ST. MARY'S UNIVERSITY COLLEGE FACULTY OF BUSINESS DEPARTEMENT OF MARKETING MANAGEMENT

A STUDY ON THE PHYSICAL DISTRIBUTION PRACTICE OF

ZAK ETHIOPIA PLC.

BY ABDULKERIM AWEL

JUNE 2010 SMUC ADDIS ABABA

ST. MARY'S UNIVERSITY COLLEGE

A STUDY ON THE PHYSICAL DISTRIBUTION PRACTICE OF ZAK ETHIOPIA PLC.

BY

ABDULKERIM AWEL

FACULTY OF BUSINESS DEPARTEMENT OF MARKETING MANAGEMENT

APPROVED BY THE COMMITTEE OF EXAMINERS

Department Head		Signature
Advisor	_	Signature
Internal Examiner	-	Signature
External Examiner		Signature

A STUDY ON THE PHYSICAL DISTRIBUTION PRACTICE OF ZAK ETHIOPIA PLC.

A SENIOR ESSAY SUBMITED TO THE DEPARTMENT OF MARKETING MANAGEMENT

BUSINESS FACULTY

ST. MARY'S UNIVERSITY COLLEGE

IN PARTIAL FULFILMENT OF THE REQUIRMENTS FOR THE DEGREE OF BACHELOR OF ARTS IN MARKETING MANAGEMENT

BY

ABDULKERIM AWEL

JUNE 2010

SMUC

ADDIS ABABA

TABLE OF CONTENTS

Chapter one F	Page Number
1. Introduction	1
1.1. Background of the study	1
1.2. Statement of the problem	2
1.3. Basic research Question	3
1.4. Objective of the study	4
1.5. Significance of the Study	4
1.6. Scope (Delimitation of the study)	4
1.7. Definition of terms	5
1.8. Research Design and Methodology	5
1.8.1. Research Design	5
1.8.2. Population and Sampling Technique	5
1.8.3. Types of Data Collected	5
1.8.4. Method of Data Collection	5
1.8.5. Data Analysis Techniques	6
1.9. Limitation of the study	6
1.10. Organization of the Paper	6

Chapter two

2	Review	of Related	Literature
∠.	INCVICAN	OI INCIALCU	Literature

2.1. Physical Distribution overview7	,
2.2. Definition of physical Distribution8	
2.3. Importance of physical distribution Management8	
2.4. Elements of Physical Distribution10)
2.4.1. Transportation10)
2.4.1.1. Function of transportation10	0
2.4.1.2 Modes of Transportation1	0
2.4.1.3 Elements of transportation cost1	.2
2.4.2 Inventory Management	13
2.4.2.1 Function of Inventory	13
2.4.2.2 Types of inventory	14
2.4.2.3 Inventory cost element	14
2.4.3 Warehousing	15
2.4.3.1 Function of warehousing	15
2.4.3.2 Types of warehouse	16
2.4.4 Packaging	17
2.4.4.1 Functions of packaging	.18
2.4.5 Material handling	.18
2.4.6 Order processing	19

Chapter Three

3. Data presentation analysis and interpretation	21
3.1 General characteristics of the respondents	22
3.2 Analysis of the findings of the study	24
3.2.1 General view of customers to the company's transportation potential	24
3.2.2 General View of the customers to the company's warehousing potential	26
3.2.3 Customer Evaluation Regard on inventory handling	28
3.2.4 Customer Evaluation towards delivery performance	29
Chapter Four	
4. Summary conclusion and recommendation	
4.1 Summary	32
4.2 Conclusion	33
4.3 Recommendation	.34

List of Tables

List of table Pa	age
Table 1 General characteristics of the respondents22	1
Table 2 General view of customers to the company's24	Ļ
Transportation potential	
Table 3 General View of the customers to the company's26	
Warehousing potential	
Table 4 Customer Evaluation Regard on inventory handling28	
Table 5 Customer Evaluation towards delivery performance29	

CHAPTER ONE

INTRODUCTION

1.1 Background of the study

According to Havaldar and cavale (2007:86) which facilitate movement and co-ordination of supply and demand in the creation of time and place utility in goods.

According to Kahanna,(2007:14)Physical distribution employed in manufacturing and commerce to describe the broad range of activities concerned with efficient movement of finished products from the end of production line to the consumer, and in some cases includes the movement of raw material from the source of supply to the beginning of the production line. There activities include fright transportation, warehousing, material handling protective packaging, inventory control, plant, warehouse selection, order processing, marketing, forecasting and customer service;

According to Sherlkar, (2004:147) Physical distribution means the process of delivering the product to the user or consumer promptly, safely and in time.

According to James E, (1997:60) Physical distribution involves management (planning action and control) of the physical flows of raw material and finished goods from the point of use consumption to meet the customer needs at a profit. It covers all activities in the flow of goods between producer and consumer.

According to KHANNA (2007:14) Physical distribution is the management of all activities which facilitate movement and co-ordination of supply and demand in the creation time and place utility in goods.

ZAK Ethiopia plc was established in 1990 ETC with the capital of 10,000,000 birr by two Ethiopians and one foreign individual and its location is in Addis Ababa /Kality kifle ketema with five branches which found in different location of the city.

ZAK Ethiopia plc currently have around 200 permanent employees working at the factory as well as in branch office and the company have a capacity of producing 3000 cartons of soap within 24 hours.

ZAK Ethiopia plc is one of the leading manufacturers of soap in Ethiopia its main objective is to produce different types of soap and deliver those products to the ultimate customers.

The competitor of the company is Nazret soap factory, Star soap factory, and Repi Soap and detergent factory.

The company produces different kinds of soap such Olympic laundry soap, Kechne laundry soap and Balekulf laundry soap those 3 products are differ by their size and price, the company also produce beauty soaps such as Give beauty soap and Lax beauty soap.

The company also produces detergent in addition to soap in order to in increase its product line and to increase its profit since detergent is easy to those who produce soap related product.

In the future the company also have a mission to produce soap related product and that can he get another market share.

1.2 Statement of the problem

According to Borwersox and closs (2003:29) transportation is the operational area of logistics that geographically positions inventory because of its fundamental importance and visible cost, transportation has received considerable managerial attention over the year and currently almost all enterprise, big and small, have managers responsible for transportation.

According to Altekar, (2005:226) Inventory Management is a key to any successful distribution business it provides everything: You need to know about the receipt and movement of goods, the sale, removal or other disposition of goods, and the precise valuation and status of goods remaining in inventory management allows a distributor to meet or exceed his customer's expectation of product availability with the amount of each item that will maximize the distributor net profit.

According to KHANNA (2007: 189) A warehouse is a location with adequate facilities where volume shipment are received from a production center broken down center, reassembled into combinations representing a particular order or orders and shipped to the customer's location or locations. The rational for establishing a warehouse in a distribution network is the creation of a differential advantage for the firm. This advantage accrues from achieving a lower overall distribution cost and/or obtaining service advantage in a market area. Given the service level which is desired to be achieved by a company every warehouse component must have the least total cost In other words a warehouse should be added or eliminated only when; as a result of this action, the total cost of distribution is reduced.

ZAK Ethiopia plc is one of the leading manufacturers of soap but its market share is doesn't increase as expected. Since there is high demand needed by the consumer because of the nature of the product by itself (soap is not seasonal product) but the problem is arising in the physical distribution aspects such as firstly inventory management in which the goods are distributed at a time or not. Secondly warehousing, warehousing have an essential effect on the physical distribution practice for example problem of locating a warehouse in appropriate place. Thirdly Transportation, transportation also plays a crucial role on the overall physical distribution practice if there is no enough transportation facility and other transportation problems.

In order to investigate the above stated problems the student researcher tries to answer the following basic question.

1.3 Basic Research question

- -Does the company apply the appropriate physical distribution practice?
- -Does the company distribute its product on time?
- -What are the factors affect the physical distribution practice?

1.4 Objective of the study

The objective of the study contains both general and specific objective as follows.

1.4.1 General objective

The general objective of this study was to assess the physical distribution practice of the ZAK Ethiopia plc.

1.4.2 Specific objective

- -To find out the physical distribution practice of the company.
- -To investigate how to deliver its product on time.
- -To identify factors affecting the physical distribution practice of the company.

1.5 Significance of the study

To the Organization

ZAK Ethiopia plc can be beneficiary from the study. The company can realize its weakness and strong part regard on its physical distribution practice.

To the student

The student may gain detail knowledge about physical distribution at all and to have an experience to conduct a research.

To others

It can be used as a stepping stone for further research on the same topic.

1.6 Scope (delimitation of the study)

The study was focus only on the physical distribution practice of ZAK Ethiopia plc which is confined to Addis Ababa, Addis ketema kifleketema around "Bomb tera" in which lots of business customers are found and the

number of customers is difficult to determine and the secondary data to be reviewed was focus on the period from the year 1999-2001 E.T.C.

1.7 Definition of terms.

Distribution - availability of the product in adequate quantity in convenient location at timing when convenient to buy.

Transportation - geographically positioning inventory

Ware housing- Location with adequate facility to store goods

1.8 Research Design and Methodology

1.8.1 Research Design

The student researcher used descriptive research method to describe the main physical distribution practice of ZAK Ethiopia plc.

1.8.2 Population and sampling technique

Customers of ZAK Ethiopia plc in "Bomb tera" area was population of the study.

To this end a total sample of 200 Business customers was taken using non probability sampling technique particularly convince sampling technique.

1.8.3 Types of data Collected

To make the study complete and accomplish the stated objectives and all relevant primary and secondary data was collected.

1.8.4 Methods of data collection.

The primary data was collected through interview and questionnaire. The interview was made with general manager and marketing manager and questionnaire was distributed to customers and secondary data was collected from company sales.

1.8.5 Method of data analysis

The collected data was analyzed using Quantitative and Qualitative techniques of analysis were used. Using Quantitative method analysis Description data was used to summarize the findings and percentages were computed and different tables used. And interview results were analyzed qualitatively.

1.9 Organization of the paper

The paper was organized into four chapters. The first chapter deals with introduction of the study it concludes background of the study and statement of the problem. The second chapters devoted to the review of related literature. The third chapter contains Data presentation and analysis were different data was analyzed quantitatively and qualitatively. The fourth chapter contains summary, conclusion and recommendation of the study: Finally questioner and interview questions are attached.

Chapter Two

Review of Related Literature

2.1 Physical Distribution overview

According to Sherlkar (2004:147) Physical distribution means the process of delivering the product to the user or consumer promptly, safely and in time.

According to James, E (1997:60) Physical distribution involves management (planning action and control) of the physical flows of raw material and finished goods from the point of use consumption to meet the customer needs at a profit. It covers all activities in the flow of goods between producer and consumer.

Physical distribution involves management (planning action and control) of the physical flows of raw material and finished goods from the point of use consumption to meet customer need at profit. It covers all activities in the flow of goods between producer and consumer. (James, E.1997:60).

Kotler,(2002:536) explains physical distribution as market logistics a physical distribution has recently expanded into the broader concept of supply chain management. Supply chain management starts earlier than physical distribution attempts to procure the high input craw material, components and capital equipments convert them efficiently into finished products and dispatch them the final destination.

Both authors under line on the point which explains physical distribution as delivering products to consumers promptly safely and in time ,that is the time and place utility aspects is regarded as the major task in physical distribution decision makes process. physical distribution takes place within numerous whole sales and retailing distribution channels and including such importance of decision areas customer service, inventory control, material handling, protective packaging, order processing, transportation, warehouse site selection and warehousing. Physical distribution is part of a

larger process called "Distribution" which include whole sale and retail marketing, as well as the physical movement of products(Lancy, 1990, 56)

Physical distribution activities have recently received increasing attention from business managers including small business owners. This is due in large part of the fact that these functions often represent almost half of the total marketing costs of a product. In fact research studies indicate that physical distribution. In fact research studies indicate that physical distribution costs nationally amount the approximate.

2.2 Definition of physical Distribution

According to Kumar and MeenaKshi (2006:356) physical distribution focuses on the efficient movement of goods from manufacturing to customers of the product.

Khanna (2002:14) also explain physical distribution management employed in manufacturing and commerce to describe the broad range of activities concerned with efficient movement of finished products from the end of the product line to the consumer and in some cases includes the movement of raw martial from the source to the beginning warehousing, material handling, packing, inventory management, order processing, and customer service.

Moreover, Sherlekar (2004:417) describe physical distributions as the process of delivering the product to the user or consumer promptly, safely, and in time.

2.3 Importance of physical distribution Management

"I farm abd factorial are the heart of industrial America, distribution network are its circulatory system". (Corey, 1989:78)

This statement helps to show how vital distribution is to the industrial sector without proper distribution, product distribution, products have no way of reality the ultimate consumer without proper distribution, products have no way of reaching the ultimate consumer. Distribution systems are

organized into channels. These channels are an organized set of institution whose goal is to over load from point of manufacturing to point of consumption.

The institution that exist within these distribution channels are known as intermediaries of middle men(Smith,2000:69) The actual physical handling subsequent delivery of products represent significant portion of total costs of foods. In this area it is important to keep a healthy balance between total costs of goods. In this area if it is important to keep a real balance between two important concept. Total product concept and total cost concept. When we see total product concept and total concept. When we see total product concept: firms

Should never be so short sighted as to think them only. Provide customer with a physical customer with a physical product

In today's market place it takes more than that to complete. Customers expect more customer long view the physical product in distribution from the service associated with that product. Often services can be deciding factors when choosing among firms providing a commodity product. This view is known as the total product concept. Costs are clearly important as well as and the total cost concept seeks to maximize the effectiveness of the entire distribution channel. Rather than one piece at a time no stock outs may maximize services our typically at acceptable cost. (Blake, 1983:126)

Raw materials have to be moved over long distances from the lender supply point to the production centered.

This material has to be store from some time of raw materials and then as finished products. The finished product has then to be transported to marketing areas, where the pattern of consumption shows fluctuations. Some products may be consumed on a daily basis, some products may be consumed on a daily basis, and some products may be consumed on a daily basis, some only in a particular season. Hence the storage of some goods becomes inevitable, Renewing and using physical distribution strategically

may enable company to strengthen and/or by reducing operating costs.(Etlel;2004:461)

2.4 Elements of Physical Distribution

Physical distribution consists of various activities. These activities include: transportation, warehousing, material handling, packaging, inventory management, order processing, and consumer service.

2.4.1 Transportation

According to Borwersox and closs (2003:29) transportation is the operational area of logistics that geographically positions inventory because of its fundamental importance and visible cost, transportation has received considerable managerial attention over the year and currently almost all enterprise, big and small, have managers responsible for transportation.

2.4.1.1 Functions of transportation

According to Bowersox and closs (2003:312) Transportation provides two major functions: product movement and product storage.

Product movement: refers to whether is n time from materials, components, assemblies, work in process, or finished goods, transportation is necessary to move it to the next stage of manufacturing process or physical closer to the ultimate customer.

Product storage: refers to a less common transportation function which products are temporarily stored on vehicles until they reach to their final destination.

2.4.1.2 Modes of Transportation

The basic modes of available for transportation are rail, highway, water, pipeline, and air. Choice among these modes involve tradeoffs in terms of cost-speed of movement, availability to serve desired locations, dependability to meet delivery schedules, capability to handle a shipment, and frequency of scheduled movement.(Gross, 1998:501)

Rail: rail road's caries the greatest amount of freight typically because of the volume of forest products grain, chemical, metals, and bulk. Materials that are handled or great distance .Rail shipment can accommodate a wide range of types and sizes of goods-dry, liquid, frozen, controlled atmosphere, and awkwardly shaped in car load(cr) .At an average rate of just a few cents per tone-mile, rail is an expensive transport mode to and from railroad terminus points, unless shippers or receivers have spur line into the plants or ware houses. Railroads primarily are used to transport low-value, high-density, large-volume shipment over long distance. As an indication of the large scale of rail shipment manufactured goods shipment by rail average 36 tones. Whereas forestry mining, mining products average 62 tones per shipment. Sensitive equipment may be damaged by the impact of rail cars being shunted in train assembly, so other modes are preferable for such shipments.

Highway: The most popular mode of transportation is truck. Its importance I shipment of selected industrial products can be seen in the fact that more than 80 percent of the weight of all machinery, fabricated metal products & rubber and plastic products shipped in the united states and more than 90 percent of the total weight of leather & leather products, moves by truck. Truck transport is the most available accessible of the modes because motor vehicles are not restricted by terminal-to terminal operation but can provide service from the shipper loading points to the receiver's dock. Highway transport in used mostly for short hauls of high-value manufactured goods, because trucks have higher operating costs and less capacity than trains pipelines-pipelines are limited to transporting gases, liquids glories (suspensions of solid particles in a liquid), operate a low speed (about 10 mile per hour), and have limited accessibility. Their third rank in ton mile carried is mainly due to the huge volume of liquid petroleum product they carry.

Water: the prime advantage of water transport is capability to move very large shipment. Water offers lowest-cost transport, but at a slow speed and restricted access. Deep-water shipments are primarily intercontinental,

where as domestic shipment. Water carries primarily move low-value, high – density cargoes such as cement, chemicals, grain, mind items; and basic bulk commodities.

Air: the utilized and most costly about 50 cent fright is air shipment. The first large at cargo air carrier way flying Tiger. Other large air lines earn most of their revenue from passenger service. Air freight is confined to high value items, emergency shipment, and perishable products (such as flowers). One advantage of air shipment is that tend to land gently. This is benefit to business marketers who ship computer, electronic equipment, and other sensitive air device is that might be damaged by truck or rail or rail shipment.

2.4.1.3 Elements of transportation cost

According to Khanna (2002:242) the following are vital elements of transportation cost to be taken into account: Tariff transportation which refers to the freight charge of various modes of transport to be paid for the movement of goods from one location to another, Transit time cost which is the total logistics costs deals with the cost of inventory in transit. If a transit time of particular mode of transport for longer periods of time to rebuilt into higher transit time cost, obsolescence and deterioration and in the physical attributes of the product during transit. There are certain categories of product which are perishable and delicate in nature, whose physical attributes deteriorate over period of time gradually resulting into devaluation of the product, protective packaging required for specific product and modes of transport when there is a requirement for a specific package and such costs come under total transport cost, transit insurance company to cover various types of risk, but because the advent of certain utilization this cost has been minimized due to lesser chance of damage of goods during transit, and at last apart from the above cost elements of transport cost, there are other miscellaneous costs such as local taxes, toll taxes, etc especially when goods are shipped through road ways.

2.4.2 Inventory Management

Inventory Management is a key to any successful distribution business it provides everything: You need to know about the receipt and movement of goods, the sale, removal or other disposition of goods, and the precise valuation and status of goods remaining in inventory management allows a distributor to meet or exceed his customer's expectation of product availability with the amount of each item that will maximize the distributor net profit (Altekar: 2005:226)

In favor of that sherlekar(2004:428) describe inventory management as the heart of the game of physical distribution, operational and customer service requirements, acts as a ledge against market place certainty and assist purchase in getting order quantity discounts.

2.4.2.1 Function of Inventory

According to Havaldar, and Cavale (2007:17) inventory function as a buffer between supply and demand both in terms of quantities and timing. customer demand and finished goods in terms of quantities and timing of demand, requirements for an operation and the output from the previous operation on the shop floor, and parts and material to begin an operation and the supplier of the material. It's rightly said that inventory is the shock absorber of a business. However maintaining inventory means high caring costs, reduced profit, and even loss in market shares. In today's competitive world wasteful inventory management loss in market share. In today's competitive world wasteful inventory management practice are not permitted or tolerated.

2.4.2.2 Types of inventory

According to Khanna (2002:102) there are two types of inventory associated with distribution there are location inventories which they are combined

stocks of raw material and finished products and work in process the level of each and the combination of inventory level, must be determined to minimize the overall cost. These inventories are maintained with a view of meeting the reasonable variation in the demand for production or for consumption. And the often one is transit and include the raw material in transit from vendor's depot the manufacturing center, and finished products on the move from the production center to the consumption center. The quantity in transit is directly proportional to the lead time.

2.4.2.3 Inventory cost element

According to Agrawal (2003:158) inventory cost comprises the following elements:

Procurement cost: These cost of a product are due to several factors which include cost of staff and the executive time spent on the order processing ,cost of transmission which involves use of stationary and services, cost of transmission which includes: postage, internet, telephone, fax cost of transmit the procurement cost of transmission which includes freight, transit insurance, protective packaging, the cost of invoice pricing, including checking approval, book entries, and payment procedures including cheque writing, sinning and mailing, cost of goods handling, inspecting and entry in the stock register/computer.

Inventory carrying cost: The carrying cost include space rent for the storage of goods cost of working capital locked in the inventory cost of insurance of goods are, cost of spoilage in the quality goods in the storage breakage, cost of deterioration due to passes of time and change in whether, cost of obsolescence of goods or depreciation.

Out of stock costs: There costs occur when demand in normal but ordered goods are received late (are lead time increase) ,or when there is a sudden spurt in the demand for goods ,or a combination of all these circumstances. An out -of-stock position of raw material would require constant chasing

with the supplier by telephone, fax messenger, or letters, which would involve what, involve what is termed as back order costs.

2.4.3 Warehousing

According to Altkeakar (2005:275) a ware house is a location with adequate facilities where volume shipment are received from a production center, broken down, reassembled into combinations representing a particular order or orders, and shipped to the customer's location(s).

Kumar and MeenaKshi (2006:359) described that a warehouse involves all activities required in the storing of goods between the times they are transported to the customers. These activities include breaking bulk, making product assortment for delivery to customers, storage, and loading.

More over Havaldar and cavale (2007:15.24) defined warehousing as part of the company's logistics frame work that stores items raw materials, packaging materials, tools, work in process or finished goods at and between the point of origin and the point of consumption and also provides information to management on the states and also provides information to management on the status and condition of the items being stored.

2.4.3.1 Function of warehousing

According to Khanna (2002:198) a ware house can serve both economic and operational function:

Economic function: This function of ware house includes: consolidation of material of goods from different plants and dispatches with a single truck, bulk break, stockpiling which focus on seasonal storage of goods to select business, for instance agricultural products are produced as a specific time but consumed throughout the year being stored in such manner, and finally value added service such as packaging and labeling.

2.4.3.2 Types of warehouse

According to Altekar (2005:276) ware houses can be classified based on two broad bases: on the basis of owner ship and on the bases of service.

On the bases of ownership: Based on ownership warehouse can be classified into private ware house and public ware house:

- a. Private warehouse: it comprises warehousing facilities operated and owned or leased by company handling its on goods. They normally used by firms whose needs are stable enough, such as retail chain stores or multi product companies, to make long term.
- b. Public ware house: All these ware house which are owned and operated by organization like government, cooperatives or company in private sector. The space of public ware house can be used by any other company or organization or individual public on certain terms and conditions of payment.

On the bases of service: Based on service provision warehouse can be classified into:

- a. Bounded ware house: It is rained and authorized by custom authorities for storing goods still import duty due on it it is paid down either by government or private parties
- b. Field ware house: The ware house are managed by the public agency in the premise of the factory or company which needs the facility for borrowing from the bank against the certification of goods in storage or in process by an independent professional warehouse man.
- c. Cold storage ware house: These facilities are provided for perishable against payment of a storage change for the space utilized by different parties. And it is essential that the temperature is regulated and temperature variation is controlled to the degree of particularly necessary for certain sensitive items.
- d. Agricultural warehouse: These ware houses are used for storing agricultural products grown a certain area.

- e. Distribution ware house: These warehouses are generally located nearer to the market or leased by manufacturing to stock their final product for immediate supply to the market.
- f. Buffer storage warehouse: These warehouses are built as a strategic location with adequate transport and communication facilities and the goods are stored in huge quantities and further transmitted to distribution warehouses.
- g. Export-import warehouse: These ware houses are located nearer to the ports from where international trade is under taken. They provide transit facilities for goods a waiting on ward movements.

2.4.4 Packaging

According to Kotler (2003:436) packaging is defined as all activities of designing and producing the container for a product and the container is called package.

Khanna(2002:179) also support the idea of kotler and defined packaging as the use of container and parts, together with the decoration and labeling of a product in order to certain, protect and identify the merchandise and facilitate the use of products.

Packaging can generally categorize into: consumer packaging and industrial packaging:

a. consumer packaging: These kinds of packages are often based on marketing consideration in terms of advertising/promoting the product through their attractive colors. And now a day in the world of globalization packages are playing a very important role in getting competitive advantage in a competitive market. And now a day we can see that firms which produce and offer the same product to the market but use effective packaging has getting competitive advantage over their rivals."An effective packaging has getting competitive advantage over their rivals." an effective package in some times required to as a silent sales person".

b. Industrial packaging: It also called protective packaging; where it has protective mature than promotions the product. This kind of packaging mostly used for those products which are highly technical and expensive so as to protect them from damage since they are very expensive to replace them.

2.4.4.1 Functions of packaging

According to sherlkar (2004:238) packaging can serve the following basic function. It can serve as a sales tool, it identifies the marketing well as the product and carries the brand name, the packaging label informs the buyer about inner contents and how to use them and it's the biggest advertising and promotion tool. Other than the above major functions packaging also gives protection and containment function for the product.

2.4.5 Material handling

Marketing handling is undertaken at every stage of logistics activity, and is an integral part of the other element of logistics function. Through material handling doesn't add to the value of the product, it's an essential production function and unless the system is properly designed it even increase the cost of production (Khanna, 2002:141).

Moreover, Agrawal(2003:271)explain a material handling system is with the logical and physical manifestation of all requirements policies and principles intended for a particular facilities on logistics pipeline and supply chain process. From the above definition it is important to understand that material handling ensures the movement of raw material from source to processing facilities, and finished goods to consumer with least possible expenditure of time and effort so as to achieve maximum productivity and efficiency let as discuss the major equipments used in material handling.

Functions of Material Handling

Generally material handling serve as a public tool in reduction in wastage of machine and order picking times, un interrupted production and distribution schedule for avoidance of movement bottleneck such as loading and un loading problems, protection of goods from breakage/damage during movement, offering safety to workers and provide safer working condition ensures better customer service and satisfaction, and can enhance productivity and efficiency by reducing handling costs.

Major types of equipment used in material handling

Some of the major types of equipment used in material handling system are pallets, Forklifts trucks, cranes, conveyors, elevator, movable ramps and tractors. Thus by taking into consideration type, size and volume materials to be moved, the distance between loading and unloading points the right type of material handling equipment should be selected(Data;2003,278).

2.4.6 Order processing

According to Havaldar and Cavale (2007:15.6) define order processing as getting orders in time from customer, checking on the status of execution and delivery.

By supporting the above idea Reeadar and other (2001:367) describe that an efficient order processing system is essential aspect of logistical coordination system. Physical distribution starts with the receipt of a customer order and ends when the customer relieves shipments.

Because of the dynamic change in the needs and wants of customer, order processing plays a vital role in creating time based competition companies which are now a days operating in an order processing manner become more successful, since they create mutual benefit, rather they are not only operating for the sake of their benefit i.e. they are not only operating for the sake of their benefit, rather they attempt to give equal benefit to their target customer to. As a result they can have more customer and as the number of customer become more and more, their benefit also increase. That is why these companies are become successful on their business areas.

Functions of order processing

According to Reedar, R and others (2001:367) order processing function includes: a credit check by the credit department, contracting the warehouse nearest to the customer to arrange for shipment updating the firms' inventory controls, and translating shipping documents into an invoice and a permanent sales record.

Chapter Three

3. Data presentation analysis and interpretation

This chapter devoted to data presentation analysis and interpretation of the study on the data from respondents of customers and staff member of ZAK Ethiopia plc.

All the data collected through questionnaire contain close and open ended question and through interview with the general manager and marketing manager of ZAK Ethiopia plc out of unknown number of customer(Retailers and Whole sellers) considered as a target population,200 of customers were selected as a sample respondents using convince sampling technique 200 copies of questionnaire were distributed to customers and 180 of them was relied and from 180 customers the information obtained from the manager and customers summarized using descriptive statistics where by raw data is computed by applying descriptive analysis method using tables following detail explanation. At last interpretation is made to demonstrate implication of the major findings.

3.1 General characteristics of the respondents

Table one

1.	Education	Respondents	
		Number of	percentage
		respondents	
	A. Below 10 th grade	49	27.2%
	B.10 th or 12 th grade complete	68	37.7%
	C. Diploma	52	28.8%
	D. Degree	11	6.11%
	E. Above	-	-
	Total	180	100%
2.	Age	Respondents	
		Number of	Percentage
		respondents	
	A.18-28	50	27.77%
	B.29-38	59	32.77%
	C.39-48	36	20%
	D. Above	35	19.44%
	Total	180	100%
3.	How many year have you been in business?	Respondents	
		Number of	Percentage
		respondents	
	A. Below 5 year	47	26.11%
	B. Less than 10 year	79	43.88%
	C. Less than 15 year	23	12.77%
	D. Above	31	17.22%
	Total	180	100%
4.	How long have you been the customer of ZAK Ethiopia plc.	Respondents	
		Number of	Percentage
		respondents	
	A.<1 year	21	11.66%
	B.1-3 year	33	18.33%
	C.4-6 year	74	41.11%
	D. More than 6 year	52	28.88%
	Total	180	100%

From this we can see in the item 1 of table 1 among respondents 49(27.2%) of customers are below 10th grade, 68(37.7 %) complete 10th or 12th grade, 52(28.8%) of customers have diploma and 1(6.11%) of the customer are degree holder and no one is above degree level from this we can understand that most of the respondents are educated and so one can think they can give the correct reply for questions raised.

In the item 2 of table 1 respondents year of being a business man among 180 respondents 47(26.11%) are below 5 year experience and 23(12.77%) of the customers are below 15 year of work experience and finally 31(17.22%) of respondents have above 1 year work experience. From this we can understand that most of the respondents have good working experience so they can give better information for the question raised using there experience.

In the item 3 0f of table 1 respondents year of being customer of the company is explained and 21(11.66%) of the respondents are below 1 year business relation with the company, 33(18.33%) of the customer have 1-3 year work experience with the company, 74(41.11%) of the respondents have 4-6 year experience and 52(28.88%) of the customers have business relationship with the company since it started manufacturing its products. From this we can understand almost all of the respondents are 1 year and above work experience with the company so they have enough knowledge to answer the question raised about the company since they are loyal customers they can give adequate information for the question raised.

In the item 4 of table 1 15(27.71%) of the respondents have age between (18-28), 59(32.77%) of the customer have age between (29-38), 36(20%) of the respondents have age between (39-48) and 35(19.44%) of the respondents have age above 48 years old. From this we can understand all respondents are capable of give correct answer because all the respondents are above 18 years old.

3.2 Analysis of the findings of the study

The student research tried to investigate the effectiveness and efficiency of physical distribution practice of ZAK Ethiopia plc from the point t view of customers. To this end various questions were posed to sample respondents mainly related with physical distribution activities, transportation, and warehousing and inventory management. Therefore in this section of the study responses from customers are summarized in the form of percentage and presented as follow

3.2.1 General view of customers to the company's transportation potential

Table Two

1.	Do you think that the company has enough vehicle?	Respondents	,
	enough vehicle?	Number of	Percentage
		respondents	
	A. Yes	1	-
	B. No	80	44.44%
	C. I don't know	100	55.55%
	Total	180	100%
2.	Does the vehicle can be cause for damage of the products?	Respondents	,
	of the products:	Number of	Percentage
		respondents	
	A. Yes	66	36.6%
	B. No	51	28.3%
	C.I don't know	63	35%
	Total	180	100%
3.	How do you rate the speed of the vehicle?	Respondents'	
		Number of	Percentage
		respondents	
	A. Very high	-	-
	B. High	-	-
	C. Medium	74	41.11%
	D. Low	81	45%
	E. Very low	25	13.88%
	Total	180	100%

In the item 1 of table 2 based on the figure we can see that none of the respondents says the company have shortage of vehicle, 80(44.44%) of the respondents say they know that the company has shortage of vehicle and 100(55.55%) of the respondents doesn't know whether the company face the problem or not with shortage of vehicles.

In relation to this an interview was made to the company's general manager and replied that they believe that we have no enough vehicles for our product to deliver the product to the customers but it is not that much concern with the company's market share.

Thus the implication here is that the company's vehicles are not sufficient enough to give the desire service for its customers. This may dissatisfy the existing customers and not call for new customers to be the customers of the company.

In the item 2 of table 2 in which the vehicle of the company cause for the damage of the product or in its package 66(36.6%) of the respondents say yes 51(28.3%) of the respondents say no and whether the company vehicle affect the product or not.

From this we can understand the company face a problem with the standard of the vehicle since more than 50% of the respondents that they know about the vehicle says the company vehicle have a problem with damage because of the vehicle standard. This can dissatisfy the end user of the products since when the product is a any damage for example if the shape of the soap change his shape then it is not good news for the retailer to sale the product for the final consumer because in order to sale any product the first thing that comes to in the consumer mind is the upper appearance.

In the item 3 of table 2 regard on the rate of the speed of the vehicle none of the respondents say the company have very high or high capacity of speed on his vehicle and 74(4.11%) of the respondents say's the company is found in medium regard on its speed but 81(45%) of the respondents say the company is found in low level when they see the speed of vehicle and

25(13.88%) of the respondents say the company found in low level regard on its speed.

Thus from the above figure one can understand that the company is facing a problem with the speed of the vehicle since 45% of the respondents reply low level and 13.8% of the respondents is very low this show that they are not enough and also they have a problem of delivering the goods since the major function of transportation to deliver a product is at the right time but because of the speed of the vehicle the company are dissatisfied his customers.

3.2.2 General View of the customers to the company's warehousing potential

Table Three

1	How do rate the appropriateness of the	Respondents	
	warehouse location (is that near to market?)	No. of	Percentage
		respondents	
	A. Very appropriate	3	1.67%
	B.Highly appropriate	6	3.33%
	C.Medium	54	30%
	D.Low	73	40.55%
	E.Very low	44	24.44%
	Total	180	100%
2	Do you think the warehouse is built well regard		
	on protection of the product from any damage?		
	A.Yes	80	44.44%
	B.No	30	16.667%
	C.I don't know	70	38.88%
	Total	180	100%
3	Does the company's warehouse is near to		
	road?		
	A. yes	73	40.55%
	B. No	20	11.11%
	C.I don't know	87	48.33%
	Total	180	100%
4	How do you rate the company regard on the		
	service given by its warehouse?		
	A.Very high	-	-
	B.High	-	-
	C.Medium	40	22.22%
	D.Low	110	61.11%
	E.Very low	30	16.667%

Tatal	100	1 1000/	
TOLAT	1 190	100%	

In the item 1 of table 3 3(1.67%) of the respondents reply the company have very high appropriate location to the market, 6(3.33%) of the respondents say high warehouse appropriate location to the market, 54(30%) of the customer medium, 73(40.55%) of the respondents reply low location appropriateness and 44(24.44%) of the respondents reply the company have very low warehouse location appropriateness. From this one can understand that the company have totally problem of warehouse location since above 90% of the respondents say medium, low and very low so we can conclude the company have high location problem since one of the essential elements of physical distribution is warehousing and its location I have to recognize the customers abilty to get the companies near to market this can help and attract customers because they can get the goods at ridght time even by there own transportation.

In relation to this an interview was made to the company's general manager and replied that the company knows the problem of location as well as shortage of warehouse. The manager says we wish to have a warehouse near to market but the problem is there is no place to get from the government to have free space to build a warehouse as we want but if don't get from the government at reasonable price at this time we wouldn't have a capacity to buy a warehouse from private institution because there price is too high but again we are now planning to rent a warehouse near to market to distribute their product.

In the item 2 of table 3 80(16.67%) of the respondents reply yes for product protectiveness of the warehouse from damage, 30(16.667%) of the respondents says no and 70(38.88%) of the respondents say they don't know whether it is protective or not.

From this we can understand that most of the respondents say the company warehouse protectiveness the product from damage 38 % of the

respondents they don't know because may be they have no chance to see the warehouse in eye.

In the item 3 of table 3 73(40.55%) of the respondents reply yes, 20(11.11%) of the respondents says no and 87(48.33%) of the respondents reply they don't know whether the warehouse is near to road or not. From this we can understand that the company ware house is near to road since it is not near to market but they are near to road but they 87(48.33%) of the respondents don't about the warehouse near to road or not but again it associate with lack of chance to see the warehouse.

In the item 4 of table 3 none of the respondents says high or very high, 40(22.22%) of the respondents rate the service given by the warehouse is medium, 110(61.11%) of the respondents reply the company's warehouse service is very low. From this we can understand that the companies have low level of warehousing service because 61.11% of the respondents say low.

3.2.3 Customer Evaluation Regard on inventory handling

Table four

1.	Item	Respondents'	
	How do you evaluate the company's	Number of	Percentage
	performance regard on inventory handling?	respondents	
	A. Very high	_	_
	B. High	-	-
	C. Medium	40	22.22%
	D. Low	77	42.77%
	E. Very low	63	55%
	Total	180	100%
2.	How do you rate the company's performance regard in having inventory	Respondents'	
	when you need?	Number of	Percentage
		respondents	
	A. Very high	-	-
	B. High		-
	C. Medium	40	22.22%
	D. Low	80	44.44%
	E. Very low	60	33.33%
	Total	180	100%

In the item 1 of table 4 regard on the company's inventory handling none of the respondents have rate very high and high,40(22.2%) of the respondents rate medium,77(42.77%) of the respondents rate the company have low level of inventory handling and finally 63(35%) of the respondents rated the company very low inventory handling.

In relation to this an interview was made to the company's general manager and replied that the company doesn't believe that they have problem o inventory handling he says they have shortage of raw material specially foreign exchange and shortage of electric power to produce their product for those customers.

In the item 2 of table 4 none of the respondents reply very high,210(2.2%) of the respondents reply medium,80(44.44%) of the respondents rate the company performance of having inventory when needed by customer say low,60(33.33%) of the respondents rate the company's performance very low level of inventory when needed by customer.

From this we can clearly understand that the company have problem of having its product when the demand is increase.

3.2.4 Customer Evaluation towards delivery performance

This part of analysis tries to investigate as well; question related to delivery time or performance of ZAK Ethiopia plc from customers' opinion view as well as company's management accordingly several questions were raised to sample respondents regarding delivery time, delivery service, performance, availability of product. The mentioned items are presented as follows

1.	Item	Respondents'	
	How do you evaluate the delivery time of ZAK	Number of	Percentage
	Ethiopia compared to other competitor?	respondents	
	A. Very high	-	-
	B. Fast	5	2.77%
	C. Similar	55	30.55%
	D. late	75	41.667%
	E. Very late	45	25%

In the item 1 of table 5, Customer were asked to rate the delivery performance of ZAK Ethiopia 45(25%) of the respondents replied very late, 75(41.667%) replied late and 55(3.55%) of the respondents reply similar and 5 respondents reply fast. the above finding tell us that how delivery performance was decreased compared to other because almost 655 of the respondents rated late and very late.

Therefore in order to investigate this critical issue further this question has been raised to company marketing manager during the interview program.

According to his opinion, the main reason low delivery performance is as the company distribute its product to customer especially in "Merkato" there is a high traffic jam all day long. Besides the other challenge lack of raw material from abroad there is foreign exchange shortage, vehicle are problems of delivery process.

According to his further explanation, new entrants in the market are increasing, following the increasing demand were becoming tremendously high.

There for the company is preparing itself to improve this crucial an important element that can be used as competitive advantage over rival firms.

Thus as the evaluation of most customers may not attractive, we can assume that the company had no information about its competitor strategies besides, including how these rival firms perform the delivery process. Moreover, it was surprising that how a company could not take immediate action to correct the problem occurred and asses delivery options to make the delivery process as fast as possible.

More over the companies general manager believe that the company's market share is not increasing but he says it has no much concern with the physical distribution practice of the company rather the problem is with regard to Shortage of raw material ,Electric power have great effect on our market share.

Finally in the questioner for question "if you have any kind compliant or suggestion towards making the company's physical distribution effective you can give" most of the respondents reply the company have to solve the problem regard on transportation, warehousing, order processing, delivery time and inventory management aspects and at last for question "if you have any additional comments try to mention it" for this question most of the respondents doesn't answer the question many of them have no additional comments but some of them are say there are lots of competitor and now a days there is shortage of soap product for they will continue to be customer of the company but in the future if there is no shortage and the company doesn't solve it's problem they say they are not pushed to be customer of the company.

Chapter four

Summary conclusion and recommendation

From the analysis and interpretation made in the previous chapter, the following summary, conclusion and recommendation are drawn up.

4.1 Summary

Based on the response made by customers towards the companies transportation potential 44.44% of them replied no enough vehicle but majority of them replied they don't know.

Regarding on warehouse location 1.67% of them replied very high 3.33% of them replied high, 30% of them replied medium, 40.55% of them replied low, 24.4% of them evaluate very low.

Regard on warehouse appropriateness 11.11% of them replied very approprite 16.66% of them replied highly appropriate, 38.8% of them replied medium 22.77 of them replied low and 10.55% of them replied very low.

Regarding the building of the warehouse appropriateness with the product type 44.44% of them replied yes, 16.667% of them replied no, 38.885 of them replied I don't know regard on the warehouse near to road 40.55% of them replied yes, 11.11% of them replied no and 48.33% of them replied I don't know.

Regarding the service given by the warehouse 22.22% of them replied medium, 61.11% of them replied low and 16.667% of them replied very low.

Regarding customer evaluation on inventory handling 22.22% of them replied very low.

Regarding customer evaluation on inventory handling 22.22% OF them replied medium, 42.77% of them replied low, 55% of them replied very low.

Regarding evaluating towards delivery performance 2.77% of them replied fast, 30.55% of them replied similar: 41.667% of them replied late, 25% of them replied very late.

4.2 Conclusion

From the findings discussed above the following conclusion is drawn. As it is revealed in the research findings the company has no enough transportation to facilitate and this has a significant impact in the overall physical distribution activity of the company since it is the primary function and a very important element of physical distribution which really provides the time and place utility which can increase the mutual benefit of both customer as well as increase the mutual benefit of both customers as well as to the company.

Based on the findings majority of the respondents evaluate the overall inventory management capability of products based on customer need and want rest of the respondents evaluate low. From this we can deduce that the company is producing customized products which really don't much with the need of its customers, which can have a negative impact on creating long last relation for mutual benefit of both parties.

As it revealed in the findings majority of the customer respond that, the company's warehouse is not located in the appropriate place nevertheless the company's marketing manager would not agree with this ,and he said that we are not producing to stock rather we produce based on demand of our customer at this time but in the future when we get enough raw material and electric power we will have better warehouse as well as better location.

Finally as the data revealed the general view of customer towards the overall distribution practice of the company measured from view of majority of the respondents.

4.3 Recommendation

According to the major findings that have been discussed so far the following points are recommended by the student research.

- The company should give due consideration to have enough vehicle so as to overcome problems related with the company's transportation capability and also to renew the existing vehicle. In addition to this, as much as possible it should try to guide itself with the basic principle of economics of scale of distance to reduce company's cost of transportation.
- In relation to inventory management since the company face a
 problem on managing inventory it seems is easy to handle the
 problem so the company should supply its product in terms of
 quantities and timing of demand needed by its customers.
- In relation to warehousing the no enough warehouse to distribute its product so the company has to give due consideration on it. In relation to warehouse the warehouse has to build near to market to apply the theory just in time.

Therefore giving a special consideration for this elements it will be better improve its market share why is the major influential factor that leads the student research to undertake the study.

Finally, this study is not an end in the area of physical distribution so the student research recommend that further study should be made in this area because, it has significant influence on the profitability of a given company.

Appendix

Reference

- Agrawal, D. (2003). **Logistic and Supply Chain Management**. New Delhi:

 Mc Millan India Ltd. Co.
- Altekar, V. (2005). Supply chain Management:Concepts and Cases.

 Delhi: prentice Co. Ltd.
- Bowersox, J and David J. close (2003). Logistical Management

 Integrated Supply Chain Process. New Delhi: Tata McGraw-Hill

 Publishing Co. Ltd.
- Canon, T.(2002). Basic Marketing: Principle and Practice. New Delhi
 A. I.T.B.S. Publisher & Distributors.
- Data, K. (2003). Material Management Procedures, Text and Cases. New Delhi: Prentice Hall of India Private Limited
- Havaldar, k. and M. Cavale (2007). **Sales and distribution Management**New Delhi: Tata McGraw Hill Publishing Company.
- Khanna, K(2002) **Physical distribution Logistical Approach**.

 Mumbai: Himalaya Publishing House.
- Kotler, (2005) **Marketing Management.** New Delhi: prentice-Hall of India Private Limited.
- Kumar, A. and N. Meenakshi (2006). **Marketing Management**. New Delhi: Vikas Publishing House Pvt.Ltd.

Reeder, R. and Other (2001). **Industrial Marketing: Analysis Planning and control**.New Delhi:Prentice Hall of India PLC.

Sherlekar (2004). **Marketing Management** .Mumbai:Himalaya Publishing.

House. New Delhi: Vikas Publishing House Pvt. Ltd

Declaration

I, the undersigned, declare that this senior essay is my original work, prepared under the guidance of Ato Kalid Issa. All source of material used for the manuscript have been duly acknowledged.

Signature
Place of Submission St. Mary's University College
Date of Submission
Advisor Declaration
The paper has been submitted for examination with my approval as the university college advisor.
Name
Signature
Date

Name Abdulkerim Awel

St. Mary's University College

Faculty of Business

Department of Marketing Management

Questionnaire to be filled by customers

This questionnaire that is attached with letter is developed for the purpose of gathering data (information) to prepare for the senior papers entitle "Study on Distribution practice of ZAK Ethiopia plc'. The research is intended for pure academic purpose and it is expected to expand our knowledge about physical distribution practice of companies, The output of which will be great importance for their companies to improve their distribution performance.

I kindly request you take your time and carefully answer the questioner. Your cooperation in this regard is invaluable.

Instruction: It is not necessary to write your name

-For multiple choice answer by putting" $\sqrt{}$ " in the box corresponding to your choice and for the open ended items, you are kindly request to give your opinions briefly.

A. General Characteristics of Respondence 1. Education	ndents
A. Below 10^{th} grade \square	D. Degree □
B.10 th or 12 th grade complete □	E. Above □
C. Diploma □	
2. Age	
A.18-28 □	C.39-48 □
B.29-38 □	D. above □
3. How many year have you been in bu	ısiness?
A. Below 5 year □	
B. Less than 10 year □	
C. Less than 15 year □	
D. Above □	
 4. How long have you been the custom A. <1 year □ B.1-3 year □ C.4-6 year □ D. Since it started □ B. General view of customers to the 1. Do you think that company has end A. Yes □ B. No □ C. I don't know □ 2. Does the vehicle affect the product product	company's transportation potential ough vehicles?
-	't know □
B. No □	
3. How do you rate the security of the	speed of the vehicle?
A. Very high ☐ C. Mediu	
B. High □	E. Very low□

	rs to the company's warehousing potential priateness of the warehouse the ware house
A. Very appropriate □	D. Low □
B. Highly appropriate \square	E. Very low□
C. Medium □	
2.Do you think the warehouse is from any type of damage?	built well regard on protection of the product
A. Very high □	D. Low □
B. High □	E. Very low□
C. Medium □	
3. Does the company's warehouse	is near to road?
A. Yes □	
B. No □	
C.I don't know □	
4. How do you rate the company i	regard on the service given by its warehouse?
A. Very high □ □	D. Low □
B. High □	E. Very low□
C. Medium □	
D. Customer Evaluation Regard	
-	any's performance regard on inventory
handling?	
A. Very high □ □	D. Low □
B. High □	E. Very low□
C. Medium □	

2. How do you rate the company's performance regard in having inventory when you need?
A. Very high □ D. Low □
B. High □ E. Very low□
C. Medium □
E. Customer Evaluation towards delivery performance 1. How do you evaluate the delivery time of ZAK Ethiopia compared to other competitor?
A. Very high □ D. Low □
B. High □ E. Very low□
C. Medium □
F.Open ended Question 1. Based on the experience of today do you want to be customer of the company in the future? Why?
2. If you have any kind of compliance or suggestion towards making the company's physical distribution effective you can give.
3. Finally if you have any additional comments try to mention it shortly

Appendix -B

Interview guide

- 1. When Does Zak Ethiopia plc. Establish
- 2. How do you measure the company's distribution practice?
- 3. Does the company have enough Vehicles?
- 4. How do you measure the company's warehouse location?
- 5. How do you evaluate the company's performance regard on inventory handling?
- 6. How do you evaluate the delivery time of ZAK Ethiopia compared to other competitor?
- 7. Do you think the company market share.