

**TOTAL QUALITY MANAGEMENT IN KENYAN COFFEE HOUSE
REVENUE GENERATION**

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B 211 – 003 – 0003- 2012

**A Thesis Proposal Submitted to the School of Business Management and
Economics in Partial Fulfillment of the Degree of Master of Business
Administration of Dedan Kimathi University of Technology.**

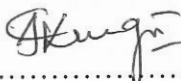
APRIL 2015

DECLARATION

This proposal is my original work and to my knowledge has not been presented to any other university or institution of higher learning for examination to the best of my knowledge.

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Signature..........Date..... 28th APRIL, 2015

This proposal has been submitted for examination with our approval as the University supervisors.

Supervisors


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DEDICATION

I dedicate the research to our beautiful country Kenya, Dedan Kimathi University of Technology, Vision 2030, and all able bodied scholars who are my source of inspiration to fulfill my obligation as a son, friend, student and noble citizen.

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ABSTRACT

The study's main aim was to analyze the role of total quality management principles in Kenyan coffee house revenue generation. Specifically; to assess the effects of continuous process improvement on coffee house revenue generation, to analyze the effects of supplier partnering on coffee house revenue generation, to evaluate the effects of customer satisfaction on coffee house revenue generation, to explore the effect of quality control on coffee house revenue generation. A census on Forty one Branch Managers working in the themed coffee house branches in Nairobi, Mombasa and Nakuru was used in this study. A questionnaire was used for data collection. The European Foundation for Quality Management model (EFQM) was used in guiding the research. Descriptive statistics such of means, standard deviation and frequency distribution were used to analyze the data. The data was presented in form of frequency tables, graphs and pie charts. A regression model was generated to establish the relationship between the dependent variable, revenue generation and the independent variables, continuous process improvement, supplier partnering, customer satisfaction and quality control. The coefficient of the variables was as follows; Continuous Process Improvement 0.969, Supplier Partnering 0.066, Customer Satisfaction 1.051 and Quality control 0.114 hence the regression model showed that Customer Satisfaction (X_3) had the greatest effects on the themed coffee house revenue generation with a coefficient of 1.051. This was followed by Continuous Process Improvement (X_1) with a coefficient of 0.969, followed by Quality Control (X_4) with a coefficient of 0.114 and finally Supplier Partnering (X_2) with a coefficient of 0.066. Further, the regression model generated R^2 value of 0.832 meaning 83.2% of the population can be explained by research variables. P value from F-test statistics ($F=11.66$) was significant at 0% level ($\text{sig.} F < 0.005$), confirming the models fitness. The study variables had a positive relationship and all the P values were less than 5% hence a conclusion on the population was made, implying that study variables had significant positive impact on the themed coffee house revenue generation. TQM principles have positive effects on overall business performance. The study recommends that the coffee houses should focus more on conformity with industry standards of operation and involve employees more in continuous process improvement programs of the organization.

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ABBREVIATIONS AND ACRONYMS

CBD:	Central Business District
CDF:	Coffee Development Fund
CBK:	Coffee Board of Kenya
CHO:	Coffee House Operations
CPI:	Continuous Process Improvement
EFQM:	European Foundation for Quality Management
F&B:	Food and Board
HRD:	Human Resource Development
ICO:	International Coffee Organization
ISO:	International Organization for Standardization
IT:	Information Technology
JIT:	Just In Time
MD:	Managing Director
PDCA:	Plan-do-check-Act cycle
QC:	Quality Control
SPC:	Statistical Process Control
TQM:	Total Quality Management

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CHAPTER ONE

1.1 Background of the Study

Coffeeshouses and coffee shops are related terms for establishments that primarily serve brewed coffee and other refreshments and also serve as informal clubs for their regular customers (Merriam-Webster online dictionary). From a cultural standpoint, coffeeshouses largely serve as centers for social interaction: the coffeeshouse provides individuals with a place to congregate, talk, write, read, entertain one another, or pass the time, whether individually or in small groups of two or three people. A coffeeshouse serves as an informal club for its regular members. The global coffee market is currently plagued by two paradoxes; a coffee boom in consuming countries, and a coffee crisis in producing countries (over supply of low quality coffee and shortage of high quality coffee) which are actually driving the coffee market (Daviron and Ponte, 2005). After the termination of the International Coffee Agreement between producing and consuming countries in 1989, the coffee market has been in a flux, with market forces and over supply bringing down the coffee prices and hence income of farmers.

According to International Coffee Organization (2004), earnings by coffee producing countries were some 10-12 billion dollars fifteen years ago which has changed to around five billion dollars in 2003. Although the percentage share of the retail coffee price that goes to the farmer has gone above 10% in recent times, it has not offset the declining prices (Oxfam, 2001).

By 2009, Brazil was the world leader in production of green coffee with 34% of the world coffee, followed by Vietnam, Indonesia and Colombia (Daviron, 2009). A recent survey of coffee farmers in India and Nicaragua has shown that the farmers consider the weather and coffee prices to be their biggest concerns (Lewin, 2004). Growers in regions such as Ethiopia,

Guatemala, Mexico and Kenya are not harvesting coffee, using it for agricultural mulch or burning it as a source of fuel.

Also, coffee producers and importers have made a number of attempts to establish cartels to limit supply into the final market and to drive up prices. In Africa, Ethiopia is inarguably the largest exporter of coffee having a world share of 6% in the global output (Belder, 2006). Other coffee producing countries in Africa include Angola, Burundi, Cameroon, Congo, Ivory Coast, Kenya, Madagascar, Rwanda, Tanzania, Uganda and Zambia (see appendix 2(ICO, 2012). In East Africa the coffee producers are Ethiopia, Uganda, Kenya and Tanzania. Ethiopia is the birthplace of coffee, more precisely Arabica coffee which has always grown wild in the forests of the southwestern highlands of the Kaffa and Buno districts of Ethiopia. The total area covered by Arabica and other types of coffee is about 400,000 hectares. Total coffee production is about 200,000 tonnes of clean coffee per year (Lemma, 2005).

This directly or indirectly affects the livelihoods for over fifteen million people in this county (Surber, 2005). Ethiopia's economy is based on agriculture. Currently, agricultural activities represent 45% of the GDP, 85% of employment, and 90% of foreign exchange earnings (Tracey, 1997). Coffee still grows wild in Ethiopia's mountain forests. Ethiopian farmers cultivate coffee in four different systems, which include forest coffee, semi-forest coffee, garden coffee and plantation coffee (Lemma, 2005). In Uganda, coffee as a commodity has continued to play a leading role in the economy, contributing between 20 - 30% of the foreign exchange earnings, despite the vigorous efforts by Government to diversify the economy.

Though large scale coffee producers are gradually emerging, the coffee sub-sector is almost entirely dependent on about 500,000 smallholder farmers, 90 percent of whose average farm size

ranges from less than 0.5 to 2.5 hectares. The coffee industry employs over 3.5 million families through coffee related activities. The policy of the Uganda Government on coffee production since liberalization in 1991 had been (and still is) to gradually replace the old, diseased coffee trees with new, genetically pure and high yielding coffee varieties at a rate of 5% per annum for Robusta and 2% per annum for Arabica for twenty years. This was expected to replace all old, unproductive coffee trees and optimize foreign exchange earnings to the country and payments to farmers. In Tanzania, coffee production is a significant aspect of its economy as it is its largest export crop (Baffes, 2003). Tanzanian coffee production averages between 30-40,000 metric tons each year of which approximately 70% is Arabica and 30% is Robusta (Flood, 2010).

The main growing regions of Arabica in Tanzania are in North Kilimanjaro, Mbeya, Matengo Highlands, Mbinga, Usambara Mountains, Iringa, Morogoro, Kigoma and Ngara. The main growing region of Robusta is the Bukoba area of the Kagera Region. Two new species were found recently in Tanzania's Eastern Arc Mountains, *Coffea bridsoniae* and *Coffea kihansiensis*. Harvest time is traditionally October to February. Ninety percent of the nation's coffee farms are smallholder, with the remainder being plantations; there are approximately 270,000 workers in the coffee industry (Flood, 2010).

Kenya produces almost exclusively washed Arabica Coffee of the Bourbon type although there is a very small production of Robusta Coffee that is grown in the low altitude areas (Howden, 2012). Kenyan coffee is characterized by very sharp acidity, full body and very pointed fine flavor. This makes it acceptable to many coffee drinkers although there are those that will complain about the high sharpness of the acidity. In terms of production, cooperatives come up with 55% of the crop while the large estates come up with the rest (45%). Cooperatives have better quality coffee that is exclusively grown along the mountains. Cooperatives are the

backbone of the coffee industry but by having many farmers, some problems may arise now and then. About 400 farmers form a factory, 10 factories form a society and approximately 30 societies form a union (Howden, 2012). Large estates come up with most of the Fair Average Quality (FAQ) types of coffee. Production varies from year to year depending on the weather and incomes generated. Annual production of Kenyan coffee is roughly about 880,000 bags; out of this 25% is the top quality, 45% FAQ, 15% MH (Mbuni) and 15% poor quality. The coffee industry of Kenya is noted for its cooperative system of production, processing, milling, marketing, and auctioning coffee. About 70% of Kenyan coffee is produced by small scale holders. It was estimated in 2012 that there were about 150,000 coffee farmers in Kenya (Howden, 2012).

There has also been a trend in the global coffee consumption patterns, with Arabica consistently taking up between 60% and 70% of the coffee exported and though approximately 2.25 billion cups of coffee are consumed everyday (Dicum and Luttinger, 1999), there is a shift towards consumption of specialty coffee in what is called the “latte revolution”, where consumers can choose from combinations of coffee origin, processing methods, packaging, social content and ambience (Daviron and Ponte, 2005). This global trend is sure to affect all producing countries, specifically East Africa’s coffee economy, as coffee is one of their main export crops. In response to this, liberalized East African markets might be the best option for some countries, and regulated markets might be better for other countries (Ponte, 2002).

However, it is unclear what the best options are for the smallholder producers. One effect could be that these trends positively affect middle income and better off farmers as suggested by Ponte (2002) for Save the Children, which showed that the disposable income will increase for middle and better off farmers by between 10 to 20% if farmers move to specialty coffee markets.

The paradox of the Kenya coffee industry is that while the country has consistently produced the best quality beans in the world, only 2% of the product is consumed locally (Varqua, 2008). The Coffee Board of Kenya (CBK) estimates that more than 70% of Kenyans who drink coffee take imported brands.

One major way of increasing the consumption of coffee locally is through coffee houses. The Kenyan government in line with Vision 2030, Coffee Board of Kenya (CBK), Coffee Development Fund (CDF) and the Brand Kenya Initiative has put deliberate efforts to encourage domestic coffee consumption, through coffee awareness campaigns and subsidies to coffeehouse set-ups. CBK estimates domestic coffee consumption at 2.5 percent, growing at a rate of 15-20 percent per year. In the last three calendar years, coffee shops have opened up in the major cities to cater for a growing middle class which has taken up a coffee drinking culture. Consequently, domestic coffee consumption will continue to grow as the Kenyan economy develops (Howden, 2012).

The study looks at key TQM principles that enable coffee houses to generate revenue from increased consumption of the same. By consuming local coffee brands, there's mitigation against losses in forex from importation of other coffee brands and creates a competitive market for the local coffee brands Coffee Board of Kenya (2012). In Kenyan coffee houses, TQM entails management dedication, product excellence/quality, continuous improvement, teamwork, and talent management. It has also made everyone conscious of the importance of having a basic perceptive of the TQM process. TQM is not just a quick management fix, but it also involves a series of changes in the way operations are carried out in the organization.

1.2 Statement of the Problem

A cup of coffee in themed Kenyan coffeehouses is retailing at Kshs 200 on average compared to tea which retails at Kshs100, hence the low consumption of coffee. High local consumption of coffee will give farmers bargaining power in auctions. This will enable the Kenyan government to earn foreign currency and strengthen Kenya's balance of payments while achieving both the economic and social pillars of her Vision 2030. The government, through the Coffee Development Fund, is seeking to increase consumption of coffee locally by giving incentives for establishment of coffeehouses. The study seeks to enjoin this government initiative through deployment of TQM in the generation of sales revenues in the coffee houses.

1.3 Purpose of the Study

The purpose of the study is to analyze the role of TQM in revenue generation in Kenya's coffeehouses.

1.4 Research Objectives

The study aims to evaluate the effectiveness of TQM in coffee house revenue generation. This study's specific objectives are:

- i. To assess the effects of continuous process improvement on coffee house revenue generation.
- ii. To analyze the effect of suppliers partnering on coffee house revenue generation.
- iii. To evaluate the effects of customer satisfaction on coffee house revenue generation.
- iv. To explore the effect of quality control on coffee house revenue generation.

1.5 Research Questions

- i. What is the effect of continuous process improvement in coffee house revenue generation?
- ii. How does supplier-partnering influence coffee house revenue generation?
- iii. What is the effect of customer satisfaction on coffee house revenue generation?
- iv. How does quality control influence defects and improve service on coffee house revenue generation?

1.6 Assumption of the Study

The study is based on the assumptions that the coffee houses in Kenya adopt TQM principles and that their market variation is as a result of their capital base and entry period in the Kenyan market.

1.7 Scope of the study

The study will be carried out in Mombasa, Nairobi and Nakuru County. Further, the study will cover the TQM principles adopted by the coffee houses, namely; Dormans, Java, Artcaffe and Savanna which will be the research locale.

1.8 Limitation of the study

The proposed study will be faced with a number of limitations; misreporting of quality control, implementation, management-employee roles, revenues and customer numbers which may occur due to protection of the various coffee house interests.

1.9 Significance of the Study

Vision 2030 (2008) encourages Kenyan companies to implement objectives that are in line with it. Under the economic pillar, Vision 2030 seeks to improve the prosperity of all regions of the country and all Kenyans by achieving a 10% GDP growth rate by 2012. Within the medium term plan 2008-2012, six priority sectors that make up the larger part of Kenya's GDP (57%) and provide for nearly half of the country's total formal employment were targeted; Tourism, Agriculture, Wholesale and Retail trade, Manufacturing, IT enabled services (previously known as business process off-shoring) and Financial services. With the implementation of TQM, the quality of goods and services is increased. Consequently, the number of defects is minimized. As a result, the cost of rework is greatly reduced. This will in turn increase the profitability of coffee houses and hence a contribution to the increase in the GDP of the country.

According to Howden (2012), the importance of coffee in the world economy cannot be overstated. It is one of the most valuable primary products in world trade, in many years second in value only to oil as a source of foreign exchange to developing countries. Its cultivation, processing, trading, transportation and marketing provide employment for millions of Kenyans in Central Province. Coffee is grown by the small holder coffee farmers who belong to the cooperative societies. There are between 500,000 and 700,000 members of cooperative societies, about 2,000 coffee farmers in the small and medium estate category and about 200 planters with more than 25 hectares of coffee. Coffee was the leading export crop since independence to 1988.

Between 1975 and 1986, it contributed over 40% of the total Kenyan exports value. After the 1978/88 production peak, the international prices fell sharply in 1989 and by 1992 coffee

contributed less than 9% of the total export value. Following the policy changes to liberalize the industry in 1992, which allowed the sale of coffee in US dollar and the improvement of the world market prices, the contribution of coffee, increased to 15% in 1995. Coffee earned about KShs. 107 billion which is about 10% of the Agricultural share of GDP between 1987/88 and 1997/98. Coffee production has declined over the past ten years leaving over `600,000 households, of which about 80% are located in the Central Province of Kenya.

Coffee still remains the main economic activity for millions of households and is therefore central to the wealth creation strategy. In 2003/04 coffee ranked among the country's top foreign exchange earners. It came fourth after tourism, tea, and horticulture. Coffee accounted for 15% of the exports a decade ago. The current trends of Kenya's coffee prices are on the rise following an increase in the global prices of Arabica and specialty markets, which Kenyan coffee happens to fall under. Kenya is primarily a producer of Arabica coffee, accounting for around 1% of the global coffee production, and 2% of the value of global exports. Germany accounts for about 35% of total exports out of Kenya, followed by Sweden, United Kingdom, United States of America, Netherlands, Belgium and others. Since 1997 Kenyan coffee has lost significant market share, through replacement of its blends with Costa Rica, and coffees from other origins, which are considered cheaper but of comparable attributes (Gaitho, 2004).

The study analyses the view of TQM for the coffee house operations using service quality and human resource development contexts. This is in recognition of the fact that the use of TQM can lead to improved business performance by making the work environment more competitive for the employees. This study is important because it can help identify the strategies that are needed

to be in put in place in order to upgrade the level of employee satisfaction and productivity. The study will depict the overall human resource development competence of Kenyan Coffee houses in the context of TQM and how it can increase consumer satisfaction. The study is set to recognize the overall implementation of the company's TQM strategies, especially when it comes to quality management and employee empowerment. As a whole, the study will also illustrate how the managers view TQM principles and strategies, in terms of how they are implemented in the various coffee shops.

1.9.1 Operational definitions of the Terms

Coffee House Revenue Generation: Activities in a given coffee shop that enable sale of goods and services leading to transactions that generate cash.

Continuous Process Improvement: An ongoing effort to improve products, services, or processes. These efforts can seek "incremental" improvement over time or "breakthrough" improvement all at once.

Customer satisfaction: A measure of how products and services supplied by a company meet or surpass customer expectation.

Foreign Exchange Market: The foreign exchange market (Forex, FX, or currency market) is a global decentralized market for the trading of currencies.

Just-in-Time: A production strategy that strives to improve a business' return on investment by reducing in-process inventory and associated carrying costs.

Quality Control: The process by which entities review the quality of all factors involved in production.

Supplier-Partnering: Mutually beneficial relationships between the organization and its suppliers to enhance the ability of both to create value.

Total Quality Management: A management approach centered on quality, based on the participation of an organization's people and aiming at long term success.

Zero Defects: A way of thinking and doing that reinforces the notion that defects are not acceptable.

CHAPTER TWO

LITERATURE REVIEW

2.1 Birth of Coffee Houses

Today coffee is grown in a multitude of countries around the world (John Francis, 2007). Whether it is Asia or Africa, Central or South America, the islands of the Caribbean or Pacific, all can trace their heritage to the trees in the ancient coffee forests on the Ethiopian plateau. The Arabs were the first, not only to cultivate coffee but also to begin its trade. By the fifteenth century, coffee was being grown in the Yemeni district of Arabia and by the sixteenth century it was known in Persia, Egypt, Syria and Turkey (Bealer, 2001). Coffee was not only drunk in homes but also in the many public coffee houses called “qahveh khaneh” which began to appear in cities across the Near East.

The popularity of the coffee houses was unequalled and people frequented them for all kinds of social activities. Not only did they drink coffee and engage in conversation, but they also listened to music, watched performers, played chess and stayed up to date with current affairs. In fact, they quickly became such an important center for the exchange of information that the coffee houses were often referred to as 'Schools of the Wise (Meyers, 2005). With thousands of pilgrims visiting the holy city of Mecca each year from all over the world, word of the 'wine of Araby' as the drink was often called, was beginning to spread far beyond Arabia. In an effort to maintain its complete monopoly in the early coffee trade, the Arabians continued to closely guard their coffee production.

European travelers to the Near East brought back stories of the unusual dark black beverage. By the 17th century, coffee had made its way to Europe and was becoming popular across the

continent. Opponents were overly cautious, calling the beverage the 'bitter invention of Satan.' The local clergy condemned the introduction of Coffee to Venice in 1615. The controversy was so great that Pope Clement VIII was asked to intervene. Before making a decision however, he decided to taste the beverage for himself. He found the drink so satisfying that he gave it Papal approval (Meyers, 2005).

Despite such controversy, in the major cities of England, Austria, France, Germany and Holland, coffee houses were quickly becoming centers of social activity and communication. In England 'penny universities' sprang up, so called because for the price of a penny one could purchase a cup of coffee and engage in stimulating conversation. By the mid-17th century, there were over three hundred coffee houses in London, many of which attracted patrons with common interests, such as merchants, shippers, brokers and artists (Kenneth Davids, 2001). Many businesses grew out of these specialized coffee houses. Lloyd's of London, for example, came into existence at the Edward Lloyd's Coffee House.

As demand for the beverage continued to spread, there was tense competition to cultivate coffee outside of Arabia. Though the Arabs tried hard to maintain their monopoly, the Dutch finally succeeded in the latter half of the 17th century and managed to obtain some seedlings. Their first attempts to plant them in India failed but they were successful with their efforts in Batavia, on the island of Java, what is now Indonesia. The plants thrived and soon the Dutch had a productive and growing trade in coffee. They soon expanded the cultivation of coffee trees to the islands of Sumatra and Celebes (Wild, 2003). The Dutch did a curious thing, however. In 1714, the Mayor of Amsterdam presented a gift of a young coffee plant to King Louis XIV of France. The King ordered it to be planted in the Royal Botanical Garden in Paris. In 1723, a young naval

officer, Gabriel de Clieu obtained a seedling from the King's plant. Despite an arduous voyage complete with horrendous weather, a saboteur who tried to destroy the seedling and a pirate attack, he managed to transport it safely to Martinique.

Once planted, the seedling thrived and is credited with the spread of over 18 million coffee trees on the island of Martinique in the next fifty years. It was also the stock from which coffee trees throughout the Caribbean, South and Central America originated (Kenneth Davids, 2001). Coffee is said to have come to Brazil in the hands of Francisco de Mello Palheta who was sent by the emperor to French Guiana for the purpose of obtaining coffee seedlings. But the French were not willing to share and Palheta was unsuccessful. However, he was said to have been so handsomely engaging that the French Governor's wife was captivated. As a going-away gift, she presented him with a large bouquet of flowers. He found enough coffee seeds buried inside to begin what is today a billion-dollar industry (Kenneth, 2001).

In only 100 years, coffee had established itself as a commodity crop throughout the world. Missionaries and travelers, traders and colonists continued to carry coffee seeds to new lands and coffee trees were planted worldwide. Plantations were established in magnificent tropical forests and on rugged mountain highlands. Some crops flourished, while others were short-lived.

New nations were established on coffee economies. Fortunes were made and lost. And by the end of the 18th century, coffee had become one of the world's most profitable export crops (Kenneth Davids, 2001). The Ethiopian ancestors of today's Oromo ethnic group were the first to have recognized the energizing effect of the native coffee plant (Bealer, 2001).

Studies of genetic diversity have been performed on *Coffea arabica* varieties, found to be of low diversity but which retained some residual heterozygosis from ancestral materials, and closely related diploid species *Coffea canephora* and *Coffea liberica*; however, no direct evidence has ever been found indicating where in Africa coffee grew or who among the natives might have used it as a stimulant or known about it there, earlier than the 17th century (Bealer, 2001). The original domesticated coffee plant is said to have been from Harar, and the native population is thought to be derived from Ethiopia with distinct nearby populations in Sudan and Kenya (Wild, 2003).

In total, there are around twenty countries that produce coffee in Africa. The main producers are of course Ethiopia, Kenya, Uganda, Tanzania, Burundi and Rwanda. Of the smaller producers which offer good quality, Ghana, Malawi, DRC, Angola and Cameroon stand out. Although scarce, some excellent single origin coffee can sometimes be found in some of these countries. There are mainly two species of coffee plants, *Coffea robusta* which originated in central Africa, mainly Uganda. The other more popular species is *Coffea arabica*, which originated in Ethiopia. Arabica seems to have a richer flavor and is grown all over the world (Wild, 2003).

Despite its proximity to Ethiopia (widely believed to be the region from which coffee originated), one source states that coffee was not cultivated in Kenya until 1893, when French Holy Ghost Fathers introduced coffee trees from Reunion Island. The mission farms near Nairobi, the capital city of Kenya, were used as the nucleus around which Kenyan coffee growing developed. (K'Oroth, 2013) Overview of the Kenyan coffee industry claims the British introduced coffee growing into Kenya in about 1900 (Kenneth, 2001).

The coffee industry of Kenya is noted for its cooperative system of production, processing, milling, marketing, and auctioning coffee. About 70% of Kenyan coffee is produced by small scale holders. It was estimated in 2012 that there were about 150,000 coffee farmers in Kenya (Howden, 2012). The growing urban coffee culture trend among young adults and professionals is not waning. Trendy Coffee shops with cozy lounges serving fresh coffee are springing up in the capital, starting with Java, Sasini, Artcaffe, (which recently acquired Dormans) and Savanna. Increasing westernization and higher incomes among the middle and upper classes are driving the growth of fresh coffee in the on-trade. Consumers patronizing these coffee shops have usually been exposed to a coffee drinking culture in the Western world. It is imperative that the end point of quality is consumer satisfaction because it will be the customers that will pay for the services and products that the coffee houses seek to provide.

When it comes to the discussion of TQM, there is a wide-array of areas to discuss. Nevertheless, it comes from the joint effort of staff members and managers. TQM is a tool that organizations implement in order to sustain business profitability. The direct goal of TQM is not to profit the company, but to improve the products and services the business can provide. According to Bunney (1999), organizations can sustain their strategies for continuous development and to create total quality culture through the planned implementation of TQM.

For decades, coffee houses have brought inspiration and motivation to millions of people across the globe. Aside from extraordinary coffee, coffee houses have made business out of human connections, community involvement, and the celebration of cultures. Committed to continuous improvement, the corporate strategies of coffee houses have been guided with the principles of

Total Quality Management. TQM was developed way back in the 1920s and the Japanese expanded its concept in the 1940s. Since then, TQM evolved and influenced almost all sectors in the business world, including the food and beverage service industry.

A few decades ago, topics like “Quality Control” and “Total Quality Management” have drawn a lot of attention in the food and beverage service industry. Hundreds of studies have been conducted to help the evaluation of an organization’s quality standards and guide the organizations towards the areas that need improvement with respect to quality management or quality control. Since TQM is an area of study that is directed towards consumer satisfaction, this can be significantly discussed within the context of the coffee houses’ corporate culture. They are always after the pleasure of external consumers through the provision of goods and services using the most effective means possible. TQM is the key to business improvement and it is important for management since it is essential for effectiveness and competency. According to Mancini (2003), the theory of TQM is to create or to produce products and services that meet the consumers’ needs and wants in a highly satisfactory level. This makes TQM an issue for business strategy in the company. As we study coffee house revenue generation, we will seek to understand how TQM principles are implemented.

2.2 Concept of Total Quality Management

One issue that is still controversial from the literature on TQM is the definition of quality. To date, there is no consensus on this definition (Wicks, 2009). Quality has different meanings to different people in different institutions, public or private, depending on their specific perspective. For those with a focus on quality control, quality is a way of managing efficiently and effectively. It is often referred to as the organization’s best investment in competitiveness (Feigenbaum, 1991).

By whatever definition, different approaches to quality have been applied by various organizations depending on their specific objectives. The bottom line is that quality has become an important phenomenon. Crosby (1979) claims that although "quality is free, it is not a gift, but it is free." However, it should not be taken as given, because "the cost of quality is the expense of doing things wrong." Therefore, it should be clearly defined and understood from ontological, epistemological and practical situations. Only then can the quest for quality be justified (K'oroth 2013).

Deming's approach to quality management theory focuses on "customers" as measures of achievement. In this sense, customers' ideas must be taken seriously and transformed into actionable information to evaluate the impact of the improvement efforts and to reinforce the customer focus within the organization. In order to achieve customer satisfaction, the quality process must be improved continuously until customer demands are met (K'oroth 2013).

2.3 Theoretical Framework

John Oakland (2014) identifies quality as a significant element of production or services in keeping the customers satisfied. There are many definitions and competing views of the term quality by different people and the common element of the business definitions is that the quality of a product or service refers to the perception of the degree to which the product or service meets the customer's expectations. The principles of quality systems can also be applied to safety, health and the environment. Forward-looking organizations now audit their procedures against the requirements of quality, safety, health and the environment (Oakland, 2014)

The quality tools are also undergoing continuous development. New developments in the field of quality costing (process cost modeling), benchmarking and TQM performance-based measurement present exciting opportunities. Metrics need to be developed to measure the organization's non-achievement of quality. Measurement of TQM progress is an important area. Many organizations are using criteria such as the European Excellence Award or the UK Business Excellence Award as an evaluative and diagnostic to measure TQM progress. The concept of continuous improvement creates a need for the imaginative use and development of the components of TQM. The TQM model incorporates many well-established tools, systems and techniques. The development and improvement of these are vital to the success of TQM. Furthermore, this award model is complemented by the Plan-Do-Study-Act cycle, which is propagated by Edward Deming and is the precursor of the ISO 9001 and process approach to Total Quality Management, which is underpinned by this cycle.

2.3.1 European Foundation for Quality Management Model (EFQM)

The EFQM model is a general model that cuts across different types of companies for assessing and designing the company's architecture in terms of best practices. It is based on different cultural and structural elements, with a view to developing an excellent organization. The management of any type of organization that wants to implement strategy redesign and develop organizational structures and processes can use it. Companies or organizations have visions and missions, which they explicitly or implicitly try to achieve. A simple but not an easy mission, which any company should try to achieve, is to satisfy both their customers and their stakeholders. Here the stakeholders are: the shareholders (owners), the employees, business partners and the society (Conti, 1997). In order to achieve that mission, companies may need a

business model and a measurement framework, which can help in understanding the changes or improvements they are doing and the results they are achieving, and what they shall do in order to improve future results. In this research, the European Excellence Model will be a reference model to which the discussion of what to measure, how and why is relevant.

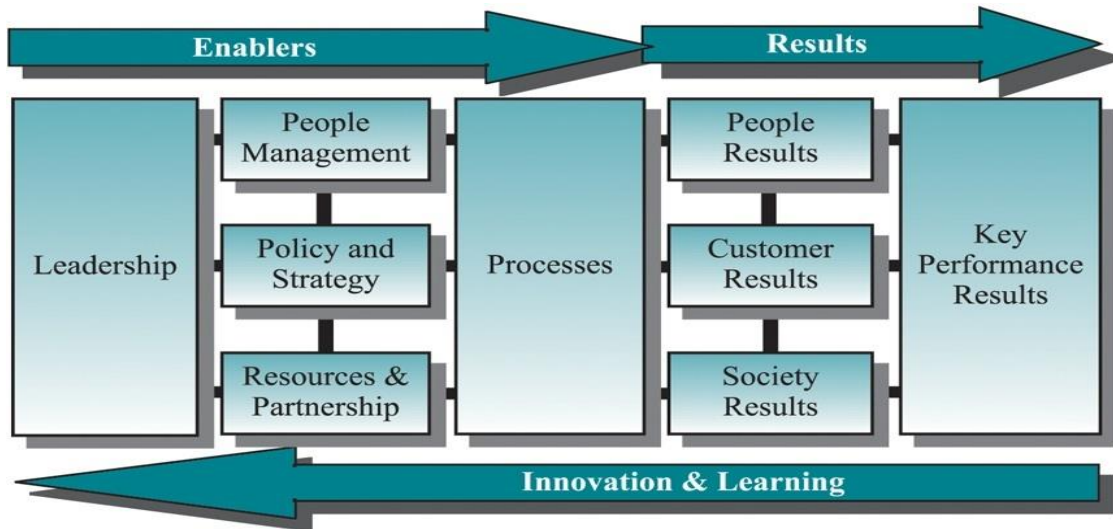


Figure 1: EFQM Model
Source: Oakland, 2000.

The model consists of nine criteria. The first five criteria are the enabler criteria of Leadership: people, policy/strategy and partnerships/resources. With Processes: The four criteria on the right of the enabler are the result criteria: people results, customer results, society results and key performance results. Conti (1997) calls the first four criteria for systemic factors. They can also be referred to as four factors for management processes because these criteria traditionally “belong to” top and middle management. Criterion 5 depicts the processes where people are producing and delivering products and services to satisfy today's as well as tomorrow's customers; that is, production and service processes. Criterion 5 also comprises the various support processes.

The model is based on the following eight fundamental concepts: results orientation, customer focus, leadership and constancy of purpose, management by processes and facts, people development and involvement, continuous learning, innovation and improvement, partnership development and public responsibility. The European Foundation for Quality Management (EFQM) stresses in their training material that an assumption behind the model is that the results of the organization are achieved through excellent performance in the enabler criteria. An organization achieving excellence in the enablers will experience sustainable developments through improved customer, people, society and financial results.

That sounds logical and easy, but reality or practice is not always that simple. There is among others no consensus on how to start up and how to continue with the implementation of the EFQM Excellence model. Companies are struggling with a lot of problems and many companies skip the model because the model seems too complex to understand and too time consuming to implement. One reason for that is that many companies need guidance on what to measure, why and how, especially related to the enabler side of the model (Oakland, 2000). What is important to understand is that you cannot measure everything you are doing on the enabler side. The main rule is that enabler activities should only be measured when they have been decided and planned either as part of the yearly strategic planning process (Policy Deployment) for achieving strategic business goals or as a specific decided improvement project. In these cases, you need enabler activity measurements in order to understand why you get or do not get the planned results. Another reason behind implementation problems is linked to the management paradigms.

The consequence of that is not only failure with implementation, but also people's contribution may not be maximized because people development and involvement are far from being

fulfilled. The critics of the European Excellence Model do not mean to reject the model as such. The point is that the model in future should be used more like a business or management control model where the main aim is to make improvements in order to achieve the mission above; to satisfy customers, owners and other stakeholders. Under this condition, the researcher regards the model as one of the best management control models, which definitely can help companies in deciding on what will be measured, why and how, in order to improve competitiveness and financial performance, in this case revenue generation (Dahlgaard-Park, 2003, 2008).

2.3.2 Plan-Do-Check-Act Cycle (PDCA)

The essence of continuous improvement lies in employee involvement. This happens when they improve their processes, products or services by applying their creative faculties on their work related problems and routine jobs. Kaizen (Japanese word meaning continuous improvement) provides these employees a platform to enhance their creativity. Dr W. Edwards Deming, who is considered by many to be the father of modern quality control, made PDCA popular. However, he always referred to it as the "Shewhart Cycle". Later in Deming's career, he modified PDCA to "Plan, Do, Study, Act" (PDSA) because he felt that "check" emphasized inspection over analysis (Anderson, 2011). The concept of PDSA is based on the scientific method, as developed from the work of Francis Bacon.

The scientific method can be written as "hypothesis"—"experiment"—"evaluation" or plan, do and check. Shewhart described manufacture under "control" under statistical control, as a three-step process of specification, production, and inspection (Shewhart, 1939). He also specifically related this to the scientific method of hypothesis, experiment, and evaluation. Shewhart says that the statistician "must help to change the demand for goods by showing how to close up the

tolerance range and to improve the quality of goods."Clearly" (Shewhart, 1939), Shewhart intended the analyst to take action based on the conclusions of the evaluation. According to Deming, during his lectures in Japan in the early 1950s, the Japanese participants shortened the steps to the now traditional Plan, Do, Check, Act (Deming, 1986). Deming preferred Plan, Do, Study, and Act because "study" has connotations in English closer to Shewhart's intent than "check" (Moen, Ronald; Norman, Clifford, 2011).

A fundamental principle of the scientific method and PDCA is iteration. Once a hypothesis is confirmed or negated, executing the cycle again will extend the knowledge further. Repeating the PDCA cycle can bring us closer to the goal, usually a perfect operation and output (Moen, Ronald; Norman, Clifford, 2011).

Another fundamental function of PDCA is the "hygienic" separation of each phase. If not properly separated, measurements of effects due to various simultaneous actions (causes) risk becoming confounded (Berengueres, Jose 2007). PDCA and other forms of scientific problem solving are also known as systems for developing critical thinking. At Toyota, this is also referred to as "Building people before building cars." (Liker, Jeffrey 2004). Toyota and other lean companies propose that an engaged, problem-solving workforce using PDCA has a higher ability to innovate and stay ahead of the competition through rigorous problem solving and the subsequent innovations. This also creates a culture of problem solvers and critical thinkers using PDCA. Deming continually emphasized iterating towards an improved system, hence PDCA should be repeatedly implemented in spirals of increasing knowledge of the system that converge on the ultimate goal, each cycle closer than the previous. One can envision an open coil spring,

with each loop being one cycle of the scientific method: PDCA, and each complete cycle indicating an increase in our knowledge of the system under study.

This approach is based on the belief that our knowledge and skills are limited, but improving. Especially at the start of a project, key information may not be known; the PDCA provides feedback to justify our guesses (hypotheses) and increase our knowledge. Rather than enter "analysis paralysis" to get it perfect the first time, it is better to be approximately right than exactly wrong. With the improved knowledge, we may choose to refine or alter the goal (ideal state). Certainly, the PDCA approach can bring us closer to whatever goal we choose (Rother, Mike 2009). The figure below gives a clear picture of the model:

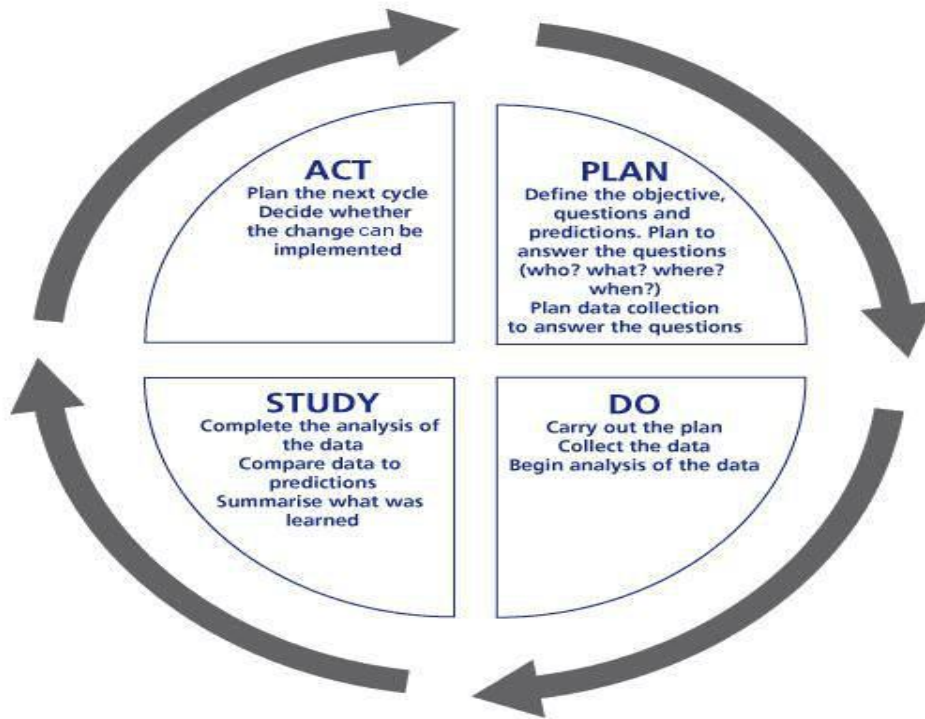


Fig 2: Plan-Do-Study-Act cycle
Source: Gatlin, 2009.

The PDSA cycle is a continuous improvement tool whose objective is to test an idea by temporarily trialing a change and assessing its impact. PDSA cycles enable the user to test out changes before wholesale implementation and give stakeholders the opportunity to see if the proposed change will work. Using the PDSA cycle involves testing new change ideas on a small scale. PDSA cycles form part of the improvement guide, which provides a framework for developing, testing and implementing changes leading to improvement. The model is based on scientific methods and moderates the impulse to take immediate action with the wisdom of careful study. In a study for Ford motors in Taiwan, Gatlin (2009) identifies seven components that complement the Deming cycle in retrospect of the cycle being successful. They include identifying a problem statement, formulation of goals, identifying points of cause, evaluating root causes, developing counter measures, doing a follow up and finally standardization. These highlight applicability of the PDSA cycle in effecting total quality management principles that will enable revenue generation in the named coffee houses. The components are explained below.

2.3.2.1 Problem

The Problem Statement is a clear, concise and measurable description of waste, rework or deviation from a standard (the norm). It should explain who is experiencing the problem, when they experienced the problem, and where they experienced the problem. The description must be measurable, and should refer to the standard.

2.3.2.2 Goal Statement

The Goal Statement is the clear, concise, measurable and attainable objective. It must include a precise target date to accomplish the goal. The Goal Statement must mirror the problem statement.

2.3.2.3 Point of Cause

Think, cause and effect. If the problem is waste or the deviation from standard, then the point of cause is the physical time and/or location the deviation is occurring. Apply the “because equation” to the problem to help define the point of cause (the problem occurs because of the point of cause).

2.3.2.4 Root Causes

The root cause is the underlying reason, often hidden or obscure, that is creating the problem. If the PDCA does not identify and eliminate the true root cause or causes, then the problem will most likely come back. You get to root causes through why analysis and other PDCA tools.

2.3.2.5 Counter Measures

The “do” phase of the PDCA are the actions the PDCA group will take to eliminate the root causes, and ultimately prevent the problem from recurring. These actions are specific activities that have a clear function, a beginning and an end. Each counter measure must tie back to a root cause, and each counter measure must provide support achieving the goal statement. A counter measure must have a begin date and a target date or expected date to complete. One member of the PDCA group is responsible for ensuring the counter measure is implemented by the target date; that group member may only assist in doing the actual work or may not even be involved in the actual work, but he or she is ultimately responsible to ensure that it happens.

2.3.2.6 Follow Up

This is the “Check and Adjust” phase of the PDCA. When the group first plans the counter measures to be taken, they should schedule a time to return to check on their success. This can be a week into the future, a month, six months, a year depending on the target date set in the goal statement. If the counter measures were successful, standardize. If the problem still exists, then adjustments can be made. That may mean simply modifying the counter measure or stepping back and reviewing the Point of Cause and Root Causes. Follow-up is often the most ignored step in a PDCA cycle, and is arguably the most critical.

2.3.2.7 Standardization

Standardization is developing the logistics of the process so that work is performed the same way across communities, companies, cities and states. Standardization includes communication and education. The group communicates the standard through sharing the PDCA, creating a Standardized Work Instruction Sheet (SWIS), creating a Value Stream or Process Map, updating a manual, among other tools. The group educates through reviewing a SWIS at a team meeting, creating a certification program, one-on-one coaching, and so on.

2.3.3 Theories Gap

It is widely known that the underlying concept behind the ISO 9001 Quality Management standard is the PDCA cycle. The ISO 9001 standard suggests that a process approach is taken to quality management systems, and is based on eight quality principles. They are customer focus, leadership, involvement of people, process approach, system approach to management, continual improvement, factual approach to decision-making and mutually beneficial supplier relationships.

However, the key concept underpinning the standard is the PDCA cycle which is not clearly highlighted and as mentioned above, ISO 9001 promotes a process approach to quality management, and the PDCA cycle can be applied to all processes. Additionally, although it is stressed by EFQM that the model is based on the eight fundamental concepts shown above, the actual implementation approach will vary depending on the interpretation and understanding of the model and the existing management paradigm often determines the character and direction of the interpretation. For instance, if the existing and dominant (Dahlgaard-Park, 2003, 2008) management paradigm is a rational and measurement oriented one, the model will be interpreted favoring those aspects, while other aspects such as people and culture, which are rather irrational and intangible aspects, will be more or less undermined or ignored.

Hence, a major problem when implementing the model, is to balance the human oriented approach with a fact and measurement based approach. This problem is related to a tendency to focus mainly on tangible and objective aspects while underestimating the more intangible and subjective aspects. An unbalance where the human dimension is underestimated while tools and techniques are prioritized in implementation processes can be one of the main causes of TQM failures.

2.4 Empirical Framework

2.4.1 Continuous Process Improvement

Continuous improvement is described as both a management strategy in itself, but also as a process within more comprehensive quality improvement strategies, such as Total Quality Management or Lean production (Bessant and Francis, 1999). Improvement is defined by Juran and Gryna (1988) as the attainment of a new level of performance that is superior to any previous level. According to Imai (Imai, 1986), improvements can be divided into Kaizen and

innovation. Kaizen refers to maintaining and improving the work-standard through small, gradual improvements, while innovation means improvements as a result of large investments.

Continuous improvement is often formalized by the PDCA (Plan, Do, Check, Act), benchmarking, learning cycle and improvement tools and methods, such as root cause analysis (RCA), and visualizations like cause-and effect and tree diagrams (Arnheiter and Maleyeff, 2005). It can also be manifested through the cost of quality. The first to discuss, identify and define quality costs were Juran and Feigenbaum in the 1950's (Williams, Van der Wiele and Dale, 1999). Since then the understanding of the subject area has developed. Traditionally the quality costs were seen from a production oriented point of view, taking only costs of deviating from specification into account (Sörqvist, 2001). The area has since become wider as the term quality has developed a wider meaning. Still there is no agreement on a single general definition of quality costs, but it is usually considered to be composed of the sum of conformance plus non-conformance costs (Schiffauerova and Thomson, 2006). Juran defined quality costs as "the costs that would disappear if a company's products and its processes were to be perfect" (Sörqvist, 2001). Some argue that this definition is too wide because it would include non-value adding costs that are traditionally not seen as quality costs. Instead a definition like "the additional costs that occurs as a result of poor quality" could be used (Sörqvist, 2001).

The rather wide definition of quality costs indicate that the concept comprises a correspondingly wide range of costs, many of which are hidden. At times the quality costs are described as an iceberg (Campanella, 1999). Campanella describes the more obvious quality costs, for example

scrap and rework, as the visible part of the iceberg. Below the surface resides the “hidden quality costs”, which are far larger than the ones represented by the tip of the iceberg.

Joseph Juran proposed to categorize quality costs into prevention, appraisal, internal failure and external failure costs (Superville and Gupta, 2001). Prevention costs are those used in efforts to prevent poor quality in products or services from occurring. Examples are quality education and training, quality planning, quality improvement projects and process capability evaluations.

Appraisal costs are costs associated with identifying which individual products do not conform to quality standards. Inspection of supplies, in-process production and finished products are typical appraisal costs.

Internal failure costs are connected to deviation from quality standards that are detected before the product or service is delivered to the customer. Examples range from scrap and rework costs to downtime costs caused by defective products or deficient maintenance.

External failure costs are costs attributable to deviation from quality standards detected after delivery to customer. Cost of recalls, warranties and customer complaints are some of those included in this category.

Quality costs are also sometimes divided into what is referred to as conformance and non-conformance costs. Conformance costs are associated with making sure products or services conform to specified standards and consist of prevention and appraisal costs. Non-conformance costs arise from products or services that do not comply with quality standards and consist of the

internal and external failure costs. Most importantly, however, is not the categorization of quality costs but that the quality costing system is tailored to suit the needs of the organization (Pursglove and Dale, 1995).

2.4.1.1 Research Gap on Continuous Process Improvement

Future research is needed to reveal other moderators of the relationship between continuous process improvement and revenue generation. Other variables such as organizational support for learning, development and job specification meeting career commitment may also be examined as a mediating variable between the need for continuous process improvement. Defined as the extent organizations wish to advance their product quality and services, this may result in a greater rate of performance if it was felt to be beneficial to the organization's long-term goals and objectives.

2.4.2 Supplier Partnering

Trent and Callahan (1993) show that supplier partnering can be an extended relationship between buyers and sellers based on confidence, credibility, and mutual benefit. The buyer, on its part, provides long-term contracts and assurance of only a small number of competing suppliers. In reciprocation, the seller implements customers' suggestions and commits to continuous improvement in quality of products and delivery time. In today's business, many buying firms pursue aggressive strategies such as supplier partnering and outsourcing in order to increase their future rate of capabilities improvement (Trent, and Callahan, 1993).

There are several reasons behind pursuing aggressive strategies. Firstly, manufacturers are focusing on their core competencies and areas of technical expertise. Secondly, developing an effective supply base management strategy can help counter the competitive pressures brought

about by intense worldwide competition. Thirdly, suppliers can directly support a firm's ability to innovate in the critical areas of product and process technology. Wicks (2009) showed 95% of the business units sampled indicated supplier contributions were increasing in terms of importance. Supplier partnering has been ubiquitous in Japan and Korea for a number of years, but is less evident in United States firms due to a perceived lack of instant return on investment. Interestingly, this practice was recognized early in the 1900's by the American automotive industry when Ford required improved supplier capacity (Krause, Handfield, and Tyler, 2006).

In the 1970s other Japanese automakers implemented the system and made their own modifications; for example, Honda developed a program called BP (Best practices). Review of case studies (Sako, 2004), allowed examining differences between supplier partnering activity in Toyota, Nissan and Honda. In 1939, Toyota purchasing rules stated that Toyota suppliers must be treated as a branch of Toyota and Toyota must continue to do business with these suppliers without switching to others. The rule also encouraged the development of suppliers if required. Toyota generated supplier development activities into Toyota Production System (TPS) and Total Quality Control (TQC). Hyundai also realized that their small suppliers could not recruit engineers thus they sent engineers from their own shops to improve suppliers' productivity. Hyundai do not financially support their suppliers but offer personnel support (Handfield R. *et al.*, 2000). Nissan also implemented supplier development programs which were significantly different from Toyota in terms of number of point of contacts for suppliers.

2.4.2.1 Research Gap on Supplier Partnering

Perceived lack of "instant" on investment has resulted in supplier partnering being overlooked over the years. Supplier partnering in essence increases organizations' future rate of capabilities improvement helping them to cope with competition. Further research will highlight the shortfall

in efficiencies regarding supplier partnership and this overlooked factor will identify the cost benefit implication of adopting a working relationship between organizations and their suppliers.

2.4.3 Customer Satisfaction

Previous research has explored the link between customer focus, satisfaction and business performance broadly (Anderson and Sullivan, 1993; Bernhardt et al., 2000; Kerin *et al.*, 1990; Morgan and Rego, 2006; Reichheld and Teal, 1996; Reichheld and Sasser, 1990). The general consensus is that higher customer satisfaction leads to higher levels of repurchase intent, customer advocacy, and customer retention (Anderson and Sullivan, 1993; Bolton and Drew, 1991; Lam et al., 2004; Mittal and Kamakura, 2001). In turn, higher satisfaction and loyalty leads to improved revenue, profitability, and cash flows (Ittner and Larcker, 1998; Heskett *et al.*, 1994; Reichheld and Teal, 1996). The net effect is that these relationships then lead to positive outcomes on the firm's market share and value (Aksoy *et al.* 2008; Fornell et al., 2006; Gruca and Rego, 2005; Anderson *et al.*, 2004; Srivastava *et al.*, 1998). A large body of research has found a strong, positive relationship between customer satisfaction and repurchase intentions (Anderson and Sullivan, 1993; Bolton, 1998; Boulding *et al.*, 1993; Mittal and Kamakura, 2001; Oliver, 1980; Zeithaml *et al.*, 1996). However, the relationship between satisfaction, actual loyalty and revenue generation is less clear, and confounding relationships occur between satisfaction, intentions and actual behavior (Rust et al., 1995; Ganesh *et al.*, 2000).

In the same regard, researchers have found that when examining the direct effects between customer focus and satisfaction, the two constructs do not always correlate positively with financial performance (Loveman, 1998; Silvestro and Cross, 2000). There are a number of reasons for such lack of clarity and confusion. The strength of the satisfaction –repurchase

intention relationship- can vary by type of product purchased (Chandon *et al.*, 2005), nature of the relationship between supplier and customer (Lemon *et al.*, 2002; Reinartz and Kumar, 2005), and supply chain strategies (Rust *et al.*, 2004). Some have found that the satisfaction and repurchase intention relationship evolves over time (Mittal *et al.*, 1999). Customer satisfaction can be defined as a person's felt state; either pleasure or discontent, ensuing from comparing a product's perceived performance (or outcome) in relation to the person's expectations (Kotler *et al.*, 1996; Fecikova', 2004; Lin *et al.*, 2010). Customer satisfaction has long been recognized as one of the critical success factors in today's competitive business environment as it affects the market share and customer retention of companies. "Satisfied customers tend to be less influenced by competitors, are less price sensitive, and stay loyal longer" (Dimitriades, 2006 as cited by Sit *et al.*, 2009, p. 958). Ultimately, this will contribute to the bottom-line or financial growth of the companies. On the other hand, TQM is based on the idea of customer satisfaction (Fecikova', 2004). Organizations thrive to achieve total quality (the pursuit of excellence, zero defects, continuous improvements) "based on the participation of all its members and aiming at long-term success through customer satisfaction" (Melan, 1998).

Establishing and achieving customer satisfaction is seen to be the ultimate goal of every organization. From various previous studies, it is noted that TQM has become the key element for improving the performance of companies and satisfaction of customers (Terziovski, 2006; Sakthivel *et al.*, 2005; Lagrosen, 2001). The adoption of TQM, as it is today, is too much focused on the internal aspects of the organization and overlooks the customers (Lagrosen, 2001). In fact, the TQM contents are full of exhortations about quality for customers and customer orientation is considered to be one of the major, if not the major building blocks of

TQM (Lagrosen, 2001). Hence, considerable attention should be devoted to customer satisfaction in relation to TQM implementation. According to Sakthivel *et al.* (2005), customer satisfaction is deemed to be the leading criterion for determining the service quality delivered to customers. Thus, the researchers have conducted an empirical study to determine the relationship between TQM implementation and customer satisfaction in higher education institutions. Based on their findings, it is evidenced that a significant positive correlation between the five TQM variables (commitment of top management, course delivery, campus facilities, courtesy, and customer feedback and improvement) and the students' satisfaction does exist (Sakthivel *et al.*, 2005).

With this clearly established relationship between the TQM implementation and the students' satisfaction of academic performance, the study recommended that this model should be effectively implemented in higher educational institutions. In addition, to achieve long-term competitive advantage in a business, a high level of quality and customer satisfaction must not be ignored; they are the basic building blocks and cannot be separated in any business operations. Effective implementation of TQM is the potential source of sustainable competitive advantage. Furthermore, the empirical findings of Trent (2006) also revealed that quality management practice is the most significant and positive predictor of productivity, improvement and customer satisfaction.

2.4.3.1 Research Gap on customer satisfaction

While these studies have generally found a significant relationship between satisfaction and repurchase intention, a good deal of variation in this relationship remains unexplained. However, other researchers have questioned the use of repurchase intentions as a surrogate of actual customer behavior. They have noted that many customers with high satisfaction and/or

repurchase intentions ultimately defect, and, conversely, some customers with low satisfaction and repurchase intent often stay with a supplier. Both of these outcomes are contrary to the main effect of satisfaction-repurchase intentions, suggesting complexity and researchers should explore on customer focus and satisfaction.

2.4.4 Quality Control

Quality control (QC) involves determining what to control, establishing units of measurement for gathering data, establishing standards of performance, measuring actual performance, interpreting the difference between actual performance and the standard, and taking action on the difference in order to prevent quality problems in the next batch or production. Improvement is a form of control in the control process where attention is paid to structural causes and solutions. Furthermore, he says quality control is as a combination of technological and managerial quality functions. In an established food supply chain the quality control should be implemented in the process and product of each member. To guarantee quality, these control activities must be directed to critical control points. Quality control is of fundamental importance, this is true over all the borderlines of organizations, branches and political economies. Their manifold dimensions lead to different views and definitions of the quality term and to different approaches to quality management. Ishikawa, a pioneer in quality control activities in Japan, bases his work on that of Deming, Juran and Feigenbaum.

Dale (2003) argues that Ishikawa has been credited with originating the concept of quality circles and cause-and-effect diagrams. Ishikawa claimed that there had been a period of over-emphasis on statistical quality control (in Japan), and as a result, people disliked quality control. They saw it as something unpleasant because they were given complex tools rather than simple ones.

Additionally, the resulting standardization of products and processes and the creation of rigid specification of standards became a burden that not only made change difficult, but also made people feel bound by regulations. Ishikawa saw worker participation as the key to the successful implementation of TQM. Quality circles, he believed, were an important vehicle to achieve this (Ponte, 2002). Ishikawa took the concepts proposed by people like Deming and Juran and brought them to the level of the common worker (Rao *et al.* 1996). There appears to be no uniform understanding and definition of the meaning of the term quality and even well-known authors seem to have different perspectives on this issue.

According to Reeves and Bednar (1994), a search for the definition of quality has yielded inconsistent results. The two researchers emphasize that regardless of the time period or context in which quality is examined, the concept has had multiple and often muddled definitions and has been used to describe a wide variety of phenomena.

The strategies and tools for assuring quality may have changed, but the basic customer expectations have been fairly constant for a long time (Hoyer, 2001). From a holistic perspective, all institutions produce and sell products and services, with varying proportions of both; as a result the management of quality must pay attention to both product and service quality and the synergy effects between them. Although many definitions of quality exist, it is prudent to create a deeper insight into the definitions of researchers such as the quality gurus, Deming, Crosby, Feigenbaum, Ishikawa and Juran. These gurus claim that their definitions, prescriptions, conclusions and recommendations work equally well for producing products and delivering

services.

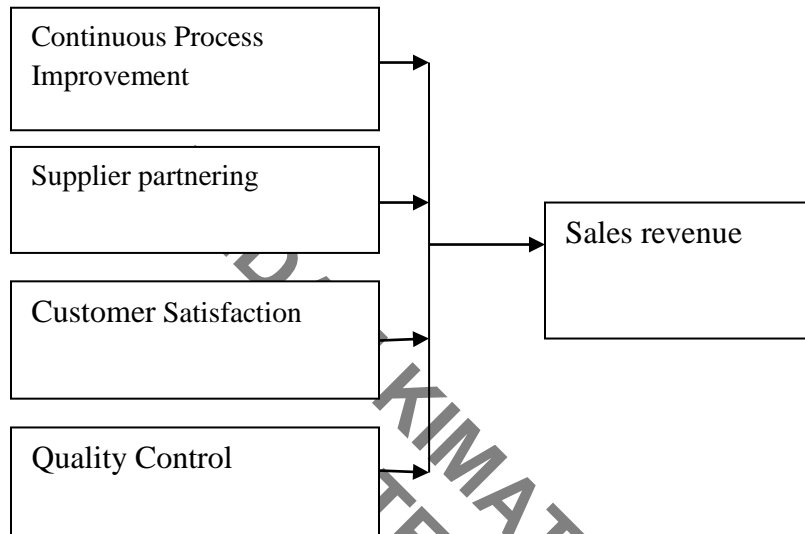
2.4.4.1 Research Gap on quality control

Customers recognize that quality is an important attribute in products and services. Suppliers recognize that quality can be an important differentiator between their own offerings and those of competitors (quality differentiation is also called the quality gap). In the past two decades this quality gap has been greatly reduced between competitive products and services. This is partly due to the contracting (also called outsourcing) of manufactures to countries like India and China, as well internationalization of trade and competition. These countries amongst many others have raised their own standards of quality in order to meet international standards and customer demands.

In recent times some themes have become more significant including quality culture, the importance of knowledge management, and the role of leadership in promoting and achieving high quality. Disciplines like systems thinking are bringing more holistic approaches to quality control so that people, process and products are considered together rather than independent factors in quality management. The influence of quality thinking has spread to non-traditional applications outside of walls of manufacturing, extending into service sectors and into areas such as sales, marketing and customer service.

2.5 Conceptual Framework

The conceptual framework shows the independent variable and the dependent variable.



Independent Variables

Dependent Variable

Figure 3: Conceptual Framework for Total Quality Management in Kenyan Coffee House Revenue Generation.

2.5.1 Continuous Process Improvement

A culture of continuous improvement is one in which individuals are growing, learning and contributing to the overall goal. Through ongoing communication, information sharing, assessments and rewards, individuals and groups can progress towards personal and organizational goals. One size of continuous improvement does not fit all parts of the organization. The kind of rigor required in a manufacturing environment may be unnecessary or even destructive elsewhere. It is indeed important to inject discipline into product and service development, but not so much that it discourages creativity. Take a hard look at the cultural implications of continuous improvement. How do they affect day-to-day behaviors?

A data-driven mindset may encourage managers to ignore intuition or anomalous data that does not fit preconceived notions. In other cases it causes managers to ask execution-oriented, cost-focused questions way too early, instead of percolating and exploring ideas through messy experimentation that cannot be justified through traditional metrics. Continuous improvement does not have to be incompatible with disruptive innovation. Unless we think about continuous improvement in more subtle, nuanced, and creative ways, we may force companies to choose between the two.

2.5.2 Supplier Partnering

Buyers and sellers, working together for mutual improvement is the great benefit received from partnering with realistic expectations on one another. Quite often, one's perception of disloyalty from a partner can really be an unrealistic expectation. Communicate organizational needs, as both benefits and pitfalls are inherent in partnering. The benefits usually outweigh the challenges. Be careful and methodical in the search for alliance partners. Remember, partnering is not instant gratification but rather a long-term paradigm for success.

As companies cast off all but their core competencies or extend their supply networks across oceans and continents, their inherent risks increase and their assemblage of suppliers becomes more and more important. Partnering with suppliers or customers to develop deep, mutually beneficial relationships over the long-term is frequently cited as a means by which to lessen that risk and develop true supply chain excellence. The reality has been less pretty. With this in mind, the "people" aspect can be challenging, and to some extent it is because people are "not the rational beings most employers imagine us to be." As an example, how often in personal relationships do people respond more quickly to someone they like than dislike? In a supply

chain context, that happens quite often. Relationships we have with customers and suppliers differ considerably, and how they act and respond varies accordingly. Moreover, it is not always the biggest customer or biggest supplier that gets preferential treatment. To that end, managing people is vitally important to building a collaborative customer-supplier relationship. It is imperative, therefore, to get the right people in the right positions.

2.5.3 Customer Satisfaction

Gaining high levels of customer satisfaction is very important to a business because satisfied customers are most likely to be loyal and to make repeat orders and to use a wide range of services offered by a business. There are many factors which lead to high levels of customer satisfaction including products and services which are customer focused and then provide high levels of value for money, and customer service giving personal attention to the needs of individual customers.

Many companies focus on customer service, but the focal point is in the wrong place. We need to turn that point from customer satisfaction to customer success. Do not assume you know what the customer wants. There are many examples of errors in this area, such as “new Coke” and car models that didn’t sell. Many organizations expend considerable time, money and effort determining the “voice” of the customer, using tools such as customer surveys, focus groups and polling. Satisfying the customer includes providing what is needed when it is needed. In many situations, it is up to the customer to provide the supplier with requirements. For example, the payroll department should inform other departments of the exact format for reporting the numbers of hours worked by employees. If the payroll department does not do this job properly, it bears some responsibility for the variation in reporting that will occur.

2.5.4 Quality Control

While it is important that quantity requirements be satisfied and production schedules met, it is equally important that the finished product meets established specifications because customers' satisfaction is derived from quality products and services. Stiff competition at national and international level and consumers' awareness require production of quality goods and services for survival and growth of the company.

Quality and productivity are more likely to bring prosperity into the country and improve quality of work. However, the management seeks to achieve customer satisfaction by running its business at the desired economic level. Both of these can be attained by properly integrating quality development, quality maintenance and quality improvement of the product. The integration of these three aspects of a product can be achieved through a sound quality control system. Quality control is one aspect of production planning and control. It is basically concerned with the quality production through the regular inspection technique.

Quality is a combination of characteristics pertaining to the manufacturer of the product, while control is the correction in the quality of the product when the deviations in the product are more than expected. A good quality item is one which conforms to some standard specifications. These specifications are determined by the expectations of consumers and also by the availability and costs of processes and materials. To most people, quality is a variable. It is subjectively judged because it deals with the relative goodness of a product. When a buyer boasts that his house or car is the best, it implies high quality. Quality is thus subjective and vaguely measurable.

2.5.5 Summary research gap

The significance of TQM for the Food and Beverage service industry is undeniable. The effective and appropriate use of TQM tools can enhance the company's service or product quality, staff's productivity and add up to the company's turnover. Proper training is essential to learn the application of TQM tools; in order to attain the accurate results regarding service and product quality measurement. A strong relationship that focuses on quality and continuous improvement is also required between the company, suppliers and the staff. The researcher had taken on the constructive aspects of the literature review and finalized the study with some practical points.

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2.6 Operational Framework

The operational framework shows the measuring parameters of both the independent variables and the dependent variables.

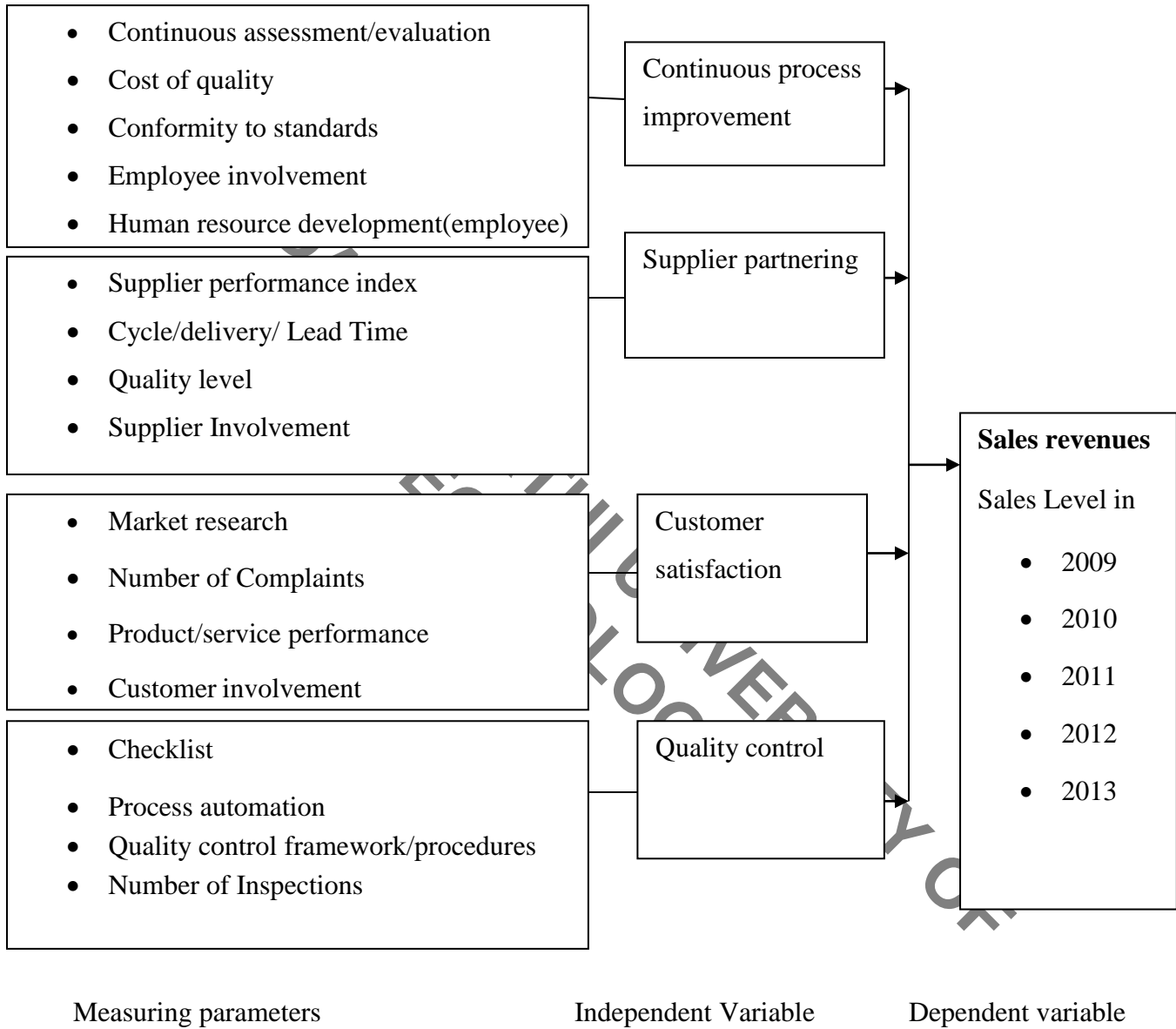


Figure 4: Operational framework of the study

2.6.1 Variable Measurability

Independent variables; continuous process improvement will be measured using various tools such as Continuous assessment or evaluation, cost of quality, conformity to legislative standards, employee involvement in the continuous improvement program and human resource development.

Supplier partnering will be enumerated using supplier performance index, cycle or delivery lead time, analysis and a scale of quality level and supplier involvement in the process.

Customer focus and satisfaction will be identified and analyzed through market research, number of complaints and feedback, product or service performance and customer involvement in product or service delivery. Quality control will be monitored through checklist, process automation, quality control framework or procedures and quality control inspections.

The dependent variable will be measured by the amount of revenue generated over a period of time, in this case five years.

2.7 Variable analysis

Table 2.1: Variable analysis

VARIABLE	AUTHOR	STUDY	PARAMETERS	FINDINGS
Continuous Process Improvement	Matsui (2002)	<ul style="list-style-type: none"> • Customer involvement • Customer satisfaction • Feedback • Maintenance • Process control Quality in new products • Rewards for quality • Supplier quality involvement • Continuous improvement for quality, • TQM link with customers 	<ul style="list-style-type: none"> • Unit cost of manufacturing • Conformance to product specifications • Product innovativeness 	Quality management depends on commitment, coordination of decision-making, task-related training for employees, small group problem solving, multifunctional employees, distinctive competence, and anticipation of new technology.
Supplier Partnering	Brownell and Reynolds (2002)	<ul style="list-style-type: none"> • Strengthening the purchaser-supplier partnerships 	<ul style="list-style-type: none"> • On time delivery performance • Inventory turnover • Cycle time • Flexibility to change product mix • Flexibility to change volume 	Trust and communication are key elements in developing a strong partnership between purchasers and suppliers. Partnerships have come to be viewed as a competitive advantage for food and beverage purchasers who are looking for long-term economic success

VARIABLE	AUTHOR	STUDY	PARAMETERS	FINDINGS
Customer Satisfaction	Anderson <i>et al.</i> (1995) Choi and Eboch (1998)	<ul style="list-style-type: none"> Systems Operationalization is used to analyze the relationship between TQM and customer satisfaction. TQM practices is summarized from process quality, human resource, strategic quality planning, information and analysis 	<ul style="list-style-type: none"> Customer feedback Overall product quality perceived by customers Aesthetics 	TQM practices have a strong effect on customer satisfaction than they do on plant performance. There is significant impact on customer focus and satisfaction
Quality Control	Flynn <i>et al.</i> (1995) Forza and Flippini (1998)	<p>Operating performance is measured to assess:</p> <ul style="list-style-type: none"> Quality market outcomes Percent-passed final inspection with no rework Competitive advantage (unit cost, fast delivery, volume flexibility, inventory turnover, cycle time) <p>Also, two dimension of quality performance on:</p> <ul style="list-style-type: none"> Quality conformance Customer satisfaction 	<p>Quality improvement programs</p> <p>Durability</p> <p>Conformance and established standards</p>	<p>Process flow management and the product design process have positive effects on perceived quality market outcomes while internal measure of the percent that passed final inspection without requiring rework is impacted by the quality control management.</p> <p>Both perceived quality market outcomes and percent-passed final inspection with no rework have significant effects on competitive advantage.</p>

2.8 Chapter Summary

This chapter has examined the empirical literature from other scholars and theoretical framework that encapsulates the total quality management principles. The two theories on total quality management have also been clearly explained and they relate to this study. It is on this basis that the conceptual framework has been developed showing the correlation between the dependent variable and its independent variables.

The conceptual framework clearly brings out the parameters which may form our basis of investigation. The research gap has also been established. The next chapter of the study covers the methodology which will deal with the means in which the researcher will collect data analyze it and make conclusions and recommendations in regard to the research problem.

CHAPTER THREE

METHODOLOGY AND DESIGN

3.1 Research Design

In this study, descriptive research design was used. Descriptive research designs helped provide answers to the questions of who, what, when, where, and how associated with a particular research problem; a descriptive study cannot conclusively ascertain answers to why. Descriptive research is used to obtain information concerning the status of the phenomena and to describe "what exists" with respect to variables or conditions in a situation (Lynn Library Research, 2013).

The survey allowed the collection of large amounts of data from a sizeable population in an economical way. It permitted the researcher to collect quantitative data, which was analyzed quantitatively using descriptive and inferential statistics. Therefore, the descriptive survey suited the best strategy that fulfilled the objectives of the study.

3.2 Study Population

The population of interest of this study was branch managers in the specified coffee house branches in Nairobi, Mombasa and Nakuru. All the branch managers had been chosen due to their vulnerability to quality control lapses and their role in policy formulation and implementation in their respective branches. The success of TQM relies heavily on management to develop, co-ordinate and implement quality improvement. To achieve this effectively, management must be in tandem with the total quality management principles highlighted in this research.

Table 3.3: Target Population

COFFEEHOUSE &REGION	Java	Artcaffe	Dormans	Savannah	Total
Nairobi	15	4	10	3	32
Mombasa	4	1	1	-	6
Nakuru	2	-	1	-	3
Total	21	5	12	3	41

Source: (Travel-Kenya, 2014)

3.3 Sampling Design

A census was used since it focused on all branch managers of the designated themed coffeehouses and the managers particular characteristics of the population that was of interest, which will best enabled the researcher to answer the research questions. Therefore, since the study population was not that large, the entire population was included in this study. All the branch managers were presented with the research instrument.

3.4 Data collection Procedure and Instruments

In order to investigate total quality management principles in coffee houses in Kenya, self-administered drop and pick questionnaires were distributed among managers in these branches. The questionnaires were designed to identify the incorporation of quality management principles affecting revenue generation in coffee houses. This made it easier to get adequate and accurate information necessary for the research. The researcher used structured questionnaires as the main data collection instrument. The questionnaires had both open and close-ended questions.

The close-ended questions provided more structured responses that facilitated tangible recommendations. The open-ended questions providing additional information had not been captured in the close-ended questions. Secondary data sources were employed with previous documents or materials supplemented the data received from questionnaires and information from interviews.

3.5 Data Analysis and Measurement

Before processing the responses, the completed questionnaires were edited for comprehensiveness and consistency. The data was then coded to enable the responses to be grouped into various categories. Descriptive statistics such as means, standard deviation and frequency distribution were used to analyze the data. This presented quantitative descriptions in a manageable form.

Descriptive statistics provided simple summaries about the sample and about the observations that were made. Such summaries were either quantitative, such as summary statistics, or visual, that is, simple-to-understand graphs. These summaries formed the basis of the initial description of the data as part of a more extensive statistical analysis, or they were sufficient in and of themselves for this particular study. The variables in the study were classified into dependent and independent variables. The dependent variable was revenue generation in the various themed coffee houses.

The relationship between the variables was stated using a mathematical function;

$$Y = f(X_1, X_2, X_3, X_4)$$

Where **Y** was the dependent variable and **X₁**, **X₂**, **X₃** and **X₄** are the independent variables

Revenue Generation in the various coffee houses was represented by **Y**

Therefore, an analytical model of a linear multiple regression equation of the form shown below was developed.

$$Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + e_1$$

Where:

Y: Revenue Generation

β_0 : Autonomous factors (Not controlled by others or by outside forces)

X₁: Continuous Process Improvement

X₂: Supplier Partnering

X_3 : Customer Satisfaction

X_4 : Quality control

β_1 : Coefficient for Continuous Process Improvement

β_2 : Coefficient for Supplier Partnering

β_3 : Coefficient for Customer Satisfaction

β_4 : Coefficient for Quality Control

β_{eta} : β is a p-dimensional parameter vector. Its elements are also called effects, or regression coefficients. Statistical estimation and inference in linear regression focuses on β

e : Error term; this variable captures all other factors which influence the dependent variable y_i other than the regressors x_i . The relationship between the error term and the regressors, for example whether they are correlated, is a crucial step in formulating a linear regression model, as it determined the method to use for estimation. A correlation analysis was also performed to establish how the variables were related to each other in the model.

3.6 Reliability

This helped the researcher to rectify and come up with good reliable instruments and ensured credibility of the results. Reliability showed the degree at which the research instruments yielded good results (Cooper and Schindler 2010). In order to achieve this, the researcher administered the instruments in person in order to assess their clarity. The

researcher also computed a Cronbach alpha score of the instrument used to obtain the primary data. Cronbach alpha ranges between 0-1. Scores between 0-0.6 indicate that the instrument has a low reliability while scores of 0.7 and above indicate that the instrument has a high level of internal consistency and reliability (Cronbach, Shavelson 2004). The scores for the research were above 0.7 hence the instrument was reliable.

3.7 Validity

Validity is described as the degree to which a research study measures what it intends to measure. There are two main types of validity, internal and external. Internal validity refers to the validity of the measurement and test itself, whereas external validity refers to the ability to generalize the findings to the target population. Both are very important in analyzing the appropriateness, meaningfulness and usefulness of a research study. However, the researcher focused on the validity of the measurement technique (Shuttleworth, 2009).

In order to determine the validity of the instruments before administration of the questionnaires, the researcher presented them to the supervisor for analysis. The study questionnaire was developed by the researcher based on the study objectives. The researcher used a pilot test on the questionnaire for validation. A small number of managers from five different coffee houses were given the questionnaire and they helped change the following aspects of the questions; knowledge of TQM principles and years of experience of the managers, which in turn helped in resolving the research problem. This helped in ensuring the questionnaire was free from errors or ambiguity.

3.8 Ethical Issues

The research sought to be objective as opposed to advocacy. High levels of competition within the coffee house industry required a confidentiality clause due to the sensitivity of the information that was collected. Hence the researcher held a moral obligation to treat the information with utmost confidentiality. Since the respondents were reluctant to disclose some information, the researcher needed to reassure the respondents of confidentiality of the information given.

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CHAPTER FOUR

RESEARCH FINDINGS AND INTERPRETATIONS

4.1 Introduction

This chapter presents the research findings and discussions. The research sought information from branch managers in the specified coffee house branches in Nairobi, Mombasa and Nakuru. There were 41 managers who worked in the all the coffee houses in Nairobi, Mombasa and Nakuru.

4.2 Demographic Data

4.2.1 Response Rate

The researcher administered 41 questionnaires to branch managers of the specified coffee house branches in Nairobi, Mombasa and Nakuru. The researcher collected the enclosed questionnaires from the respondents after completion. The findings are presented in the following table.

Table 4.2 Response rate

	Responses	Percentage
Questionnaires Duly returned	37	90
Questionnaires Not returned	4	10
Total	41	100

The response rate was 90% which was representative of the questionnaires returned. According to Shuttleworth (2009), a response rate of 50% is adequate for analysis and reporting; a rate of 60% is good and a response rate of 70% and over is excellent. Based on the assertion, the response rate was considered to excellent. A response rate of 90% was achievable after the researcher administered the questionnaires and made personal visits and phone calls to remind the respondents to fill-in and return the questionnaires.

4.2.2: Gender

The respondents were requested to state their gender. The results are as shown in the figure below.

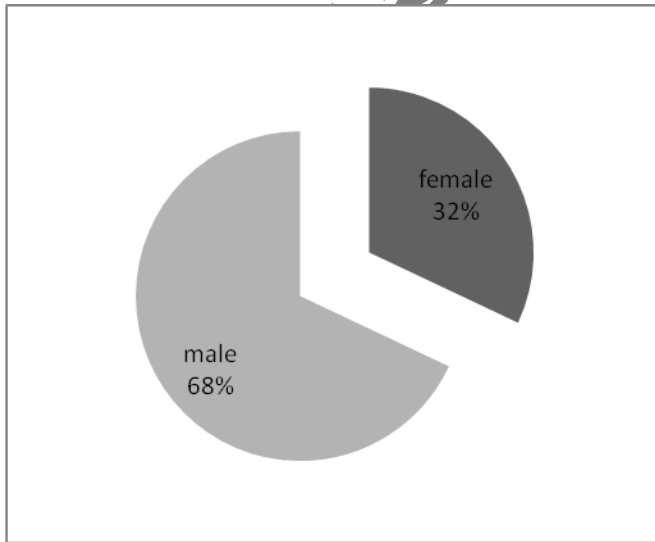


Figure 5: Gender of the Respondents

The study sought to determine the gender of the respondents and therefore requested the respondents to indicate their gender, from the findings the study found that majority of the respondents as shown by 62% indicated that they were males whereas 38% of the respondents indicated that they were females, this indicated that both genders were

involved in this study and thus the finding of the study would not suffer from gender biasness.

4.2.3: Age of the Respondents

Respondents were asked to tick their age bracket. The figure shows the respondents' age:

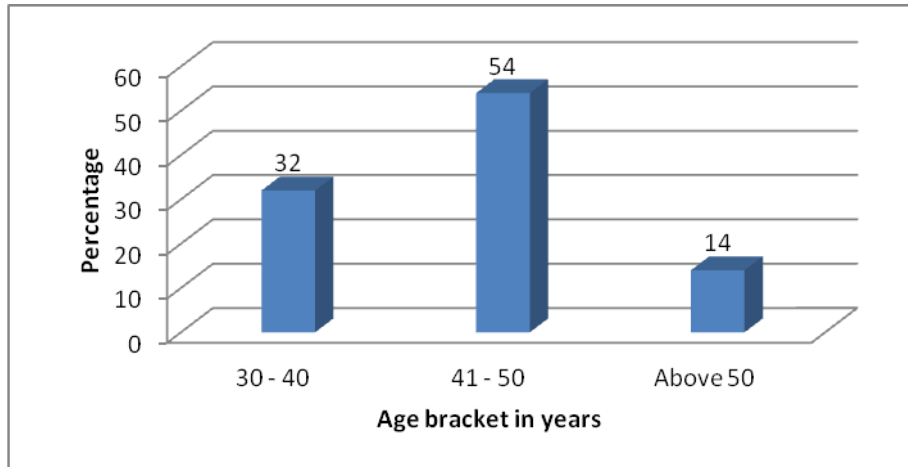


Figure 6: Age bracket

The age of the respondents, the study requested the respondents to indicate their age category. From the findings, the study found that 54% of the respondents indicated that they were aged (between 41 to 50 years), 32% of the respondents indicated (30 to 40 years), whereas 14% of the respondents indicated to be (50 years and above). This was an indication that respondents were well distributed in term of their age. This also showed that 54% of the respondents were aged between forty one and fifty years. This also indicated that majority of the employees fell under that age group. This group of respondents was vital in giving a clear view on what the organization had been doing to improve sales revenue.

4.2.4: Educational level

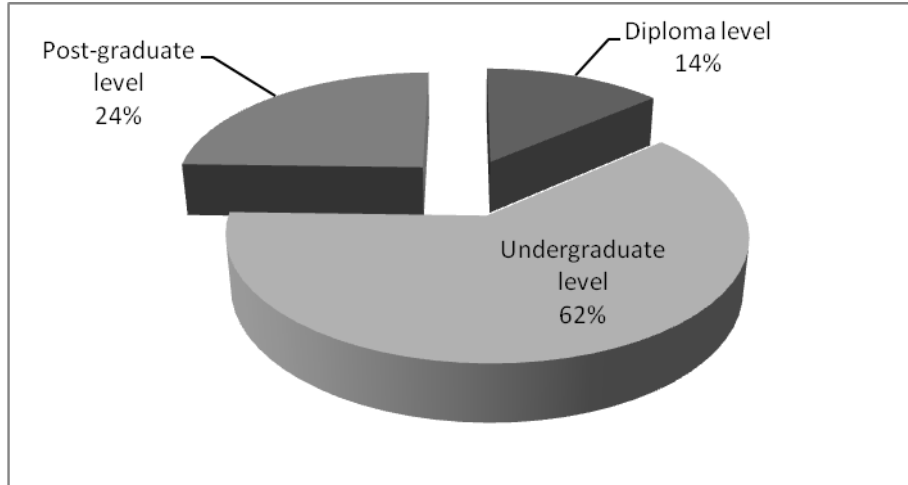


Figure 7: Highest level of education

From the figure above on the respondent highest level of education, the study found that 62% of the respondent indicated that they had attained education up to an undergraduate level, 24% had reached post-graduate level whereas only 14% had reached the diploma level, this shows that respondent in the organizations were well educated. The study respondents were willing to provide the information that was required by the study that helped in understanding the study problem that was under research.

4.2.5: Years of Service

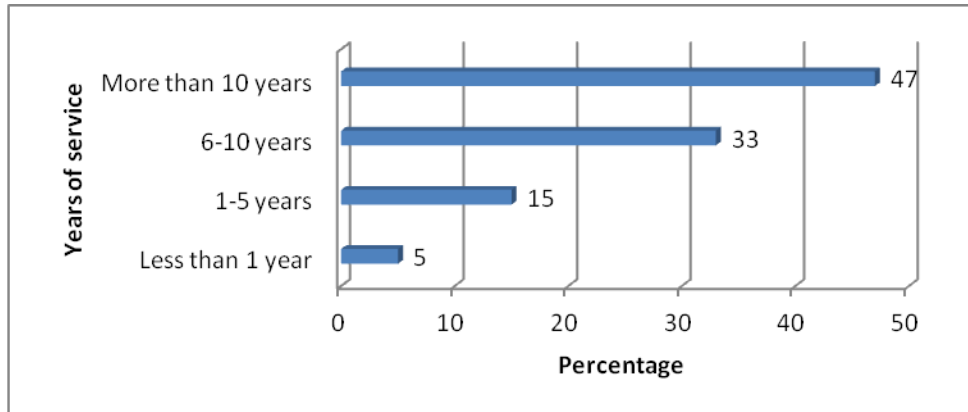


Figure 8: Years of service

From the finding on the time of service, the study found that majority of the respondents indicated that they had served the coffee house for a duration of more than 10 years (47%), followed by 6 to 10 years (33%), 1-5 years (15%), whereas for less than one year (5%). This is an indication that majority of the respondents had served in the coffee house for a duration of more than 5 years and so would give information in regard to the research study. This is an indication that the respondents had adequate information regarding Total Quality Management principles in the coffee houses.

4.3 Descriptive Statistics

The respondents were requested to indicate their level of agreement with the statements in regard to individual perceptions of total quality management principles. The responses were rated on a five point Likert scale where: 1=strongly disagree, 2=disagree, 3=neutral, 4=agree and 5=strongly agree.

4.3.1 Continuous Process Improvement

Table 4.3: Continuous Process Improvement

Statement on Continuous Process Improvement	N	Mean	Std. Deviation
The branches operations/processes are constantly assessed and evaluated	37	3.9854	.34119
The cost of product/service quality exceeds perceived product/service benefits	37	2.3610	.64255
The organization is in tandem with industry standards of operation	37	3.4098	.95790
Employees are involved in continuous process improvement programs in the organization	37	3.8585	.88435
There is training and development, reward and benefits schemes for employees achieving set targets	37	3.8073	.90851

From the study findings in Table 4.2 above, 65%(n=24/37), agreed that the branches' operations/processes were constantly assessed and evaluated ($\mu=3.9854$), and that 54% (n=20/37) of the employees involved in continuous process improvement programs in the organization ($\mu =3.8585$), and 48.6% (n=18/37) also agreed there was training and development, reward and benefits schemes for employees achieving set organization targets ($\mu =3.8073$). 67.6% (n=25/37), of the respondents did not know whether the organization was in tandem with industry standards of operation ($\mu =3.4098$). However 72.9 % (n=27/37) of the respondents disagreed to the statement that the cost of product/service quality exceeds perceived product/service benefits ($\mu =2.3610$).

From the empirical researchers, this finding was in line with Matsui (2002), who observed that total quality can be achieved by constantly pursuing continuous improvement through the involvement of people from all organizational levels. This also

portrayed continuous improvement as put forward by Oakland, (1999) that it can be a completely new approach of enhancing creativity and achieving competitive excellence in today's market.

4.3.2 Supplier Partnering

Table 4.4: Supplier Partnering

Statement on Supplier Partnering	N	Mean	Std. Deviation
There are measures for gauging supplier performance over a period of time (example supplier performance index)	37	3.1854	.94893
Supplier delivery/cycle/lead time is optimum for branch operations	37	3.9756	.88369
Products supplied are often in good/quality condition	37	3.9512	.74765
The supplier is involved in the organization policy formulation with regards to procurement standard procedures	37	3.9366	.54346
The cost of switching a particular supplier is minimal	37	3.9341	.40990

The respondents were given various statements on supplier partnering and their responses were put on a likert scale. 75.6% (n=28/37) of the respondents agreed that the supplier delivery/cycle/lead time was optimum for branch operations ($\mu = 3.9756$), 70.2% (n=26/37) agreed that the products supplied were often in good/quality condition ($\mu = 3.9512$), 78.3% (n=29/37) said that the suppliers were involved in the organization policy formulation with regards to procurement standard procedures ($\mu = 3.9366$) and the cost of switching a particular supplier was minimal ($\mu = 3.9341$). However, 56.7% (n=21/37) of the respondents did not know whether there were measures for gauging supplier performance over a period of time like the supplier performance index.

These findings showed that there was effective supplier partnering in the coffee houses and this concurred with Brownell and Reynolds (2002), Trent, and Callahan, (1993) that in today's business, many buying firms pursue aggressive strategies such as supplier

partnering and outsourcing in order to increase their future rate of capabilities improvement.

4.3.3 Customer Satisfaction

Table 4.5: Customer Satisfaction

Statement on Customer Satisfaction	N	Mean	Std. Deviation
Market research is undertaken to cater for dynamic customer needs	37	4.2195	.63516
Customer complaints are dealt with immediately and with urgency	37	4.4146	.83593
The number of customer complaints has reduced to zero over the organizations trade period	37	4.1951	.95445
Customer retention is mostly because of high product and service perceived performance	37	4.5122	.84030
Customer feedback is incorporated in the evaluation of customer service to enhance better performance	37	4.5854	.74080

With regards to the customer satisfaction, 78.3% (n=29/37) of the respondents strongly agreed that customer feedback was incorporated in the evaluation of customer service to enhance better performance ($\mu = 4.5854$) and that 83.8% (n=31/37) said customer retention was mostly because of high product and service perceived performance ($\mu = 4.5122$). Also, 72.9% (n=27/37) agreed that customer complaints were dealt with immediately and with urgency ($\mu = 4.4146$), 78.3% (n=29/37) agreed that market research was undertaken to cater for dynamic customer needs ($\mu = 4.2195$) and 81.1% (n=30/37) agreed that the number of customer complaints had reduced to zero over the organizations trade period ($\mu = 4.1951$).

These findings indicated that the coffee houses were employing the customer satisfaction strategies in their work in order to maintain their customers and attract new ones. The

coffee houses tend to be motivated by several researchers Anderson *et al*(1995), Choi and Eboch(1998) also observed that in turn, higher satisfaction and loyalty leads to improved revenue, profitability, and cash flows.

4.3.4 Quality Control

Table 4.6: Quality Control

Statement on Quality Control	N	Mean	Std. Deviation
A checklist is used for quality control standard operating procedures	37	3.8049	.98784
Quality control checks and balances are all automated	37	4.0732	.98464
There's a quality control framework or manual that serves as a guideline during quality control procedures	37	4.3415	.91131
Quality control inspections are carried out frequently	37	3.8293	.80213
Everyone in the organization is involved in quality control measures	37	3.7073	.66462

From the study findings in Table 4.5 above, 100% (n=37/37) of the respondents agreed to all the statements that there was a quality control framework or manual that served as a guideline during quality control procedures ($\mu = 4.3415$); 75.6% (n=28/37) agreed that Quality control checks and balances were all automated ($\mu = 4.0732$); 92.8% (n=34/37) said Quality control inspections were carried out frequently ($\mu = 3.8293$); 89.1% (n=33/37) agreed a checklist was used for quality control standard operating procedures ($\mu = 3.8049$) and 81.1% (n=30/37) agreed that everyone in the organization was involved in quality control measures ($\mu = 3.7073$). Flynn *et al* (1995), Forza and Flippini (1998) empirical findings, found that to enhance quality control many quality control measures were to be put in place for organizations to be successfully efficient which is in line with the research findings.

4.4: Inferential Statistics

4.4.1: Reliability Coefficients

Table 4.7: Reliability Coefficients

Measurement Scale	Number of questionnaires	Number of Items	Cronbach's Alpha (α)
Continuous Process Improvement	5	5	0.710
Supplier Partnering	5	5	0.722
Customer Satisfaction	5	5	0.729
Quality Control	5	5	0.717

The score on how reliable was the questionnaire was 0.7 and above hence the questionnaire used was reliable in this study. Reliability is a fundamental issue in any measurement scale. Scale reliability is considered as the proportion of variance attributed to the true score of the latent construct (Gable, & Wolf, 1993). It is usually measured by internal consistency reliability that indicates the homogeneity of items comprising a measurement scale. Internal consistency gives the extent at which items in a model are inter-correlated. Thus, high inter-item correlations explain that the items of a scale have a strong relationship to the latent construct and are possibly measuring the same thing. Usually, the internal consistency of a measurement scale is assessed by using Cronbach's coefficient alpha. It is generally recommended that if a measurement scale having a Cronbach's coefficient above 0.70 is acceptable as an internally consistent scale so that further analysis can be possible.

4.4.3 Strength of the model

Table 4.7: Model Summary

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.912 ^a	.832	.816	.66403

a. Predictors: (Constant), Supplier partnering, Quality Control, Continuous Process Improvement, Customer Satisfaction

Adjusted R squared is coefficient of determination which tells us the variation in the dependent variable (Customer Satisfaction, Continuous Process Improvement, Supplier Partnering and Quality Control) due to changes in the independent variable (Sales Revenue). Analysis in Table above shows that the coefficient of determination (the percentage variation in the dependent variable being explained by the changes in the independent variables) R^2 equals 0.832 (83.2%), that is, Continuous Process Improvement, Supplier partnering, Customer Satisfaction, Quality Control leaving only 16.8 % unexplained.

4.4.3.1 Analysis of Variance

Table 4.8: Analysis of Variance

ANOVA^b

Model		Sum of Squares	Df	Mean Square	F	Sig.
1	Regression	20.565	4	5.141	11.660	.000 ^a
	Residual	15.874	36	.441		
	Total	36.439	40			

a. Predictors: (Constant), Supplier partnering, Quality Control, Continuous Process Improvement, Customer Satisfaction

b. Dependent Variable: Sales revenue

The summary of the basic logic of ANOVA is the discussion of the purpose and analysis of the variance. The purpose of the analysis of the variance is to test differences in means (for groups or variables) for statistical significance. The accomplishment is through analyzing the variance, which is by partitioning the total variance into the component that is due to true random error and the components that are due to differences between means. The ANOVA analysis is intended to investigate whether the variation in the independent variables explain the observed variance in the outcome in this study. The ANOVA results indicated that the independent variables significantly in the F-Statistics produced ($F=11.660$) was significant at 0 per cent level (Sig. $F<.005$) thus confirming the fitness of the model. Analysis in table below shows that the coefficient of determination (the percentage variation in the dependent variable being explained by the changes in the independent variables).

4.4.3.2 Coefficients of Determination

Table 4.9: Coefficients of Determination

Coefficients^a

Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	.022	1.029		.021	.983
	Continuous Process Improvement	.969	.132	.061	.519	.004
	Customer Satisfaction	1.051	.180	.706	5.833	.000
	Quality Control	.114	.137	.096	.833	.001
	Supplier partnering	.066	.145	.056	.459	.003

a. Dependent Variable: Sales revenue

The established multiple linear regression equation:

$$Y = 0.022 + 0.969X_1 + 0.066X_2 + 1.051X_3 + 0.114X_4$$

Where ;

- i. Constant = 0.022, shows that if Continuous Process Improvement, Supplier partnering, Customer Focus and Satisfaction and Quality Control are all rated as zero, Sales revenue would be 0.022.
- ii. X_1 is equal to; 0.969, shows that one unit change in Continuous Process Improvement results in 0.969 units increase in Sales revenue
- iii. X_2 is equal to; 0.066 shows that one unit change in Supplier partnering results in 0.066 units increase in Sales revenue.
- iv. X_3 is equal to; 1.051 shows that one unit change in Customer Satisfaction results in 1.051 units increase in Sales revenue.
- v. X_4 is equal to; 0.114 shows that one unit change in Quality Control results in 0.114 units increase in Sales revenue.

CHAPTER FIVE

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

5.1 Introduction

This chapter presents summary of findings, conclusions and recommendations based on the study. The main objective of the study was to evaluate the role of TQM in coffee house revenue generation. The main objective was accomplished by examining the effects of continuous process improvement, suppliers partnering, customer satisfaction and quality control on coffee house revenue generation.

5.2 Summary of the Study

The summary of findings focused on the main objective of the study which was to evaluate the effectiveness of TQM in themed coffee house revenue generation. Ranking based on coefficients is as follows;

Table 4.9: Rank of Principles

Rank Of Variables	Coefficients	P Value
Customer satisfaction	1.051	0.016
Continuous Process Improvement	0.969	0.039
Quality control	0.144	0.041
Supplier Partnering	0.066	0.004

This study established that customer satisfaction increased revenue extensively. For every one unit increase in customer satisfaction the revenue would increase by 1.051 units.

Continuous process improvement was next with a unit increase in continuous process improvement increasing revenue by 0.969, quality control followed with a coefficient of 0.144 and finally supplier partnering with a coefficient of 0.066. This shows that the

study variables had a positive relationship and all the P values were less than 5% hence statistically significant to make a conclusion on the population.

Majority of the coffee houses operations/processes were constantly assessed and evaluated and also that there was training and development, reward and benefits schemes for the employees achieving set targets in these coffee houses. The findings of the study could not establish whether the coffee houses were in tandem with industry standards of operation or if the employees were involved in continuous process improvement programs in the organization and this was because majority of the respondents indicated they did not know about those factors in their organization. However the study established that the cost of product/service quality do not exceed perceived product/service benefits in these coffee houses. The study established that one unit change in Continuous Process Improvement results in 0.969 units increase in Sales revenue.

With regards to the impact of suppliers partnering on coffee house revenue generation, the study established that one unit change in Supplier partnering results in 0.066 units increase in Sales revenue. This showed a positive impact of suppliers partnering on coffee house revenue generation. These finding were also supported by most respondents indicating that the supplier delivery/cycle/lead time was optimum for branch operations; that the products supplied were often in good/quality condition, that the suppliers were involved in the organization policy formulation with regards to procurement standard procedures and that the cost of switching a particular supplier was minimal. However, the study could not establish whether there were measures for gauging supplier performance over a period of time like the supplier performance index.

Customer Satisfaction had the huge effect on coffee house revenue generation compared to the other factors this was because one unit change in Customer Satisfaction resulted in 1.051 units increase in Sales revenue. This was also evident from the respondent's responses in regard to effects of customer satisfaction where the study established that customer feedback in the coffee houses was incorporated in the evaluation of customer service to enhance better performance and that customer retention was mostly because of high product and service perceived performance. The study also found out that customer complaints were dealt with immediately and with urgency, and that the market research was undertaken to cater for dynamic customer needs and that the number of customer complaints in the coffee houses had reduced to zero over the organizations trade period.

The study established that in the coffee houses, there was a quality control framework or manual that served as a guideline during quality control procedures, that the quality control checks and balances were all automated and quality control inspections were carried out frequently. The study also found out that a checklist was used for quality control standard operating procedures in the coffee houses and that everyone in the organization was involved in quality control measures. The study findings showed that one unit change in Quality Control resulted in 0.114 units increase in Sales revenue. This implied that quality control had a positive impact on coffee house revenue generation.

5.3 Conclusions

This study concluded that continuous process improvement, supplier partnering, customer satisfaction and quality control all impact positively on coffee houses revenue generation. The study concluded that customer satisfaction was vital and most important factor for an organization to increase its revenue base. Continuous processes such as assessing and evaluation of operations/processes, training and development, reward and benefits schemes for the employees were found to be practiced by the coffee houses in the study. Further, more emphasis by the coffee houses in regard to Customer satisfaction in order to increase more revenue were and still are imperative.

Supplier partnering had a positive effect on coffee house revenue generation. Supplier delivery/cycle/lead time; products quality condition, involving suppliers in the organization policy formulation with regards to procurement standard procedures and that the minimal cost of switching a particular supplier were all found to have an increase in revenue generation in the coffee houses.

The study concluded that the most important factors to consider in revenue generation was customer satisfaction and this is because it had the largest impact on revenue generation in this study than the rest variables with one unit change in customer focus and satisfaction resulted in 1.051 units increase in sales revenue. The study concluded that incorporating customer feedback in the evaluation of customer service enhanced better performance, dealing with customer complaints with urgency and undertaking market research to cater for the dynamic customer needs were vital in enhancing revenue generation.

The study finally concluded that having quality control in the organization helps in revenue generation. Quality control measures such as automated quality control checks and balances, frequent quality control inspections, checklist for quality control standard operating procedures and involving everyone in the organization were found to have an impact on coffee house revenue generation.

5.4 Recommendations

TQM principles have positive effects on overall sales revenue generation in themed coffee houses. Implementing TQM principles does pay off since the benefits accrued include; improved quality, employee satisfaction, productivity, employee participation, teamwork, communication, profitability and market share. It is in the best interest of the themed coffee houses to incorporate the following recommendations in their quality management plan in the effort of generating more revenue and increasing coffee consumption locally.

- i. The study recommends that the coffee houses should focus more to be in tandem with industry standards of operation and involve employees more in continuous process improvement programs in the organization.
- ii. The study also recommends that organizations should have measures for gauging supplier performance over a period of time like the supplier performance index.
- iii. The study recommends that emphasis should be put on the incorporation of all the principles of TQM for the success of the organization. The role of leadership, employee participation, customer focus, supplier quality management, continual improvement, and organizational culture are apparent for the success of the firm

in terms of market share, productivity, profitability and overall revenue generation.

- iv. The study recommends that firms should establish their quality management systems according to the requirement of ISO 9000 effectively for effective TQM principles implementation and for the success of the firm in generating revenue.

5.5 Recommendation for further studies

Further research on effects of Total Quality Management implementation on business performance in service institutions such as the themed coffee houses is imperative. Further research should also be carried out on the challenges facing the implementation of TQM principles in organizations such as the coffee houses. These findings would supplement the findings in this study and form a reliable literature base.

REFERENCES

- Anderson, B., & Pettersen, P.G (1996) *The benchmarking handbook: Step-by-step instructions*. London: Chapman and Hall.
- Anderson, J.C., Rungtusanthan, M., & Schroeder, R. (1995). A theory of quality Management underlying Deming management method. *Academy of Management Review*, 19, 472-509.
- Anderson, C. & Sullivan, A. (1993). The Importance of Pay in employee Motivation: Discrepancies between What People say and what they do. *Human Resource Management*, 43 (4), 381-394.
- Bealer, S.M. (2001). *The Human Dimension in TQM – Learning, Training and Motivation*. Linköping: Linköping University.
- Belder, D., & Besterfield, C. (2006). *Total Quality Management*. Prentice Hall New Jersey, 3rd Edition, 4.
- Brownell, S., & Reynolds, P. (2002). Trying to consume, *Journal of Consumer Research*, 17 (2), 127-40.
- Buckman, J. (2009) Ford finds its way; *Quality progress*, 42, 14-15.
- Burda, D (2010). Leaders with the IT factor; *Modern Healthcare*, 40, 18.
- Carl, A.J., Rungtusanatham, M., Schroeder, R. G., & Devaraj S.(2008, June) A path analysis model of a theory of quality management underlying the Deming management method: Preliminary empirical findings, *Decision science journal*, 26, 637-658.
- Campanella, J. (2001). *Human Resources Management*, 8th Edition Irwin Boston Burn, McGraw-Hill.
- Campanella, J. (1999). *Principles of quality costs: principles, implementation and use* (3rd Ed). Milwaukee, Wisconsin: ASQ Quality Press.
- Choi, A.J., & Eboch, M. (1998). A path analysis model of a theory of quality management underlying the Deming management method: Preliminary empirical findings. *Decision science journal*, 26, 637-658.
- Codling, S. (1996). *Best Practice Benchmarking an International Perspective*: Gulf Publishing.
- Conti, T. (1997). *Organizational Self-Assessment*: Chapman & Hall, London.

- Cronbach, L. J., & Shavelson, R. J. (2004). My current thoughts on coefficient alpha and successor procedures. *Educational and Psychological Measurement* 64, 391–418
- Crosby, P. B. (1979). *Quality is Free: The Art of Making Quality Certain*. New York: New American Library.
- Crosby, P. B. (1992). *The Eternally Successful Organization: The Art of Corporate Wellness*. New York: Penguin Books.
- Dahlgaard-Park, S.M. (2008). Reviewing the European excellence model from a management control point of view. *The TQM Journal*, 20, 98-119.
- Dahlgaard-Park, S.M., Dahlgaard, J.J. (2004), The 4P Quality strategy for breakthrough and sustainable development. *European Quality*, 10.
- Dahlgaard-Park, S.M., Dahlgaard, J.J. (2003). Toward a holistic understanding of human motivation: core values – the entrance to people's commitment?. *The International Journal of AI (Artificial Intelligence) and Society*, 17, 150-80.
- Dahlgaard-Park, S.M. (2003). Management control theories and the European Business Excellence Model, *The Asian Journal on Quality*, 4.
- Dale, B., & Schindler, P. (2003). *Business Research Methods* 8th Edition McGraw-Hill, New York.
- Dale, B G. (1999). *Managing Quality* (3rd ed). Oxford, UK and Malden, MA: Blackwell Publishers Inc.
- Daviron, B., & Ponte, S. (2005). *The coffee paradox: Global markets, commodity trade, and the elusive promise of development*. London: Zed Books in association with the CTA.
- Deming, W. E. (2000). *The New Economics for Industry, Government, Education* (2nd ed). Cambridge, MA: The MIT Press.
- Deming, W. E. (1986) *Out of the Crisis*. Cambridge, MA: MIT Center for Advanced Engineering Studies.
- Dicum, F. & Luttinger, W. (1999). Coffee consumption in Africa, *Harvard Business Review*, No.September/October, pp.105-11.
- Feigenbaum, A. V. (1991). *Total Quality Control* (3rd ed). New York, NY: McGraw-Hill, Inc.

- Flynn, N., Barbara B., Roger G., Schroeder R., & Sadao, S. (1995). "The Impact of Quality Management Practices on Performance and Competitive Advantage" *Decision Science Journal*, Vol. 26, No. 5, pp. 659-691.
- Flood, K. (2010). TQM and the Government. *Journal of Quality and Participation*, 32, (32), 27-31.
- Forza, M., Flippini, G., & Walton, M. (1998). *Tourism and Leisure Research Methods*, Pearson Education.
- Gable, V., & Wolf, A. (1993). Review of Research on Cost of Quality Models and Best Practices. *International Journal of Quality & Reliability Management*, 320-362.
- Goleman, D., Biederman, P.W., Bennis, W. G., & O'Toole, J. (2008). *Transparency – How Leaders Create a Culture of Candor*. San Francisco, CA: Jossey-Bass.
- Howden, D. (2012). Kenya's coffee wars. *The Independent*, Retrieved 27 August 2012.
- Hoyer, H. (2009). *ISO 9000 Quality Systems Handbook*. 6th Edition, Burlington MA: Butterworth-Heinemann.
- <http://Lynn-Library.Libguides.com/A-Z.php>
- <http://Merriam-Webstaronlinedictionary.com>
- Hur, M. H. (2009). The Influence of Total Quality Management Practices on the Transformation of How Organizations Work. *Total Quality Management*, 20, 847-861.
- Imai, M. (1986). *Kaizen (Ky'zen), the key to Japan's competitive success*. New York: Random House Business Division instructions. London: Chapman and Hall.
- International Coffee Organization (2004). *Lessons from the World Coffee Crisis: A serious Problem for Sustainable Development*. Submission to UNCTAD XI: Sao Paulo.
- Ishikawa, K., & Lu, J. D. (1991). *What is Total Quality Control? The Japanese Way*. Englewood Cliffs, NJ: Prentice-Hall.
- John, F. (2007). *Total Quality Mnagement*, 8th Edition Irwin Boston Burn, McGraw-Hill.
- Juran, J. M. (1988). *Juran on Planning for Quality*. New York, NY: Free Press.
- Juran, J. M., & Gryna, F. M. (1988). *Quality control handbook*. New York and London: McGraw-Hill.

- Kenneth, F., Handfield, M. & Tyler, S. (2001). TQM and the Government. *Journal of Quality and Participation*, 32, (32), 27-31.
- K'Oroth, (2013) Issues in modeling, monitoring and managing quality costs. *The TQM Magazine*, 19-23.
- Latif, A. (2007). *Information Quality Management: Theory and Application*. Hershey, PA: Idea Group Publishing.
- Lemma, B. G.(2005). Quality costing: a management review. *International Journal of Management Reviews*, 441-460.
- Lewin, N, Oscar B., Anderson G., Eric F., & Sarah, C. (2004). "The Impact of Quality Management Practices on Performance and Competitive Advantage *Decision Science Journal*, Vol. 26, No. 5, pp. 200-231.
- Meyer, J. (2005) The integration of lean management and six sigma. *The TQM magazine*, 5-18. Management Practices on Performance and Competitive Advantage. *Decision Science Journal*, 26, 659-691.
- Matsui, J. (2002). The integration of lean management and six sigma. *The TQM magazine*, 5-18. Management Practices on Performance and Competitive Advantage. *Decision Science Journal*, 26, 659-691.
- Oakland, J. (1999,September). *Total organizational excellence – achieving world-class performance*. Butterworth Heinemann: Oxford.
- Pursglove, H., & Dale, L. (2005). Are travelers satisfied with Malaysian hotels. *International Journal of Contemporary Hospitality Management*, 17 (3), 217-27.
- Ponte, J. (2002). "SERVQUAL: a multiple-item scale for measuring customer perceptions of service quality based on disposable income", *Journal of Retailing*, Vol. 64 No.1, pp.12-40.
- Rao, S., Odendaal, A. & Roodt, G. (1996). *Organizational behavior*. Cape Town: Prentice-Hall International
- Reeves, J. & Bednar, G. (1994). Social structural characteristics of psychological empowerment. *Academy of Management Journal*, 39,483-504.
- Sako, H. (2004). Customer Satisfaction European hotels. *International Journal of Contemporary Hospitality Management*, 17 (3), 217-27.
- Sayer, G. (2001). *Coffee Futures, Impacts of falling prices on Livelihoods in Uganda*. Uganda Coffee Report for Oxfam.

- Schiffauerova, J., & Thomson, A. (2006). Are your satisfied customers loyal, *Cornell Hotel and Restaurant Administration Quarterly*, 45 (3), 221-34.
- Schonberger, R. (2008). *Best practices in lean six sigma process improvement: A deeper look*. Hoboken, NJ: John Willey & Sons, Inc.
- Shuttleworth, W.A. (2009). *Economic control of quality of manufactured product/50th anniversary commemorative issue*. American Society for Quality. ISBN 0-87389-076-0.
- Sörqvist, S. & Vrat, P. (2005). Service quality models: a review, *International Journal of Quality & Reliability Management*, 22(9), 913-49.
- Surber, G. (2005). *Relationship between rewards, recognition and motivation at insurance company in the Western Cape*: University Of The Western Cape.
- Summers, D.C.S. (2009). *Quality* (5th ed). Englewood Cliffs, NJ: Prentice Hall.
- Summers, D.C.S. (2007). *Six Sigma Basic Tools and Techniques*. Upper Saddle River NJ: Prentice Hall.
- Thomson, V. A. (2008, January) Review Of Research On Cost Of Quality Models And Best Practices. *International Journal of Quality & Reliability Management*, 647-669.
- Tracey, L. O. (1997) Coffee Growth And Best Practices. *International Journal of Coffee in Ethiopia*, 47-66.
- Trent, V., & Callahan, A. (1993). Review of Research on Cost of Quality Models and Best Practices. *International Journal of Quality & Reliability Management*, 647-669.
- Varqua, S. (2008), The Impact of Reform of The Coffee Industry in Kenya on Small and Large Farmers: *A research programme carried out in collaboration with the Institute of Development Studies (IDS), of the University of Nairobi, the French Institute for Research in Africa in Nairobi and The Coffee Board of Kenya. September, 2008*. The TQM Magazine, 18 (2), 162-173.
- Wicks, A.M. A. (2009) satisfaction-based Definition of quality. *Journal of Business and Economic Studies*, 15, 82-97.
- Wild, B. C. (2003). Creating Your Own Quality Definition. *The Conference Board*, 963, 47-49.

APPENDICES

APPENDIX I: INTRODUCTION LETTER

Kirugumi John Ndung'u

P.O. Box 17148-00100

Nairobi.

Dear Respondent,

Re: Data collection for my research

I am a student at Dedan Kimathi University of Technology conducting a survey on Total Quality Management principles in coffee house revenue generation. Please consider the various aspects of quality control and quality improvements within your branch when you answer the questions in this survey. Your answers will be kept confidential and will be used for statistical purposes only.

Yours faithfully,

John Kirugumi.

APPENDIX II: COFFEE PRODUCTION IN THE WORLD

The following table lists the total coffee production of each coffee-exporting country.

Country	60 kilogram bags	Kilograms	Pounds
Brazil	42,512,000	2,550,720,009	5,611,584,000
Vietnam	15,000,000	900,000,000	1,980,000,000
Colombia	11,600,000	696,000,000	1,531,200,000
Indonesia	6,850,000	411,000,000	904,200,000
Ethiopia	6,500,000	330,000,000	726,000,000
India	5,005,000	300,300,000	660,660,000
Mexico	4,500,000	270,000,000	594,000,000
Guatemala	4,000,000	240,000,000	528,000,000
Peru	3,500,000	210,000,000	462,000,000
Honduras	2,700,000	162,000,000	356,400,000
Uganda	2,500,000	150,000,000	330,000,000
Ivory Coast	2,350,000	141,000,000	310,200,000
Costa Rica	1,808,000	108,480,000	238,656,000
El Salvador	1,374,000	82,440,000	181,368,000
Nicaragua	1,300,000	78,000,000	171,600,000
Papua New Guinea	1,125,000	67,500,000	148,500,000
Ecuador	1,000,000	60,000,000	132,000,000
Thailand	1,000,000	60,000,000	132,000,000
Tanzania	917,000	55,020,000	121,044,000
Dominican Republic	900,000	54,000,000	118,800,000
Kenya	850,000	51,000,000	112,200,000
Venezuela	850,000	51,000,000	112,200,000
Cameroon	750,000	45,000,000	99,000,000
Philippines	728,000	43,680,000	96,096,000
Democratic Republic of the Congo	500,000	30,000,000	66,000,000
Burundi	481,000	28,860,000	63,492,000
Madagascar	425,000	25,500,000	56,100,000
Haiti	350,000	21,000,000	46,200,000
Rwanda	350,000	21,000,000	46,200,000
Guinea	275,000	16,500,000	36,300,000
Cuba	225,000	13,500,000	29,700,000
Togo	170,000	10,200,000	22,440,000
Bolivia	150,000	9,000,000	19,800,000
Zambia	110,000	6,600,000	14,520,000
Angola	100,000	6,000,000	13,200,000
Central African Republic	100,000	6,000,000	13,200,000
Panama	100,000	6,000,000	13,200,000
Zimbabwe	75,000	4,500,000	9,900,000
United States	47,000	2,800,000	6,100,000
Nigeria	45,000	2,700,000	5,940,000

Ghana	35,000	2,100,000	4,620,000
Jamaica	35,000	2,100,000	4,620,000
Sri Lanka	35,000	2,100,000	4,620,000
Malawi	25,000	1,500,000	3,300,000
Paraguay	25,000	1,500,000	3,300,000
Sierra Leone	25,000	1,500,000	3,300,000
Trinidad and Tobago	11,000	660,000	1,452,000
Republic of the Congo	3,000	180,000	396,000
Equatorial Guinea	3,000	180,000	396,000
Gabon	2,000	120,000	264,000
Benin	1,000	60,000	151,515

{1}Total Production of Exporting Countries

Source: International Coffee Organization, September 2012.

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