kenya. Four major hypotheses were formulated in order to guide the accomplishment of the study. The hypotheses were tested and findings outlined in chapter four. This chapter draws from the test results and presents summary, conclusion and recommendations for further research.

#### **5.2 Summary**

In order to accomplish the broad objective of the study, four specific objectives were formulated from which four major hypotheses were derived. The population of the study was composed of telecommunications companies that were licensed by Communications Authority of Kenya as at June 2015. Hypotheses were tested from data that were collected from primary sources through structured questionnaire targeting three managers responsible for the management of finance, marketing and human resource activities within the organizations. Data processing was done through both descriptive statistics and inferential statistics. Factor analysis and regression analysis were specifically used among others.

The study established that a higher percentage of the top management of telecommunications companies is made up of males (67%) with the female managers accounting for only 33%. Moreover, 80% of the managers are aged below 45 years of age. This demonstrates the confidence that the telecommunications industry has in the youth whom are believed to perform better in competitive and turbulent industries like the one under study (Wiersema & Bantel, 1992). Majority of the telecommunications companies (82.9%) had operated for less than 15 years thereby suggesting that the telecommunications industry in Kenya is fairly young. This is reflected in the size of majority of the companies (83%) that were established to fall within the small and medium size categories who employ up to 100 permanent employees. The study also showed that majority of the telecommunications companies (80%) are locally owned and majorly operated nationally.

The premise of this study was that e-marketing practices influence performance of telecommunications companies. In order to establish this, a conceptual framework was developed and tested empirically guided by four objectives and corresponding hypotheses. The study established that majority of the telecommunications companies have adopted e-marketing practices and that both online and offline marketing strategies are employed in the companies' marketing tactics. Reduced marketing expenditure has been noted by majority of the companies that have adopted e-marketing practices. The companies are also more able to not only advertise their products cost effectively but also receive feedback on their performances through e-marketing practices. Notably, e-marketing practices have a positive relationship with both non-financial and financial performance of the telecommunications companies. The findings support studies by Hossinpour et al., (2014) and Brodie et al, (2007) who found out that adoption of e-marketing practices results into better performance in sales, distribution and customer acquisition.

Corporate cultural values were depicted in diverse ways with a collaborative culture evidenced through heavy presence of teamwork and bonding sessions among organizational members. Bureaucratic management style was also noted through well aligned structures that enabled engagement with staff and customers while encouraging staff development in line with environmental changes. Adhocracy culture was highly practiced with majority of the companies allowing some degree of risk among its employees which resulted into ease of alignment of strategies to industry feedback. Competition within the telecommunications industry was established to be very intense as observed through advertising wars and price cuts by players. Despite the moderate threat from substitute products, the industry faces high threat from new entrants especially in the content and application services provision. Both buyers and sellers equally dictate terms in the industry thereby intensifying industry competitiveness.

It was established that both corporate culture and competitive environment had moderating effects on the relationship between e-marketing practices and performance of telecommunications companies. This suggests that e-marketing practices, corporate culture and competitive environment independently contribute towards variations in the performance of telecommunications companies. This supports findings of previous

studies (Egan et al., 2004; Ogbanna, 2000; Skerlavaj et al., 2007). The results therefore suggest that telecommunications companies need to monitor and adapt to the competitive environment as the changes that occur within the environment offer opportunities and at the same time pose threats that can affect the overall organizational performance. Telecommunications companies therefore need to focus on strategies that assure them of competitiveness and sustainability. The results also demonstrated that competitive environment affects the strength and direction of the relationship between e-marketing practices and organizational performance. This implies that as changes occur within the competitive environment, telecommunications companies need not only to adopt marketing strategies that assure them of competitiveness like e-marketing practices but to also align their strategies to corporate culture that enables adaptation to the competitive environment. This leads to competitive advantage and superior organizational performance reflected in the organizations' efficiency, effectiveness, relevance and overall financial performance.

Results on the joint effect of e-marketing practices, corporate culture, competitive environment and organizational performance established that the combined effect of the variables was stronger than the individual effect on overall organizational performance. Competitive environment had the highest contribution followed by e-marketing practices and lastly corporate culture that had the least contribution.

### **5.3 Conclusion**

The study examined the relationship between e-marketing practices and performance of telecommunications companies. E-marketing practices were measured by the organizations' adoption of online and offline marketing practices while organizational performance was measured through non-financial (efficiency, effectiveness and relevance) and financial viability indicators. The positive relationship revealed in the study suggested that telecommunications companies in Kenya have adopted e-marketing practices as unavoidable marketing strategy that assures them of competitiveness. The telecommunications companies are therefore in a position to effectively seek their customers' views while reaching them cost-effectively and efficiently through both online and offline marketing activities. Telecommunications companies must also take cognisance of the consumers' current high knowledgeability and demand for better

services. This requires that the companies be responsive to the needs and wants of their target customers better than their competitors in order to succeed in this competitive environment. The companies must therefore seek to adopt marketing strategies that assure them of success.

The study also examined the moderating effects of corporate culture on one hand and competitive environment on the other hand on the relationship between e-marketing practices and organizational performance. In both cases, the results were statistically significant but with an inverse relationship implying that an increase on both corporate culture and competitive environment had a negative effect on the overall performance of the telecommunication companies. Specifically, as competition increases in the industry, telecommunications companies have to adopt positive corporate culture that assures them of efficient response with appropriate strategies to avoid negative performance. This suggests that both the corporate culture adopted by the telecommunications companies and the competitive environment within which the companies operate have great influence on the relationship between e-marketing practices and performance of the companies. Notably, the competitive environment predicts the performance of the majority of telecommunications companies in Kenya. The strategies applied by the companies therefore determine whether they are able to effectively respond to the challenges and opportunities presented in the competitive environment. The cultural orientation of the telecommunications companies is a key resource that is capable of enabling adoption of effective strategies while at the same time adapting to the competitive environment. The telecommunications companies need to therefore continuously scan the competitive environment; adapt to the dynamisms in the industry and adopt corporate culture and marketing strategies that enable competitiveness while assuring them of success.

On the joint effect of e-marketing practices, corporate culture, competitive environment and overall organizational performance, the results were equally statistically significant. This suggests that the influence of e-marketing practices, corporate culture and competitive environment on performance of telecommunications companies is stronger than the individual effect of each of the variables. This implies that the combined influence of the independent variables creates synergy that can be relied upon by organizations to deliver superior organizational performance.

## **5.4 Contributions of the Study**

The study examined the relationship between e-marketing practices, corporate culture, competitive environment and organizational performance. It also explored the moderating roles of both corporate culture and competitive environment on the relationship between e-marketing practices and organizational performance. The study findings have implications on theory, policy and practice as outlined in the sub-sections that follow.

### **5.4.1 Contribution to Theory**

In its quest to test for the direct relationship between e-marketing practices and organizational performance, the current study is one of the few that also tested the relationship of e-marketing practices with both the non-financial and financial indicators of performance. The study specifically viewed non-financial performance using efficiency, effectiveness and relevance indicators while financial performance was measured through financial viability. In both instances, the study results showed statistically significant relationships with the robustness being higher in relationship with non-financial performance than with financial performance.

The findings are in support of the hypothesized direct relationship between e-marketing practices and organizational performance. This is consistent with the general view and extant literature (Hossinpour et al., 2014; Trainor et al., 2011; Brodie et al, 2007; Avlonitis & Keranyani, 2000) that detail how adoption of e-marketing practices have positive effects on overall organizational performance. The study builds into the Diffusion of Innovations Theory as espoused by Rogers (1995).

The study further tested for the moderating effect of both corporate culture and competitive environment on the relationship between e-marketing practices and organizational performance. Reference to the Resource Based Theory provided insights in linking corporate culture to the relationship while noting that organizations that invest in corporate culture thereby making it inimitable, durable and sustainable often have competitive advantage over the competition (Grant, 1991; Collis & Montgomery, 1995; Amit & Shoemaker, 1993). In line with the previous studies (Daft, 2007, Asikhia, 2009; Raofi, 2012), the current study revealed that moderating effect of corporate culture on the relationship between e-marketing practices and organizational performance was significant.

The study further considered competitive environment while drawing from the Industrial Organization Theory (Pecotich et al, 1999) with Porter's (1980) five forces being applied in establishing the competitiveness within the telecommunications industry. The study established statistical significance of the moderating effect of competitive environment on the relationship between e-marketing practices and overall organizational performance thereby supporting findings in extant literature (Egan et al., 2004). The study further showed that the joint influence of e-marketing practices, corporate culture, competitive environment and organizational performance was statistically significant.

The findings from this study imply that corporate culture complements the effects of e-marketing practices on organizational performance. The empirical evidence presented in the current study shows that there is a relationship between an organization's performance and e-marketing practices, corporate culture and competitive environment. These findings can be extended to contribute to a renewed research interest on e-marketing practices and its contribution to superior organizational performance. The findings can be extended in further development at both the conceptual and theoretical levels. The study results therefore add to the existing e-marketing practices and organizational performance body of knowledge, thereby empirically and theoretically testing the hypotheses in the Kenyan context.

#### **5.4.2 Contribution to Policy**

Telecommunications companies play a significant role in enhancing accessibility and reach of remote markets by both individuals and organizations. They are also a source of employment for the growing Kenyan population. This makes their scope of operations, nature of products offered and overall performance a matter of policy concern. Moreover, with telecommunications sector being identified as one of the priority sectors under the economic pillar of the Vision 2030, government focus and intervention would assure the country of unquestionable global competitiveness.

Findings of the study showed that majority of the telecommunications companies operate mainly nationally with minimal regional, continental and international reach. Moreover, majority of the companies only offer content service provision with very few of the companies offering full range of telecommunications products. Furthermore, the

study has also shown that majority of the telecommunication companies, despite having operated for over ten years, are still in the category of small companies employing less than 50 permanent employees. From these findings, deliberate policy measures aimed at encouraging the companies to enhance their product range – specifically policies related to investment in infrastructure, will not only enhance scope of operations but also enable growth of the companies thereby providing more employment opportunities. The findings also reveal that e-marketing practices have a direct effect on superior performance of the telecommunications companies. The policy makers within the sector can offer support to the telecommunications companies by passing laws that enable ease of acquisition of resources that enable investment in technology related to e-marketing practices. Policy interventions are therefore necessary in strengthening and promoting telecommunications companies in Kenya.

#### **5.4.3 Contribution to Marketing Practice**

The study findings suggest that telecommunications companies that need to succeed in this dynamic and competitive industry must adopt marketing strategies that not only assure them of sustainability but also enable success. Specifically, they should consider adopting e-marketing practices; combine both online marketing and offline marketing tactics for synergy in delivery of outstanding performance. They also need to continuously monitor the competitive environment and adapt to the changes for competitiveness. Furthermore, the telecommunications companies need to identify the relevant corporate culture that encourages ease of adoption of new ideas while enhancing environmental scanning. All these would assure the companies of positive and improved performance.

#### **5.5 Limitations of the Study**

The study used structured survey design for data collection. This was restrictive as it did not allow respondents to express their views fully but narrowed their responses to areas captured by the questionnaire. The respondents would have provided better insights if the research had utilized a blend of both structured and unstructured research designs. Lastly, the cross-sectional study design adopted was limiting in that it could not assess the long-term influence of e-marketing practices and organizational performance relationships. It is most likely that different results could have been obtained if the study had applied longitudinal research design.

## **5.6 Suggestions for Further Research**

The findings of this study augment the existing conceptual and empirical evidence that e-marketing practices influence organizational performance. Notably, the findings also add to empirical evidence that corporate culture and competitive environment, among other extraneous variables, moderate e-marketing practices and organizational performance relationship. E-marketing practices were measured using online and offline marketing practices while organizational performance was measured along the IDRC model. Consequently, corporate culture was measured using McKinsey's 7s model while measures of competitive environment were derived from industrial organization literature. The inclusion of additional factors not covered in this study could bring more insights into the e-marketing practices and organizational performance studies. Moreover, competitive environmental factors considered in the study may not provide a complete image of an organization's competitive environment. Additional competitive environmental factors can therefore be explored.

Identification of additional factors that contribute to the concept of e-marketing practices, corporate culture, competitive environment and organizational performance variables can be undertaken through a further review of both marketing and strategic management literature. The addition of the identified factors could enhance the robustness of the study models as well as the generalizability and validity of the results. Specifically, future research could consider testing the influence of corporate climate on the relationship between e-marketing practices and organizational performance considering that corporate climate is related but not similar to corporate culture. It would be interesting to discover whether the moderating effect would still be maintained as is the case with the current study. Further studies can also be conducted to assess the direct relationship between corporate culture and organizational performance that was not part of the current study. The study can be extended to determine which specific dimensions of corporate culture have the most significant impact on organizational performance. This would guide the industry players on the allocation of resources and management emphasis.



The current study focused on telecommunications companies in Kenya. A replication of the study on other sectors as a breakaway from the telecommunications industry can also reveal valuable insights. Future studies can consider the hospitality industry in totality, the manufacturing sector, not-for-profit organizations as well as government ministries and agencies. It can also cover a combination of industries and organisations in which case it can give a more detailed view of the nature of the relationship identified in the study. It would therefore be commendable to study the relationship between e-marketing practices and performance of organizations in different sectors. Additionally, the replication of the current study in other countries and specifically in the Sub-Saharan Africa would demonstrate the universality and significance of e-marketing practices and performance relationship.

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## APPENDICES

### Appendix 1: Researcher's Introductory Letter

Dear Sir/Madam,

**RE: ELECTRONIC MARKETING PRACTICES, CORPORATE CULTURE,  
COMPETITIVE ENVIRONMENT AND PERFORMANCE OF  
TELECOMMUNICATION COMPANIES IN KENYA**

I am a PHD candidate in the School of Business at the University of Nairobi. I am conducting a research study on the above topic as a requirement for the award of the degree and would like your assistance by answering the attached questionnaire. The study sets out to investigate the influence of electronic marketing, corporate culture and competitive environment on performance of the telecommunication companies in Kenya.

The questionnaire is divided into Five (5) sections; please read carefully and answer the questions to the best of your ability. The information gathered will be used purely for the purpose of academic research and will be treated with utmost confidentiality. Attached is an introduction letter from the University of Nairobi for your reference. Kindly note that there is no right or wrong answer and your participation in participating in the study is highly appreciated.

I look forward to your kind assistance.

Yours Sincerely,

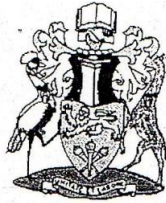


Olgha Auma Adede

Cellphone: +254 722790556

Email: [olghaadede@yahoo.com](mailto:olghaadede@yahoo.com)

**Appendix 2 Researcher's Introductory Letter from The University of Nairobi**



**UNIVERSITY OF NAIROBI**  
**COLLEGE OF HUMANITIES AND SOCIAL SCIENCES**  
**SCHOOL OF BUSINESS**  
**DOCTORAL STUDIES PROGRAMME**

Telephone: 4184160/1-5 Ext. 225  
Email: dsp@uonbi.ac.ke

P.O. Box 30197  
Nairobi, Kenya

8<sup>th</sup> March, 2016

**TO WHOM IT MAY CONCERN**

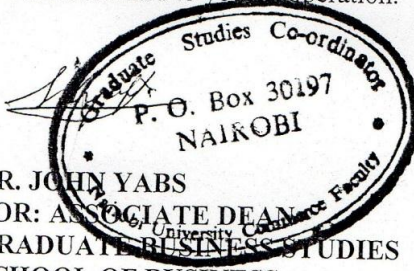
**RE: OLGHA AUMA ADEDE – D80/72647/2012**

This is to certify that, **OLGHA AUMA ADEDE: D80/72647/2012** is a Ph.D candidate in the School of Business, University of Nairobi. The title of her study is: **“Electronic Marketing Practices, Corporate Culture, Competitive Environment and Performance of Telecommunication Companies in Kenya”.**

The purpose of this letter therefore, is to kindly request you to assist and facilitate in carrying out the research/study in your organization. A questionnaire is herewith attached for your kind consideration and necessary action.

Data and information obtained through this exercise will be used for academic purposes only. Hence, the respondents are requested not to indicate their names anywhere on the questionnaire.

We look forward to your cooperation.

  
**DR. JOHN YABS**  
**FOR: ASSOCIATE DEAN**  
**GRADUATE BUSINESS STUDIES**  
**SCHOOL OF BUSINESS**

JY/nwk

## Appendix 3: Questionnaire

### Questionnaire

This questionnaire is designed to collect data from telecommunication companies in Kenya on electronic marketing practices, corporate culture, competitive environment and organizational performance. The data shall be used for academic purposes only and will be treated with strict confidence. Identity of the respondent will also be kept anonymous. Your participation in facilitating the study is highly appreciated.

#### Part1: Organizational and Respondent Profile

1. Name of the company \_\_\_\_\_

2. Your Gender \_\_\_\_\_

3. Your Age \_\_\_\_\_

4. How long have you worked in this company? (Specify) \_\_\_\_\_ Years

5. When was the company established? Year: \_\_\_\_\_

6. Indicate the number of Permanent employees employed in the Organization (Tick as appropriate)

#### Permanent

- |                     |                          |
|---------------------|--------------------------|
| Up to 100 employees | <input type="checkbox"/> |
| Between 101-200     | <input type="checkbox"/> |
| Between 201-300     | <input type="checkbox"/> |
| Between 301-400     | <input type="checkbox"/> |
| Between 401-500     | <input type="checkbox"/> |
| Above 500           | <input type="checkbox"/> |

7. What is the scope of operation of your company? (Tick as appropriate)

- |                                   |                          |
|-----------------------------------|--------------------------|
| National (within Kenya)           | <input type="checkbox"/> |
| Regional (within East Africa)     | <input type="checkbox"/> |
| Continental (within Africa)       | <input type="checkbox"/> |
| Global (within Africa and beyond) | <input type="checkbox"/> |

8. What is your company's ownership structure?

- |                                |                          |
|--------------------------------|--------------------------|
| Fully locally owned            | <input type="checkbox"/> |
| Fully Foreign owned            | <input type="checkbox"/> |
| Both locally and foreign owned | <input type="checkbox"/> |

9. Indicate the category of Telecommunication Company that your organization belongs to. Tick as appropriate

- |  |                          |
|--|--------------------------|
| International Network Facility Providers               | <input type="checkbox"/> |
| National Network Facility Providers (NFP – Tiers 1-3)) | <input type="checkbox"/> |
| Application Service Provider                           | <input type="checkbox"/> |
| Content Service Provider                               | <input type="checkbox"/> |

**Part 2: Electronic Marketing Practices**

One aspect of this study is on Electronic marketing and seeks to understand how your organization makes use of the various e-marketing practices (digital technologies, email marketing, social media marketing, e-marketing research, e-distribution etc). Kindly indicate (by ticking one box for each statement) the extent to which your organization applies each of the following factors.

**Online Marketing**

<b>Statements</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
The company has an active and interactive website through which it engages its customers /stakeholders					
The company actively advertises its products/services using the internet-					
Using internet to market the company has reduced our company's marketing expenditure					
Advertising the company's products on-line is cheaper than all other forms of marketing					
The company gets more customer enquiries when using internet technology					
The company has dedicated personnel that handle company's online marketing activities					
The company advertises its products /services through other companies' websites					
The company uses online advertising whenever it runs its promotions					
The company uses social media marketing technology (facebook and twitter) to reach its customers					
The company has an online Marketing Information System (MkIS) that it employs for collecting marketing intelligence / information					
The company uses online qualitative research to collect information from its customers					
The company seeks customers' views on its products/services using the internet					

v. **Off-line Marketing**

<b>Statement</b>	<b>Not at all</b>	<b>Small Extent</b>	<b>Moderate extent</b>	<b>Large extent</b>	<b>Very large extent</b>
	<b>(1)</b>	<b>(2)</b>	<b>(3)</b>	<b>(4)</b>	<b>(5)</b>
How actively does the company use telephone / mobile phone to market its products/services?					
The company uses short messages (SMS) to communicate with its customers					
The company gets more customer enquiries/ feedback through short messages (SMS)					
The company spends less money and time in reaching its customers by SMS than through other forms of communication					
The company obtains wider reach through SMS marketing					
The company uses digital screens and motion pictures in marketing its products and activities					

**Part 3: Corporate Culture**

The following statements relate to corporate cultural characteristics of organizations. Corporate culture refers to the organization's distinct philosophies, assumptions, norms, values systems and ways of doing business that is unique to the organization. Kindly indicate extent to which each of the statements below match cultural traits in your organization.

i. **Structure**

<b>Statements</b>	<b>Not at all</b>	<b>Small Extent</b>	<b>Moderate extent</b>	<b>Large extent</b>	<b>Very large extent</b>
	<b>(1)</b>	<b>(2)</b>	<b>(3)</b>	<b>(4)</b>	<b>(5)</b>
The company is organized into different functions /departments in line with roles					
All departments in the company are headed by relevant managers responsible for achievement of departmental goals					
Every employee in the organization has well specified job descriptions that guide job performance and territory demarcations					
Management carries out adjustments to the organization structure from time to time to make it more responsive to changes in the environment					

**ii. Systems**

<b>Statements</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
The company has well established and widely shared systems, policies, procedures and guidelines that direct job performance					
The company has implemented Information Technology systems that enable efficient work performance					
The company recognizes flexibility and constantly reviews its systems, policies and procedures in line with environmental changes					
The company has put in place evaluation and appraisal systems for all its activities					
The company has a reward system for all job performances					
The company has stable systems that assures it of sustainability					
The company has established a system that encourages and rewards innovative ideas and performances					
Our systems are highly bureaucratic with many rules that constraint performance					
Our well aligned systems have earned our company a good reputation					

**iii. Style**

<b>Statements</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
The CEO has an open door policy that allows ease of access by any cadre of employee					
The company's departmental heads explain job requirements to every staff function					
The departmental heads encourage staff consultations					
The management is decisive in every aspect					
Top management is supportive of goal achievement					
Management has high expectations for performance					
The company emphasizes focus on customers, competitors and suppliers across all departments					
The management emphasizes delivery of superior value to customers					
Employee inputs are considered in management decisions					
The employees are rewarded on good job performance					

**iv. Staff**

<b>Statements</b>	<b>Not at all</b>	<b>Small Extent</b>	<b>Moderate extent</b>	<b>Large extent</b>	<b>Very large extent</b>
	<b>(1)</b>	<b>(2)</b>	<b>(3)</b>	<b>(4)</b>	<b>(5)</b>
The company has adequate number of staff to handle job requirements					
The company has qualified staff for every job position					
Our staff have analytical minds and able to take initiative for goal achievement					
The company appraises its employees systematically and periodically					
The company is people oriented and treats employees with respect					
Management tolerates reasonable degree of risk and error committed by employees					
Our employees are aggressive and quick in taking advantage of opportunities					
The company encourages employees to be calm yet careful when handling tasks and customers					
Our company assures all staff of security of employment					

**Skills**

<b>Statements</b>	<b>Not at all</b>	<b>Small Extent</b>	<b>Moderate extent</b>	<b>Large extent</b>	<b>Very large extent</b>
	<b>(1)</b>	<b>(2)</b>	<b>(3)</b>	<b>(4)</b>	<b>(5)</b>
The company focuses highly on skills and competencies required for every job					
All positions within the company have well spelt out skill expectations					
The managers carry out skill gaps analysis periodically in line with environmental changes					
The company invests adequately on skills development of its employees					
The company has a well-documented training programme for all its employees					
The company offers opportunities for professional growth to all employees					
The company benchmarks its skills with leaders in the industry and beyond					

**vi. Strategy**

<b>Statements</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
The company has documented and communicated its objectives that guide strategy formulation					
The company has a position that is charged with strategy implementation					
The company has a strategy for monitoring the environment periodically					
The company's strategies are aligned to industry feedback					
The management reviews company's strategies periodically to make them more adaptive to changes in the environment					
Our strategies emphasize on quality performance					
The company's strategies are distinct thus enable our activities and programmes to be different from others					
Our strategies assure us of competitiveness in the industry					

**vii. Shared Values**

<b>Statements</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
Top management encourages togetherness and ownership of company activities by all employees					
The company encourages teamwork spirit / team orientation of its employees					
The CEO ensures all departments engage in yearly team building activities					
The company is more focused on external environment than internal environment					
Company directors, top management and employees participate in yearly staff parties					
The company celebrates its achievement by both management and employees					
The company shares relevant information freely among respective members					
Our company cares for the society and participates in community activities					
Working in collaboration with others from different departments is highly encouraged at our company					



**Part 4: Competitive Environment**

One aspect of this study is on competitive environment and seeks to understand the competitive environment within which your organization operates and how it affects decision making by your management. Kindly indicate (by ticking one box for each statement) the extent to which your organization is affected by each of the following factors.

**The intensity of rivalry**

Statements	Not at all (1)	Small extent (2)	Moderate extent (3)	Large extent (4)	Very large extent (5)
Firms in the industry compete intensely to hold/increase their market share					
Competition in the industry is describe by terms like 'war-like', 'bitter', and 'cut-throat					
There are many promotion wars in the industry					
Advertising battles occur frequently and with high intensity in the industry					
Price competition is highly intense and price cuts are quickly and easily matched in the industry					
Anything that one competitor can offer the market, others can readily match it					
Competitors react fast to moves by any single company within the industry					
Rate of introduction of new products and services in the industry is rapid					
Firms within the industry have massive resources for vigorous and sustained competitive action and retaliation against competitors					

Competition affects organizations in different ways. Elaborate how your company has been affected by competition in the recent past.

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### Threat of Entry

The statements below seek to determine how easy or hard it is for other players to join your industry

Statements	Not at all (1)	Small extent (2)	Moderate extent (3)	Large extent (4)	Very large extent (5)
Setting up a company within our industry requires large start-up costs in form of finances, research and development, capital and human resources					
New companies have to enter at a highly visible scale to be recognized by customers					
Established companies in our industry have substantial resources which are used to prevent entry of new competitors					
New companies joining the industry must spend a lot of resources on research and development					
New entrants into the industry have to spend heavily to build their brands and overcome existing brand loyalties					
New companies entering the industry as small scale firms must accept a considerable cost advantage					

### Bargaining power of Buyers

The following statements seek to determine how much power your customers have over your company's offerings

Statements	Not at all (1)	Small extent (2)	Moderate extent (3)	Large extent (4)	Very large extent (5)
Buyers and buyer groups are very powerful in the industry					
Buyers in the industry's products are in a position to demand concessions and large discounts					
There is a small number of buyers in the industry that form a large proportion of our industry's sales					
Buyers in the industry demand better services					
Buyers in our industry do not dictate any terms and go by what companies offer them					

**Bargaining power of suppliers**

Statements below seek to determine how much power your suppliers have over your industry players?

Statements	Not at all (1)	Small extent (2)	Moderate extent (3)	Large extent (4)	Very large extent (5)
In our industry, the suppliers' product quality has great effect on quality of our company's products					
The suppliers' products/offerings are an important input into our company's products/ offerings					
The suppliers' / supplier groups in our industry are very powerful					
Suppliers in our industry demand and gain high concessions					
The industry has a small number of suppliers who contribute to a large proportion of the industry's inputs					

**Threat of substitute goods/services**

The statements below relate to the availability of products in your industry that can meet the same needs as your company products

Statements	Not at all (1)	Small extent (2)	Moderate extent (3)	Large extent (4)	Very large extent (5)
There is considerable pressure from substitute products in our industry					
All companies in our industry are aware of the strong substitutes that are easily available to our customers					
The availability of substitute products in our industry limits the potential return on investment in the industry					
The needs that our industry products satisfy may be easily satisfied by products from many other sources and industries					
The products from our industry have intrinsic characteristics from which it is difficult to find substitutes					

**Part 5: Organizational Performance**

The following statements seek to understand the performance of your company in relation to different performance criteria. Rate the extent to which the performance has been achieved in the last Five (5) years from 2011-2015 (Tick as appropriate).

**i) Efficiency**

<b>Statement</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
Our company makes best use of the employees to the best of their abilities					
Our company makes best use of its physical resources					
Our company makes optimal use of its financial resources					
Our company monitors employee absenteeism and turnover rates					
The company monitors timeliness of service delivery by the employees					
High quality administrative systems are in place to support efficiency					
All departments within the company make benchmark comparisons of the progress achieved					

**ii) Effectiveness**

<b>Statement</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
The mission statement provides the reason for the existence of our company					
Our company mission is measured in terms of corporate goals and objectives with detailed strategies in different programmes and activities					
The company uses qualitative and quantitative indicators to capture the essence of the mission					
The company has a system in place that measures effectiveness of its programmes and activities					
The company uses feedback from its stakeholders to improve its performance					
The company products/services are highly rated in the industry					
The company is able to meet needs of all its customers					
The company mission is known and widely shared by all staff					

**iii) Relevance**

<b>Statement</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate extent (3)</b>	<b>Large extent (4)</b>	<b>Very large extent (5)</b>
The company carries out stakeholder (customers, suppliers) satisfaction surveys regularly					
The company regularly monitors and adapts to the business environment					
The company regularly trains employees in line with environmental changes					
The company introduces new products/services regularly					
The company monitors its image and reputation regularly					
The company adopts to new technology easily					
The company products/services reflect changing environmental conditions					
The company strongly encourages and embraces innovation					
The company had an innovation team that develops and guides on implementation of new ideas					
The company regularly trains employees in line with environmental changes					
The company's products and services reflect changes in customer needs and wants					

**vi. Financial Viability**

<b>Description</b>	<b>Not at all (1)</b>	<b>Small Extent (2)</b>	<b>Moderate Extent (3)</b>	<b>Large Extent (4)</b>	<b>Very Large Extent (5)</b>
Our firm monitors finances on a regular basis					
Our assets are greater than liabilities					
Our firm keeps a reasonable surplus of money to use during difficult times					
Our firm consistently has more revenue than expenses					
Our profit margins have been increasing over the years					
Our firm diversifies levels of funding sources					
Our firm rarely gets short/long term loans from financial institutions					
Our staff are among the best paid in this industry					
We pay our suppliers on time					

**Thank you for your cooperation**

## Appendix 4: Register of Licensed Telecommunication Companies in Kenya

### 1. INTERNATIONAL GATEWAY OPERATORS

1. Airtel Networks Kenya Limited	73146 Nairobi 00200 0734110000 0734111114
2. Alldean Networks Limited	14400 Nairobi 00800
3. Comcarrier Satellite Services Limited	41093 Nairobi 00100 312712 330887
4. Essar Telecom Kenya Limited	45742 Nairobi 00100
5. Internet Solutions Kenya Limited	39519 Nairobi 00623 020-27111400 020-2718418
6. iWayAfrica Kenya Limited	27554 Nairobi 00506
7. Jamii Telecommunications Limited	47419 Nairobi 00100
8. Liquid Telecom Kenya Limited	62499 Nairobi 00200
9. Mobile Telephone Networks Business Limited	12170 Nairobi 00100
10. Safaricom Limited	46350 Nairobi 00100
11. Sea Submarine Communications Limited	200 Nairobi 00606 3748084 3740242
12. Telkom Kenya Limited	30301 Nairobi 00100
13. Wananchi Telecom Limited	10286 Nairobi 00100 020-3292000 020-313922
14. Access Kenya Group Limited	43588 Nairobi 00100 3600000 3600001

### 2. SUBMARINE CABLE LANDING RIGHTS OPERATORS

1. Sea Submarine Communications Ltd	200 Nairobi 00606 3748084 3740242
2. Telkom Kenya Limited	30301 Nairobi 00100
3. The East African Marine System Limited	30025 Nairobi 00100 251152

### 3. NETWORK FACILITIES PROVIDER TIER 1

1. Airtel Networks Kenya Limited	73146 Nairobi 00200 0734110000 0734111114
2. Essar Telecom Kenya Limited	45742 Nairobi 00100
3. Safaricom Limited	46350 Nairobi 00100 4373272 4273897
4. Telkom Kenya Limited	30301 Nairobi 00100

## 5. NETWORK FACILITIES PROVIDER TIER 2

1. Alldean Networks Limited	14400 Nairobi 00800 020-3743595 020-3740827
2. Bell Western Limited	49670 Nairobi 00100 722511043/4440169 4447966
3. Comcarrier Satellite Services Limited	41093 Nairobi 00016 312712 330887
4. Fourth Generation Networks Ltd	46941 Nairobi 00100 3258252/3258000 3258222
5. Frontier Optical Networks Limited	57731 Nairobi 00200 2217886 2213582
6. Gateway Telecommunications (Kenya) Limited 1	00560 Nairobi 00101 202414538 +17029771614
7. Internet Solutions Kenya Limited	39519 Nairobi 00623 020-27111400 020-2718418
8. iWayAfrica Kenya Limited	27554 Nairobi 00506 20-2792000 20-2710010
9. Jamii Telecommunications Limited	47419 Nairobi 00100 3975101 3877350
10. Liquid Telecom Kenya Limited	62499 Nairobi 00200 5000000 5000329
11. Kenya Power And Lighting Company Limited	30099 Nairobi 00100 3201650 3751285
12. Kenya Towers Limited	73146 Nairobi 00200 0734110000
13. Mobile Telephone Networks Business Limited	12170 Nairobi 00100 069-88220 069-88221
14. Sea Submarine Communications Limited	200 Nairobi 00606 3748084 3740242
15. Simbanet Com Limited	10286 Nairobi 00100 020-3292000 020-313922
16. Wananchi Group (Kenya) Limited	10286 Nairobi 00100 020-3292000 020-313922
17. Wananchi Telecom Limited	10286 Nairobi 00100 020-3292000 020-313922
18. Callkey (EA) Limited	49778 Nairobi 00100 3650000 3750448
19. Harun International Limited	10972 Nairobi 00400 2226327/311183 340543/2211072
20. Accesskenya Group Limited	43588 Nairobi 00100 3600000 3600001

### 5. NETWORK FACILITIES PROVIDER TIER 3

1. Amazi Group Limited	29717 Nairobi 00100 0722513656
2. Dr. Wireless Limited	2484 Nairobi 00200 2722481
3. Ells Limited	3966 Nairobi 0724504577
4. Embarq Limited	19214 Nairobi 00100 0735-001010
5. Emerging Markets Comm. (K) Limited	61752 Nairobi 00200 0721880412 020-2733242
6. Hirani Telecommunication Limited	33347 Nairobi 00600 07001243007
7. Horyal Services Limited	9121 Nairobi 00200 0713506555
8. Icon Wireless Limited	3860/27775 Nairobi 00506/00100 0722466928
9. Indigo Telecom Limited	1063 Nairobi 00502 0733605939
10. Industrial Technology Trading Company Limited	2083 Nairobi 00200
11. Kasnet Africa Limited	1412 Nairobi 00606 3740854/733718364 3746949
12. Klass Image Limited	72755 Nairobi 00200
13. Rainbow Network Solutions Limited	1291 Nairobi 00700 0720 393388
14. Sovaya Communications Limited	283 Nairobi 00606 03875591 3875891
15. Valleypoint Telecoms Limited	23797 Nairobi 00100 0738202770

### 6. APPLICATIONS SERVICE PROVIDERS

1. 61 Lyle Kenya Limited	14477 Nairobi 00800 020-4442010 020-4442010
2. 64 Next Generation Networks Telecommunications (EA)	26333 Nairobi 00100 0725454238 0773002000
3. 84 Speedial Connections Limited	53514 Nairobi 00200 2245477 221825
4. Access kenya Group Limited	43588 Nairobi 00100 3600000 3600001
5. Adtel Phone Co. Ltd	25636 Nairobi 00603 020-2875000
6. Africa Fleet Management Solutions Limited	48296 Nairobi 00100 0722606641 020-2533613
7. Africa Online	63017 Nairobi 00200 2792000 2710010
8. Airtel Networks Kenya Limited	73146 Nairobi 00200 0734110000 0734111114
9. Airtouch Connections Limited	Nairobi 00800 7459 3747016



10. Aja Limited	53984 Nairobi 00200 0722725775/2059500
11. Alldean Networks Limited	14400 Nairobi 00800 020-3743595 020-3740827
12. Attain Enterprise Solutions Limited	18286 Nairobi 00100 020-828908
13. AU GAB Services	222 Garissa 70100 0463408/ 0736 495047
14. Autoscope International Limited	34792 Nairobi 00100 0751955770
15. Azanuru Technologies Limited	44560 Nairobi 00100 0710656958
16. Backtrack Technologies Limited	64899 Nairobi 00620 0725547585
17. Bandwidth & Cloud Services Limited	856 Nairobi 00606 202667249/0733-478263
18. Bandwidth Providers East Africa Limited	15780 Nairobi 00100 0708676776
19. Bell Western Limited	49670 Nairobi 00100 722511043/4440169 4447966
20. Beneficial Solutions and Technocrats Limited	29879 Nairobi 00202 020-8069214
21. Bernsoft Interactive Limited	965 Nairobi 00606 020-223700 020-229347
22. Birdseye Auto Track Limited	27469 Nairobi 00100 020-2636737 020-313384
23. Boss Communications Company	28919 Nairobi 00200 8068433/721212394 8068433
24. C Hear (K) Limited	38077 Nairobi 00623 0717676867 020-2493846
25. Cable One Limited	22840 Nairobi 00400 0721779966
26. Callkey (E.A) Limited	49778 Nairobi 100 608617/20/21 020-600675
27. Cellulant Kenya Limited	283 Nairobi 00606 0722898393 020-2710988
28. Commcarrier Satellite Services Limited	41093 Nairobi 00100 312712 330887
29. Compfix Data Limited	19102 Nairobi 00501 0721822422 020-3585585
30. Comtec Hosting Solutions Limited	653 Nairobi 00621 7122269 7122481
31. Converged Information Services Limited	1857 Nairobi 00100
32. Craft Silicon Limited	13628 Nairobi 00800 020-4440343 020-4448058
33. Databit Limited	51826 Nairobi 00200 3875727 3875698
34. Diamond Online Satellite Systems	26466 Nairobi 00100 0728015478
35. Digital Distribution Centre (K) Limited	66766 Nairobi 00800 020-8029333
36. Dr. Wireless Limited	2484 Nairobi 00200 2722481 2737832

37. Electronic and Transmission Media Limited	3981 Nairobi 00200 00200 020-2247180
38. Elige Communications Limited	91236 Mombasa 80100 0727584858
39. Ells Limited	3966 Nairobi 20100 0724504577
40. EM Communications Limited	3860 Nairobi 00506 0722466928
41. Embarq Limited	19214 Nairobi 00100 0735-001010
42. Emerging Markets Comm. (K) Limited	61752 Nairobi 00200 0721880412 020-2733242
43. Enterprise Data Freedom Limited	30594 Nairobi 00100 0720-273662
44. Essar Telecom Kenya Limited	45742 Nairobi 00100 020-4441602
45. Eureka Technical Services Limited	49844 Nairobi 00100 0720960752 020-4442337
46. Fanaka Online Limited	4494 Kisumu 40100 0736-296669
47. Finnet Communications Limited	39466 Nairobi 00623 020-219015/221754
48. Finserve Africa Limited	75104 Nairobi 00200 0202262000
49. Flex Communications Limited	8025 Nairobi 00200 0732472687 2044610
50. Fourth Generation Networks Ltd	46941 Nairobi 00100 3258252/722-514774 3258222
51. Frontier Informatics Limited	72686 Nairobi 00200 0727449534 317700
52. Frontier Optical Networks Limited	57731 Nairobi 00200 2217886 2213582
53. Gateway Insurance Company Limited	60656 Nairobi 00200 0719035000
54. Gateway Telecommunications (Kenya)Limited	100560 Nairobi 00101 2414538 +17029771614
55. Geda Limited	8163 Nairobi 00200 4441900/073771717 4441300
56. Gelati Limited	86509 Nairobi 80100 041-2229571
57. Glocal Data Solutions Limited	5004 Nairobi 005060 20 5000613/ 0721 519492/ 057 250668 020 5000614
58. Harun International Limited	10972 Nairobi 00400 2226327/311183 340543/2211072
59. Hausraum Limited	76530 Nairobi 508 0721 368430
60. Hirani Telecommunication Limited	33347 Nairobi 00600 07001243007
61. Horyal Services Limited	9121 Nairobi 00200 0713 506555
62. Hotego Networks Limited	18213 Nairobi 00100 0728-862965
63. Icon Wireless Limited Nairobi	00506/00100 0722466928

64. Indigo Telecom Limited	1063 Nairobi 00502 3876805/8 3876886
65. Industrial Technology Trading Company Limited	67139 Nairobi 00200
66. Instacconnect Limited	40497 Nairobi 00100 0711776675/2318300
67. Internet Solutions Kenya Limited	39519 Nairobi 00623 020-27111400 020-2718418
68. Iphone Global Ltd	59103 Nairobi 00100 020-6750235
69. Itek Solutions Limited	103593 Nairobi 00101 0721981158
70. iWayAfrica Kenya Limited	27554 Nairobi 00506 020-2792000
71. Jadalink Kenya	3255 Nairobi 20100 061-2301180
72. Jamii Telecommunications Limited	47419 Nairobi 00100 3975101 387750
73. JMW Limited	10972 Nairobi 00400 0733418882 020-2211072
74. Karibu Telecom Limited	25636 Nairobi 00603 2725588/2875146 020-2710540
75. Kasnet Internet Services Limited	1412 Nairobi 00606 3740854/39/ 3746949
76. Kentrace And Accessories	8190 Karatina 10101 2691044
77. Kinde Engineering Works Limited	6911 Nairobi 00300 2308401/722309271 2308401
78. Kingsway Autowatch Limited	37935 Nairobi 00100 0721951499
79. Klass Image Limited	72755 Nairobi 00200 0722553992/717555740
80. Lantech (Africa) Limited	6384 Nairobi 00200 0712210645/316778 316747
81. Linkers International Limited	12855 Nairobi 00100 2211199
82. Liquid Telecom Kenya Limited	62499 Nairobi 00200 5000000 5000329
83. Mobile one to one limited	42498 Nairobi 00100 0722715836
84. Mobile Pay Limited	69768 Nairobi 00400 0722690000 828074
85. Mobile Telephone Networks Business Kenya 86. Limited	12170 Nairobi 00100 020-6988000
87. Mount Kenya Online	NAIROBI 02-560456/0733664257 02-560456
88. Nairobinet (K) Limited	61758 Nairobi 00200 217406 243512
89. Nia Moja Business Solutions (K) Limited	2589 Nairobi 00100 2727691 2727691
90. Ninewinds Communications Limited	45237 Nairobi 00100 3547255

91. Nirali Enterprises Limited	4858 Nairobi 00200 0725-202504 651395
92. Ocean Five Telecom Kenya Limited	26648 Nairobi 00504 553298
93. Octopus Ict Solutions Limited	17745 Nairobi 00100 2731294 2731295
94. Onmobile Kenya Telecoms Limited	30029 Nairobi 00100 0786333363
95. Orca Bay Data Solutions Limited	15352 Nairobi 00100 0723772825 317764
96. Oyster Enterprises Limited	20014 Nairobi 00200 0722705545
97. Plans Online (k) Limited	2713 Meru 60200 0722352879
98. Porting Access (K) Limited	50330 Nairobi 00200 2221225 2221224
99. Pwani Telecoms Limited	87200 Mombasa 80100 041-229339 229308
100. Rainbow Network Solutions Limited	1291 Nairobi 00700 0720 393388
101. Rasmilink	1584 Nairobi 00100 6767668/722529199 6760488
102. Safaricom Limited	46350 Nairobi 00100 4373272 473897
103. Sahanet Limited	16827 Nairobi 00100 219935/39 249725
104. Sat Africa Limited	5563 Nairobi 00200 020-2714894
105. Sea Submarine Communications Limited	200 Nairobi 00606 3748084 3740242
106. Servtel Communications Limited	80085 Mombasa 80100 3748844 41-2228351
107. Sisi Communications Limited	60770 Nairobi 00200 0722382995
108. SITA	47339 Nairobi 00100 020-2711172 020-2715971
109. Sovaya Communications Limited	283 Nairobi 00606 3875591 3875891
110. Suuban Enterprises	71809 Nairobi 00622 0722-339779
111. Telkom Kenya Limited	30301 Nairobi 00100 020-4952001
112. Texas Alarms Kenya Limited	81711 Nairobi 80100 0733411500 041-472455
113. Tiben Technologies Company Limited	30868 Nairobi 00100 0722152406
114. Total Security Surveillance Limited	4243 Nairobi 00506 2721218/722999494 2721330
115. Toucan Network Limited	12474 Nairobi 00100 020-4442785 020-4442785
116. Tracer Limited	39348 Nairobi 00623 0721400707/3864520

117. Tracesoft Limited	24147 Nairobi 00100 2061788
118. Track & Trace Limited	52435 Nairobi 00200 0720844638
119. Tuseme Africa Limited	14472 Nairobi 00800 8009252 2010162
120. Universal Connect Limited	9423 Nairobi 00100 3000000/ 0724 253512 20 300 900
121. UUNET Kenya Limited	12170 Nairobi 00100 060-88220 069-88221
122. Uvacorp Technologies Limited	57522 Nairobi 00200 020-3865698
123. Valleypoint Telecoms Limited	23797 Nairobi 00100 0738202770
124. VirtualSat Limited	76460 Nairobi 00508 020-3872191/722204769
125. Vision Network Solutions Africa Limited	43496 Nairobi 00100 0722512134
126. VOIP Pro(K) Ltd	24709 Nairobi 00100 2046699/733604003
127. Wananchi Group Kenya Limited	10286 Nairobi 00100 020-3292000 020-313922
128. Web Tribe Limited	23675 Nairobi 00100 2716818, 2215366, 0722843812 2710540
129. Wifismartzone Solutions	95024 Nairobi 80104 0733 891174
130. Wingu Technologies Limited	2484 Nairobi 00200 0722659251
131. Xtranet Communications Limited	1330 Nairobi 00600 0722-411826/4441062 4441062
132. Zioncell Kenya Limited	30021 Nairobi 00100 0733910206

## 7. CONTENT SERVICE PROVIDERS

1. Adtel Phone Company Limited	25636 Nairobi 00603 2719011/2711523/2716818 2710540
2. Advanta Africa Limited	1035 Nairobi 00200 2319990/0724314614
3. Africa Online Limited	63017 Nairobi 00200 2792000 2710010
4. Africastalking (K) Limited	28044 Nairobi 00100 0726854063
5. Africom Media Limited	4385 Nairobi 00100 0701334455 020-3505079
6. Airtel Networks Kenya Limited	9689 Nairobi 00100 2049300
7. Airtouch Connections Limited	66337 Nairobi 00800 0752117459 3747016
8. Aja Limited	53984 Nairobi 00200 0722725775 2059500
9. Allogy Africa International Limited	66746 Nairobi 00800 0722348190

10.	Altruist Technologies Limited	30333 Nairobi 00100 0722523767
11.	Amazi Group Limited	29717 Nairobi 00100 0722513656
12.	Attain Enterprise Solutions Limited	18286 Nairobi 00100 828908
13.	Awesome Solutions Limited	2145 nairobi 00200 0721986231
14.	Beats Creations Limited	41893 Nairobi 00100 0722919852 3512896
15.	Bell Western Limited	49670 Nairobi 00100 0722511043/4447966
16.	Bernsoft Interactive Limited	965 Nairobi 00606 223700 229347
17.	Betran International Limited	15819 Nairobi 00100 0722522877
18.	Better Short Messages Services	27464 Nairobi 00100 0722914105
19.	Beverly Technologies Limited	26769 Nairobi 00100 0722600475
20.	Billsoft Services Limited	1053 Nairobi 00518 0720938700 2350999
21.	Bison Infotech (K) Limited	1265 Nairobi 00600 0720554954
22.	Bitz IT Consulting Limited	58132 Nairobi 00200 07200550693 2679693
23.	Brandkey Marketing Limited	27 Nairobi 00517 0726087393 8014502
24.	Business Value Partners Limited	74768 Nairobi 00200 0722615321 020-712904
25.	C Hear Kenya Limited	38077 Nairobi 00623 0717676867 020-2493846
26.	Cable One Limited	22840 Nairobi 00400 0721779966 230657
27.	Cashswift Limited	10971 Nairobi 00100 0727960960 2220635
28.	Cellink Limited	6834 Nairobi 00100 0722600942
29.	Cellnet Service Provider	75963 Nairobi 00200 020-2743400 020274444
30.	Cellulant Kenya Limited	283 Nairobi 00606 0722712003 020-2710988
31.	Ceva Limited	7731 Nairobi 00100 821300/1/2 821303
32.	Challa Telecommunications Limited	57054 Nairobi 00200 0722512534
33.	Cilcom Limited	70128 Nairobi 00400 0722352669
34.	Clickatell Kenya Limited	3085 Nairobi 00100 07219107700
35.	Commcarrier Satellite Services Limited	41093 Nairobi 00100 312712 330887
36.	Computer Castles Limited	74655 Nairobi 00200 0728484326

37.	Comtec Hosting Solutions Limited	653 Nairobi 00621 7122269/7122481
38.	Connect Media Interactive Company Limited	1161 Nairobi 00200 0714533967
39.	Control-Tech Limited	17659 Nairobi 00500 2011961 553254
40.	Coretec Systems and Solutions Limited	10067 Nairobi 00100 0722910539 601267
41.	Council For Science & Technology	30623 Nairobi 00100 0722782246 2213215
42.	Craft Silicon Limited	13628 Nairobi 00800 44403/4448058
43.	Cross Gate Solutions Limited	175 Nairobi 00606 0722988175
44.	Data Impact Limited	10098 Nairobi 00100 0721464426
45.	Data SMS (Kenya) Limited	45860 Nairobi 00100 020-2230182
46.	Databit Limited	51826 Nairobi 00200 3875727/3875698
47.	Datalex Limited	69853 Nairobi 00400 0725733050
48.	Digital Africa Services Limited	74450 Nairobi 00200 2635255/0721428431 2731323
49.	Digital Media Aggregator Limited	270 Nairobi 00100 0770617409/2044645
50.	Digital Works Limited	35140 Nairobi 00100 2103829/0732985819
51.	Discovery Products (EA)Limited	22873 Nairobi 00100 0722630995
52.	Eclectics International Limited	21605 Nairobi 00505 020-2710274
53.	EM Communications Limited	3860 Nairobi 00506 0722466928
54.	Enable-It Limited	19582 Nairobi 00100 0704422211
55.	Enfinite Africa Communication Limited	989 Nairobi 00100 22200224/3533775 240420
56.	Envisage Multimedia Limited	55690 Nairobi 00200 0733600627/533727
57.	Eskay Communications	75380 Nairobi 00200 0722674170 310851
58.	Essar Telecom Kenya Limited	45742 Nairobi 00100
59.	Etiquet Solutions Limited	45689 Nairobi 00100 2243097
60.	Finamann Solutions Limited	1217 Nairobi 00200 0722322061/2213220
61.	Finserve Africa Limited	75104 Nairobi 00200 0202262000
62.	Flex Communications Limited	8025 Nairobi 00200 0732472687 2044610
63.	Flint East Africa Limited	28919 Nairobi 00200 0722311973 2711901

64.	Fone Planet Limited	12726 Nairobi 00400 0714225456
65.	For a Twenty Twelve Limited	42043 Nairobi 00100 0720440000/0786440000
66.	Fourth Generation Networks Ltd	46941 Nairobi 00100 3258252 7325222
67.	Frontier Informatics Limited	72686 Nairobi 00200 0727449534 317700
68.	Frontier Optical Networks Limited	57731 Nairobi 00200 2217886 2213582
69.	Frotcom E.A Limited	15011 Nairobi 00100 2445797/0727654111 2725761
70.	Fulbrite Systems	79518 Nairobi 00200 2216481/722525822 2245816
71.	Gakk East Africa Limited	76658 Nairobi 00508 0722517099 020-3875634
72.	Gamerswild Limited	74937 Nairobi 00200 0722204400 020-20550958
73.	Gemix Company (E.A) Limited	1080 Nakuru 20100 0704089337
74.	Global Messaging Services Limited	368 Nairobi 00202 0722217632
75.	Global Technologies Limited	67290 Nairobi 00200 0722540620
76.	Glocal Data Solutions Limited	5004 Nairobi 00506 0721519492 020-5000614
77.	Goldrock Capital Limited	12911 Nairobi 00400 0720720720
78.	Guliyo Limited	13726 Nairobi 00100 0722673727 2213498
79.	Harnssen Kenya Limited	71666 Nairobi 00100 0722736626
80.	Harun International Limited	10972 Nairobi 00400 2226327/311183 340543/2211072
81.	Hausraum Limited	168 76530 Nairobi 19010721 368430
82.	HomeBoyz Entertainment Limited	20774 Nairobi 00202 0722723989/553954
83.	Hotspot Two Five Four Limited	68113 Nairobi 00200 2716568 2733267
84.	Industrial Technology Trading Company Limited	67139 Nairobi 00200
85.	Infiniti Capital Limited	20981 Nairobi 00100 0722411004/2519794
86.	Infobip Kenya Limited	26333 Nairobi 00100 0729774383
87.	Infolink Communications Limited	72239 Nairobi 00200 0720615002
88.	Information Convergence Technologies Limited	11797 Nairobi 00100 3754286 3742457
89.	Instaconnect Limited	40497 Nairobi 00100 0711776675 2318300
90.	Intellect Group Limited	14029 Nairobi 00800 020-2538742 020-4442010



91. Intelligent Contact Solutions Limited	4720 Nairobi 00200 0722339068/0725834714 2012896
92. Interactive Media Services Limited	61823 Nairobi 00200 341555 341530
93. Intergrat Limited	59229 Nairobi 00100 0723281732/204435
94. Internet Protocol Extreme Company Limited	54041 Nairobi 00200 0727769613
95. Internet Solutions Kenya Limited	39519 Nairobi 00623 27111 27184
96. IT Dolls Investment Limited	5282 Nairobi 00100 07213445
97. iWayAfrica Kenya Limited	27554 Nairobi 00506 2792000
98. Jambopay Express Limited	10723 Nairobi 00100 0720119813
99. Jamii Telecommunications Limited	47419 Nairobi 00100 3975101 387750
100. Jet Telecommunications Services Network Ltd	40032 Nairobi 00100 0722310304
101. Karibu Telecom Limited	25636 Nairobi 00603 2725588 2710540
102. Kasnet Internet Services Limited	1412 Nairobi 00606 3740854/33746949
103. Kenya Commercial Bank Limited	484000 Nairobi 00100 0722207345 2244965
104. Kenya Postel Directories Limited	10810 Nairobi 00100 226263 223526
105. Kenya Premium Services Limited	39380 Nairobi 00623 0733938333
106. Kenya School Of Technology Studies Limited	3064 Nairobi 00100 020-2400414/0711-
107. Kenya Solid Limited	48841 Nairobi 00100 0720571630
108. Kinde Engineering Works Limited	6911 Nairobi 00300 2308401 72308401
109. Klass Image Limited	72755 Nairobi 00200 0722553992 717555740
110. Kundi Comms Kenya Limited	18942 Nairobi 00100 0723281732
111. Lantech Africa Limited	6384 Nairobi 00200 071221064/316747
112. Leopard Communications Limited	48280 Nairobi 00100 556300 551389
113. Liberty Afrika Technologies Limited	12911 Nairobi 00400 0722841068 313974
114. Linkers International Limited	12855 Nairobi 00100 0711649032/2211199 2217120
115. Liquid Telecom Kenya Limited	62499 Nairobi 00200 5000000 5000329
116. Local Authorities Provident Fund	79592 Nairobi 00200 0714606998/3589105 2405765
117. Lyle Kenya Limited	14477 Nairobi 00800 0720552222 4442010

118. Magic Touch Technologies Limited	12708 Nairobi 00100 0729440006 2721561
119. Magnum Limited	66040 Nairobi 00800 0724348990
120. Metropolitan Teachers Sacco Ltd	871 Nairobi 00200 0721-703126 066-2022007
121. MIS Solutions Limited	48625 Nairobi 00100 020 2023200 020 2471566
122. Mkononi Limited	15177 Nairobi 00100 0722583377/2149404
123. Mobalert Kenya Limited	63117 Nairobi 00619 3010453/736-777999
124. Mobi Tech Technologies Limited	67679 Nairobi 00200 0710434259
125. Mobicord Cellular Technologies Limited	56465 Nairobi 00200 0724802916
126. Mobikash Africa Limited	101123 Nairobi 00101 020 8034376
127. Mobile Accord Limited	4857 Nairobi 00506 0722458416
128. Mobile Financial Solutions Limited	43250 Nairobi 00100 0725065238
129. Mobile Money Technology Limited	49387 Nairobi 00100 0722520797
130. Mobile Pay Limited	69768 Nairobi 00400 0722690000 828074
131. Mobile Platform Solution Limited	61358 Nairobi 00200 0722447938 2728715
132. Mobile Strategies Limited	47784 Nairobi 00100 0722707073
133. Mobile Zone Wireless Limited	22585 Nairobi 00100 0713161567 242514
134. Mokonge Limited	16081 Nakuru 20100 0721707151
135. Nairobinet (K) Limited	61758 Nairobi 00200 217406 243512
136. Nation Infotech Limited	49010 Nairobi 00100
137. National Bank of Kenya Limited	72866 Nairobi 00200 0711038000
138. Naval Logistics International Limited	5128 Nairobi 00100 0722576929
139. Newtech Africa Limited	3394 Nairobi 00200 020-2212930
140. Ngeria Managed Services Limited	25969 Nairobi 00100 0726671387
141. Nia Moja Business Solutions (K) Limited	2589 Nairobi 00100 2727691 2727691
142. Olive Tree Media Limited	7334 Nairobi 00100 0721881969
143. Onfon Media Limited	270 Nairobi 00100 0722261388 0738935666
144. Online BIZ Kenya Limited	196 Kikuyu 00902 0724119360 2715429

145. Onmobile Kenya Telecom Limited	30029 Nairobi 00100 0786333363
146. Oyster Enterprises Limited	20014 Nairobi 00200 0722705545
147. Peace and Development Network Trust	49806 Nairobi 00100 020-2725271 020-2725270
148. Pendo Media Limited	41516 mombasa 80100 0751443379
149. Philanthia Centre of Kenya Limited	59016 Nairobi 00200 0724808093 020-6007493
150. Pillars Holdings Limited	6493 Nairobi 00100 4347436/711565441
151. Plus Point Limited	41825 Mombasa 80100 0722412379 020-2230084
152. Prime Outdoor Network Limited	52937 Nairobi 00200 3866600/01 3866601
153. Procom (K) Limited	50511 Nairobi 00100 0722951724
154. Qasiida Technologies Limited	234 Nairobi 00160 720-333222/2251587 2251587
155. Rainbow Network Solutions Limited	1291 Garissa 00700
156. Rapid Communications Limited	593 Nairobi 00606 0721-533045 020-4453801
157. Raven Limited	913 Nairobi 00606 0722832541
158. Reliance Courier Services Limited	5179 Nairobi 00100 020-2214392
159. Reward And Recognition Limited	705 Nairobi 00517 020-2713052 020-2602688
160. Ricksmiles Enterprises Limited	768 Kikuyu 00902 0721640369
161. Risk Link Agency Limited	52725 Nairobi 00200 0724308773
162. Roamtech Solutions Limited	1145 Nairobi 00606 0751-362044
163. Safaricom Limited	46350 Nairobi 00100 4373272 4273897
164. Sea Submarine Communications Limited	200 Nairobi 00606 3748084 3740242
165. Searchit Limited	101911 Nairobi 00101 0722455584
166. Shujaa Solutions Limited	48183 Nairobi 00100 020 4449602
167. Siltech Systems Limited	25269 Nairobi 00603 020-2720510 020-2721236
168. Sky World Limited	50455 Nairobi 00100 0721913958
169. Smart Pen Productions	7117 Nairobi 00100 020-3750121 020-3750171
170. SmsgH Solutions Limited	101650 Nairobi 00100 0735411886
171. Socialcom Limited 0723772888	25332 Nairobi 00100
172. Software Group KE Limited	28804 Nairobi 00100 0722139629

173. Solami Limited	1145 Nairobi 00606 0724297066
174. Solunet Business Solutions Limited	17899 Nairobi 00100 0711-029100/0726-087393 National
175. Source Code Limited	103722 Nairobi 00101 0735004000
176. Spice Vas Kenya Limited	46683 Nairobi 00100 020 3555065
177. Sproxil East Africa Limited	38871 Nairobi 00623 0720630059
178. Standard Chartered Bank Limited	30003 Nairobi 00100
179. Star Digit Limited	76542 Nairobi 00508 020-3673988
180. Stonewood Enterprises limited	18248 Nairobi 00100 0722711051
181. Sunberry Communications Limited	18221 Nairobi 00100 057-2523211
182. Symbiotic Media Consortium Limited	25044 Nairobi 00100 0721669709
183. Talanta Africa Media Telecommunication	5468 Nairobi 00200 0731555314 0204452816
184. Tangazoletu Limited	60214 Nairobi 00200 0722298429 020-201187
185. Tech Pitch Limited 35954 Nairobi	00200 0722517279 020-2711442
186. Teleworth Communications Limited	8145 Nairobi 00200
187. Telkom Kenya Limited	30301 Nairobi 00100
188. Tentacle Communications Limited	35332 Nairobi 00100 0722584757
189. Texteleza Solution Limited	50425 Nairobi 00200 020 2120737
190. The Standard Group Limited	30080 Nairobi 00100 0722 203730 243323
191. Tilil Technologies Limited	18990 Nairobi 00500 0723169938
192. Top Brands Limited	14040 Nairobi 00800 0729876846
193. Transport Users Association	5118 Nairobi 00100 0722566622
194. True African (k) Limited	5665 Nairobi 00100 315897/8 222061
195. Ubuntu ON Line Limited	406 Nairobi 00502 020 2493484
196. Uchumi Supermarkets Limited	73167 Nairobi 00200 020 2041267 020 554768
197. Ultinet Limited	10953 Nairobi 00100 0722970718
198. Unaitas Sacco Society Limited	1145 Nakuru 10200 0721244139 060-2030058
199. Unique Global Ideas Limited	45339 Nairobi 00100 0722668198
200. Urban IT Consulting Limited	7662 Nairobi 00200

201. User Experience Technologies Limited	12971 Nairobi 00100 0712839579
202. Valleypoint Telecoms Limited	23797 Nairobi 00100 0738202770
203. Vasonomics (Kenya) Limited	18945 Nairobi 00100 0716889083
204. Verse Innvation Private Limited	30029 Nairobi 00100 0722658486
205. Virtual City Limited	76460 Nairobi 00508
206. Virtual Mobile Limited	76460 Nairobi 00508 0722204769 020-3876248
207. Vivacom Limited	8500 Nairobi 00100 0716568981
208. Voice and Data Interactive Limited	11463 Nairobi 00100
209. Wabcom Technologies Limited	862 Nakuru 20100 0722-629153
210. Wananchi Group (Kenya) Limited	10286 Nairobi 00100 020-3292000 020-313922
211. Wasp Africa Limited	34017 Nairobi 00100
212. Waterfall Communication Limited	304 Nairobi 00610 0728815555
213. Web Tribe Limited	23675 Nairobi 00100 020 2215366
214. Wilfred & Eugene Branding Solutions Limited	28661 Nairobi 00100 0707889899
215. World Phone Limited	27646 Nairobi 00100 0721-554937
216. Xemba Africa Limited	25232 Nairobi 00100 0733680950/0720544249
217. Xpedia Management Limited	12911 Nairobi 00400 0720720720 020-3745970
218. Xtranet Communications Limited	1330 Nairobi 00600 722-411826 4441062
219. Zesa Future Limited	73748 Nairobi 00200
220. Zioncell Kenya Limited	30021 Nairobi 00100 0733910206

**Source: Communications Authority of Kenya, June 2015**

**Appendix 5: Table for Determining Appropriate Sample Size**

*Table for Determining Sample Size from a Given Population*

<i>N</i>	<i>S</i>	<i>N</i>	<i>S</i>	<i>N</i>	<i>S</i>
10	10	220	140	1200	291
15	14	230	144	1300	297
20	19	240	148	1400	302
25	24	250	152	1500	306
30	28	260	155	1600	310
35	32	270	159	1700	313
40	36	280	162	1800	317
45	40	290	165	1900	320
50	44	300	169	2000	322
55	48	320	175	2200	327
60	52	340	181	2400	331
65	56	360	186	2600	335
70	59	380	191	2800	338
75	63	400	196	3000	341
80	66	420	201	3500	346
85	70	440	205	4000	351
90	73	460	210	4500	354
95	76	480	214	5000	357
100	80	500	217	6000	361
110	86	550	226	7000	364
120	92	600	234	8000	367
130	97	650	242	9000	368
140	103	700	248	10000	370
150	108	750	254	15000	375
160	113	800	260	20000	377
170	118	850	265	30000	379
180	123	900	269	40000	380
190	127	950	274	50000	381
200	132	1000	278	75000	382
210	136	1100	285	100000	384

Note.—*N* is population size.  
*S* is sample size.

Krejcie, Robert V., Morgan, Dayle W., *Determining Sample Size for Research Activities: Educational and Psychological Measurements*, 1970

## Appendix 6: Sample Adequacy Tests

### KMO and Bartlett's Test for Electronic Marketing Practices

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.791
Bartlett's Test of Sphericity	Approx. Chi-Square	953.293
	df	153
	Sig.	.000

### KMO and Bartlett's Test Corporate Culture

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.724
Bartlett's Test of Sphericity	Approx. Chi-Square	3130.549
	df	1540
	Sig.	.000

### KMO and Bartlett's Test Competitive Environment

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.749
Bartlett's Test of Sphericity	Approx. Chi-Square	839.161
	df	435
	Sig.	.000

### KMO and Bartlett's Test Organizational Performance

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.769
Bartlett's Test of Sphericity	Approx. Chi-Square	930.668
	df	351
	Sig.	.000

## Appendix 7: Supplementary Statistical Analyses

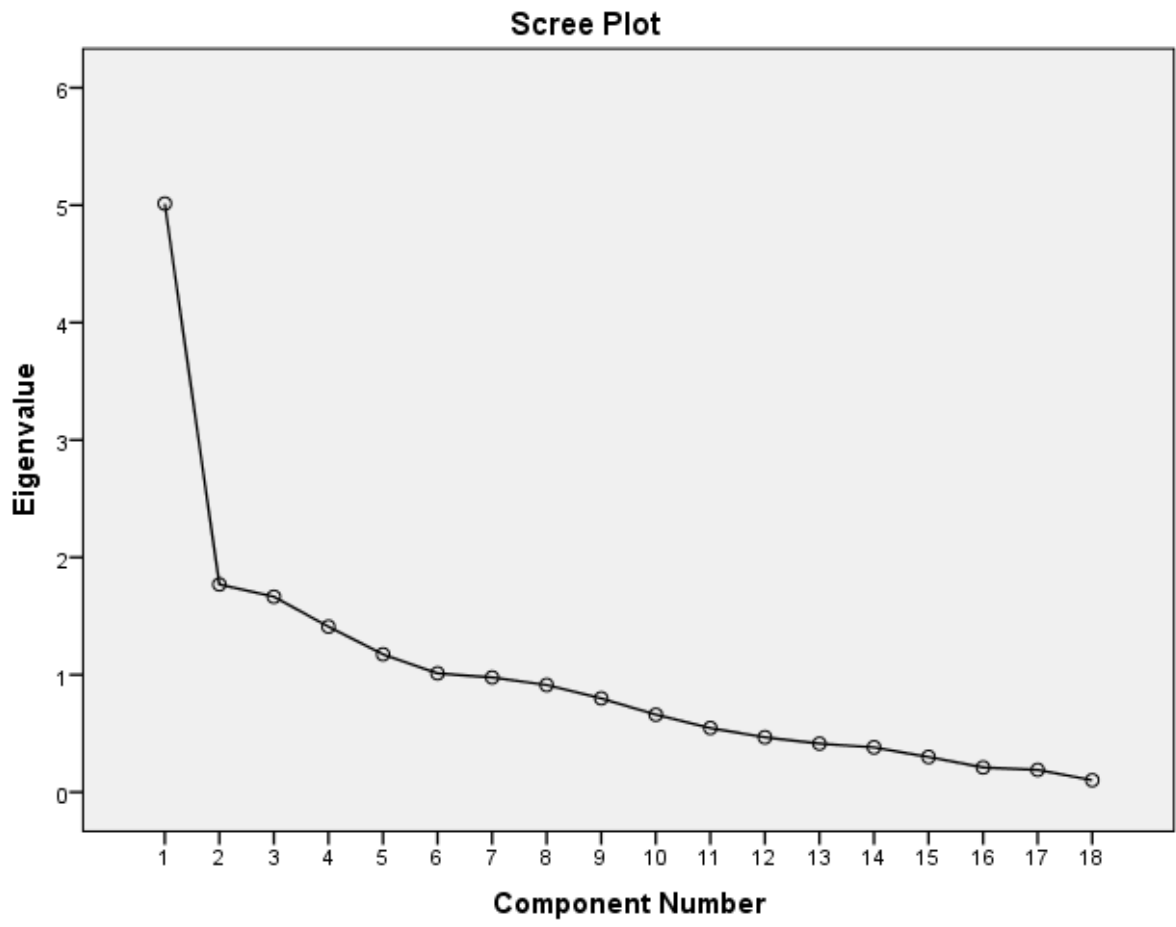
**Table A1: Factors Analysis Results for E-marketing Practices**

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	5.014	27.855	27.855	5.014	27.855	27.855	3.840	21.332	21.332
2	1.769	9.830	37.685	1.769	9.830	37.685	2.751	15.285	36.617
3	1.665	9.250	46.935	1.665	9.250	46.935	1.590	8.832	45.450
4	1.410	7.832	54.767	1.410	7.832	54.767	1.488	8.267	53.717
5	1.174	6.522	61.289	1.174	6.522	61.289	1.283	7.130	60.847
6	1.012	5.622	66.911	1.012	5.622	66.911	1.092	6.064	66.911
7	.977	5.427	72.338						
8	.913	5.071	77.409						
9	.799	4.437	81.846						
10	.660	3.667	85.513						
11	.546	3.033	88.546						
12	.467	2.596	91.142						
13	.413	2.292	93.435						
14	.381	2.117	95.552						
15	.299	1.663	97.215						
16	.210	1.167	98.383						
17	.189	1.053	99.435						
18	.102	.565	100.000						

**Extraction Method: Principal Component Analysis.**



**Chart A1: Scree Plot for E-marketing Practices**



**Table A2: Rotated Component Matrix for E-marketing Practices**

	Component					
	1	2	3	4	5	6
active, Interactive Website	.867	.172	.007	.030	.137	-.017
Internet Adverts	.652	.114	.088	.023	.026	.308
Reduced Mktg Expense	.298	.339	.168	.053	.284	-.105
Online Advertising Cheaper	.266	-.103	.029	-.078	.492	-.159
More customer Enquiries	.279	.119	.176	.004	.475	-.166
Personnel for Online Marketing	.726	.050	.042	.012	.197	.132
Adverts on Other company's Websites	.821	.170	.034	-.011	.175	-.048
Online Adverts Always	.737	.454	.023	-.045	.054	-.031
Social Media Use	.690	.136	.055	.039	-.218	-.181
MkIS Employed	.318	.867	.022	-.031	.038	.034
Mktg Qualitative Research	.211	.918	-.009	.011	.040	-.027
Customer Views Online	.072	.836	.057	.011	-.006	-.012
Telephone and Mobile Use	.040	.092	.870	-.001	-.006	-.067
SMS Application	.077	-.011	.860	-.093	.056	.029
Customers Feedback by SMS	-.066	.028	-.037	.860	.033	.035
Less Spend on SMS	.110	-.027	-.052	.850	-.077	-.085
Wider reach on SMS	.156	-.082	.099	-.009	-.761	-.178
Digital Screens Used	.081	-.041	-.040	-.050	-.069	.912

Extraction Method: Principal Component Analysis.

Rotation Method: Varimax with Kaiser Normalization.

a. Rotation converged in 6 iterations.

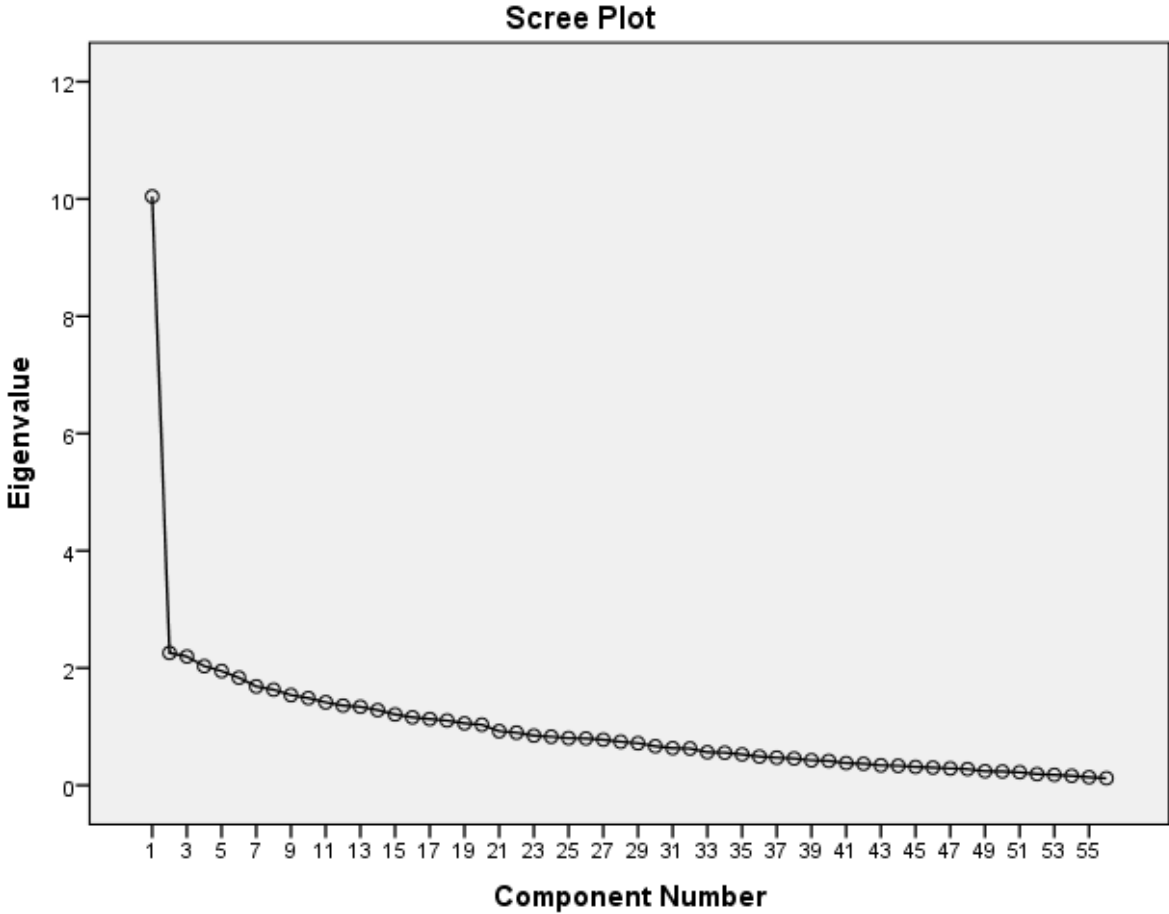
**Table A3: Factors Analysis Results for Corporate Culture**

Component	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	9.060	16.178	16.178	3.224	5.757	5.757
2	3.201	5.717	21.894	3.110	5.553	11.310
3	2.590	4.626	26.520	3.058	5.461	16.770
4	2.283	4.078	30.598	2.728	4.871	21.642
5	2.127	3.798	34.396	2.615	4.669	26.311
6	1.921	3.430	37.826	2.555	4.562	30.873
7	1.862	3.325	41.151	2.329	4.159	35.033
8	1.762	3.147	44.298	2.158	3.853	38.886
9	1.615	2.883	47.181	2.067	3.692	42.577
10	1.541	2.751	49.932	2.062	3.682	46.259
11	1.450	2.590	52.522	1.987	3.547	49.807
12	1.389	2.480	55.002	1.744	3.115	52.922
13	1.321	2.358	57.361	1.690	3.017	55.939
14	1.261	2.251	59.612	1.638	2.926	58.865
15	1.189	2.122	61.734	1.607	2.870	61.734
16	1.099	1.962	63.696			
17	1.075	1.920	65.617			
18	1.022	1.825	67.441			
19	1.002	1.790	69.231			
20	.945	1.687	70.918			
21	.887	1.584	72.502			
22	.866	1.547	74.049			
23	.825	1.473	75.522			
24	.787	1.406	76.928			
25	.776	1.385	78.314			
26	.721	1.288	79.601			
27	.702	1.254	80.856			
28	.677	1.209	82.065			
29	.646	1.154	83.219			
30	.602	1.074	84.294			
31	.577	1.030	85.324			
32	.565	1.009	86.333			
33	.548	.978	87.311			

34	.511	.913	88.224			
35	.510	.911	89.135			
36	.480	.857	89.992			
37	.456	.813	90.805			
38	.439	.783	91.589			
39	.417	.744	92.333			
40	.388	.692	93.025			
41	.382	.682	93.707			
42	.360	.643	94.351			
43	.313	.559	94.909			
44	.302	.540	95.449			
45	.276	.493	95.942			
46	.272	.485	96.427			
47	.252	.451	96.878			
48	.247	.441	97.319			
49	.235	.419	97.738			
50	.219	.391	98.129			
51	.214	.382	98.512			
52	.204	.364	98.876			
53	.190	.339	99.215			
54	.164	.294	99.508			
55	.150	.267	99.775			
56	.126	.225	100.000			

Extraction Method: Principal Component Analysis.

**Chart A2: Scree Plot for Corporate Culture**



**Table A4: Rotated Matrix for Corporate Culture**

**Rotated Component Matrix<sup>a</sup>**

	Component									
	1	2	3	4	5	6	7	8	9	10
Departmental Organization	.754	.018	.226	.110	-.027	.140	.096	.101	.102	-.167
Managers Head Departments	.749	-.103	.057	.071	.200	.064	.028	.164	.253	.013
Employee Job Descriptions	.455	-.205	.181	.320	-.173	-.050	.068	.028	-.093	.370
Orgn Structure Adjusted	.264	.140	.539	-.163	.017	.248	.130	.041	-.015	-.171
Systems, Policies, Procedures available	.731	.148	.109	-.119	.144	.072	.081	.164	.119	-.086
Information Technology Systems	.239	-.016	.166	-.096	-.048	.148	.047	.112	.679	.050
System Reviews Done	.352	.253	.014	.093	-.280	.007	.109	.485	.393	.121
Evaluation and Appraisals Done	.895	.170	.080	-.041	.228	.029	.099	.140	.098	.041
Reward systems Applied	.412	.076	-.208	.245	.203	.184	-.200	.031	-.263	-.052
Stable Systems for sustainability	.362	-.141	.398	-.111	.365	.269	-.069	-.058	.065	.009
Innovations Reward Systems	.909	.143	.149	.066	.113	.111	.085	.123	-.002	.042
Bureacratic Systems Aligned	.336	.020	.159	-.185	.111	.267	.158	-.082	-.025	.522
Systems for Reputation	.086	-.041	.144	.262	.617	.044	.032	.056	-.080	.023
CEO Open Door Policy	.227	.397	.106	.236	.128	-.179	.348	.177	-.064	-.088
Dept Heads explain Jobs	.825	.218	.200	.016	-.043	.058	.076	.119	-.061	-.091
Dept Heads Consultative	.076	.535	.050	.239	.145	.247	.000	.139	.104	-.161
Management Decisive	.319	.099	.063	.026	.000	-.095	.694	.088	.150	.002
Management support Goal Achievement	.340	.020	.061	.164	.200	.258	-.213	.425	.048	.248

<b>High Expectations on Performance Stakeholders emphasized Company Customer Focused Employee Inputs in Decisions Rewards on Performance Staff Adequacy Staff Qualified Staff analytical and Initiative Staff appraisal systematic Mngt People Oriented and Respectful Risk and Error tolerated Staff Aggressive and Quick Mngt encourage Calmness and Care in tasks Employment Security Company focuses on Skills Skills Expected spelt for all Positions Skill Gap analysis undertaken Mngt invests on Skills Develomnet Training Programme documented</b>	<b>.837</b>	<b>.008</b>	<b>-.031</b>	<b>-.034</b>	<b>.362</b>	<b>.066</b>	<b>.102</b>	<b>.141</b>	<b>.191</b>	<b>.043</b>
	<b>.338</b>	<b>.303</b>	<b>-.044</b>	<b>-.097</b>	<b>.142</b>	<b>.504</b>	<b>.142</b>	<b>-.071</b>	<b>-.031</b>	<b>-.176</b>
	<b>.222</b>	<b>-.112</b>	<b>.063</b>	<b>-.165</b>	<b>-.005</b>	<b>.073</b>	<b>.053</b>	<b>-.046</b>	<b>-.010</b>	<b>-.674</b>
	<b>.828</b>	<b>.098</b>	<b>.154</b>	<b>.030</b>	<b>.160</b>	<b>.044</b>	<b>.146</b>	<b>.095</b>	<b>.002</b>	<b>.001</b>
	<b>.112</b>	<b>.087</b>	<b>.023</b>	<b>.079</b>	<b>-.068</b>	<b>.673</b>	<b>-.144</b>	<b>-.053</b>	<b>.279</b>	<b>.120</b>
	<b>.218</b>	<b>.606</b>	<b>.038</b>	<b>-.099</b>	<b>-.037</b>	<b>.032</b>	<b>.109</b>	<b>-.088</b>	<b>.023</b>	<b>.190</b>
	<b>.830</b>	<b>.247</b>	<b>.105</b>	<b>.077</b>	<b>.038</b>	<b>.033</b>	<b>.018</b>	<b>-.058</b>	<b>.116</b>	<b>-.069</b>
	<b>.187</b>	<b>.118</b>	<b>-.015</b>	<b>.338</b>	<b>.204</b>	<b>.130</b>	<b>.151</b>	<b>-.115</b>	<b>.434</b>	<b>-.289</b>
	<b>.825</b>	<b>.074</b>	<b>-.061</b>	<b>.003</b>	<b>.257</b>	<b>.082</b>	<b>.234</b>	<b>.152</b>	<b>.143</b>	<b>.051</b>
	<b>.107</b>	<b>.101</b>	<b>.016</b>	<b>.603</b>	<b>.076</b>	<b>.057</b>	<b>.006</b>	<b>.057</b>	<b>-.104</b>	<b>.009</b>
	<b>.293</b>	<b>-.192</b>	<b>.320</b>	<b>.238</b>	<b>-.042</b>	<b>.023</b>	<b>.214</b>	<b>.308</b>	<b>-.044</b>	<b>-.032</b>
	<b>.802</b>	<b>.227</b>	<b>.235</b>	<b>.071</b>	<b>-.075</b>	<b>.060</b>	<b>.031</b>	<b>-.004</b>	<b>.049</b>	<b>.051</b>
	<b>.667</b>	<b>.326</b>	<b>.051</b>	<b>.180</b>	<b>-.138</b>	<b>.007</b>	<b>.006</b>	<b>-.173</b>	<b>.018</b>	<b>-.040</b>
	<b>.105</b>	<b>.425</b>	<b>.149</b>	<b>-.035</b>	<b>.005</b>	<b>.064</b>	<b>.133</b>	<b>.052</b>	<b>-.343</b>	<b>.157</b>
	<b>.741</b>	<b>.343</b>	<b>.115</b>	<b>-.011</b>	<b>-.024</b>	<b>.099</b>	<b>-.002</b>	<b>.016</b>	<b>.005</b>	<b>-.007</b>
	<b>.669</b>	<b>.196</b>	<b>.067</b>	<b>.213</b>	<b>.153</b>	<b>-.148</b>	<b>.156</b>	<b>-.216</b>	<b>.236</b>	<b>-.025</b>
	<b>.353</b>	<b>.138</b>	<b>.065</b>	<b>-.153</b>	<b>.086</b>	<b>.014</b>	<b>.101</b>	<b>.648</b>	<b>.024</b>	<b>-.057</b>
	<b>.788</b>	<b>.053</b>	<b>.292</b>	<b>.034</b>	<b>-.143</b>	<b>-.046</b>	<b>.097</b>	<b>.042</b>	<b>.054</b>	<b>-.017</b>
	<b>.714</b>	<b>.086</b>	<b>-.006</b>	<b>.000</b>	<b>.152</b>	<b>-.096</b>	<b>.036</b>	<b>.019</b>	<b>.253</b>	<b>.232</b>

<b>Professional Growth Opportunities Benchmarking Skill with Leaders Objectives Documented and Communicated Strategy Implementation Position Environmental Monitoring Strategy Strategy Aligned to Feedback Strategy Reviewed and Adaptive Quality Performance Emphasized Distinct Company Strategies Competitiveness from Strategies Togetherness and Ownership encouraged Teamwork Spirit encouraged Dept's Yearly Team Building Company Externally Focused Yearly Staff Parties Participation Company Celebrates Achievements</b>	.468	-.011	-.078	.082	-.130	.095	-.025	-.002	-.091	.072
	.220	.515	.098	.119	-.054	.093	-.094	.131	.026	-.005
	.736	.113	.004	-.017	.095	.063	.067	.262	-.030	.070
	.114	.037	.554	.161	.078	-.131	.008	.159	.099	.159
	.191	.072	.196	.597	-.014	.070	.061	-.101	.141	.122
	.742	.002	.272	.243	-.204	.196	.033	.112	-.113	-.153
	.117	.316	.496	.208	.160	.011	-.119	-.019	.099	-.078
	.828	.131	.282	.131	-.002	.095	.154	.044	-.036	-.033
	.126	.151	.394	.128	.235	.126	.198	-.109	-.036	.096
	.786	-.084	.044	.103	.217	.130	.187	.005	.121	.019
	.816	-.007	.001	.018	.198	.135	.075	.240	-.041	-.053
	.689	.112	-.230	-.114	.441	.080	.077	.223	.186	.053
	.564	.142	.135	.279	.068	.082	.161	-.133	-.024	.112
	.313	.190	.049	-.317	.020	.032	.418	-.011	-.102	-.050
	.305	.149	.326	-.189	.548	-.117	.044	.000	.039	-.014
	.903	.103	.251	.115	-.046	.114	.140	.097	-.008	-.057



<b>Freely share</b>										
<b>Relevant</b>	<b>.609</b>	<b>-.012</b>	<b>-.035</b>	<b>.171</b>	<b>.085</b>	<b>.174</b>	<b>.311</b>	<b>.096</b>	<b>-.105</b>	<b>.064</b>
<b>Information</b>										
<b>Cares for</b>										
<b>Society and</b>	<b>.165</b>	<b>-.122</b>	<b>.027</b>	<b>.144</b>	<b>.046</b>	<b>.401</b>	<b>.555</b>	<b>.001</b>	<b>.030</b>	<b>.059</b>
<b>Community</b>										
<b>Participation</b>										
<b>Departmental</b>	<b>.067</b>	<b>.149</b>	<b>.110</b>	<b>.159</b>	<b>.024</b>	<b>.547</b>	<b>.167</b>	<b>.287</b>	<b>-.089</b>	<b>-.053</b>
<b>collaboration</b>										
<b>Encouraged</b>										

**Extraction Method: Principal Component Analysis.**

**Rotation Method: Varimax with Kaiser Normalization.**

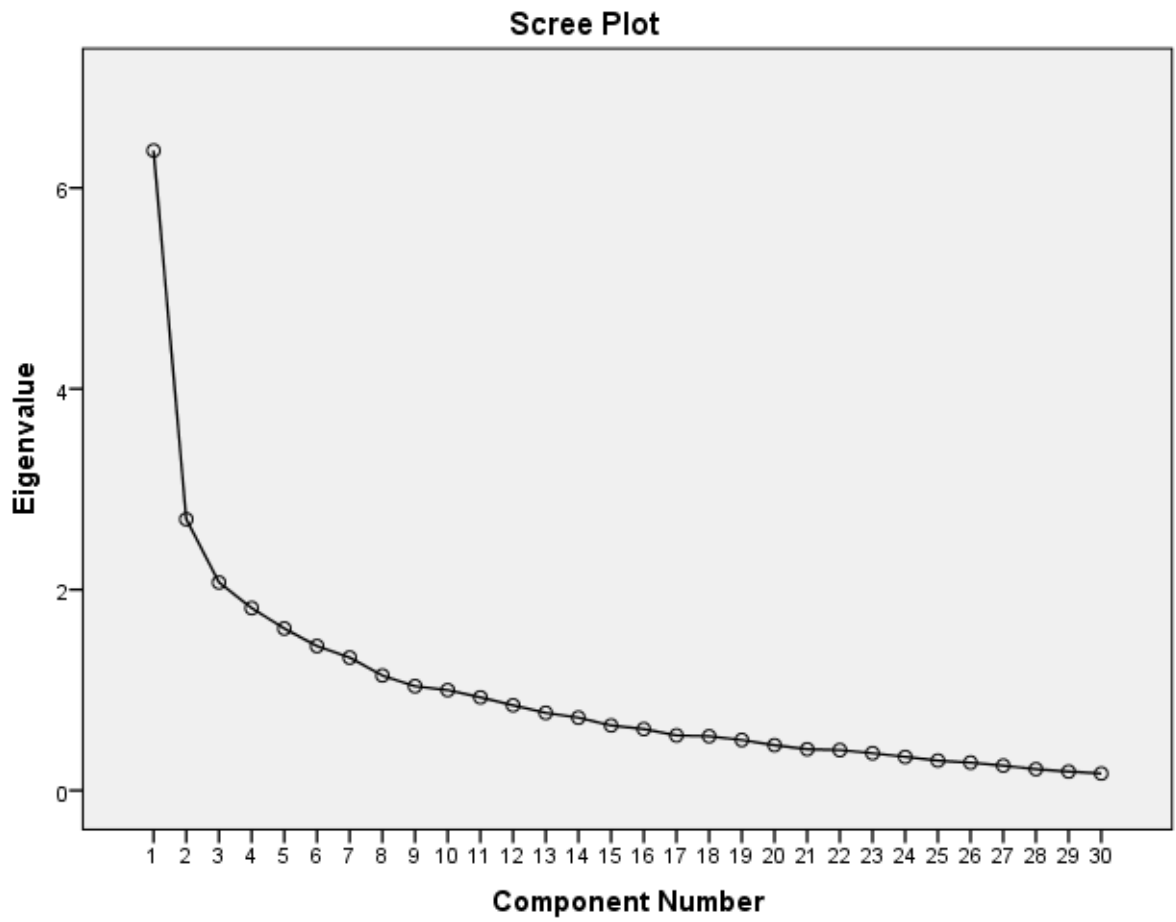
**a. Rotation converged in 16 iterations.**

**Table A5: Factor analysis Results for Competitive Environment**

Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	6.373	21.242	21.242	6.373	21.242	21.242	3.067	10.225	10.225
2	2.701	9.003	30.246	2.701	9.003	30.246	2.820	9.401	19.626
3	2.072	6.905	37.151	2.072	6.905	37.151	2.801	9.337	28.963
4	1.816	6.054	43.205	1.816	6.054	43.205	2.381	7.936	36.899
5	1.613	5.375	48.580	1.613	5.375	48.580	2.222	7.406	44.306
6	1.438	4.795	53.374	1.438	4.795	53.374	2.080	6.934	51.240
7	1.323	4.410	57.784	1.323	4.410	57.784	1.594	5.312	56.552
8	1.144	3.815	61.599	1.144	3.815	61.599	1.292	4.306	60.859
9	1.038	3.461	65.060	1.038	3.461	65.060	1.261	4.202	65.060
10	1.000	3.332	68.392						
11	.928	3.092	71.484						
12	.848	2.826	74.310						
13	.773	2.576	76.886						
14	.725	2.418	79.304						
15	.647	2.156	81.459						
16	.611	2.037	83.497						
17	.548	1.827	85.324						
18	.539	1.798	87.122						
19	.503	1.675	88.797						
20	.451	1.504	90.301						
21	.411	1.370	91.671						
22	.402	1.341	93.012						
23	.371	1.237	94.249						
24	.335	1.115	95.364						
25	.297	.991	96.355						
26	.277	.924	97.278						
27	.247	.824	98.103						
28	.212	.708	98.811						
29	.189	.628	99.439						
30	.168	.561	100.000						

Extraction Method: Principal Component Analysis.

**Chart A3: Scree Plot for Competitive Environment**



**Table A6: Rotated Component Matrix for competitive Environment**

	Component								
	1	2	3	4	5	6	7	8	9
Industry Competition Intense	.408	-.071	.367	.051	.479	.104	-.022	.351	.008
Competition War-like, Bitter and Cut throat	.143	-.016	.193	-.118	.794	.001	-.073	.033	-.087
Promotion Wars Many Advertising Battles	.000	-.018	-.005	.100	.746	.169	-.049	.009	.058
Frequent and Intense	-.211	.035	.084	.110	.604	.126	.399	.022	.222
Price Wars Intense, Price cuts matched quickly	.148	.078	-.006	.215	.365	.018	.432	.176	-.243
Competitor offers easily matched	.113	.123	-.090	.098	.358	.459	.334	.044	-.113
Competitor Reactions Fast	.028	.210	-.006	.080	.233	.675	.130	-.075	-.151
Rapid Rate of New Products Introduction	.038	-.077	.123	.004	.074	.760	-.038	-.065	.057
Industry with Massive Resources for Competition retaliation	.045	.172	.279	.177	-.103	.500	.078	.285	.326
Large Start-up Costs required	.210	.160	.716	.187	.077	-.026	-.070	.241	.129
Entry at High visibility for Recognition needed	.071	.038	.788	-.097	.028	.191	.200	-.037	.052
Established companies have Huge Resources prevent Entry	.079	-.030	-.014	.067	.091	-.031	.022	.785	.039
New companies Huge spend on R&D	.041	.239	.703	.200	.121	-.125	-.008	-.044	.024
New Entrants spend High in brand Building	.309	-.001	.704	.176	.091	.141	.106	-.091	-.114
Small Scale Firms accept Cost Advantage	.053	-.071	.259	-.213	-.078	.268	.652	.086	.094
Buyers Powerfull Buyers demand	.228	.245	.239	.702	.108	-.025	-.018	.179	.133
Concessions and Discounts	.115	.148	.186	.824	-.005	.090	-.063	.132	-.145
Few Buyers account for Large Industry Sales	.101	.125	-.021	.597	.035	.075	.354	-.149	.165
Buyers demand Better Services	.715	-.011	.028	-.059	.063	.164	.213	-.001	.006

Buyers don't dictate Terms	.005	.243	.169	-.093	.089	-.285	.024	.256	.601
Suppliers Product Quality Affects Our Product Quality	.762	.155	.191	.151	-.029	-.066	.001	.136	.043
Supplier Products Important In-puts in company products	.766	.288	.207	.109	.016	-.039	.023	.170	.016
Suppliers Very Powerful	.602	.201	.235	.386	.121	.091	-.129	-.082	.127
Suppliers Demand High Concessions	.531	.078	.059	.392	.066	-.049	-.094	-.319	.274
Few Suppliers account for Large Industry Proportion	.382	-.059	-.102	.254	-.016	.192	.066	-.160	.631
High substitute Pressure in Industry	.186	.799	.086	.130	-.092	.058	-.037	.090	.162
Companies Aware of Substitutes	.245	.792	.121	.078	.090	-.009	-.026	-.004	.035
Substitutes Limit Industry ROI	.013	.737	.177	.241	.026	.012	-.166	-.043	.006
Industry needs easily met by other Sources	.011	.707	-.020	.020	-.035	.149	.334	-.075	-.062
Industry Products Intrinsic with no class Substitutes	.052	-.016	.068	.244	-.025	-.428	.523	-.128	.055

**Extraction Method: Principal Component Analysis.**

**Rotation Method: Varimax with Kaiser Normalization.**

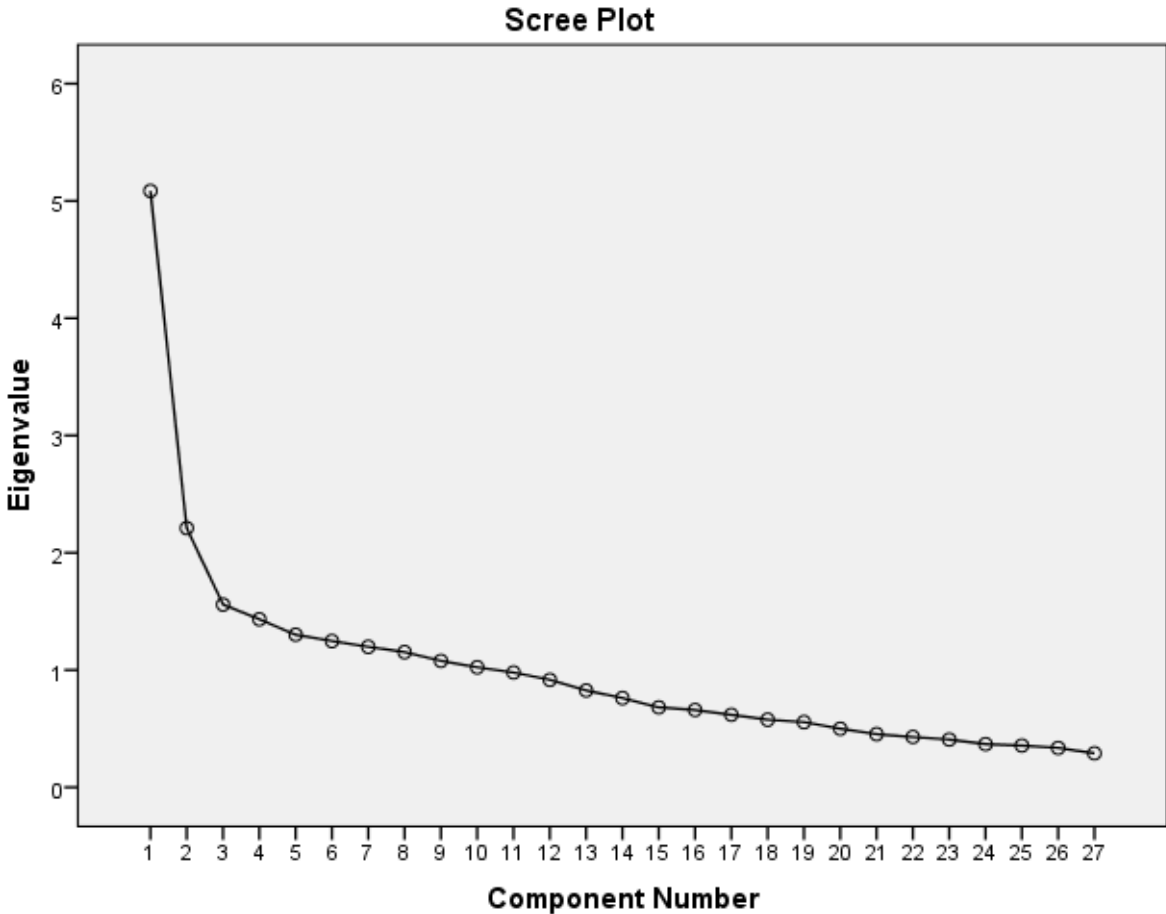
**a. Rotation converged in 25 iterations.**

**Table A7: Factor analysis Results for Organizational Performance**

Component	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	5.086	18.837	18.837	3.739	13.848	13.848
2	2.210	8.186	27.023	3.243	12.011	25.859
3	1.558	5.771	32.794	1.393	5.160	31.018
4	1.433	5.308	38.102	1.314	4.868	35.887
5	1.301	4.818	42.921	1.296	4.798	40.685
6	1.247	4.618	47.539	1.292	4.786	45.471
7	1.198	4.435	51.974	1.285	4.757	50.228
8	1.153	4.270	56.244	1.260	4.667	54.895
9	1.078	3.993	60.237	1.236	4.579	59.474
10	1.024	3.792	64.029	1.230	4.555	64.029
11	.979	3.625	67.654			
12	.916	3.394	71.048			
13	.826	3.058	74.106			
14	.761	2.817	76.924			
15	.682	2.524	79.448			
16	.660	2.444	81.891			
17	.618	2.290	84.181			
18	.576	2.135	86.316			
19	.556	2.058	88.374			
20	.500	1.850	90.224			
21	.453	1.678	91.902			
22	.429	1.589	93.491			
23	.408	1.509	95.000			
24	.368	1.363	96.363			
25	.356	1.319	97.682			
26	.336	1.244	98.926			
27	.290	1.074	100.000			

Extraction Method: Principal Component Analysis.

**Chart A4: Scree Plot for Organizational Performance**



**Table A8: Rotated Component Matrix for Organizational Performance**

	Component									
	1	2	3	4	5	6	7	8	9	10
Employee Abilities Fully Utilized	.136	.011	-.524	.267	.036	.139	.023	.125	.245	.103
Physical Resources Well Utilized	-.033	.093	-.012	-.123	.012	.119	-.103	.800	-.132	.046
Finances Well Utilized	.018	.021	.022	-.096	-.096	-.056	.817	-.102	.088	.151
Company Monitors Absenteeism and Turnover Rates	-.029	.077	-.080	-.087	-.111	.812	-.068	.090	.094	-.118
Company monitors Timeliness of Service Delivery	.072	.102	-.053	.708	-.013	-.093	-.083	-.131	-.027	-.057
Company has High Quality Admin Systems	-.041	-.020	.044	-.104	.099	-.147	.171	.013	-.086	.823
Departments Benchmark Achievements	-.045	.032	.057	-.010	.011	.059	.064	-.135	.839	-.066
Company Existences guided by Mission Statement	.120	.764	.104	.201	-.115	-.070	.073	-.001	-.002	-.019
Goals, Objectives, Strategies measure Mission	.202	.459	.475	-.016	.177	-.162	-.182	.127	.049	-.002
Mission Measured in Qualitative and Quantitative Terms	.182	.530	.026	.025	.245	.288	.230	-.041	-.152	-.186
Effectiveness of Programmes and Activities measured	.139	.609	.061	.160	-.145	.202	-.079	-.325	-.084	.017
Feedbackused in Performance Improvement	.117	.690	-.131	-.211	-.102	-.182	-.055	.230	.032	.132
Company Products Highly Rated	.060	.350	.221	-.335	.118	-.169	.175	-.126	-.296	-.385
Company Fully Meets Customer Needs	.020	.503	-.002	.434	.252	.019	.121	.013	.118	-.308
Company Mission Known and Shared Widely	.036	.650	.074	-.104	.272	.304	-.121	.078	-.007	-.017



Stakeholder										
Satisfaction Surveys Undertaken	.414	.582	.048	.124	-.209	.008	.060	.028	.163	-.087
Company Monitors and Adopts to Business Environment	.682	.153	.141	.111	-.136	-.096	-.310	.052	.105	.129
Employee Trainings Aligned to Environment	.622	.014	.301	.062	.235	.255	.135	.046	-.097	.120
Company Introduces New Products Regularly	.611	.106	-.177	-.275	-.014	-.067	.029	-.081	.260	-.244
Company Image and Reputation Monitored	.564	.130	-.168	-.192	-.040	.081	-.300	-.268	.045	.051
Company Easily Adapts New Technology	.558	.071	-.199	.173	-.193	-.079	.362	.333	-.127	-.080
Company Products reflect Environment changes	.677	.134	.090	.212	-.053	.032	-.027	.166	-.056	-.148
Company embraces Innovation	.536	.150	.069	.203	.065	.267	.147	-.219	-.209	.040
Innovation Team Availability	.694	.116	.064	-.056	.185	-.266	.151	-.027	.028	-.098
Company Products Reflect Customer Needs	.555	.193	-.066	-.071	-.216	.074	.001	-.282	-.256	.213
Growth in Sales Revenue	.145	.087	.735	.087	-.230	.066	.086	.019	.220	.097
Growth in Profit	-.024	-.023	-.133	.018	.824	-.093	-.093	.013	.009	.068

Extraction Method: Principal Component Analysis.

Rotation Method: Varimax with Kaiser Normalization.

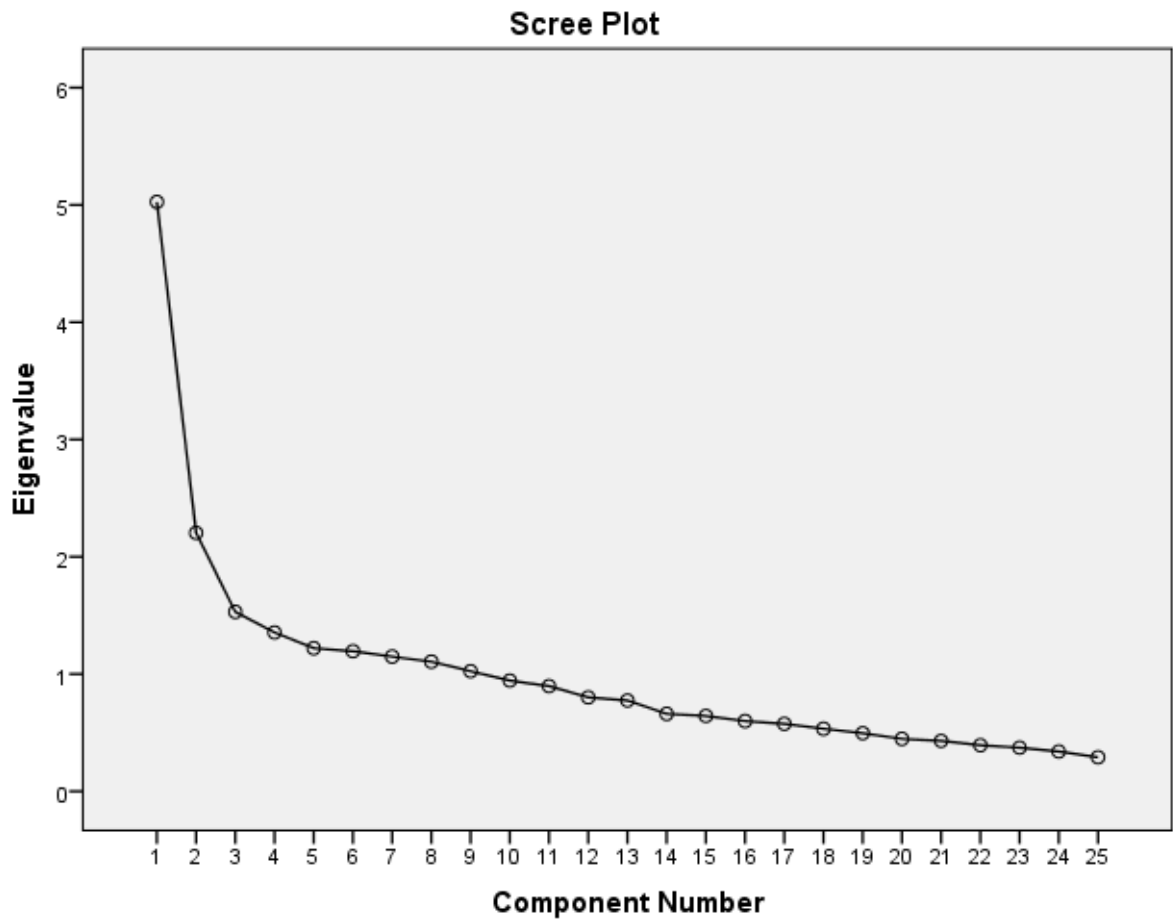
a. Rotation converged in 19 iterations.

**Table A9: Factor analysis for Non-Financial Performance**

Component	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	5.026	20.104	20.104	3.731	14.923	14.923
2	2.203	8.812	28.916	3.251	13.006	27.929
3	1.530	6.120	35.036	1.285	5.141	33.070
4	1.355	5.419	40.455	1.281	5.126	38.196
5	1.220	4.881	45.336	1.276	5.105	43.300
6	1.194	4.777	50.112	1.270	5.081	48.382
7	1.148	4.593	54.705	1.260	5.039	53.420
8	1.106	4.423	59.128	1.240	4.961	58.382
9	1.024	4.096	63.224	1.211	4.842	63.224
10	.944	3.777	67.001			
11	.897	3.588	70.589			
12	.801	3.202	73.792			
13	.775	3.099	76.891			
14	.661	2.643	79.533			
15	.642	2.569	82.103			
16	.599	2.396	84.498			
17	.575	2.301	86.799			
18	.533	2.132	88.932			
19	.495	1.982	90.914			
20	.447	1.790	92.703			
21	.430	1.720	94.423			
22	.393	1.572	95.995			
23	.372	1.488	97.483			
24	.339	1.356	98.839			
25	.290	1.161	100.000			

Extraction Method: Principal Component Analysis.

**Chart A5: Scree Plot for Non-Financial Organizational Performance**



**Table A 10: Rotated Component Matrix for Non-Financial Organizational Performance**

	Component								
	1	2	3	4	5	6	7	8	9
Employee Abilities Fully Utilized	.035	.023	.060	-.002	.145	.057	-.011	.780	-.051
Physical Resources Well Utilized	.012	.113	-.132	-.803	-.051	-.114	.128	.033	-.117
Finances Well Utilized	.026	.010	-.084	.102	-.136	.820	-.072	-.002	.055
Company Monitors Absenteeism and Turnover Rates	.010	.096	-.089	-.102	.129	-.064	.842	.029	.094
Company monitors Timeliness of Service Delivery	.101	.060	.698	.136	.048	-.103	-.083	.151	-.019

Company has High Quality Admin Systems	-.037	-.031	-.078	-.044	-.774	.160	-.125	-.069	-.081
Departments Benchmark Achievements	-.042	.024	.008	.121	.101	.063	.114	.004	.837
Company Existances guided by Mission Statement	.180	.725	.288	-.030	-.084	.084	-.021	-.101	.126
Goals, Objectives, Strategies measure Mission	.199	.516	.001	-.072	.041	-.251	-.294	-.266	-.010
Mission Measured in Qualitative and Quantitative Terms	.153	.565	.002	.091	.327	.208	.126	.008	-.312
Effectiveness of Programmes and Activities measured	.173	.587	.215	.305	-.118	-.049	.257	-.065	.025
Feedbackused in Performance Improvement	.081	.693	-.245	-.182	-.121	.001	-.226	.248	.006
Company Products Highly Rated	.091	.344	-.195	.071	.260	.171	-.154	-.503	-.146
Company Fully Meets Customer Needs	.042	.487	.462	-.020	.350	.114	-.003	.007	.090
Company Mission Known and Shared Widely	.010	.698	-.110	-.043	.133	-.126	.191	-.031	-.120
Stakeholder Satisfaction Surveys Undertaken	.463	.547	.159	-.031	-.011	.074	.067	.014	.279
Company Monitors and Adopts to Business Environment	.679	.163	.044	.017	-.150	-.333	-.119	.101	.117
Employee Trainings Aligned to Environment	.639	.050	.040	-.009	-.016	.047	.156	-.205	-.186
Company Introduces New Products Regularly	.564	.098	-.328	.128	.275	.052	-.094	.147	.241
Company Image and Reputation Monitored	.485	.150	-.298	.350	.001	-.262	.025	.261	-.024

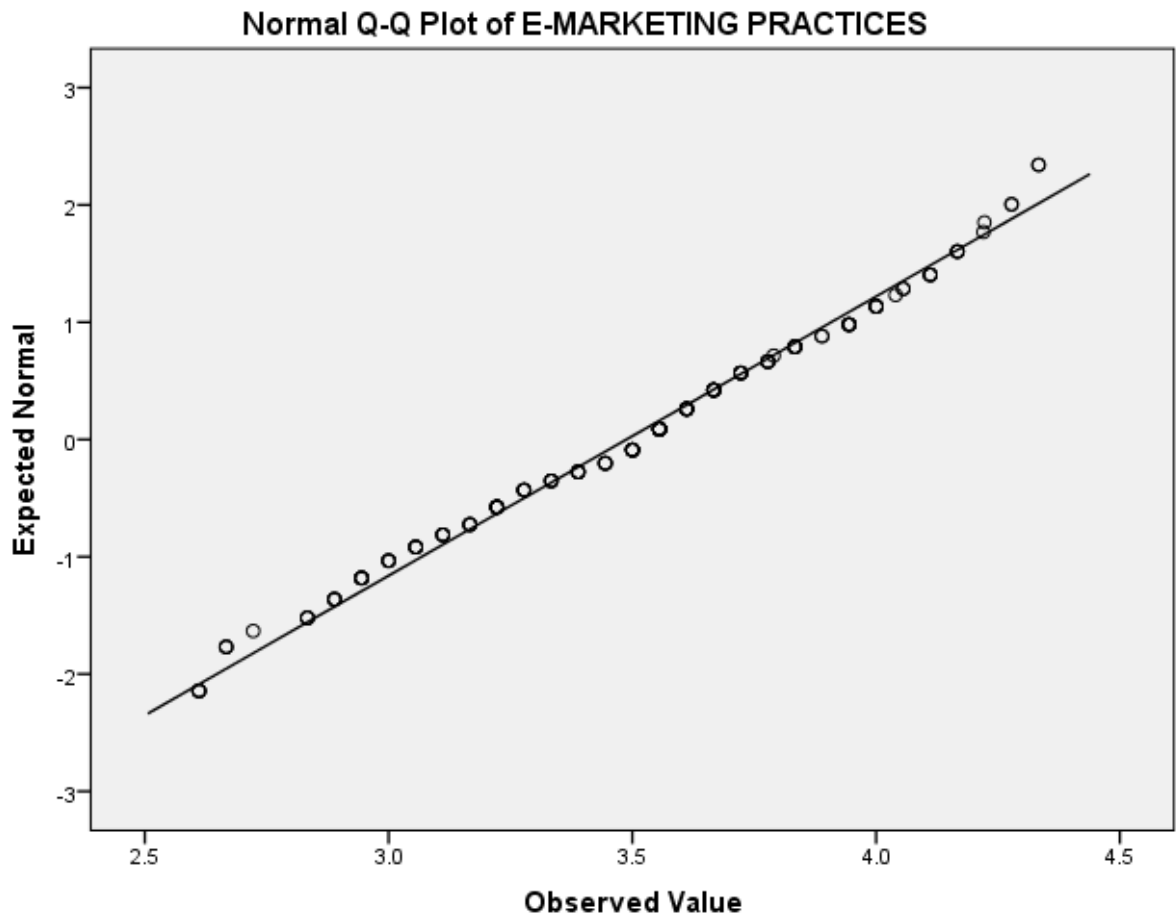
Company Easily Adapts New Technology	.613	.018	.155	-.334	-.001	.372	-.011	.174	-.030
Company Products reflect Environment changes	.716	.125	.191	-.130	.118	-.072	.014	-.013	-.016
Company embraces Innovation	.503	.185	.106	.303	.049	.128	.150	.135	-.349
Innovation Team Availability	.678	.108	-.063	.058	.139	.113	-.328	-.100	.017
Company Products Reflect Customer Needs	.580	.156	-.051	.264	-.345	.038	.173	-.029	-.095

**Extraction Method: Principal Component Analysis.**

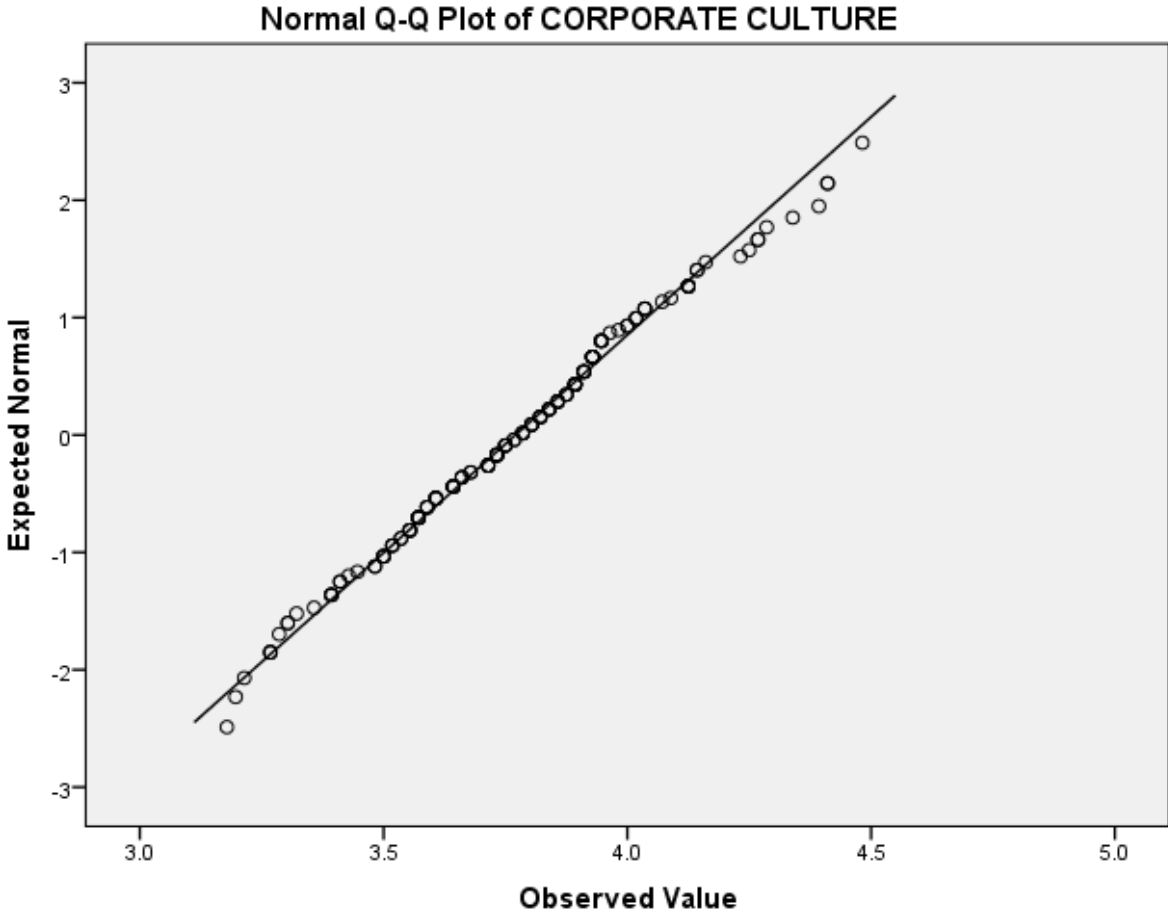
**Rotation Method: Varimax with Kaiser Normalization.**

**a. Rotation converged in 8 iterations.**

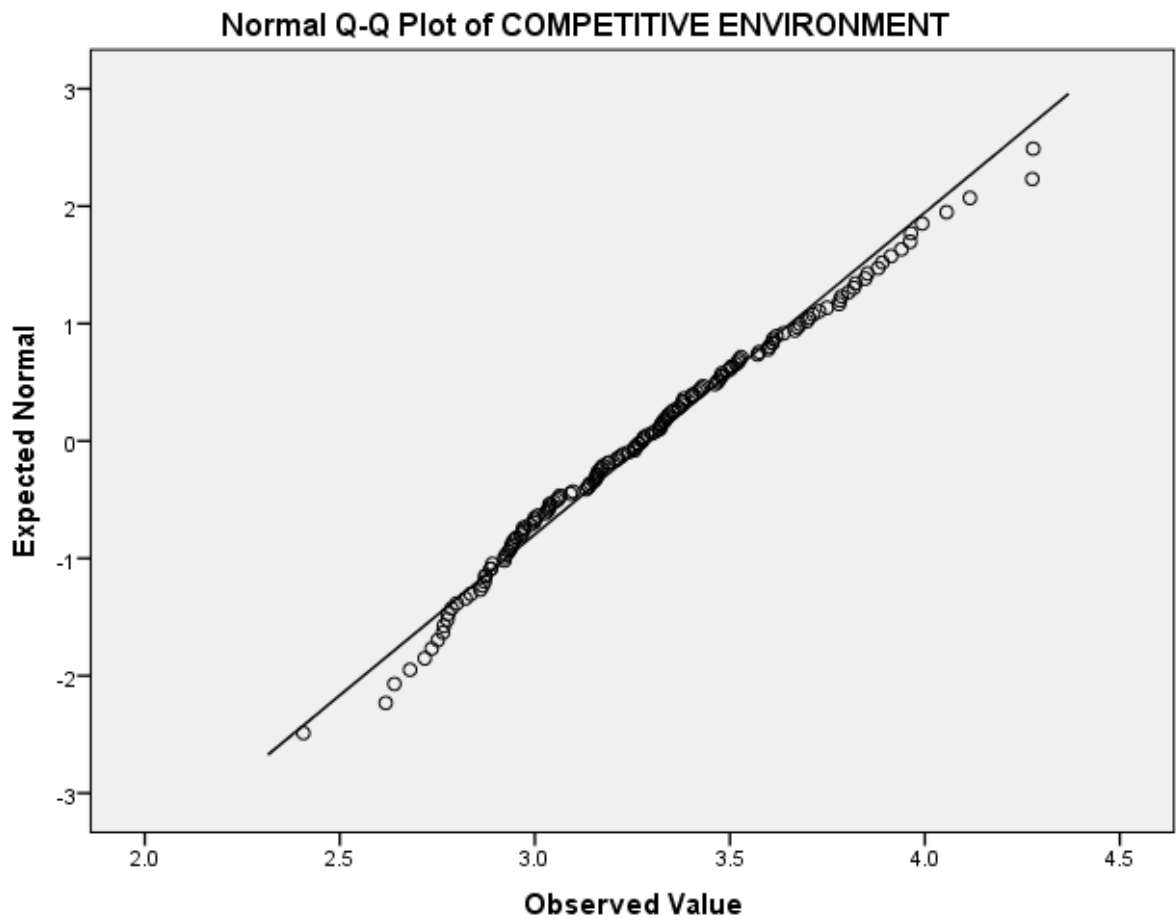
**Appendix 8: Linearity Tests for Study Variables**  
**Chart B1: Linearity Test for E-marketing Practices**



**Chart B2: Linearity Test for Corporate Culture**

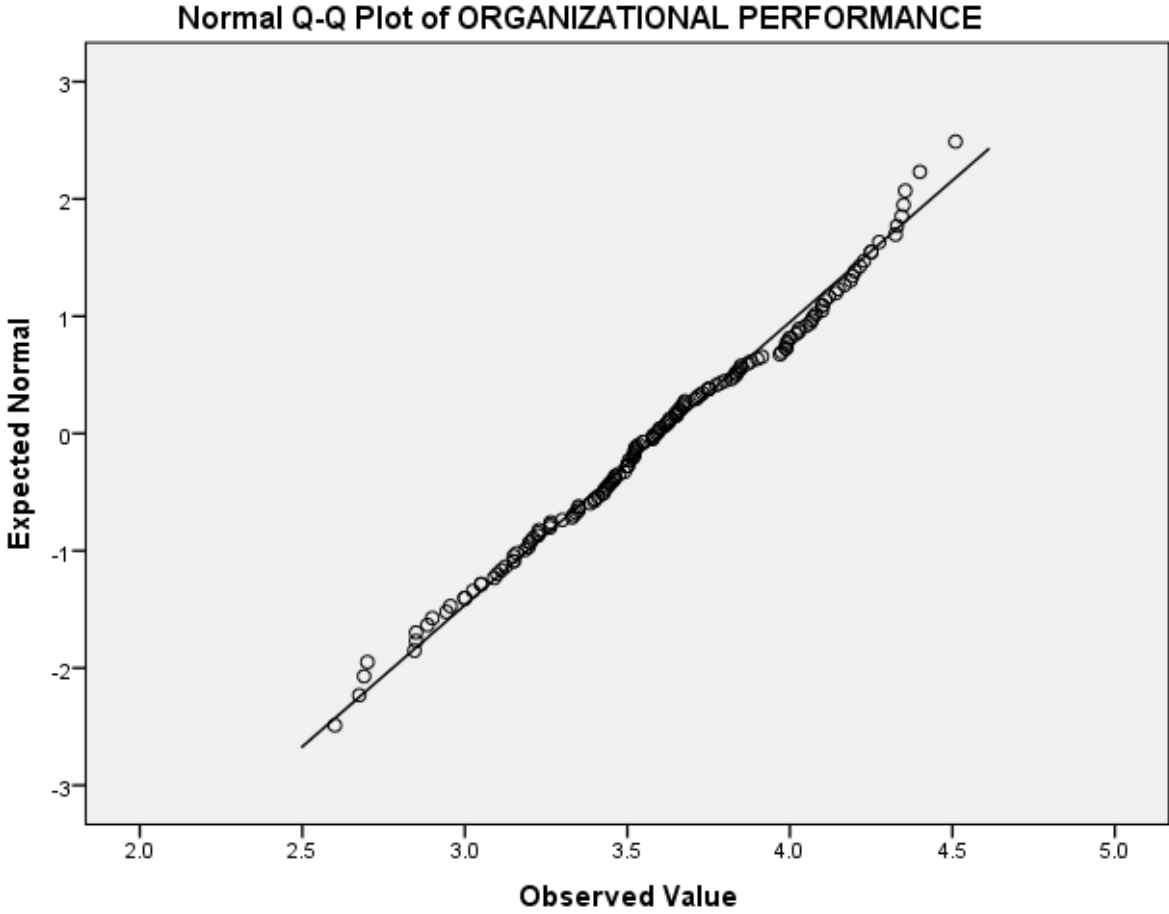


**Chart B2: Linearity Test for Competitive environment**

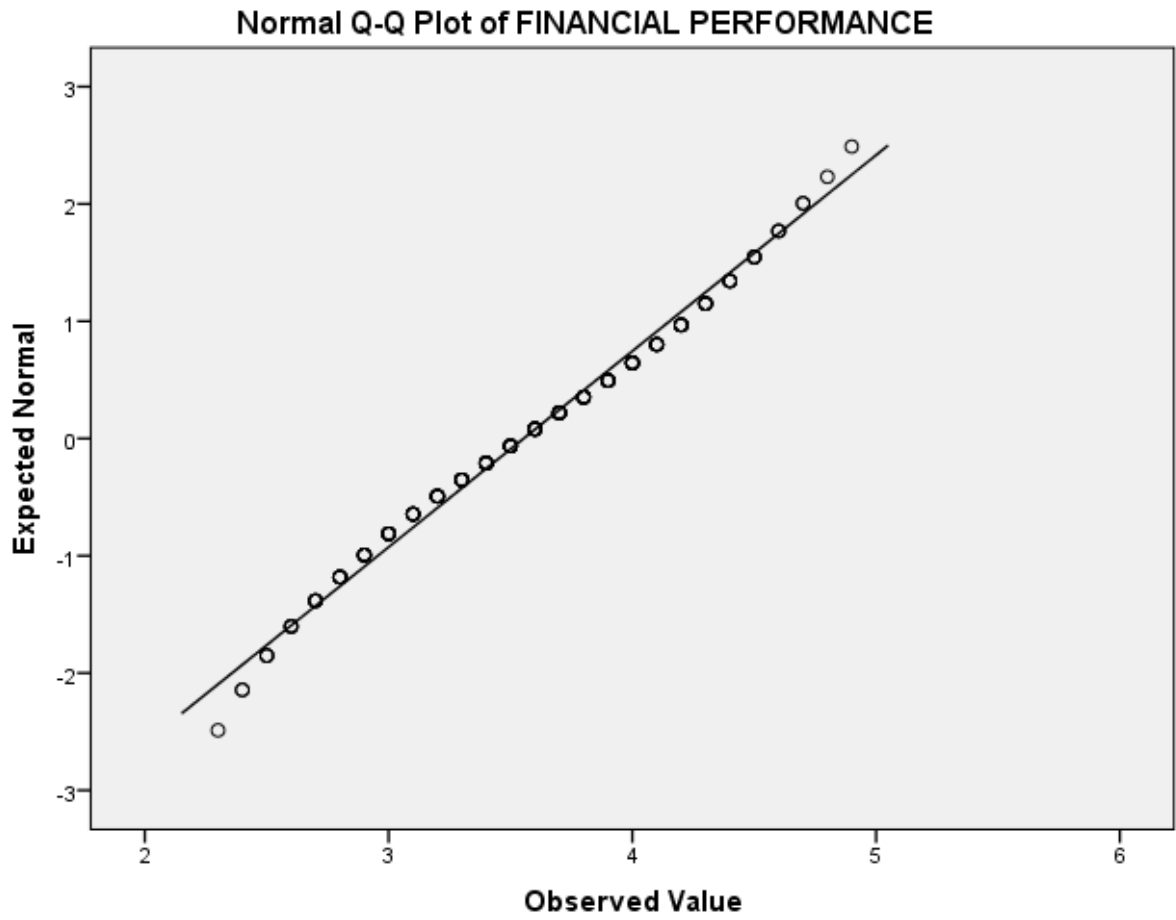




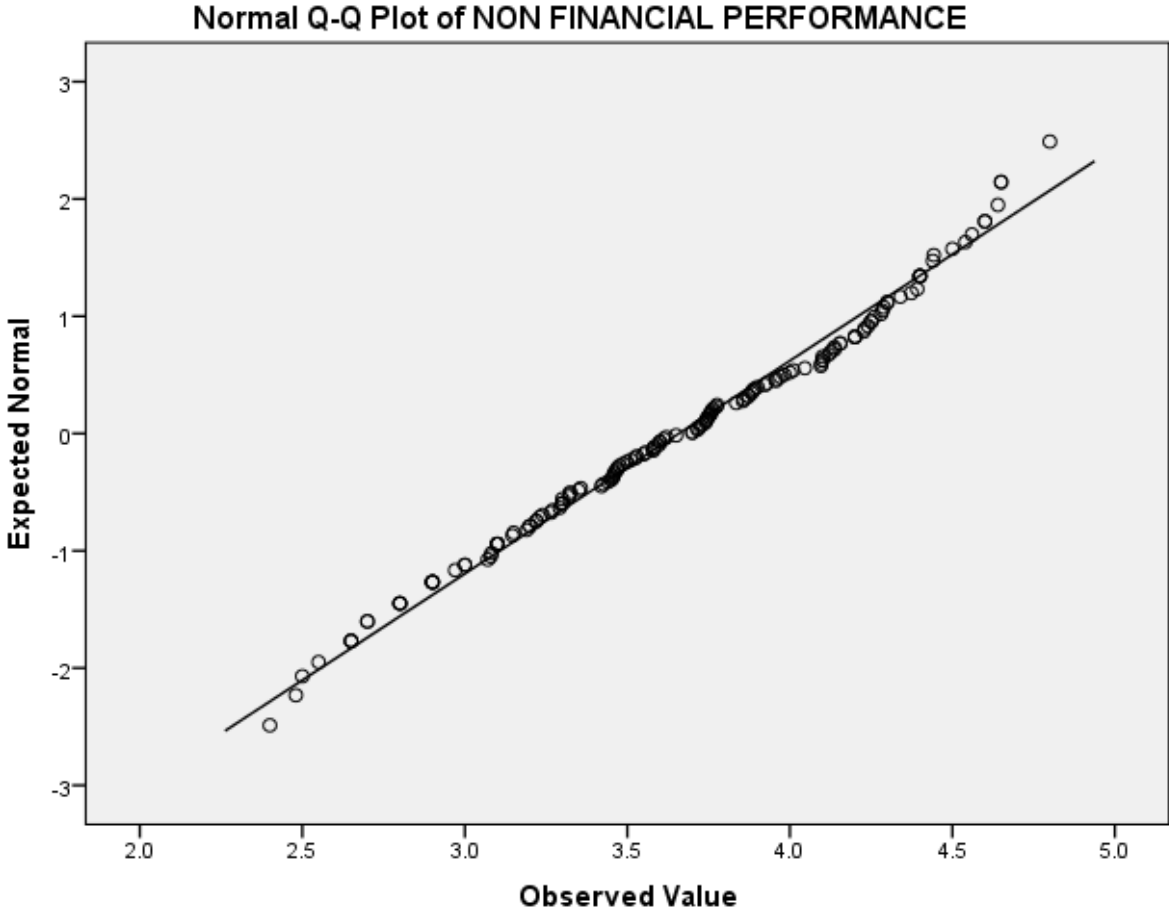
**Chart B4: Linearity Test for Organizational Performance**



**Chart B5: Linearity Test for Financial Performance**

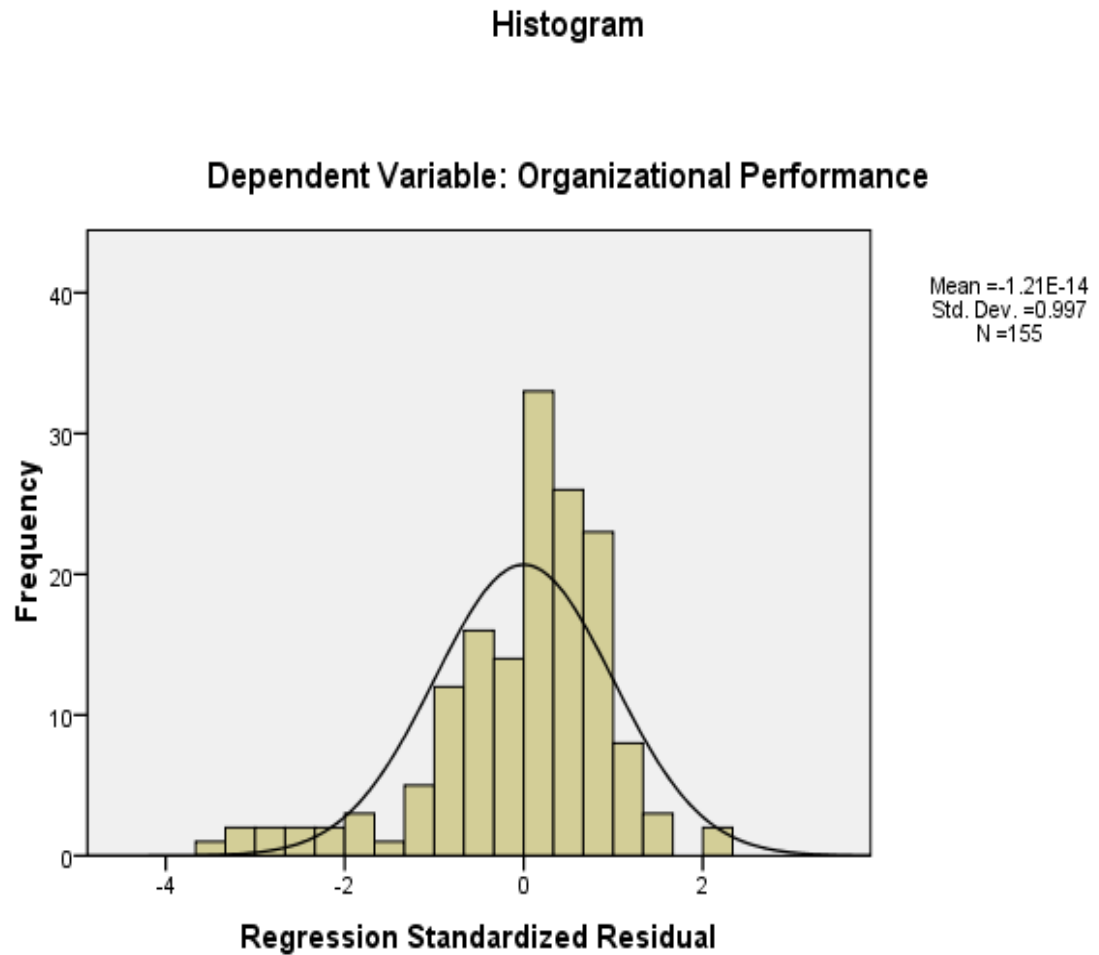


**Chart B6: Linearity Test for Non-Financial Performance**



## Appendix 9: Tests for Regression Analysis Assumptions

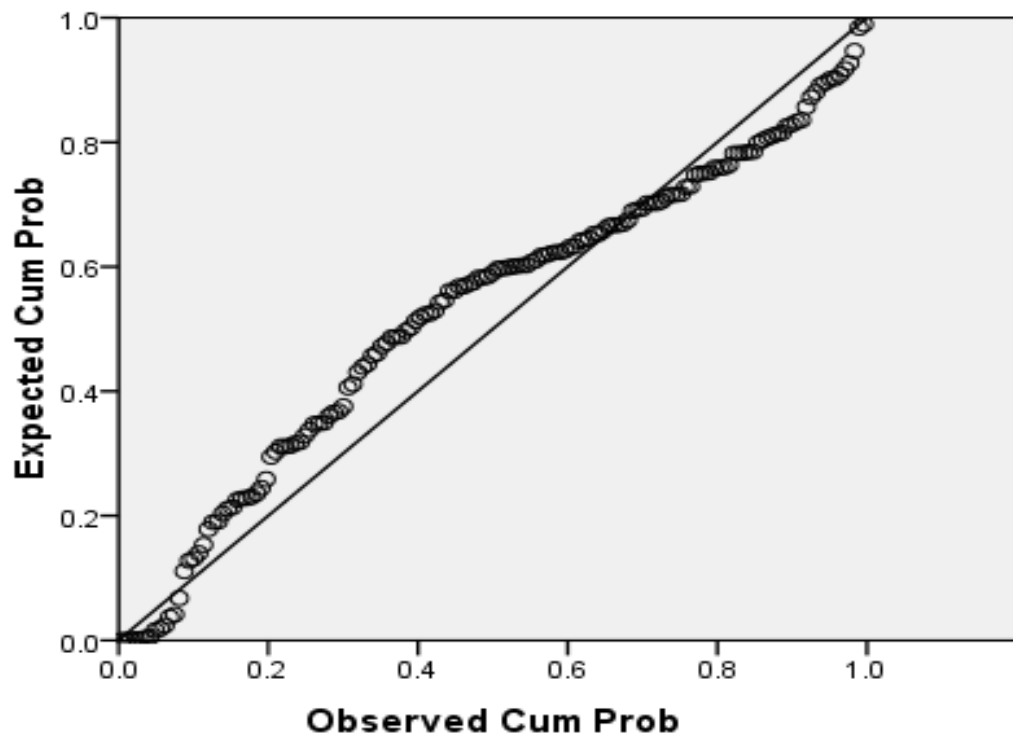
**Chart B7: Normality Test for the Relationship between E-marketing Practices and Organizational Performance**



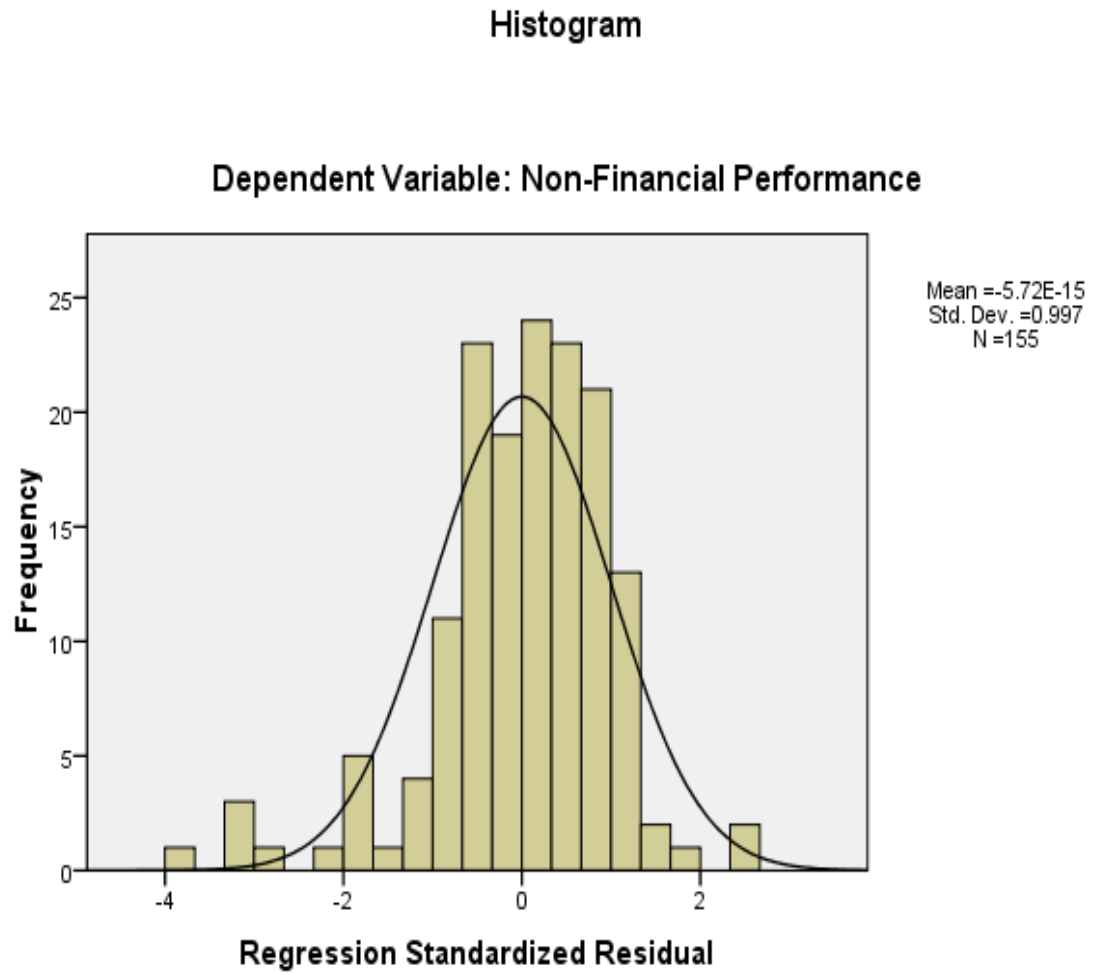
**Chart B8: Linearity Test for the Relationship between E-marketing Practices and Organizational Performance**

**Normal P-P Plot of Regression Standardized Residual**

**Dependent Variable: Organizational Performance**



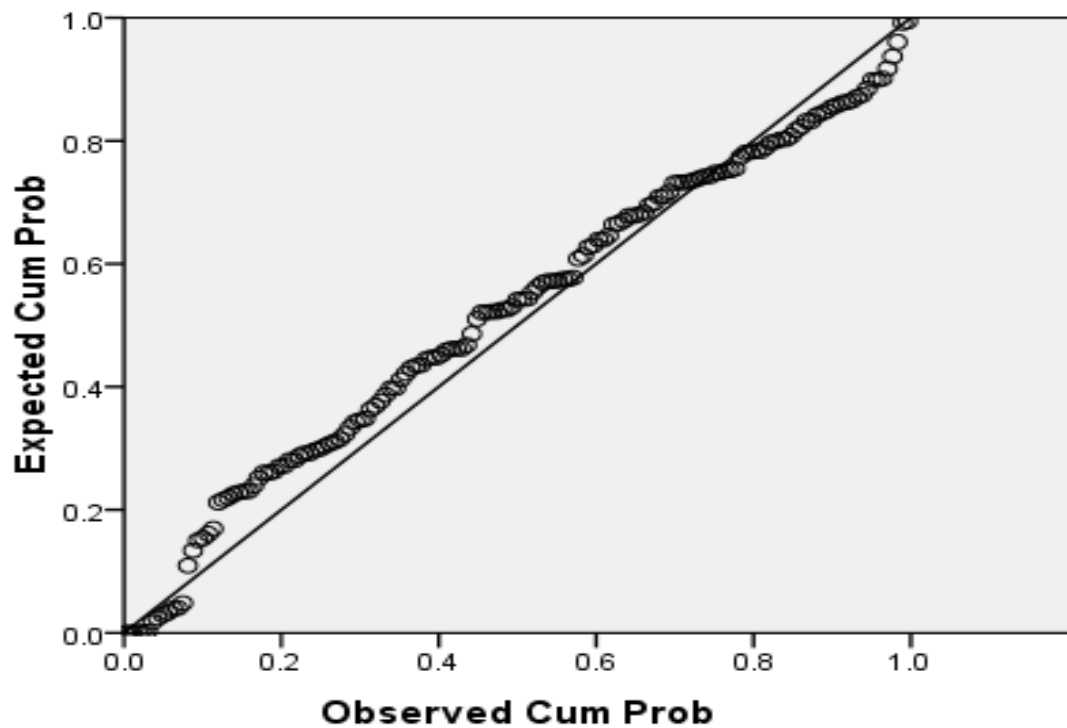
**Chart B9: Normality Test for the Relationship between E-marketing Practices and Non-Financial Performance**



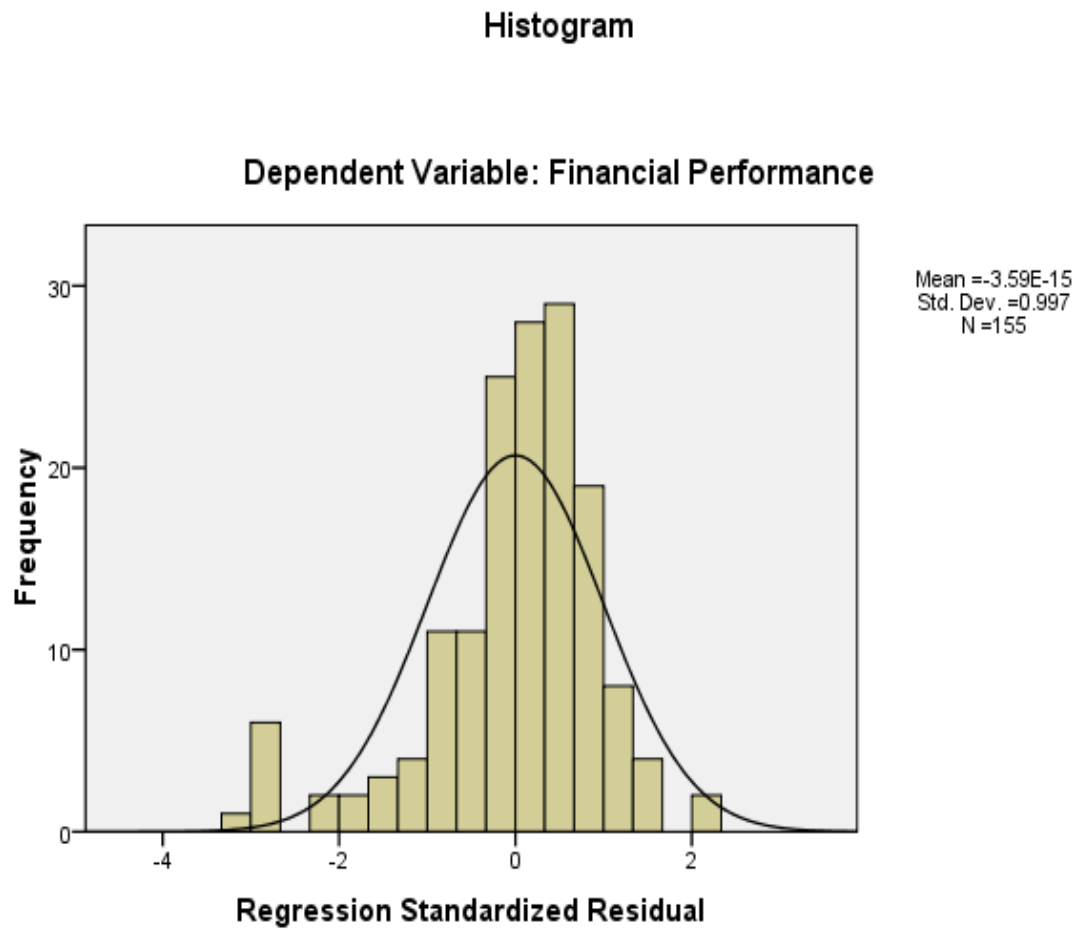
**Chart B10: Linearity Test for the Relationship between E-marketing Practices and Non-Financial Organizational Performance**

**Normal P-P Plot of Regression Standardized Residual**

**Dependent Variable: Non-Financial Performance**



**Chart B11: Normality Test for the Relationship between E-marketing Practices and Financial Organizational Performance**

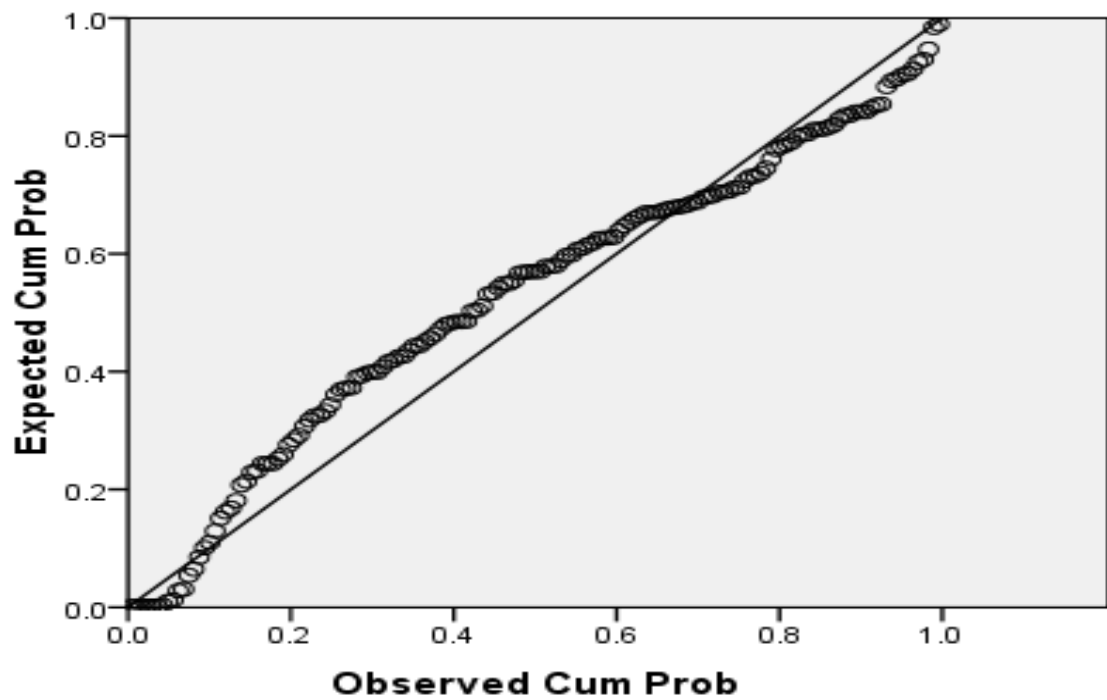




**Chart B12: Linearity Test for the Relationship between E-marketing Practices and Financial Organizational Performance**

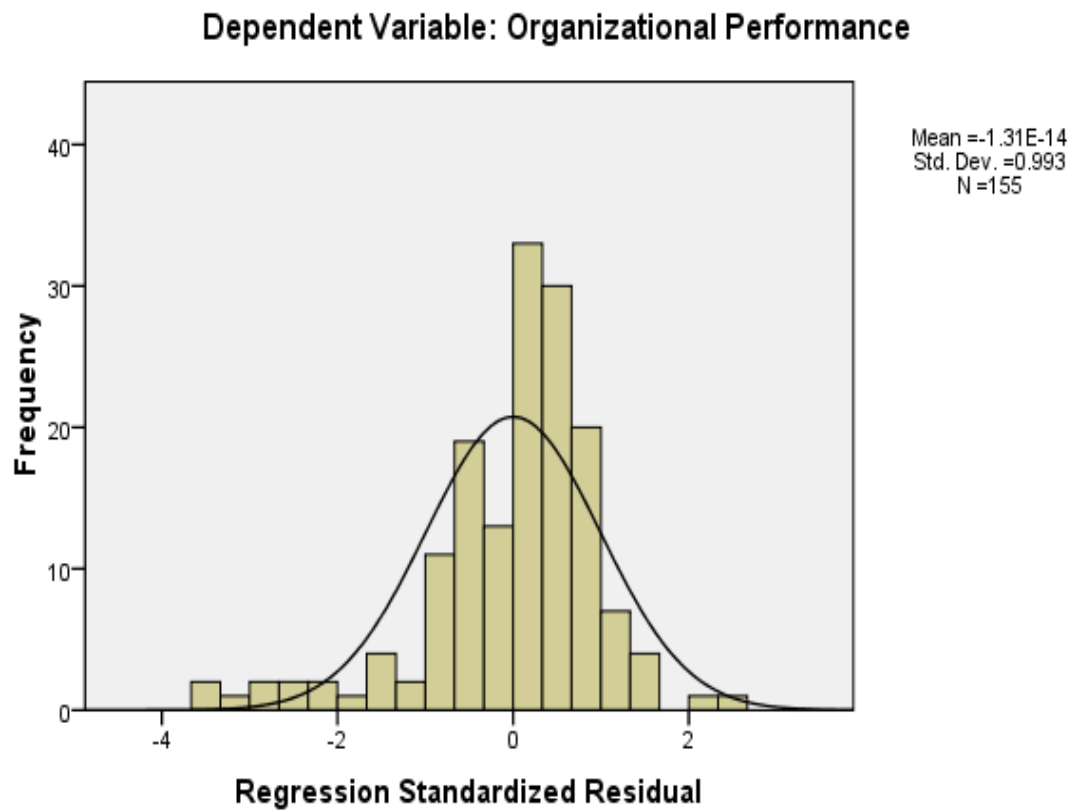
**Normal P-P Plot of Regression Standardized Residual**

**Dependent Variable: Financial Performance**



**Chart B13: Normality Test for the Influence of Corporate Culture on the Relationship Between E-marketing Practices and Organizational Performance**

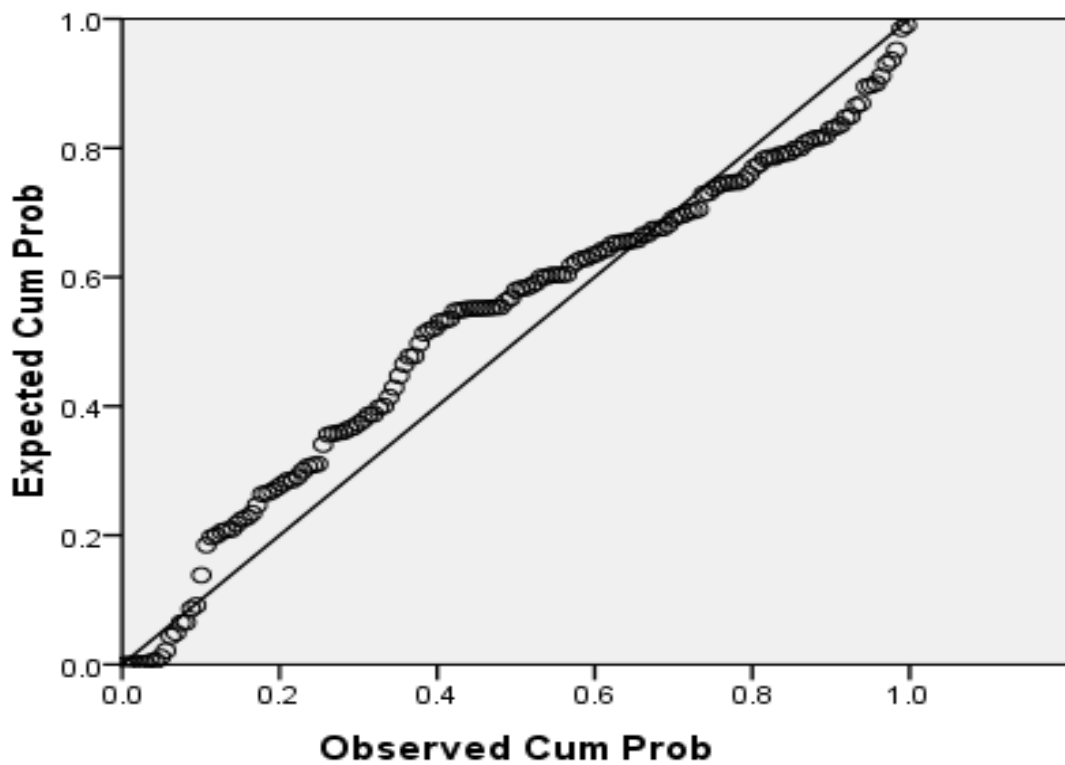
**Histogram**



**Chart B14: Linearity Test for the Influence of Corporate Culture on the Relationship between E-marketing Practices and Organizational Performance**

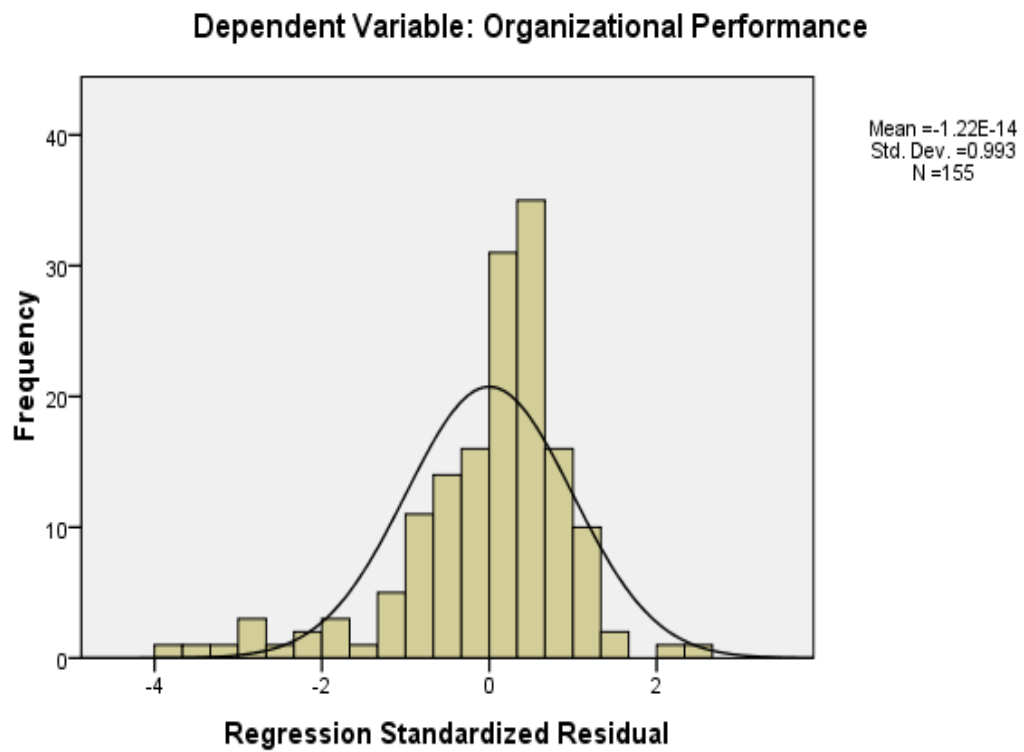
**Normal P-P Plot of Regression Standardized Residual**

**Dependent Variable: Organizational Performance**



**Chart B15: Normality Test for the Influence of competitive environment on the Relationship between E-marketing Practices and Organizational Performance**

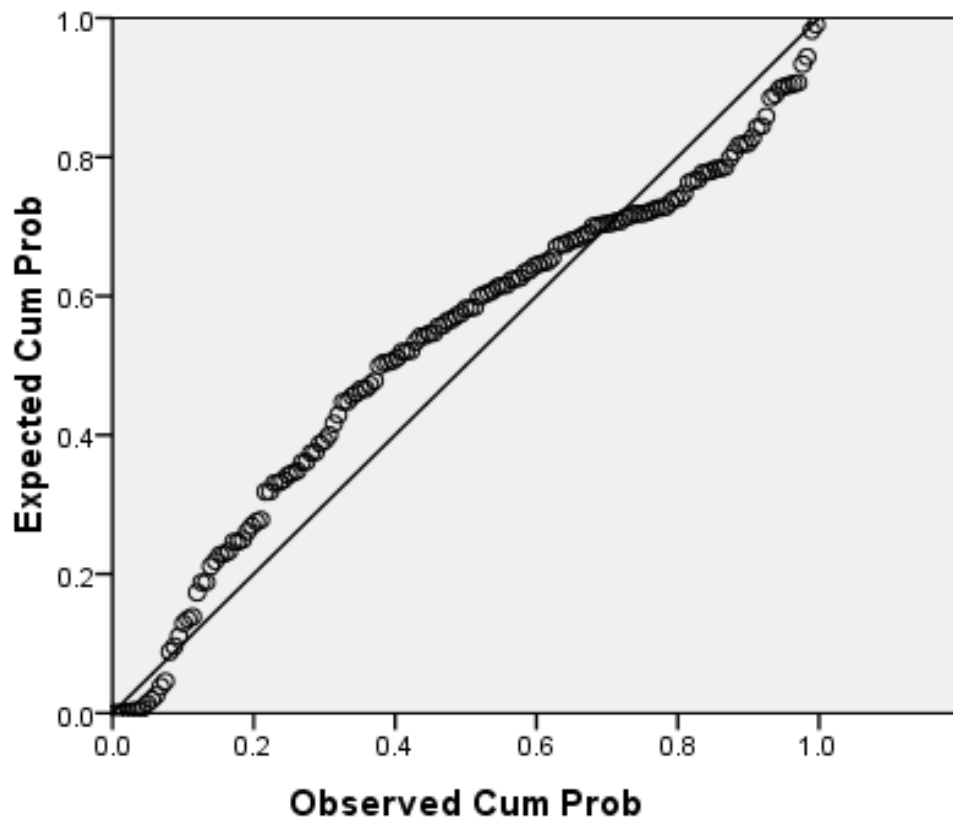
**Histogram**



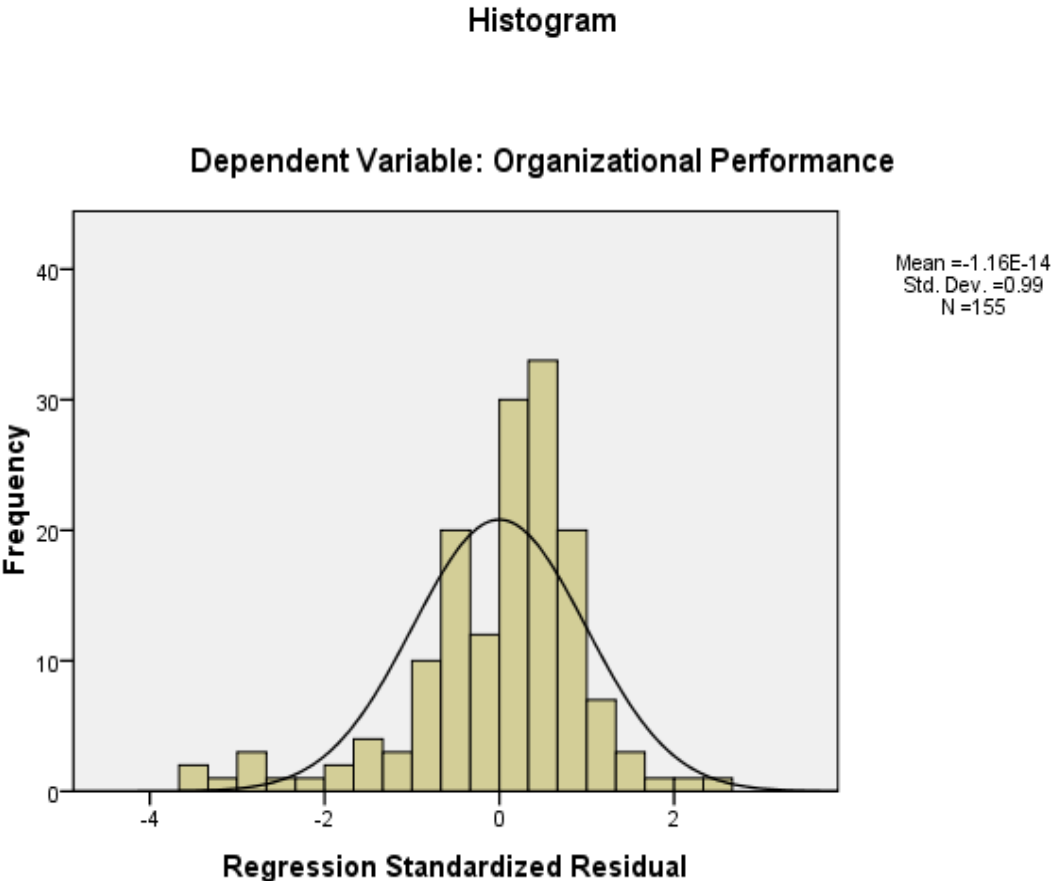
**Chart B15: Linearity Test for the Influence of Competitive Environment on the Relationship between E-marketing Practices and Organizational Performance**

**Normal P-P Plot of Regression Standardized Residual**

**Dependent Variable: Organizational Performance**



**Chart B16: Normality Test for the Joint Effect of E-marketing Practices, Corporate Culture, Competitive Environment and Organizational Performance**



**Chart B15: Linearity Test for the Joint Effect of E-marketing Practices, Corporate Culture, competitive Environment and Organizational Performance**

**Normal P-P Plot of Regression Standardized Residual**

**Dependent Variable: Organizational Performance**

