THE INFLUENCE OF PERCEIVED QUALITY ATTRIBUTES ON THE CHOICE OF ANIMAL FEEDS: CASE OF NAKURU DISTRICT "

UNIVERSITY OF NAME.

BY

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# **DECLARATION**

This management research project is my own original work and has not been submitted for a degree at the University of Nairobi or any other University.

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Date 18-10-02

This management research project has been submitted for examination with my approval as University supervisor.

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# **DEDICATION**

This study is dedicated to my family (Sam, Maggie, Jeff, Jean, Becky, and Liz).

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#### ABSTRACT

This study sought to investigate the effect of perceived quality attributes on the choice of animal feeds brands. It was carried out between April 2002 and October of the same year. The sampling frame comprised of small-scale farmers from Nakuru district. The sampling method used was multistage sampling.

Many dairy feeds manufacturing companies did not observe the relevant attributes that constitute a perceived quality outlook. Some of the attributes were very important and need to be considered. In order to investigate this the research had the following objectives.

- i) To identify the important attributes of perceived quality in the choice of animal feeds.
- ii) To determine the influence of the perceived quality attributes in the perception of quality.

Primary data was collected using questionnaires that were divided into three parts. The data was analyzed using descriptive statistics for parts one and two. Frequencies and percentages were used. Contingence tables were used to see relationships between the attributes and aspects of the biodata. In part three factor analysis using SPSS 9.0 package was used.

It was deduced from the study that some aspect like the farming duration, type of breed and number of cows kept had influence on attributes of perceived quality. This important attributes were: brand name; the package size: the functionality: the fit and finish of the brand. Several factors were considered as important in perception of quality. These were;

- Information about the brand and quality of package
- Credibility and the uniqueness of the brand and company
- Assurance of performance and availability of the brand
- Quantity of the brand
- Commitment by the middlemen
- The content and texture of the feeds
- Attitude towards the brand

- Existence of the brand
- Transportation services to consumers
- Frequency of advertising

In conclusion, companies manufacturing animal feeds should observe these important factors. They should also incorporate the relevant attributes when manufacturing the feeds. By doing this they will be committed to their customers in a positive way.

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#### **CHAPTER ONE**

#### INTRODUCTION

## 1.1 Background

The government of Kenya Sessional Paper No.1 of 1986 on Economic Management of Renewed Growth, had projected that agriculture would play a leading role in the country's future economic development by feeding the rapidly growing population; providing farm family income target to grow by at least 5% per annum to the year 2000; absorbing new farm workers at the rate of 3% per annum; and supplying raw materials to industry so as to stimulate growth of off-farm activities by between 3.5% and 5% a year (Chege,1993).

Between 1964 and 1973, the manufacturing sector registered an average growth rate of 9.1 %, and agriculture 4.6 % (National Development Plan 1997-2001). Companies operating during this period grew tremendously and felt no much need for strategic brand building activities. This was true for a country like Kenya where the market condition did not require this (Mburu, 2001). Most companies during these earlier times marketed unbranded products, a mistake that no present enterprise can make. Consumers then did not have a wide range of products to choose from, and they were not as complex as the modern consumers. Price and product availability were the only competitive tools. According to Kotler (1989), the product concept sufficed.

Early in the 1900's, the feed business consisted essentially of a merchandising channel for milling by-products, livestock protein sources such as tankage, and a few formula supplements (Kailikia, 1992). At this time, much livestock was fed straight feed grains with no protein supplement. In this type of feeding program and in this state of development of livestock nutrition, the opportunity and latitude for development of a formula feed industry was rather restricted (Moore, 1976). As the human population influx continues to increase in the urban areas, where the income are higher than in the rural areas, the demand for livestock products increased. As a result, the demand for animal feeds undoubtedly increased (Young, 1985).

The feed industry greatly expanded the output of formula feed supplements during the interwar period. Complete feeds were developed for some types of livestock but represented a

relatively small part of the total business. During this period of agricultural development, large shares of farmers feeding livestock were producing most of their feed grains. They depended upon the mixed feed industry only as a supply of protein supplement (Moore, 1976). The performance of the animal feeds industry has not been satisfactory. This is indicated by the frequent shortages and erratic price fluctuations and low quality animal feeds (Bartilor et al, 1988). The price fluctuations could also be due to other factors such as fluctuations in costs of production, government interventions and the structural organization of the industry (Bartilor et al, 1988).

The Government of Kenya adopted Structural Adjustment Programmes (SAPs) through the publication of sessional Paper No. 1 of 1986 on Economic Management for Renewed growth, to counter the structural constraints in the mid 1980's within the economy (Government Press, 1986). Companies in the past one decade have experienced stiff competition, globalization of products markets, deregulation, increasing convergence of consumers preferences, dumping, explosion in information technology, a desire to access portfolio of international brands and difficult in establishing new brands. All these challenges complicate the way any firm should market itself and it's product/services to the ever changing consumer, (Capron and Hullan, 1999).

Product quality has received attention in both practice and research, as evidenced by the growing number of firms instituting quality programs (for example Xerox, IBM, Hewlett Packard) and research-based academic literature (for example Aaker and Jacobson 1994). One reason for the keen attention placed on product quality is because of its critical relevance for delivering superior customer value. Superior customer value is the cornerstone of competitive advantage (Day and Wensley, 1985) and, as such, must be the focus of marketing strategy. Thus, it is essential for business to develop processes and systems that produce superior quality, at a competitive cost.

Companies have therefore felt the need to build their brands (Keller, 1998). World strongest brands have been strategically built over time (Aaker, 1996). Discussions of brands and branding have become increasingly common in recent years. An area that was traditionally the

responsibility of brand managers in a few packaged goods firms has become of central concern to everyone in the business community (Aaker and Biel, 1993).

Brands are successful when developed with a clear statement of intent about the product or service's purpose, the specific group of customer the brand is targeted at, and a commitment to equipping the brand with the right type of resources to achieve the stated purpose (Leslie de Chernatony, 1998). This is more important today since it is true that the customer is overwhelmed by choice and thus the distinction of a firm's output had better stand out (Mbau, 2000). Not surprising, an avalanche of speeches, books, seminars, corporate task forces, articles, and conferences has focused on the dos and don't of effective branding and hence product differentiation. Interest on the topic is intense, but much of the information fueling the discussion has been anecdotal, and the heroes of one session become the goats of the next (Aaker and Biel, 1993).

Brand equity, a concept born in the 1980's, has aroused intense interest among marketing managers and business strategists from a variety of industries (Aaker, 1991). A consumer perceives a brands' equity as a set of assets (and liabilities) linked to a brand's name and symbol that adds to (or subtracts from) the value provided by a product or service to a firm and/or that firm's customer (Aaker, 1996). A company may view it as the future discounted value of the profit stream that can be attributed to the price premium or enhanced loyalty generated by the brand name (Aaker and Biel, 1993). What the present firms need is a proper management of the brand equities (Mbau, 2000).

Mburu asserts that many firms in Kenya that profess to be adhering to the brand equity concept, are far from grasping its value and mode of implementation (Mburu, 2001). He further states that these firms do not have adequate procedures and systems necessary for the execution of the brand equity concept (Mburu, 2001). Despite this, companies have realized that the strength of these brand names, corporate images, aggressive advertising, price, trademarks and so forth are not enough to differentiate products from those of competitors (Baker 1994).

Most feed manufacturing companies do not recognize brand equity as a measure of building strong brands (Iyadema, 1988). Issues in perceived quality in animal feeds have not been taken seriously in the industry (Iyadema, 1988). A problem commonly cited in animal feeds is that of low quality feeds. Adulteration of chicken feeds by millers was reported and a warning issued by the minister of agriculture to the effect that feed millers found mixing fish meal with sawdust would have their licenses withdrawn (The Standard Daily Newspaper, 19<sup>th</sup> November, 1990).

Due to the low quality feeds, farmers complain that the production period of livestock was longer than the recommended (Barilor et al, 1988). This made the production costs to be higher than would be the case if the feeds were of high quality. Some farmers went to the extent of supplementing the feeds with vitamins, pre-mixes and proteins (Kailikia, 1992). Barilor et al(1988), notes that the animal feeds industry has been characterized by frequent shortages, erratic price fluctuations, low quality feeds, inadequate supplies and counterfeiting of credible brands like those of Unga feeds limited. The actors in the industry have not recognized what farmers' perception of quality entails (Iyadema, 1988). This matches well with the ideas of one scholar who notes that until the firm realizes that perception is everything, it will always fall in the trap of pursuing quality in lines that do not matter to consumers. (Mburu, 2001).

From a managerial perspective brand equity is a set of assets- including brand awareness, brand loyalty, perceived quality, brand association and other proprietary assets like competitive advantage- that are attached to a brand name or symbol (Aaker, 1991). Perceived quality refers to how customers perceive particular brands' overall quality offering - functional, emotional and self-expressive benefits - with respect to its intended purpose relative to alternative. A major asset, perceived quality, contributes significantly to the overall brand equity. If there is any leadership that companies should strive for, it is that of brand equity leadership. Perceived quality has been specifically identified as a drive of financial performance. This is the strategic thrust of a business, which has been found to drive other aspects of how a brand is perceived (Aaker, 1996).

In a study done to investigate the creation and implementation of brand equity in Kenya's'

Pharmaceutical sector, Mbau (2000), it was found out that the concept of perceived quality is not held highly in most organizations. Marketers have for long been pre-occupied with the concept of building their market share through advertising, sales promotion and price wars that are too costly. Yet, the returns are not enough to make them gain an extra mileage (Srivasatra et al, 1998). Kailikia in a study on "The structure and conduct of the animal feeds industry in Kenya", found low quality in the manufacturing of animal feeds as a major hindrance in this industry (Kailikia, 1992). This is positively supported by Iyadema who conducted a study on "Marketing and distribution of agricultural chemicals and farm tools in Uganda" (Iyadema, 1988).

# 1.2 Statement of the Problem

Muriuki (2000) asserts that contemporary management thinking recognizes three avenues of managing competition effectively. These include cost leadership, product differentiation, and focus strategy. Creating a successful brand entails blending all these various elements together in a unique way (Keller, 1998).

Perceived quality will directly influence purchase decision and brand loyalty, especially when buyer is not motivated or able to conduct a detailed analysis (Leslie de Chernatony, 1998). If a brand is well regarded in one context, the assumption will be that it will have high quality in a related context (Aaker and Biel, 1993).

The role of the animal feeds industry in livestock production in Rift Valley cannot be emphasized. The performance is unsatisfactory and this is a cause of concern (Bartilol et al, 1988). It appears that farmers in search of better-feed brands have been switching from one company to another. One researcher asserts that farmers went to the extent of supplementing the feeds with vitamins, premixes and proteins (Kailikia, 1992). Others sought for advice on

the feeds to buy. What is this that farmers are looking for in their choice of animal feeds? The companies have failed to recognize and fill the gap occurring in their effort to acquire higher market shares. What attributes of perceived quality do farmers consider in their choice of animal feeds? It is in light with this that companies have also to recognize the attributes that consumers perceive as quality and how it affects the choice of animal feeds. Hence the need to answer the question: What is the influence of perceived quality attributes in choice of animal feeds brands?

# 1.3 Research objectives

The objectives of the study will be:

- To identify the relevant attributes that underlies a perceived quality judgment of dairy feed.
- The extent to which these attributes are important.
- To investigate the influence of the perceived quality on the choice of dairy feed.

# 1.4 Importance of the study

It is anticipated that the finding of the study will be of value and interest to the following groups.

- Animal feeds manufacturing companies that would like to get information on what farmers perceive as quality in their animal feeds purchase decisions.
- Farmers in their choice of animal feeds.
- Animal feed stockiest that would like to stock animal feeds from companies that fulfill the requirements considered by farmers as of quality.
- Academicians and researchers who find the research useful and interesting in their quest for knowledge.

# 2.0 CHAPTER TWO AGRICULTURAL MARKETING

A number of empirical studies have been carried out, in many countries, on agricultural marketing. Examples of such studies include: Akello-Ogutu (1976), Iyadema(1988), Kailikia(1992). In all cases the analysis adopted some or all the four elements identified by Pritchard (1969), as necessary for formulating a research framework for analyzing agricultural marketing system in developing countries. These elements are:

- Market structure
- > A set of economic theories relevant to marketing
- > A theory of effective competition
- > The general theory of economic growth.

The fore mentioned studies have stressed the importance of agricultural inputs and the need to make them accessible to farmers. Despite this wide coverage of agricultural marketing; no study has been carried out on marketing and distribution of agricultural input in Nakuru. In his study, one scholar notes that existence of any systematic coordination between the procurement and marketing levels so as to sustain a smooth flow of the inputs to the farmers as an important factor in agricultural marketing (Iyadema, 1988).

In addition, another scholar had earlier identified what he called the five essential requirements that constitute a wheel of agricultural development. These are: markets for farm products; new farm technology; local availability of farm supplies and equipment; adequate incentives for farmers; transportation facilities (Mosher, 1986). Of this, local availability of farm supplies combined with adequate transportation facilities are essential pre-requisites of a well developed marketing channel for agricultural inputs.

# 2.1.1 Demand for animal feeds

The population of livestock keeps increasing from year to year. This population of livestock shall demand more in terms of grazing land and compound feeds. This implies that the demand for animal feeds will have to increase. Thus, for the structural changes to be effective, the animal feeds industry shall have to expand its production to meet the increased demand for

livestock feeds (Kailikia, 1992). In addition it should be able to provide high quality but reasonable priced feeds on a reliable basis. The animal feed production from 1980 to 1990 is shown in the table 2.1.

Table 2.1: Animal feed production (100tonnes) in Kenya: 1980 to 1990

YEAR	CATTLE	POULTRY	PIG	OTHER	TOTAL
	FEED	FEED	FEED	FEED	
1980	345	496	89	146	1,077
1981	466	639	123	87	1315
1982	379	610	791	57	1,126
1983	468	924	732	56	1,521
1984	561	695	99	41	1,396
1985	466	748	106	49	1,369
1986	414	1,238	109	21	1,782
1987	540	1,300	114	21	1,975
1988	668	1,111	188	57	2,045
1989	675	1,169	194	72	2,111
1990	505	1,230	250	81	2,034

SOURCE: Central Bureau of Statistics, Statistical Abstract (Various Issues, 1980-1990)

# 2.1.2 Market structure of the mixed feed industry

Market structure involves a classification of some physical and organizational characteristics of buyers and sellers of products in the market. The more important dimensions of market structure include the number and relative size of market participants, the degree of product differentiation in the market and relative freedom of entry into the market (Moore, 1976).

Primary attention in this industry analysis is directed towards the feed manufacturing industry as the buyer in the input market for feed grains and other products. It directs the feed manufacturing industry as a seller of manufactured formula feeds. Market concentration refers to the degree to which the larger participants in the market control a disproportionate share of market volume.

The market structure refers to those characteristics of the organization of a market which influence strategically the nature of competition and pricing within the market (Bain, 1967). In my study, a salient point emphasized is product differentiation. Livestock production is very sensitive to the availability, quality and prices of animal feeds. The extent to which agricultural input, including animal feeds are utilised at the farm level depends among other things on the existing marketing system of these inputs that links the agricultural sector with the wider economy (Breimyer, 1975). Thus an effective and efficient agricultural marketing system is pertinent.

# 2.1.3 Product differentiation

Product differentiation implies the degree to which the outputs of alternative sellers receive preferential treatment among buyers (Moore, 1976). One scholar recons that "....a general class of product is differentiated if any significant basis exists for distinguishing the goods (or services) of one seller from those of others (Chamberlin, 1983).

Product differentiation, like that of animal feeds may be due to firms emphasizing that their particular feeds have unique characteristics and that "quality" of the product is guaranteed by the brand name under which they are sold (Dahl, 1977). This aspect may bring about consumer loyalty and consequently reduce competition between the market participants. If this happens, then there is a likelihood of excessive non-price competition, such as advertising and special services. The total cost of doing business would then be raised rather than lowered.

Several features of the food-marketing complex affect the degree of product differentiation in mixed feeds. Where many personal and merchandising services are a part of the total product package, the opportunity for product differentiation is again substantially increased (Moore, 1976). Product differentiation tends to be more important at the retail end of the distributive channel because buyers at retail typically cannot be market experts in every product they buy. Therefore, they tend to rely on reputation gained by marketing firms and the backlog of satisfactory personal experiences obtained within a particular firm rather than the technical characteristics of the product and its relative price when compared to alternatives.

According to Kailikia, products are typically traded on the basis of physical specifications, which are measured very accurately by buyers and sellers (Kailikia, 1992). The high level of market information on the part of all buyers and sellers tend to diminish the opportunity for extensive product differentiation.

## 2.1.4 Distribution and marketing channels for mixed feeds

There are three marketing channels that require to be harmoniously and simultaneously developed so as to provide incentives to a farmer with intent of making him more productive and integrated in the whole economy. These marketing channels are (Iyadema, 1988):

- ✓ Channels for his produce
- ✓ Channels for consumer foods and services that he requires but does not produce
- ✓ Channels for farm inputs.

Formula feed products typically moves from manufacturer to farmer through a local dealer or feed handler. The feed dealers provide a spectrum of services to farmers in addition to the feed itself, which is typically obtained from the manufacturer (Moore 1986). Among the more important of these services may be listed grinding and mixing of feed grains, convenience of location, technical advice on nutritional aspects of feeding programs and many types of financing. In addition to handling feed products these dealers typically have other contacts with farmers (Moore, 1986). While these are some indications of a trend of direct selling from the manufacturer to the farmer, feed dealers represent an important link in the distribution of feeds at present and in the foreseeable future.

The channel for farm inputs is of critical importance to a farmer. It is through it that he acquires farm inputs in order to realize surplus production that he may dispose off and obtain the deficit consumer foods and services. An efficient agricultural input marketing channel should posses the following characteristics (Kailikia, 1992):

a) It should provide farmers with access to a wider range of agricultural inputs, which are appropriate to the level of technology used in their crop\livestock enterprise.

- b) It should make inputs available to the farmers at or near the site of his or her enterprise
- c) It should make the inputs available on timely if not continuous basis, consumerate with the nature of the production system.
- d) It should be composed of a sufficient number of supplies. This would provide a competitive environment for serving the farmers need at input prices which reflect the real financial costs.

A marketing system that achieves the above outlined characteristics provides incentives to farmers and enables them realize increased productivity (Moore 1986).

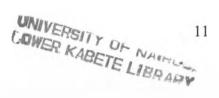
# 2.1.5 The marketing system for animal feeds in Kenya

Scanty literature is available on marketing of animal feeds in Kenya. Mbatha has cited high prices of animal feeds and poor quality, besides other constraints such as diseases as the major constraints that have hampered livestock production in Kenya (Mbatha, 1976). High costs and shortages of feeds were cited as contributing to the decline in poultry population.

The 1984-1988 development plan made similar observations. The prices and unavailability of quality feeds have been caused of complaints from farmers. This suggests that an efficient animal feeds industry, which is an essential precondition for intensified livestock production is lacking. The concept of a marketing system includes both the physical distribution of economic inputs and products, and the mechanism or process of co-ordinating production and distribution (Shaffel et al, 1985).

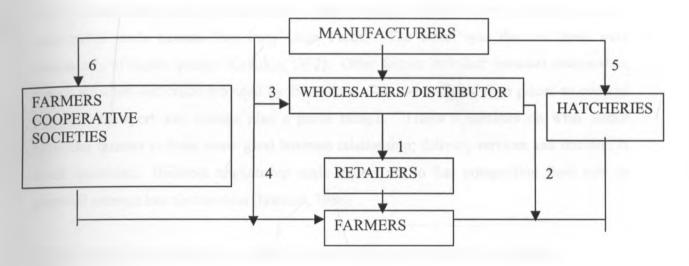
A marketing system may be viewed as the totality of product channels, market participants and business activities involved in the physical and economic transfer of goods and services from producers to consumers. The marketing system that develops for any products depends on the nature of the product and the business activities involved (Benzon and Norvel, 1983).

The channel of distribution that may be involved may be direct as in the case where the producers sell directly to the ultimate consumers or it may contain one or more institutional



middlemen (Donnely, 1986). The marketing system for compounded animal feeds in Kenya as shown in figure below indicates that there are six possible channels of distribution, through which the feeds may move from the manufactures to the farmers (Kailikia, 1992)

Figure 2.1: A schematic diagram of the marketing system for animal feeds in Kenya



Source: Kailiku, 1992.

Channel 1: indicates that farmers obtain their feeds through the manufacturers through the wholesalers and retailers

Channel 2: indicates that farmers obtain their feeds from the manufacturers through the wholesalers

Channel 3: indicates that the retailers obtain the feeds from the manufacturers and then sell to the farmers

Channel 4: indicates that the farmers obtain their feeds directly from the manufacturers

Channel 5: indicates that the farmers get feeds from the manufacturers through the hatcheries

Channel 6: indicates that farmer's co-operative societies supply the farmer with feeds.

# 2.1.5 The conduct of the animal feed industry

The conduct refers to the manner in which firms within an industry adjust prices, output, product quality and promotional efforts in response to competitive pressures (Kohls, 1980). Prior to November 1989, the prices of feeds in Kenya were under price control. The quality of

feeds is likely to be poor if the prices are controlled at levels where it is not profitable to produce (Kailikia, 1992).

In his study, one scholar found that quality attracted buyers most, while prices come second. Farmers were willing to buy 'Unga Feeds' which was relatively more expensive than other feeds. Other factors such as consumer's rigidity brought about by long standing business relationship made farmers buy from Unga Feeds. The belief was that its feeds were consistently of higher quality (Kaikikia, 1992). Other factors included: personal relationship, market situation and credit provided by the traders. The traders based their prices on costs of purchase, transport and storage plus a profit margin. Trader's opinions on what attract particular farmers to them were: good business relationship; delivery services and retailing in small quantities. Business relationship made traders not to fear competition from new or potential entrants into the business (Iyamezi, 1988).

## 2.1.6 Factors that determine the brands of feeds stocked by traders

Traders do not stock feeds exclusively from particular processors but from a range of different suppliers. The traders approach the processors for the feeds. New processors have to request the traders to stock their feeds. Farmers demand is a major factor that determines the brand of feeds stocked by the traders. Others include: profitability; the terms of sales; and the availability of feeds (Kailikia, 1992).

Mbatha supports this and notes that input stock are determined mainly according to farmers' demands, which take into consideration seasonal requirements (Mbatha, 1988). Though true, they are also guided by their previous sales records. Personal experience, in terms of both rate of stock turnover and profitability, will always determine what a trader deals in. Scarcity of the items may limit the flexibility of the traders in whatever decisions they take regarding input distribution. Other parameters that are considered include: requirements as per area of operation; advice from agricultural officers; requirements by primary societies; availability of funds or working capital; and the existence of new business opportunities (Iyamezi, 1988).

Promotional efforts taken to attract customers include: advertising; lowering prices relative to

other farm supply shop; offering quick services\using a nice language; offering regular customer credit; stocking enough; visiting progressive farmers; observing quality; and increasing society's membership (Kailikia, 1992). According to Iyadema, some of the problems faced by farm supply shops in the sale of inputs include (Iyadema, 1985):

- > Shortage of input\irregular supplies
- > High prices
- > Location of business premise
- > High premise rents
- Poor product know knowledge
- > Lack of advertisement facilities
- Inadequate capital
- > High competition
- > Lack of storage facilities
- > Lack of courses for farmers on input use
- > Limited sources of supplies
- > Poor transport facilities

# 2.2.1 What is perceived quality

Quality can be defined broadly as superiority or excellence. By extension, perceived quality can be defined as the consumer's judgment about a product's overall excellence or superiority (Zeithaml, 1988). Another scholar defines perceived quality as a global assessment based on customer perception of what they think constitutes a quality product and how well the brand rates on these dimensions (Keller, 1998).

Perceived quality differs from: Actual or Objective quality – the extent to which the product or service delivers superior service; Product based quality – the nature and quantity of ingredients, features, or services included; Manufacturing quality - conformance to specification (the "zero defect" goal) (Aaker, 1991). As one chief Executive Officer, James Robinson of American Express, put it in his speech "......Quality is the only patent protection we've got" (Robinson, 1991).

# 2.2.2 Objective quality versus perceived quality

Several researches have emphasized the difference between objective and perceived quality (Dodds and Monroe 1984; Jacoby and Olson 1985). Holbrook and Corfman, for example distinguish between mechanistic and humanistic quality. Mechanistic (quality) involves an objective aspect or feature of a thing or event; humanistic (quality) involves the subjective response of people to objects and is therefore a highly relativistic phenomenon that differs between judges (Holbrook and Corfman, 1985). Objective quality is used to describe the actual technical superiority or excellence of the product (Monroe and Krishnan, 1985). It refers to measurable and variable superiority on some predetermined ideal standard or standards. Concern centres on the selection of attributes and weights to measure objective quality.

Product based quality refers to amounts of specific attributes or ingredients of a product. Manufacturing based quality involves conformance to manufacturing specifications or service standards. Conformance to requirements and incidence of internal and external failures are other definitions that illustrate manufacturing-oriented notions of quality. Managers views may differ considerable from consumers or users views. Consumer reports rating may not agree with manager's assessment in terms of either salient attributes or weights assigned to the attributes (Zeithaml, 1988). In a research study for General Electric, the researchers points out striking differences between consumer, dealer and manager perception of appliance quality.

# 2.2.4 Perceived quality as a judgement made within consumers evoked set

Evaluation of quality usually takes place in a comparison context. Quality evaluations are made within ' the set of goods which ........ would in the consumer's judgment serve the same general purpose for some maximum outlay' (Maynes, 1986). On the basis of the qualitative study and consistent with Maynes contention, the set of products used in comparing quality appears to be the consumers evoked set. A products quality is evaluated as high or low depending on its relative excellence or superiority among products or services that are viewed as substitutes by the consumer. The specific set of products used for comparison depends on the consumer's, not the firms, assessment of competing products (Zeithmal, 1988).

Quality can be inferred from specific attributes, surrogate-based preference forming behaviour

(for example size signals quality in stereo speakers, style signals quality in cars and clothes). Signal quality has been dichotomised into intrinsic and extrinsic cues (Olscharsky, 1985). Intrinsic cues involve the physical composition of the product. In a beverage, intrinsic cues would include such attributes as flavour, colour, texture and degree of sweetness. Intrinsic attributes cannot be changed without altering the nature of the product itself and are consumed as the product is consumed. Extrinsic cues are product-related but not part of the physical product itself. They are by definition, outside the product. Price, brand name and level of advertising are examples of extrinsic cues to quality (Olsan and Jacoby 1972; Olson, 1977).

The intrinsic –extrinsic dichotomies of quality cues are useful for discussing quality but are not without conceptual difficulties. A small number of cues, most notably those involving the products package, are difficult to classify as either intrinsic or extrinsic. Package could be considered an intrinsic or extrinsic cue depending on whether the package is part of the physical composition of the product (for example a squeezable ketchup container) in which case it would be an intrinsic cue or protection and promotion for the product (for example a card-board container for a computer) in which case it would be and extrinsic cue (Zeithaml, 1988).

Generalizing about quality across products has been difficult for manages and researchers. Specific or concrete intrinsic attributes differ widely across products as do attributes consumers use to infer quality. Even within a product category, specific attributes may provide different signals of quality. For example, thickness is related to high quality in tomato-based juices but not in fruit-flavoured children's drinks (Zeithmal, 1988).

The literature on hedonic quality measurement maintains that price is the best measure of product quality. It has shown that consumers use price to infer quality when it is the only available cue. When price is combined with others (usually intrinsic cues), the evidence is less convincing. Two researchers, Kirmani and Wright found empirical support for the relationship between level of spending on advertising and quality inferences. The cues that signal quality change over time because of: competition, promotional efforts of companies, changing consumer tastes, and information (Kirman and Wright, 1987).

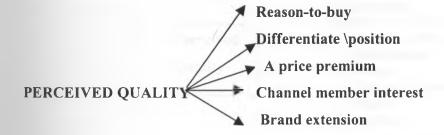
# 2.2.5 Perceived quality as a brand equity asset

Perceived quality is an important asset in brand equity. Perceived quality is a brand association that is elevated to the status of a brand asset for several reasons (Aaker, 1996). Among all brand association, only perceived quality has been shown to drive financial performance. Perceived quality is often a major (if not the principal) strategic thrust of a business. It is linked to and often drives other aspects of how a brand is perceived. Figure 2.3 drawn from and discussed in Managing Brand Equity, provides a compact overview of how brand equity generates value.

# 2.2.6 How perceived quality generates value

As figure 2.2 suggest, perceived quality provides value in several ways.

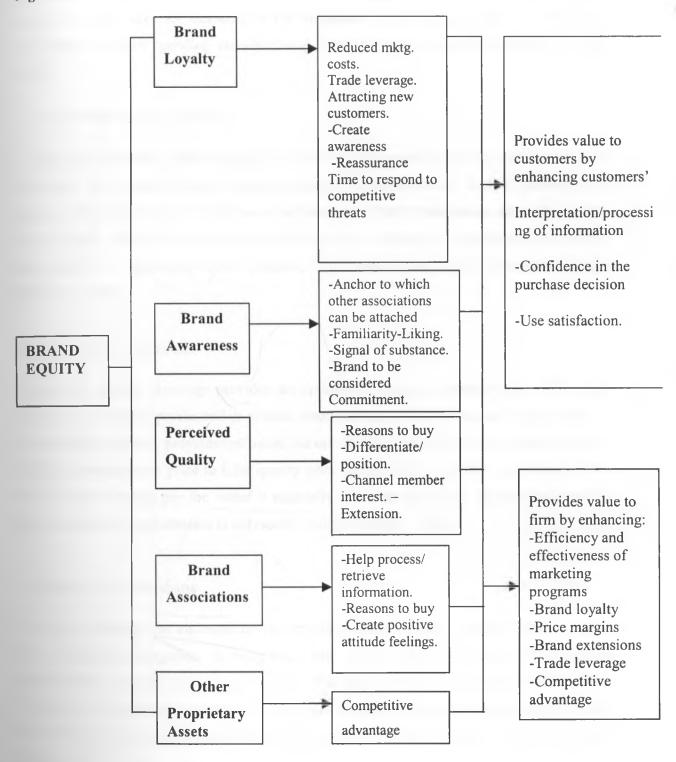
Figure 2.2: The value of perceived quality



# 2.2.6.1 Reason to buy

In many contexts, perceived quality of a brand provides a pivotal reason to buy, influencing which brands are included and excluded from consideration, and the brand that is to be selected (Aaker, 1991). A customer often will lack the motivation to obtain and sort out the information that might lead to an objective determination of quality in a given application or the information may simply be unavailable or the customer may not have the ability or resources to obtain or process.

Figure 2.2: How brand equity generates value to the firm and to the customers



From Managing Brand Equity: Capitalizing on the value of a Brand Name by David A. Aaker (1991)

In any case, perceived quality becomes central. Because perceived quality is linked to purchase decision, it can make all elements of the marketing program more effective. There is a relationship between spending on advertising and quality inferences (Kirman and Wright, 1987).

# 2.2.6.2 Differentiate\position

A principle-positioning characteristic of a brand is its position on the perceived quality dimension. Is it a super premium, premium, value or economy entry? Further, with respect to a perceived quality category is the brand the best, or is it only competitive with others in the class (Aaker, 1991)? As improved technology and increasing competition lead to the development of technically better products, the features that signal superiority change (Zeithmal, 1988).

# 2.2.6.3 A price premium

A perceived quality advantage provides the option of charging a premium price. The price premium can increase profits and or provide resources with which to reinvest in the brand. A price premium not only provides resources, but can also reinforce the perceived quality (Aaker, 1989). Consumers use price to infer quality when it is the only available cue (Olsen, 1977). The 'you get what you pay for' belief is especially important in the case of goods and services for which objective information is not readily available (Aaker, 1991).

#### 2.2.6.4 Brand extensions

Perceived quality can be exploited by introducing brand extensions, using the brand name to enter new product categories. A strong brand with respect to perceived quality will be able to extend further, and will find a higher success probability than a weaker brand (Aaker, 1991). A study of 18 proposed extensions of six brand names found that perceived quality of the brand name was a significant predictor of the evaluation of the extensions (Keller and Aaker, 1990).

# 2.2.6.5 Channel member interest

Perceived quality can also be meaningful to retailers, distributors and other channel members and thus aid in gaining distribution. The image of a channel member is affected by the products or services included in its line. Stocking "quality products" can matter (Mburu, 2001). In addition, a retailer or other channel member can offer a high-perceived quality product at an attractive price to draw traffic. In any case, the channel members are motivated to carry brands that are well regarded and that customers want (Aaker, 1991).

# 2.2.7 What influences perceived quality

The dimension that underlies a perceived quality judgment will depend upon the context. Though the concrete attributes that signal quality differ across products, higher level abstract dimensions of quality can be generalized to categories of products (Zeithmal, 1988).

To learn relevant dimensions in a given context, it is usually useful to conduct some exploratory research. For example, customers can be asked why some brands have higher quality than others and why pairs of brands differ in quality (Aaker 1991). Then the relative importance of emerging dimension needs to be assessed. Prior research has identified the following general dimension of product quality (Garvin, 1985).

**Performance**: level of which the primary characteristics of the product operate (for example low, medium, high, or very high)

Features: secondary elements of a product that complement the primary characteristics.

Conformance quality: degree to which the product meets specifications and is absent of defects.

Reliability: consistence of performance over time and from purchase to purchase

Durability: expected economic life of the product

Serviceability: ease of servicing the product

Style and design: appearance or feel of quality

Parasuraman, Zeithaml and Berry (1985) found consistent dimensions of perceived quality across seven service industries.

Competence: delivery of the basic function being sought by the customer

Tangibles: whether the physical facilities and appearance of personnel imply quality.

Reliability: whether dependable and accurate

Responsiveness: is the company personnel willing to help customers and provide prompt

service

Empathy: does the company provide caring, individualized attention to its customers

Figure 2.3 displays some product attributes and benefits that were selected as part of a research study to be meaningful across seven different product classes (Keller, 1998).

Figure 2.3 Representative sets of specific attributes and benefits for seven product categories

Flavour\taste	Weight	Size	Construction material
Colour	Energy-efficiency	Caffeine	Freshness
Calories	Style	Instructions	Convenience
Compatibility	Content	Warranty	Availability
Brand name	Comfort	Automation	Price
Durability	Serviceability	Ease of use	Packaging
Sweetness			

# 2.2.8 Signals of high quality

Achieving high quality is not enough. Actual quality must be translated into perceived quality (Mburu, 2001). In most situations, the dimensions of quality that are most critical also are most difficult to judge (Schiffman and Karuk, 1997). Consumers will routinely learn the determinants of product quality when attribute cues are freely available and processing is unconstrained (Osselaer and Alba, 2000). Research has shown that in many product classes a key dimension, which is visible can be pivotable in affecting perceptions about more important' dimensions which are difficult if not impossible to judge (Mburu, 2001). For example:



Stereo speakers: large size means better sound

**Detergents**: suds means cleaning effectiveness

Cars: a solid door closure sound implies good workmanship and a solid safe body

2.2.9 Creating perceptions of quality

Achieving perception of quality is usually impossible unless the quality claim has substance.

Generating high quality requires an understanding of what quality means to customer as well

as a supportive culture and a quality improvement process that will enable the organization to

deliver quality products and services. Creating a quality product or service, however, is only a

partial victory; perceptions must be created as well (Aarker, 1991).

Perceived quality may differ from actual quality for a variety of reasons. First, consumers may

be overly influenced by a previous image of poor quality. Because of this, they may not believe

new claims. It is critical to protect a brand from gaining a reputation for shoddy quality from

which recovery is difficult and sometimes impossible (Mburu, 2001).

Secondly, a company may be achieving quality on a dimension that consumers do not consider

important. There is need to make sure that investments in quality occur in areas that will

resonate with customers (Aaker, 1991). Thirdly, consumers rarely have all the information

necessary to make a rational and objective judgment and even if they do have the information,

they may luck the time and motivation to process it. It is important to understand the little

things that consumers use as the basis for making a judgment of quality. If consumers kick a

cars tire to judge its sturdiness, then the tire had better be sturdy. Fourthly, because consumers

may not know how best to judge quality, they may be looking at the wrong cues (Aaker, 1991).

2.2.10 Product quality versus customer needs

Customers buy satisfaction not just parts (Schiffman and Kanuk, 1997). Marketing managers

must be constantly concerned with product quality. Product quality should be assessed on how

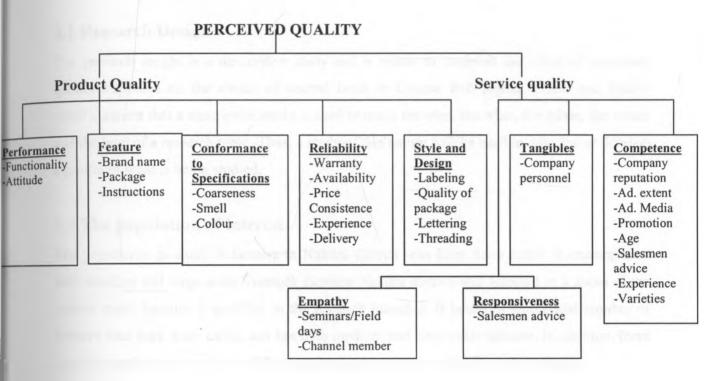
the customer thinks a product will fit some purpose (Mburu, 2001).

A product with more features is not a high quality product if the features are not what the target

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market wants. Some companies have in practicing TQM principles run into implementation problems as they become overly focused on processes and how they are doing business (Keller, 1998). Since consumers rank brand according to their perceptions of quality (Lefton, 1991) firms should try to be customer focused.

Figure 2.4: Link between attributes of Perceived quality and consumer choice.



Source: Parasuraman, 1985

# 3.0 CHAPTER THREE RESEARCH METHODOLOGY

This chapter shows the methodology to be used to carry out the research. It includes the research design, population of interest, the sampling plan, data collection and data analysis method.

# 3.1 Research Design

The research sought is a descriptive study and is meant to establish the effect of perceived quality attributes on the choice of animal feeds in Central Rift region. Coper and Emory (1995), asserts that a descriptive study is used to teach the who, the what, the when, the where and the how of a research topic. Thus, a study of this nature will be used to describe or develop a profile of what is being studied.

# 3.2 The population of interest.

The population of study is farmers in Nakuru district who keep dairy cattle. It encompasses both medium and large-scale livestock farmers. Nakuru district was selected as a focus of the current study because it qualifies in the research intended. It houses a substantial number of farmers who keep dairy cattle, and has both medium and large-scale farmers. In addition, there is a reasonable number of animal feed producing plants as compared to other districts.

# 3.3 The Sample

Multistage sampling method was used to get the samples. First, three locations were selected from the entire district using simple random sampling. The three locations were then split into different sub-locations and this formed the next sampling frame. A further three sub-locations were selected using simple random sampling. One hundred farmers were then chosen from the three sub-locations using judgmental sampling. Judgmental sampling method was chosen since the number of farmers in these sub-locations could not be clearly determined.

#### 3.4 Data collection method

Primary data was used. The data was collected using a self-administered questionnaire. An interview was conducted using the researcher-administered questionnaire for the illiterate farmers while a drop and pick strategy was used for the literate ones. The first section of the questionnaire gave a general background of the responded (biodata). The second and third part gave information on the attributes of perceived quality.

# 3.5 Operational definitions

To determine the farmer's perception of quality, the nine dimensions of perceived quality given by Parasuraman (1985) were operationalized. These dimensions include: performance, features, conformance to specifications, reliability, style and design, tangibles, empathy, responsiveness and competence.

Dimensions	Attributes
Performance	If the brand achieves its primary objectives. The attitude of the farmers
	towards he product
Features	Whether the product brand name is known .The type of packaging
	material. Instructions on the package.
Conformance to	The coarseness, smell and colour of the feed particles.
Specifications	
Reliability	Warrant for purchases and availability of feeds. The price and
	consistency in pricing. How long has the farmer used these feeds and
	who delivers the feeds to them.
Style and design	Good labeling, lettering and threading.
Tangibles	The guide given by the company personnel.
Empathy	Field days/ seminars given by the company. The channel members
	interest.
Responsiveness	The salesmen advice and demonstrations held.

Competence.

The company reputation. Amount spent on advertising. The type of media used e.g. radio, tv, margazines. The age of the brand in the market. The varieties of feeds and the experience gained by the farmer in using the brand.

## 3.6 Data Analysis

The researcher used descriptive statistics to analyze data in section 1 and 2 of the questionnaire (Appendix 1). These included tables, charts and percentages. This helped answer the first and third objective. Inferential statistics was used for section 3. Factor analysis was used to answer questions in this section. It helped answer the second objective. The analysis enabled the researcher establish whether there were some underlying pattern of relationship that existed between the variables. Ranking of the variables in order of importance was done and variables grouped together.

# 4.0 CHAPTER FOUR DATA ANALYSIS AND RESEARCH FINDINGS

#### 4.1 Introduction

This chapter is divided into three sections. The first section presents research findings on the biodata and general information on farmers identified in the research. Although this section does not explain any direct link to the objectives, it will be used to deduct some conclusive information for the research findings in order to achieve the objectives of the study. The second section shows the influence of perceived quality attributes in the description of quality by dairy farmers in their preference of animal feeds. The third and last section presents findings on the important variables of perceived quality considered by farmers in their choice of feeds and the magnitude to which they are important. These attributes are grouped into different important factors, which are then prioritized according to their importance.

In section one and two means, percentages and frequencies were used to analyze the data. Cross tabulation using contingence tables were used in section two to determine relationships that information on the respondents had on the important perceived quality attributes. In section three data reduction method of analysis using SPPS was used. This mode of data analysis was chosen due to the nature of data collected and the ease of use.

Eighty-six farmers out of the expected one hundred responded. This indicates an eighty six percent response rate. The farmers for whom the research was done were from Nakuru district. They were selected using multistage sampling.

## Section one

## 4.2.1 Number of dairy cows kept by farmers

Table 4.1: Number of dairy cows

	_	D	Valid	Cumulative
	Frequency	Percent	Percent	Percent
1 to 10	69	80.2	80.2	80.2
11 to 20	12	14.0	14.0	94.2
21 to 30	3	3.5	3.5	97.7
31 to 40	2	2.3	2.3	100.0
Total	86	100.0	100.0	

Table 4.1 shows the number of dairy cows kept by farmers. Of the eighty-six farmers who responded, sixty-nine of them (80.2 %) kept ten or less dairy cattle. Twelve farmers (14 %) kept between eleven and twenty cattle, while five (5.8 %) kept between twenty-one and forty cattle.

## 4.2.2 Type of breed of cattle

Table 4.2: Type of breed of cattle

tune of broad			Valid	Cumulative
type of breed	Frequency	Percent	Percent	Percent
up-grade	24	27.9	27.9	27.9
local	9	10.5	10.5	38.4
cross breed	51	59.3	59.3	97.7
different breeds	2	2.3	2.3	100.0
Total	86	100.0	100.0	

Table 4.2 shows the type of breed kept by farmers. Fifty-one farmers (59 %) kept crossed breeds of cattle. Twenty-four (24 %) kept pure breed. Nine (10.5 %) kept local breeds while two farmers (2.3 %) kept different breeds of cattle.

#### 4.2.3 Dairy farming period

Table 4.3 shows periods (in years) that farmers have practiced dairy farming. Among the respondents for which the research was done, thirty-four (39.5 %) have practiced dairy farming for a period of two to five years. Thirty-one farmers (36 %) had practiced for more than ten years.

Table 4.3: Farming period in Years

	Frequency	Percent
less than 1	2	2.3
2 to 5 years	34	39.5
6 to 10	19	22.1
more than 10	31	36.0
Total	86	100.0

Nineteen farmers (22.1 %) had kept for a period ranging from six to ten years. The rest, 2 farmers (2.3 %), have practiced it for less than one year. This analysis is important in the study because it shows the experience gained by the farmers. The more the farming years the more experience the farmer has in choosing the preferred dairy feed brands.

#### 4.2.4 Awareness and purchase decisions of dairy feeds

Table 4.4: Dairy feeds awareness

	Frequency	Percent	Cumulative Percent
1 to 5	65	75.6	75.6
6 to 10	20	23.3	98.8
11 to 15	1	1.2	100.0
Total	86	100.0	

From table 4.4, sixty-five (75.6 %) of the farmers interviewed knew less than five types of dairy feeds. Twenty (23.3 %) knew six to ten different brands of feeds, while only one respondent (1.2 %) knew more than ten different brands.

Eighty-two farmers used five or less of the various brands they were aware of. This represents 95 % of the total respondents. Only four farmers used more than five different brands of dairy feeds. This is shown in table 4.5. Forty-six percent of the farmers felt that both quality and price were very vital in their decisions on which dairy feed brand to buy. Thirty-nine percent felt that quality alone was important, while three percent considered price alone in their purchase decisions. The remaining ten percent thought other factors such as availability and the sellers knowledge on feeds were important.

Table 4.5: Number of feeds used

			Cumulative
	Frequency	Percent	Percent
1 to 5	82	95.3	95.3
6 to 10	2	2.3	97.7
1 to 15	2	2.3	100.0
Total	86	100.0	

#### Section two

## 4.3.0 The influence of perceived quality attributes on choice of feeds

#### 4.3.1 Importance of perceived quality attributes in description of quality

Perceived quality was operationalized into the various dimensions. These include: performance; features; conformance to specifications; reliability; style and design. These dimensions were further classified into the important attributes that constitute a purchase decision. Some of the important perceived quality attributes identified were: brand name, price; package; functionality; advertising; age of brand; cultural symbol; fit and finish.

The respondents felt that brand name, package size and the functionality of the brand were very important influencers of quality in their choice of brands they purchase. The cultural symbol and fit & finish were considered as important, while advertising and age of the brand in the market bore little importance.

Ninety-five percent of respondents felt that functionality of a brand in achieving its intended purpose was very important, while the remaining five percent were indifferent. Seventy three percent felt that brand name was very important, fourteen percent were indifferent and thirteen percent felt it was not important. Sixty-six percent felt that package size was very important, sixteen percent were indifferent while eighteen percent felt otherwise. Fifty-two and forty-three percent felt that fit & finish and cultural symbol respectively were important, twenty one and forty two percent were not sure, while twenty six and thirty four percent respectively thought it was unimportant. Fifty percent felt that advertising was not important; twenty-two were indifferent while twenty eight percent thought it was important. For the age of a brand in the market, fifty-one percent felt it was not important, seventeen were indifferent while thirty-one felt it was important.

The attributes that influence perceived quality to a greater extent were determined across the general information on the respondents. This information includes:

- The period the respondent had practiced farming
- The number of dairy cattle kept
- The type of breed kept

The following was deduced from the above information

#### 4.3.2 Influence of the dairy farming period on perceived quality attributes

The level of importance was ranked as: 1 to 2 - not important; 3 - indifferent; 4 to 5 - important

#### i) Influence on brand name

The table 4.3.1 shows how the period of dairy farming influenced the brand name

Table 4.3.1: Influence of farming period on the brand name

	brand name				
farming period in	b				
years	1 to 2	3	4 to 5	Total	
less than 1			2	2	
year			3.2%	2.3%	
2 to 5 years	4	2	28	34	
	36.4%	16.7%	44.4%	39.5%	
6 to 10	3	4	12	19	
	27.3%	33.3%	19.0%	22.1%	
more than 10	4	6	21	31	
years	36.4%	50.0%	33.3%	36.0%	
Total	11	12	63	86	
	100.0%	100.0%	100.0%	100.0%	

For the sixty three respondents who felt that brand name was an important attribute, 44.4% had practiced dairy farming for a period of between two and five years. 33.3 % had done it for more than ten years, 19 % for a period between six and ten years, while 19 % had done it for less than a year.

#### ii) Influence on the package size

The table 4.3.1 below shows how the period of dairy farming influenced the size of the package. Fifty-seven respondents (66 %) of the total respondents felt that the size of the package was important. Of these respondents 36.8 % had practiced dairy farming for a period between two and five years, an equal percentage for a period more than ten years, while 2.5 % had done it for less than one year.

Table 4.3.2: Influence of the farming period on the package size

	pa	package size			
	1 to 2	3	4 to 5	Total	
less than 1			2	2	
year			3.5%	2.3%	
2 to 5 years	8	5	21	34	
	53.3%	35.7%	36.8%	39.5%	
6 to 10	2	4	13	19	
	13.3%	28.6%	22.8%	22.1%	
more than 10	5	5	21	31	
years	33.3%	35.7%	36.8%	36.0%	
Total	15	14	57	86	
	100.0%	100.0%	100.0%	100.0%	

## iii) Influence on the functionality of the product

The functionality of the product had the highest number (96.5 %) of respondents who considered it as important. Of those respondents 39.8 % had practiced dairy farming for a period of two to five years. 36 % had done it for more than ten years, 21 % for six to ten years while 2 % for less than one year. This is shown on table 4.3.3

Table 4.3.3: Influence of the farming period on the functionality of the product

		icreases yield		
		3	4 to 5	Total
farming	less than 1		2	2
period	year		2.4%	2.3%
in years	2 to 5 years	1	33	34
		33.3%	39.8%	39.5%
	6 to 10	1	18	19
		33.3%	21.7%	22.1%
	more than 10	1	30	31
	years	33.3%	36.1%	36.0%
Total		3	83	86
		100.0%	100.0%	100.0%

## iv) Influence on fit and finishing of the product

Table 4.3.4: Influence of farming period on the fit and finishing of the product

		fi	and finisl	n	
		1 to 2	3	4 to 5	Total
farming	less than 1		1	1	2
period	year		5.6%	2.2%	2.3%
in years	2 to 5 years	5	10	19	34
		22.7%	55.6%	42.2%	39.5%
	6 to 10	5	3	11	19
		22.7%	16.7%	24.4%	22.1%
	more than 10	12	4	14	31
	years	54.5%	22.2%	31.1%	36.0%
Total		22	18	45	86
		100.0%	100.0%	100.0%_	100.0%

Slightly over half percent (52.5 %) considered the fit and finishing of a package as an important attribute. Of these respondents 42.2 % had practiced dairy farming for two to five years while 31.1 % for more than ten years. 24.4 % had done it for six to ten years and 2.2 % for less than one year.

## 4.3.3 Influence of the numbers of dairy cows kept by respondents on perceived quality attributes

#### i) Influence on the brand name

Fifty respondents (79.4 %) of those who felt that brand name is important had between one and ten cows. 14.3 % had eleven to twenty cows, 4.8 % had twenty one to thirty dairy cows, while the rest (1.6 %) had more than thirty cows. This is indicated in table 4.3.5

Table 4.3.5: influence of number of cows kept on the brand name

		b	е		
		1 to 2	3	4 to 5	Total
Number	1 to 10	9	10	50	69
of dairy		81.8%	83.3%	79.4%	80.2%
cows	11 to 20	1	2	9	12
		9.1%	16.7%	14.3%	14.0%
	21 to 30			3	3
				4.8%	3.5%
	31 to 40	1		1	2
		9.1%		1.6%	2.3%
Total		11	12	63	86
		100.0%	100.0%	100.0%	100.0%

#### ii) Influence on the package size

The table 4.3.6 shows the influence of number of cows kept on the size of package. Forty-five respondents (78.9 %) of the total fifty-seven respondents who felt that the package size was important had kept between one and ten dairy cows. 14 % had eleven to twenty, 5.3 % had twenty to thirty, while the rest (1.8 %) had more than thirty dairy cows.

Table 4.3.6: Influence of number of cows kept on the size of package

		pa	package size			
4		1 to 2	3	4 to 5	Total	
Number	1 to 10	12	12	45	69	
of dairy		80.0%	85.7%	78.9%	80.2%	
cows	11 to 20	3	1	8	12	
		20.0%	7.1%	14.0%	14.0%	
	21 to 30			3	3	
				5.3%	3.5%	
	31 to 40		1	1	2	
			7.1%	1.8%	2.3%	
Total		15	14	57	86	
		100.0%	100.0%	100.0%	100.0%	

#### iii) Influence on functionality of the brand

Table 4.3.7: Influence of the number of cows kept on the functionality of the brand

		function	onality	
		3	4 to 5	Total
Number	1 to 10	3	66	69
of dairy		100.0%	79.5%	80.2%
cows	11 to 20		12	12
			14.5%	14.0%
	21 to 30		3	3
			3.6%	3.5%
	31 to 40		2	2
			2.4%	2.3%
Total		3	83	86
		100.0%	100.0%	100.0%

Sixty-six respondents (79.5 %) of the total eighty-three respondents who considered functionality of the brand as an important attribute had kept between one and ten cows. 14.5 % had between eleven and twenty dairy cows, 3.6 % had between twenty-one and thirty, while 2.4 % had more than thirty dairy cows. This is shown in table 4.3.7

#### iv) Influence of the fit and finish of a package

Thirty-nine (86.7 %) of the total forty-five respondents, who thought that how a package is fitted and finished is an important attribute, kept between one and ten dairy cows. 4.4 % kept between eleven and twenty, 6.7 % between twenty-one and thirty, while the rest (2.2 %) had more than thirty dairy cows.

Table 4.3.8:Influence of number of cows kept on the fit and finishing of a brand

			fit and finish					
		1 to 2	3	4 to 5	5.00	Total		
Number	1 to 10	16	13	39	1	69		
of dairy		72.7%	72.2%	86.7%	100.0%	80.2%		
cows	11 to 20	5	5	2	_	12		
		22.7%	27.8%	4.4%		14.0%		
	21 to 30			3		3		
				6.7%		3.5%		
	31 to 40	1		1		2.		
		4.5%		2.2%		2.3%		
Total		22	18	45	1	86		
		100.0%	100.0%	100.0%	100.0%	100.0%		

# 4.3.4 Influence of the type of breed kept by the respondents on the attributes of perceived quality

#### i) Influence on the brand name

The table 4.3.9 shows the influence of the type of breed on the brand name. Fourteen (22.2 %) of the total (63) respondents, who considered brand name as an important attribute of perceived quality, kept pure breeds of cattle. The pure breeds could have been freshian, gunsey, ashire or jersey. 9.5 % had kept local breeds and an example is the zebus. 65.1 % kept crossbreeds. Such cross breeds are a freshian crossed with an ashire, a gunsey with a jersey e.t.c. 3.2 % kept a mixture of the above breeds.

Table 4.3.9: Influence of type of breed of cattle on the brand name

		b	rand name	е	
		1 to 2	3	4 to 5	Total
type of	up-grade	5	5	14	24
breed		45.5%	41.7%	22.2%	27.9%
	local	2	1	6	9
		18.2%	8.3%	9.5%	10.5%
	cross breed	4	6	41	51
		36.4%	50.0%	65.1%	59.3%
	different			2	2
	breeds			3.2%	2.3%
Total		11	12	63	86
		100.0%	100.0%	100.0%	100.0%

## ii) Influence on package size

Table 4.3.10 below shows the influence of the breed type on the package size.

Table 4.3.10: Influence of the breed type on the package size

		pa	ackage siz	:e	
		1 to 2	3	4 to 5	Total
type of	up-grade	3	3	18	24
breed		20.0%	21.4%	31.6%	27.9%
	local	4	2	3	9
		26.7%	14.3%	5.3%	10.5%
	cross breed	8	8	35	51
		53.3%	57.1%	61.4%	59.3%
	different		1	1	2
	breeds		7.1%	1.8%	2.3%
Total		15	14	57	86
		100.0%	100.0%	100.0%	100.0%

Eighteen (31.6 %) of the total fifty-seven respondents who felt that the size of the package was an important attribute kept pure breeds of cattle. 61.4 % had cross breeds, 5.3 % had local breeds while only 1.8 % kept a variety of the different breeds.

#### ii) Influence on the functionality of the brand

Forty-nine (59 %) of those who considered functionality as an important attribute kept cross breeds. 27.7 % kept pure breeds, 10.8 % kept local breeds while 2.4 % kept different breeds. This is shown on the table 4.3.11

Table 4.3.11: Influence of breed of cattle on the functionality of a product

		function	onality	
		3	4 to 5	Total
type of	up-grade	1	23	24
breed		33.3%	27.7%	27.9%
	local		9	9
			10.8%	10.5%
	cross breed	2	49	51
		66.7%	59.0%	59.3%
	different		2	2
	breeds		2.4%	2.3%
Total		3	83	86
		100.0%	100.0%	100.0%

## iii) Influence on the fitting and finishing of a brand

Table 4.3.12: Influence of the breed of cattle kept on the fit and finish of a product

		fi	t and finis	h	
		1 to 2	3	4 to 5	Total
type of	up-grade	8	4	12	24
breed		36.4%	22.2%	26.7%	27.9%
	local		4	5	9
			22.2%	11.1%	10.5%
	cross breed	14	8	28	51
		63.6%	44.4%	62.2%	59.3%
	different		2		2
	breeds		11.1%		2.3%
Total		22	18	45	86
		100.0%	100.0%	100.0%	100.0%

Table 4.3.12 shows the breed of cattle kept influences the fit and finishing of a product.

Twenty-eight respondents (62.2 %) of the total forty-five respondent who felt that, how a company makes and finishes its brand's package, was vital, kept cross breeds of dairy cattle. 26.7 % had pure breeds, 11.1 % local breeds while none had kept a mixture of the various breeds.

## 4.3.2 Company description of quality

Sixty percent of the respondents indicated that companies manufacturing dairy feeds did not adhere to the required description of quality. These companies did not ascribe to the relevant attributes that signify a perceived quality outlook. This augurs well with Iyadema (1985) who indicated that manufacturers did not keep abreast with quality requirements of feeds and that farmers were complaining about the same. Forty percent of these farmers felt that the companies they bought from responded well to the description of quality. This implies that the actors in the industry are not observing quality descriptions in the manufacture of dairy feeds.

Eighty-one farmers (94 %) indicated that they would not purchase feeds that they considered to be of low quality. Only 5 (6 %) felt that they would compromise quality for other factors.

#### Section three

#### 4.4 Factor analysis

In this section factor analysis was used in order to identify attributes that were considered important in the perception of quality in choice of animal feeds. This was done to accomplish the first objective of the study. These attributes were listed in the third part of the questionnaire (see appendix 1)

The variance of the thirty-three factors is shown in table 4.4.1. The principle component analysis extracted ten factors (table 4.4.1). These are attributes with eigen value more than one. These ten factors explained 70.394 % of the total variation. Factor 1 had the highest variation, which is 23.289 %.

Table 4.4.1: Total variance explained

Total Variance Explained

				T = 1	0	,	5.4	" 0	,
	Initi	al Eigenv	alues		Extraction Sums of Squared Loadings			ation Sur ared Loa	
Co mp	11110	% of	alues	July	% of	ungs	Squ	% of	uiiigs
on		Varia	Cumul		Varia	Cumul		Varia	Cumul
ent	Total	nce	ative %	Total	nce	ative %	Total	nce	ative %
1	7.685	23.289	23.289	7.685	23.289	23.289	3.107	9.416	9.416
2	3.640	11.031	34.320	3.640	11.031	34.320	3.028	9.176	18.591
3	2.308	6.993	41.313	2.308	6.993	41.313	2.771	8.397	26.989
4	1.903	5.767	47.079	1.903	5.767	47.079	2.485	7.532	34.520
5	1.558	4.720	51.799	1.558	4.720	51.799	2.328	7.054	41.574
6	1.459	4.421	56.221	1.459	4.421	56.221	2.275	6.895	48.470
7	1.255	3.802	60.022	1.255	3.802	60.022	2.163	6.556	55.025
8	1.228	3.721	63.743	1.228	3.721	63.743	2.092	6.340	61.366
9	1.176	3.564	67.307	1.176	3.564	67.307	1.602	4.856	66.221
10	1.019	3.087	70.394	1.019	3.087	70.394	1.377	4.173	70.394
11	.974	2.951	73.346						
12	.842	2.553	75.898						
13	.824	2.498	78.396						
14	.743	2.253	80.649						
15	.668	2.023	82.672						
16	.616	1.868	84.540				1		
17	.565	1.712	86.252						
18	.518	1.571	87.823					1	
19	.472	1.429	89.252						
20	.460	1.394	90.646						
21	.401	1.216	91.862						
22	.365	1.106	92.968						
23	.346	1.047	94.015						
24	.300	.908	94.923						1
25	.277	.839	95.762						
26	.254	.771	96.532						
27	.228	.691	97.224						
28	.208	.631	97.855						
29	.197	.596	98.451						
30	.178	.539	98.990						
31	.147	.446	99.436						
32	.109	.329	99.765						
33	.077	.235	100.000						

Extraction Method: Principal Component Analysis.

#### 4.4.1 Communalities

Communalities refer to the proportion of the variables variation to the total variation that is involved in the factors. This is shown in appendix 4. Colour of granules had the highest cummunality, and contributed 86.4 % of the total variation, while labeling and lettering had the least (23.5 %).

The eigen values show that there are ten main factors with the following contributions

Factor 1	23.289 of the variation
Factor 2	11.031 of the variation
Factor 3	6.993 of the variation
Factor 4	5.767 of the variation
Factor 5	4.720 of the variation
Factor 6	4.421 of the variation
Factor 7	3.802 of the variation
Factor 8	3.731 of the variation
Factor 9	3.564 of the variation
Factor 10	3.087 of the variation

The accumulated percentage variance is 70.394 of the dimensions. The remaining 29.606 % of the dimension of perceived quality is explained by other factors other than those identified by the model.

The initial matrix was rotated orthogonally using varimax with Kaiser normalization and gave the component transformation matrix on table 4.4.4.

Table 4.4.4: Component transformation matrix

**Component Transformation Matrix** 

Compone	1	2	3	4	5	6	7	8	9	10
1	.478	.413	.449	.250	.179	.135	.354	.344	.175	.105
2	.266	468	251	.551	.171	.521	075	115	.106	114
3	350	.203	078	.090	.876	133	038	080	.082	150
4	347	.494	047	.258	128	.477	217	064	364	.373
5	.037	024	.427	519	.112	.510	421	103	.248	156
6	363	.053	397	163	126	.296	.272	.503	.500	034
7	212	048	.174	048	056	.154	.620	663	.209	.157
8	121	136	.169	.253	040	278	373	021	.561	.584
9	510	371	.572	.277	081	.010	.098	.309	192	221
10	068	.404	.027	.346	340	126	188	241	.335	612

Extraction Method: Principal Component Analysis. Rotation Method: Varimax with Kaiser Normalization.

From the table 4.4.4 above, it can be shown that different statements are heavily loaded by the components. It can be seen that statement 9 is loaded heavily by factor 1. Statement 4 on factor 2, statement 9 on factor 3, statement 2 on factor 4, statement 3 on factor 5, statement 2 on factor 6, statement 7 on factor 8 and statement 8 on factor 9.

Attributes were then grouped according to their weight on these factors. They were extracted from the rotated component matrix in Appendix 2. The full description of the variables is shown in Appendix 3. The attributes falling in each factor are show below.

Factor 1	I	nformatio	on abo	ut the	brand	and	quality	of	package	

	1 / 1
Variable 13	Demonstrations by companies
Variable 30	Salesman's advice
Variable 21	Veterinary /Opinion leader's advice
Variable 12	Seller's knowledge on feeds
Variable 25	Instruction on how to use
Variable 20	Varieties of feeds
Variable 14	Advertising frequency
Variable 15-1	8 Advertising media e.g. radio, television, billboard, magazine
Variable 28	Labeling & lettering
Variable 29	Quality of the package

Credibility and the uniqueness of the brand and company Factor 2 Price Variable 3 Variable 1 Brand name Variable 21 Experience with feeds Variable 26 Cultural symbol Variable 33 Trademark Variable 2 Company reputation Assurance of performance and availability of the brand Factor 3 Variable 7 Increases yield Variable 8 Consistence in yield Variable 9 Warranty Variable 10 Availability of the brand Factor 4 Quantity of the brand Variable 4 Package size e.g. 20kg, 70kg e.t.c Factor 5 Commitment by the middlemen Devotion by channel members e.g Agro-chemical & feeds outlet Variable 23 The content and texture of the feeds Factor 6 Variable 6 Smell of the feeds Variable 5 Coarseness of granules Variable 11 Colour of granules Attitude towards the brand Factor 7 Attitude towards the brand Variable 27 Factor 8 Existence of the brand and company personnel Variable 22 Age of brand in the market Variable 31 Company personnel Transportation services to consumers Factor 9 Variable 24 Delivery by manufacturers

#### Factor 10 Frequency of advertising

Variable 14

Advertising frequency

Table 4.4.4: Prioritization of the attributes

Factor	Percent of variance	Cumulative percent	Ranking
Information about the brand and quality of package	23.289	23.289	No.1
Credibility and the uniqueness of the brand and company	11.031	34.320	No.2
Assurance of performance and availability of the brand	6.993	41.313	No.3
Quantity of the brand	5.767	47.080	No.4
Commitment by the middlemen	4.720	51.800	No.5
The content and texture of the feeds	4.421	56.221	No.6
Attitude towards the brand	3.802	60.023	No.7
Existence of the brand	3.731	63.754	No.8
Transportation services to consumers	3.564	67.318	No.9
Frequency of advertising	3.087	70.405	No.10

From the table above it can be seen that the factor with the highest percentage of explained variance is information about the brand and quality of the package. It has a variance of 23.289 % hence it has the most important representation of factors attributed to perception of quality in the choice of animal feeds. The frequency of advertising has the least variance (3.087 %) and therefore the least important factor.

## 5.0CHAPTER FIVE SUMMARY, DISCUSSIONS AND CONCLUSIONS

#### 5.1 Introduction

This chapter presents discussions and the conclusive deductions derived from chapter four. This information is deduced from the three sections on that chapter. Perceived quality is an important brand asset in building competitive advantage in any contemporary company. Stakeholders in any industry should identify and apply the relevant dimensions of quality for business growth.

#### 5.2 Summary

From the findings, it is apparent that information about the respondents is important in deducing conclusive remarks about the influence of quality in the choice of animal feeds. From the data collected it can be seen that most of the respondents had between one and ten dairy cows. The farmers preferred crossbreed cattle. It can be concluded that financial constraints brought the preference of cross breeds than the pure breeds by farmers. Pure breeds are more expensive and so is their upkeep compared to the former. In examining the farming period, it can be pointed out that a higher percent had practiced it for two to five years. An equal percent had done it for more than ten years. It shows that the farming duration had some influence on the choice of animal feeds. The farmers would have amassed more information on brands over time and this could have facilitated their preference for a particular feed brand. A bigger portion of farmers knew of less than five brands of feeds. This is a major setback in considering which brands were the best, bearing in mind that there are more than fifteen different brands. The farmers might not have had an opportunity to gather information on the other brands they did not know and therefore limited their option on available brands.

The farmers strongly felt that quality is vital in any decisions regarding the choice of feeds. Although the actual quality is different from the perceived quality, the latter is crux in the preference of feeds. Perceived quality differs from: Actual or Objective quality – the extent to which the product or service delivers superior Service; product based quality – the nature and quantity of ingredients, features, or services included; manufacturing quality – conformance to

specification. Perceived quality cannot be inferred to in general and hence its various dimensions were considered. Further to this, an extraction of the vast attributes on the dimensions of perceived quality was made in order to give a more specific picture of the study intended. Among the most important attributes identified were the brand name, the package size, the functionality of the brand and the fit and finishing of the package.

The farming period had an influence on these attributes. Farmers who practised farming over a longer period of time could well recognise the brand name better. If the company were reputable in the manufacturing of feeds, it would enhance the retention of the brand name in the farmer's minds. The farming period also greatly influenced the functionality of a brand. Farmers who had a longer history of farming would be able to identify the most result giving brands of the dairy feeds.

The number of cows kept by the farmers also played a role in influencing some of the attributes of perceived quality. It had a notably high influence on the package size of the brand. This is pertinent to this study because most of the farmers the research was done on practice small-scale farming and keep less than ten dairy cows. In such an instance, the farmer would prefer a purchase quantity that is commensurate to number of cattle they keep. For those farmers with one to three cows a small package of about twenty kilograms is prudent enough to purchase. This aspect had also a great influence on the fit and finish of the package. This is the manner in which the manufacturing company does the external part of the brand i.e on the package. A well-done fit and finish will avoid tears, faint writings and enable proper handling of the brand. Most farmers transport the feeds using a bicycle, a wheelbarrow or even on their backs. With regards to that, a poorly finished brand would have a detrimental effect on this mode of transportation. It is therefore important to ensure that feeds had a good fit and finishing.

The type of breed of cows kept by the farmer also influenced the perceived quality attributes in the choice of animal feeds. Majority of the farmers kept crossbreeds. The salient point in this aspect is production level. In trying to achieve high production level in dairy cattle, the functionality of the brand is crux. Therefore the preference for this breed was determined by the level of production that was expected of the dairy cows. This breed was a substitute for the

preferably pure breeds, which can produce much more. The fact that they are much more expensive to buy and feed gives a limitation to their acquisition by farmers. They thus opt for the lesser breeds, which are cheaper to acquiring as well as feeding.

The farmers felt that companies did not respond to the relevant requirements of perceived quality. Dairy feed manufacturers did not incorporate all the relevant attributes that constitute a perceived quality outlook. One or two attributes were lacking in most of these brands. The aforementioned were also not consistent in ensuring that these attributes were always present. This has led to the switching of brands by farmers as they opt for a better brand. One reason for manufacturers not achieving this has been due to unavailability of raw material, which has resulted to sourcing of alternative materials, which do not meet the intended objectives.

From the results extracted in factor analysis, the major goal was to identify important factors considered by farmers in their perception of quality as they make purchase decisions. Using Principle Component analysis, ten factors were extracted. The most important factor was information about the brand and quality of the package, with an explained variance of 23.289 %. It is evident then that farmers need to be bombard with as much information about the brands. In addition to that, the brand package should be of good quality. This includes good threading, legible lettering and a hard package material that is easy to handle and does not tear easily. This two would then give the farmer a better insight on the type of feed they are purchasing.

The second most important factor is the credibility and the uniqueness of the brand and company. Brands have to be credible to be recognized by farmers. Credibility of a brand is derived from its brand name, the experience a farmer has attained in using a brand and the manner in which farmers perceive a company's offering. A brand also has to be unique to those who buy it. This can be attributed to the cultural symbol used and the trademark. The cultural symbol is how the consumers, in our case the farmer, can identify the brand once he/she sees it. It associates the brand with its performance. For example farmers who prefer Unga dairy meal associates its performance with the windmill. Whenever these farmers see a windmill they associates it with Unga dairy meal.

The third important factor extracted was assurance of the performance and availability of the brand. A farmer should be convinced that before he/she chooses a brand it should be free of flaws and that it achieves the purpose for which it is intended, that is the functionality. In addition to that, the brand should always be available anytime and anywhere sought. Farmers will shun from brands that do not function as expected and those that are not within reach.

The forth factor in importance was quantity of the brand. This would be both for convenience and economy. Animal feed manufacturing companies should ensure that feeds are packed in different sizes to suite the different categories of farmers. Those with fewer cattle would prefer buying smaller packs of feeds like that of 20 kilograms, while the medium and large scale farmers would go for the larger sizes like that of 70 kilograms. For this type of farmers it is more economical to consider the quantity sizes.

The fifth factor in importance is commitment by the middlemen. The middlemen act as the link between the manufacturers and the final consumer who is the farmer. These middlemen include the wholesaler, agents and the retailers. Most of these middlemen stock other farm inputs in addition to the animal feeds. The middlemen can opt to deal with brands of one manufacturer or they can stock from many manufacturers. They should therefore ensure that these products are constantly available to avoid shortages. Farmers would appreciate if stockiest and agents maintain a constant supply of these feeds.

The sixth important factor was the content and texture of the feeds. Such attributes as smell, coarseness and colour of the granules, are important to the farmers when they intend to make a purchase decision. An example is when the feeds are made of large particles that cannot be digested properly by the cattle. This would make the animal not utilize that component of the feed and therefore a waste of resources. Cows are also said to be sensitive to the smell of the feeds. It will easily detect a foreign smell that is different from what it normally eats. This would then make it avoid that kind of feed. The presence of feeds having a different smell could be due to changes in raw materials. It can also be due to expired raw material. The colour of the feeds could change due to shortages of certain raw material in the ration. The farmer can easily detect this when he opens the gunny. The colour could also be because of substitutes in

raw materials.

Attitude towards the brand was the seventh important factor. A farmer can either develop a positive or negative attitude towards a brand depending on how they perceive it. It is upon the manufacturing company to ensure that farmers develop a positive attitude towards their brands. Farmers will shun brands that are of high quality but have a negative outlook in the consumer's mind.

The eighth factor in importance was the existence of the brand and involvement of the company personnel. Some very reputable brands of feeds have been in the market for a longer time. This enables the farmers to gain continuos confidence in them. Brands like Unga dairy meal have been in the market for quite some time and have won continuos consumer preference. The way individuals working in a company carry out themselves shouts a lot about the brand of a company. This is the etiquette displayed by the employees, from the subordinate to the senior level managers. If the employees were courteous and urbane it would also load heavily on the brand.

Offering transportation services to consumers was the ninth factor in importance. Manufacturing companies should devise ways in which products reach their customers. This would ensure that the farmers get their constant supply of feeds without shortages. This is best practiced when farmers do not have a formal means of transporting these purchases.

The last factor that had the least influence on perceived quality was the frequency of advertising. How often a manufacturer did his advertising on a particular brand in a certain media could influence perceived quality.

#### 5.3 Conclusion

From the discussion above it can be seen that there are several factors that influence the perception of quality. It is important for any animal feed manufacturing company to identify the relevant attributes that farmers consider in the brands they choose. These attributes can further be explained across some important aspects like the duration of farming, the breeds kept by farmers and the number of cows kept. This would enable the brands to have a higher

influence of perceived quality and therefore continuous purchase. The companies should ensure that they are consistent in implementing this. In firms where there are continuos purchases, it implies business growth and hence performing better than competitors.

Lastly it is evident that the companies need to provide maximum information about their brands. This ensures that the purchasers have the right information about the products in order to make the right purchase decisions. It is important that companies manufacture the feeds in a well branded, legible, well threaded and a high quality made package.

Quality is the only patent protection that a company can ride on, and therefore companies should strive to achieve quality in standards supreme to others in the industry. This could be achieved by understanding the term 'perceived quality' well and the dimensions that encompass it.

#### 5.4 Recommendation

A very important asset of brand equity has been covered in this research. It is therefore imperative that animal feed manufacturing companies perform pilot studies to identify the important aspects of perceived quality, which are important to farmers.

Companies should ensure that they furnish the farmers with sufficient information on their brands. They should supplement this by manufacturing feeds that have appealing external features and good quality package, in addition to the right content of feeds.

Companies should thrive to achieve the societal marketing concept, which dictates that you start from the consumer and work backward towards the firm.

## 5.5 Limitation of the study

Although the research was successfully done it did not go without some limitation. From the total number of responded targeted, only eighty six percent of them responded. With a hundred percent response rate the researcher could have gained a better picture of the research in general. There was also a constraint in time available. Had there been more time the researcher

would have researched from a wider region of the country to get a better representation of the farmers.

## 5.6 Suggestion for further research

Although perceived quality is one of the most important assets of brand equity, other assets can also be researched on and their influence on purchase of animal feeds investigated. The other brand equity assets are: Brand loyalty; Brand awareness; Brand associations; other proprietary assets.



# FACULTY OF COMMERCE MBA PROGRAM – LOWER KABETE CAMPUS

Telephone: 732160 Ext. 208 Telegrams: "Varsity", Nairobi Telex 22095 Varsity P.O. Box 30197 Nairobi, Kenya

DATE.....

## TO WHOM IT MAY CONCERN

The bearer of this letter
Registration No:
' Manager C. Duninger Administration (MIDA) student of the University of Mairchi

is a Master of Business Administration (MBA) student of the University of Nairobi.

He/she is required to submit as part of his/her coursework assessment a research project report on some management problem. We would like the students to do their projects on real problems affecting firms in Kenya. We would, therefore, appreciate if you assist him/her by allowing him/her to collect data in your organization for the research.

The results of the report will be used solely for academic purposes and a copy of the same will be availed to the interviewed organizations on request.

DR. MARTINOGUTU
COAORDINATION, MBA PROGRAM

Thank you

## **APPENDIX 1: QUESTIONNAIRE**

## QUESTIONNAIRE FOR LIVESTOCK FARMER

(Please help answer the following questions)

PA	RT 1
1.	What is your name? (Optional)
2.	Where is your farm located?
3.	Which type of cattle do you keep?  Beef ( ) Dairy ( )
4.	For dairy cattle farmer in (3) above, how many cows do you keep?
5.	Which breed do you keep?
	a) Up-Grade ( ) b) Local ( ) c) cross breed ( )
6.	For how long have you kept livestock?
	• Less than 1 year ( )
	• 1-5 years ( )
	• 5-10 years ( )
	• More than 10 years ( )
PA	ART II
1.	How many dairy feeds are you aware of?
2.	How did you become aware of these feeds?
3.	In question (2) above, how many do you use?
4.	How do you decide which feeds to use?

5.	How important are the following attributes who	en c	onsi	der	ing	whi	ch	branc	l to	buy	/?
		L	east	im	por	rtant	-	very	/ im	poi	tant
✓	The Brand name	(	)	(	)	(	)	(	)	(	)
✓	The price	(	)	(	)	(	)	(	)	(	)
✓	The package size e.g 20kg, 70kg	(	)	(	)	(	)	(	)	(	)
✓	Functionality (achieves purpose)										
	Increases yield	(	)	(	)	(	)	(	)	(	)
	Yield is consistent	(	)	(	)	(	)	(	)	(	)
✓	Advertising: extent, media e.t.c	(	)	(	)	(	)	(	)	(	)
✓	Age of brand in market	(	)	(	)	(	)	(	)	(	)
✓	Cultural symbol e.g. windmill for Unga feeds	(	)	(	)	(	)	(	)	(	)
1	Fit & finish: Labeling, lettering and quality of										
	package	(	)	(	)	(	)	(	)	(	)
6.	In your view, does the company you buy from	m f	ulfill	l th	e al	bove	de	scrip	tior	ı of	quality for
the	brand you buy?										
Ye	s ( )										
No	( )										
Otl	ner (specify)	• • • •	• • • • •								
7.	Do you purchase feeds that you consider to be	of	low o	qua	lity	?					
	Yes ()										
	No ()										
8.	If Yes in question (7) above, what reasons can	you	give	e?							
• • • •		• • • •		• • • •	• • • •			• • • • •	• • • •	• • • •	• • • • • • • • • • • • • • • • • • • •
		••••	• • • • •	• • • •	• • • •		• • • •	• • • • •	••••	• • • •	•

#### PART III

1. Which of the following attributes do you consider important and to what extent are they important in your choice of animal feeds. Tick ( ) as appropriate.

		Very Important - Least Importa							
		5	4	3	2	1			
<b>√</b>	The Brand name	( )	( )	( )	( )	( )			
<b>✓</b>	The company reputation	( )	( )	( )	( )	( )			
<b>✓</b>	The price	( )	( )	( )	( )	( )			
<b>✓</b>	The package size e.g 20kg, 70kg	( )	( )	( )	( )	( )			
<b>✓</b>	Coarseness of granules	( )	( )	( )	( )	( )			
✓	Smell	( )	( )	( )	( )	( )			
<b>√</b>	Functionality:								
	Yield increases	( )	( )	( )	( )	( )			
	Yield is consistent	( )	( )	( )	( )	( )			
<b>√</b>	Warranty(Assuarance)	( )	( )	( )	( )	( )			
<b>√</b>	Availability	( )	( )	( )	( )	( )			
<b>√</b>	Colour of granules	( )	( )	( )	( )	( )			
<b>√</b>	Seller's knowledge on feeds	( )	( )	( )	( )	( )			
<b>✓</b>	Demonstrations by companies	( )	( )	( )	( )	( )			
1	Advertising extent(frequency)	( )	( )	( )	( )	( )			
<b>√</b>	Advertising media:								
	Radio	( )	( )	( )	( )	( )			
	Billboard	( )	( )	( )	( )	( )			
	Margazines e.g. Kenya farmer	( )	( )	( )	( )	( )			
	Television	( )	( )	( )	( )	( )			
<b>√</b>	Experience with feeds	( )	( )	( )	( )	( )			
<b>✓</b>	Varieties of feeds	( )	( )	( )	( )	( )			
1	Vertinary / Opinion leader's advise	( )							
/	Age of brand in market	( )				( )			
<b>√</b>	Devotion of channel members e.g outlets	( )	( )	( )	( )	( )			
<b>√</b>	Delivery by manufacturers	( )	( )	( )	( )	( )			

<b>√</b>	Instruction on how to use on package	(		)	(	)	(	)	(	)	(	)	
<b>✓</b>	Cultural symbol e.g windmill	(	(	)	(	)	(	)	(	)	(	)	
✓	Attitude towards brand	(	,	)	(	)	(	)	(	)	(	)	
<b>√</b>	Labelling & lettering	(	,	)	(	)	(	)	(	)	(	)	
<b>√</b>	Quality of package	(	,	)	(	)	(	)	(	)	(	)	
<b>✓</b>	Lettering of package	(	,	)	(	)	(	)	(	)	(	)	
<b>√</b>	Salesmen advice on use	(	,	)	(	)	(	)	(	)	(	)	
✓	Company personnel	(	,	)	(	)	(	)	(	)	(	)	
<b>✓</b>	Threading of package	(		)	(	)	(	)	(	)	(	)	
<b>✓</b>	Trademark	(		)	(	)	(	)	(	)	(	)	

THANK YOU

Appendix 2: Rotated Component Matrix

	Component										
	1 2 3 4 5 6 7 8 9									10	
brand name	.130	.767	066	161	150	.230	.105	.007	.007	123	
company reputation	.054	.815	.036	.057	.143	248	.028	091	06	_091	
price	.096	065	.029	.271	.123	.745	09	008	.076	025	
package size	.130	.003	.061	.817	091	.266	.119	.051	.046	.073	
coarseness of granules	.420	.010	.000	.220	.274	.471	07	.151	.011	.183	
smell	.153	038	009	.298	.313	.409	.231	224	.240	.350	
increases yield	013	.075	.737	.007	031	017	06	016	04	.003	
consistent yield	.232	060	.375	.251	.134	.015	.004	.039	.349	543	
warranty	151	.081	.632	.024	.299	- 049	.474	.028	.179	009	
availability	.180	.181	.720	.033	.254	.112	03	.123	.032	048	
colour of granules	.100	.046	.052	079	.086	.833	.186	.079	.116	.032	
sellers knowledge on feeds	.722	.327	.229	.085	.066	.099	01	144	.166	.147	
demonstrations by companies	.643	.093	.007	.303	.048	.022	.005	.206	.353	049	
advertising frequency	.738	.121	008	.309	.122	.296	.107	.082	.068	007	
radio advert	.627	.170	.343	.157	.135	135	.391	.015	186	.083	
billboard advert	.722	095	.369	218	- 147	.103	.207	046	.136	032	
margazine advert	.154	.432	.233	.126	300	385	.107	.279	117	.145	
television advert	.367	.545	.235	137	195	225	.138	.275	106	.112	
experience with feeds	058	.820	.076	134	.214	016	.123	.170	.090	.060	
varities of feeds	.576	.367	.292	.095	.235	.030	.110	053	115	072	
vertinary/opinion leaders advice	.756	014	.104	.018	.107	058	.027	.106	.138	.194	
age of brand in market	.124	.154	.089	.125	184	126	175	.683	.429	.055	
devortion by channel members	.029	.266	.107	.728	142	.240	.106	.134	07	.031	
delivery by manufacturers	.111	.098	.020	027	.211	031	.135	.073	.709	.072	
instruction on how to use	.459	.420	.292	.173	202	.239	.213	.330	08	.341	
cultural symbol	.276	.750	.118	.034	011	115	.00	.314	.134	.155	
attitude towards brand	.083	.474	.099	.024	032	.149	.708	041	.077	185	
labeling and lettering	.310	.134	.123	.009	071	.158	.256	.057	.284	.031	
quality of package	.695	.095	.209	.215	.055	.024	.439	.193	.057	.064	
salesmen advice on use	.498	.177	.393	.402	.130	009	.185	.335	.052	067	
company personnel	.440	075	.032	.008	067	.461	.079	.502	.038	208	
threading of package	.173	.327	.068	.033	.133	.229	.009	.685	.069	203	
trademark	033	.695	.339	108	.016	153	.205	.207	.088	060	

Extraction Method: Principal Component Analysis. Rotation Method: Varimax with Kaiser Normalization.

a. Rotation converged in 14 iterations.

#### **APPENDIX 3: DESCRIPTION OF VARIABLES**

Variable 1:Brand name the name of the product

Variable 2: Company reputation how the company is perceived

Variable 3:Price the monetary value of the product

Variable 4: Package size the quantity of the product

Variable 5: Coarseness of granules the sizes of particles in the feeds

Variable 6: Warranty assurance by the company that the feed is okay

Variable 7: Smell the smell of the feeds

Variable 8: Increases yield increases the production level

Variable 9: Consistent yield the production is uniform

Variable 10: Availability ensuring that the feeds are always there

Variable 11: Colour of granules the colour of granules of feed

Variable 12: Sellers knowledge knowledge of person selling the feeds

Variable 13: Demonstrations demonstrations done by companies of feeds

Variable 14: Advertising frequency no of times a firm advertises its product

Variable 15-18 Advert. media advertising media used by companies

Variable 19: Experience with feeds how long a consumer has used the feed

Variable 20: Varieties the different types of feeds available

Variable 21: Vertinary advice advice from a vertinary officer

Variable 22: Age of the brand how long the product has been in the market

Variable 23: channel members the contribution of the middlemen

Variable 24: Delivery transportation services given by the manufacturers

Variable 25: Instruction guidance on the package on how to use the product

Variable 26: Cultural symbols association of the product with performance

Variable 27: Attitude the attitude towards the brand

Variable 28: Labeling & lettering how the writings appear on the package

Variable 29: Quality of packages the type of material that makes the package

Variable 30: Salesmen advice the guidance by salesmen of a company

Variable 31: Company personnel the etiquette displayed by employees of a company

Variable 32: Threading the way the threading is done on the package

Variable 33: trademark the patent of the company on its brand

## **APPENDIX 4: COMMUNALITES**

#### Communalities

		Forter of the
	Initial	Extractio n
brand name	1.000	.738
company reputation	1.000	.775
price	1.000	.673
package size	1.000	.791
coarseness of granules	1.000	.583
smell	1.000	.663
increases yield	1.000	.556
consistent yield	1.000	.696
warranty	1.000	.779
availability	1.000	.681
colour of granules	1.000	.864
sellers knowledge on feeds	1.000	.772
demonstrations by companies	1.000	.686
advertising frequency	1.000	.779
radio advert	1.000	.795
billboard advert	1.000	.811
margazine advert	1.000	.642
television advert	1.000	.713
experience with feeds	1.000	.802
varities of feeds	1.000	.602
vertinary/opinion leaders advice	1.000	.666
age of brand in market	1.000	.797
devortion by channel members	1.000	.727
delivery by manufacturers	1.000	.600
instruction on how to use	1.000	.674
cultural symbol	1.000	.808
attitude towards brand	1.000	.808
labeling and lettering	1.000	.310
quality of package	1.000	.642
salesmen advice on use	1.000	.619
company personnel	1.000	.720
threading of package	1.000	.728
trademark	1.000	.731

Extraction Method: Principal Component Analysis.

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