

# Service Quality and Customer Satisfaction in Public Transport Sector of Kenya: A Survey of Shuttle Travelers in Kitale Terminus

# **David Nyongesa Murambi**

P.O. Box 2283- 30200, Kitale, Kenya E-mail: dmurambi@yahoo.com

# Prof. Henry M. Bwisa

Professor, Jomo Kenyatta University of Agriculture and Technology, P. O. Box 62000-00200, Nairobi, Kenya, School for Human Resource Development, Entrepreneurship and Procurement Department

Email: bwihem@gmail.com

DOI: 10.6007/IJARBSS/v4-i9/1167 URL: http://dx.doi.org/10.6007/IJARBSS/v4-i9/1167

#### Abstract

Public transport is important in economies since it permits the movement of factors of production and finished goods to the market. Economic survey of 2009 indicates that about 11.5% of the work force is employed in the transport industry. Customers, who are travellers, are the driving force of all firms' survival and expansion, as they strive to satisfy customer needs. This study sought to investigate service quality and customer satisfaction in public sector in Kenya by undertaking a survey of shuttle travelers in Kitale. This study was guided by the following specific objectives: finding out the influence of travel time on customers' satisfaction. The study was conducted in Kitale town at the shuttle terminus. The review of literature indicated that most of the studies had been conducted on taxis and Matatus in Kenya yielded mixed results. Hence it was worth to conduct the study. The research used survey design and the target population was all shuttle travelers in Kitale town. The information from shuttle office indicated that on daily basis about 3100 travelers use shuttles hence a sample size of 310 travelers was selected using simple sampling technique. The questionnaires and interview schedules were used to collect data. The data was analyzed using computer and presented in table using percentages. The regression was used to find out the influence of travel time, availability of information at booking office and frequency of route change on customers satisfaction. The study found that 76% of customers' satisfaction was explained by independent variable. Travel time, information and frequency of route change were significant to customers' satisfaction.

**Key words**: Service quality, Customer satisfaction, and Travel time



#### 1. Introduction

In many countries, major investments are being made in public transport systems to make them more competitive vis-à-vis other means of transport, most notably private cars. New services are being developed and old ones are being improved (Friman and Fellesson, 2009). However, an increase in supply (qualitatively or quantitatively) will not automatically lead to a corresponding increase in demand and satisfaction (Fujii and Kitamura 2003, Mackett and Edwards 1998). To make sure that investment really attracts both the existing and the potential customers envisaged, knowledge of satisfaction and service performance should provide policymakers and operational managers in public transport with valuable information.

Quality is increasingly becoming a strategic issue in the Western world (Bergman and Klefsjo, 2003). One of the main reasons for the successes of Japanese industry in the 1970s and 1980s was that the Japanese realized early that quality concept should emanate from the requirements and expectations of the customers (Bergman and Klefsjo, 2003). This perception played a vital role in bringing about success (Bergman and Klefsjo, 2003). Today service quality has become more vital than ever before because service providers have realized that they have to provide customer-perceived value, if they want to stay in business. As global competition increases, customers have more varieties to choose from and of course service quality will become their priority when spending their (customers) money, especially as they try to maximize the value in return as well as satisfaction for every unit of money spent.

Customer satisfaction is considered to be the most important factor whether it is meant for a product or a service. In case of failure to satisfy the customers the company will be replaced by others and when industries offering various services, have to be more vigilant because there is a special attitude that plays an important role attracting and retaining the customers (Khurshid, Naeem, Ejaz, Mukhtar, and Batool, 2012). The underlying assumption is that there is a direct link between the actual service and the customer's perception of it. To increase public transport use, the service should be designed and performed in a way that accommodates the levels of service required by customers (Beirão and Cabral 2007). According to Khurshid et al. (2012), the current crises of the world have affected a lot of people and organizations as well. One of the most important factors behind these crises was the shortage and increased prices of petroleum products. Inflation increased and as a reaction layoffs, started taking place. Because of lesser job securities, it resulted in less affordability of the luxuries. It became difficult for people to afford many things personal transport was also one of those luxuries and people had to rely on public transport.

#### 1.1. Statement of the Problem

Public transport is significant for economic growth and economic development since it facilitates the movement of labor, raw materials, finished commodities and creation of employment in the economy (Cavanna and Cornbelt, 2007) the public transport permits firms and people that do not own units of carriage to transport their commodities (Poleen 1993) The organizations and people that use public transport need to be assured that their goods will



reach the desired destinations and in good time (Annabel 2005) The study also disclosed the following factors that affect public transport or couriers when transporting cargos. The conditions of the vehicles, qualifications and experience of the drivers, traffic officers, weighing bridge officials, and state of the roads. Kariuki (2006) found state of the vehicle and experience of the drivers as the main factors that influence service quality of taxis service in Nairobi Kenya.

Oliver (1980) summarized factors that influence customers' satisfaction in buses as follows: punctuality, road worth of the buses, courtesy of the operators' experiences and skills, price ticket and safety of the passenger as well as cargos. However Mosi (2010) found ticket price, punctuality and reliability as the main factors that influence customers' satisfaction in bus transport in Kenya. The study found that majority of the companies and Matatus in Kenya do not operate on fixed schedules, unpredictable fares, frequently change route and unsafe destinations/booking offices and Matatus in Kenya do not operate on fixed schedules ,charge fixed fare but majority operate but according to the demand.

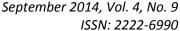
Therefore basing on above contradictions finding one missing link is worth to investigate the quality and customers' satisfaction. Also, the findings created an insight on factors that influence customers' satisfaction in public transport.

#### 2. Literature Review

Edvardsson (1998) showed in his research that customer (dis)satisfaction depends on the usage of the information that the business can dig out from its customers. One way of getting such information is through customer complaints. He found that the driver plays a significant role on the (dis)satisfaction of the customer, and that because the driver, usually, does not know the customers' needs and expectations and in many cases it is something that leaves the driver indifferent. Also, he showed that the combination of information and the driver is the key success for customer satisfaction, as the driver is the main means of interaction with the customers. Moreover, he found a singularity. He noticed that the unhappy and dissatisfied customers continued to utilize public transportations and that was because of the nature of public transportation. Moreover, friendliness of the personnel especially bus driver behaviour in relation to service frequency has an impact on customer satisfaction. Friendliness behaviour of the bus driver can satisfy customers by developing better communication and knowledge of its customers needs (Disney, 1998). As far as frequency is concerned, frequent services increase satisfaction and urban transportation patronage (Taylor *et al.*, 2008).

Additionally, Andreassen (1995) claimed that customer (dis)satisfaction in public transportation depends on three things: ticket price, price level and, finally, the layout of the platform or the station, especially for buses. Furthermore, he separates customers

in two categories: one category are the ones who use public transportation very often and they are considered expert users, to those who are not often users and they are not considered experts. He found that (dis)satisfaction varies according to the above three factors (price, ticket price and layout) to two categories of customers. Expertise users consider those three factors very important in contrast to those who are not expertise in the use of public transportation. To





conclude, underlining that public transportation is an area with low utility (low customer satisfaction) due to low rate of accordance between customer needs and the provided services.

Moreover, reliability and convenience are these factors which are considered to be important in customer satisfaction. Specifically, reliable and convenience transportation means increased customer satisfaction (Cavana and Corbett, 2007). Furthermore, reliability, travel time and comfort are considered to have a great impact on customer satisfaction in relation with the type of the trip. For instance, those who utilize buses for professional reasons consider time as the most important dimension and particularly in buses. An interesting result is that the price of the ticket is not considered being significant and does not affect customer satisfaction directly (Beira and Cabral, 2007)

Anderson *et al.*, (2007) observed that operation failures of the services affect customers' satisfaction. An operation failure, such as a possible delay of a transportation means, creates bias to customers, resulting to unsatisfied customers. Further, he showed that customers have the trend to blame the service provider for everything that happens, even if the service failure is affected by external or internal factors. On one hand, it showed that interaction has a major impact between customers and personnel which may create satisfaction and on the other hand operation failures reduce the interaction between customers and personnel, and that is because customers are becoming biased by the work force of a public transportation company.

Focusing on factor "time" Bielen and Demoulin (2007) showed that customer satisfaction is being determined by dimension waiting time, in which three determinants are included; perceived waiting time, satisfaction which is related with information in occasion of delays and finally with satisfaction which is related with the waiting environment. As long as the above 3 determinants function well, customers will stay satisfied. Also, waiting time is considered to be crucial as it plays an intermediate role between satisfaction and loyalty link.

# 3. Research Methodology

The study used a descriptive survey research design. The target population was the users of shuttle transport services between Kitale and Eldoret. This route was chosen because it is the first route to operate seven seater public transport services. Two oldest operators, 64 and Kangaroo shuttles were used for the study. On average both Sacco's got 1622 customers daily to and from Eldoret. Target respondents were be persons that are in the range between 15 and 60 that have the experience of using public shuttle transport. The ages range 15 and 60 years old are chosen because people in these age bracket have a routine commute travel behavior and probably have taken public shuttle transport as their mode of choice.

Simple random sampling technique was used to select 310 customers from a total of 1622 customers expected daily. A detailed semi structured questionnaire was be used to collect data. According to Kothari, (1999) the questionnaire tool is most appropriate since a quantitative data capture is a necessity, which can only be obtained directly from the respondents. Data was collected using questionnaires which were administered by the researcher.. The questionnaires were tested and retested for the validity to measure the ability of tools to collect the intended data. The reliability of the tools was also checked by the same procedure. The preliminary data



on the test and retesting yielded 0.5 alpha. This was above the range for the suitability of the tools.

# 4. Research Findings and Discussion

# 4.1. Respondents Characteristics

The findings of the study indicated that among the 310 respondents that were selected from the sample of the study, 169 (45.5%) were male and 227 (54.5%) were married, close to a third 100(32.1%) were aged between 36-45 years old and 40 (29.9%) had secondary level education and 39 (29.8) were professionals indicated in table 4.1

**Table 4.1: Table of Status** 

-	FREQUENCY	(%)
GENDER		
Male	169	(54.5)
Female	141	(45.5)
Marital status		
Single	83	(26.9)
Married	227	(73.1)
Age		
15-20	12	(3.8)
21 -25	69	(22.1)
26- 35	92	(29.8)
36 - 45	100	(32.1)
46 – 60	38	(12.2)
Above 60	0	(0.0)



Educational level		
None	44	(14.2)
Primary	23	(7.5)
Secondary	93	(29.9)
Tertiary	76	(24.6)
University	74	(23.9)
Occupation		
Student	52	(16.8)
Self employed	141	(45.5)
Businessman	71	(22.9)
Civil servant	50	(16.0)
Professionals	92	(29.8)

More than half of the respondents 182 (58.6%) possessed a driving license (Fig 4.1) and a similar percentage had access to a private car.

### 4.2.1 Travel Time

The table below shows the respondents' perception of the elements of travel time on customers' satisfaction

**Table 4.4 Travel time** 

Factors	SD	D	N	Α	SA
Short travel time	3 (%1)	12 (4%)	11 (4%)	154 (50%)	130 (42%)
punctuality	3 (1%)	12 (4%)	11 (4%)	154 (50%)	130 (42%)
Minimal stoppage on the way	1 (0%)	8 (3%)	9 (3%)	160 (52%)	32 (43%)

## 4.2.2. Short Travel Time

The finding of the study indicate that 92%(284) of the passengers require short time to be satisfied while 4% of the passengers respondents did not find short time travel as factor that influenced their satisfaction. However 4% of the passengers' respondents were neutral about the shorter time travel.



## 4.2.2.1 Punctuality

The finding of this study indicates that 50 % (154) agreed that punctuality was a factor that contributed to customers' satisfaction. Also 42 % (130) strongly agreed that punctuality was significant factor to customer's satisfaction. The finding of this study indicated 92% (284) of passenger respondents either agreed or strong agreed that punctuality contributed to customers' satisfaction. The finding of the study concurred with Kariuki (2006) which found punctuality and reliability of the vehicle as significant factors for passenger's satisfaction.

### 4.2.2.2 Minimal Stoppage on the Way

The of the study from table 4.2 show that 93% [292] either agreed or strongly agreed that minimal stoppage on the way contributed to passengers satisfaction. The finding of the study was similar to the findings of Elobi and Mazzilla (2009) which found that frequent stoppage on the way contributed significantly to customers' dissatisfaction.

## 4.2.2.3 Availability of Information

The table below shows the response of factors of availability of information to passengers.

**Table 4.5. Availability of Information.** 

FACTORS	SD	D	N	Α	SD
Departure information	3 (1%)	4 (2%)	2 (0%)	61 (20%)	240 (77%)
Destination information	3 (1%)	4 (2%)	2 (0%)	61 (20%)	240 (77%)
Time taken information	2 (0%)	6 (2%)	2 (0%)	61 (20%)	240 (77%)
Driver information	1 (0%)	3 (1%)	4 (1%)	68 (21%)	234 (75%)

### 4.2.2.4 Departure Information

The finding of the study shows that 97% (301) either agreed or disagreed that information about the departure time was important factor that contributed to their satisfaction. However, findings in the table 4.3 indicate that 3% of passenger respondents' did not find departure information as a factor that contributed to passenger satisfaction. The finding of the study was similar to Bielen and Demoulin (2007) found that information departure on time reduced passenger waiting or coming late

#### 4.2.2.5 Destination Information

The finding of the study on table 4.3 indicates that 97% of passenger respondents cited that information about their destination contributed their satisfaction while 3% of passengers' respondents either strongly disagreed or disagreed that information about their destination influenced their satisfaction.



Anderson et al. (2007) found that trains and aero planes passengers cited availability of information about their destination as a factor that contributed to passenger satisfaction. The study showed that adequate information made passengers to be stranded at their intermediate destinations.

#### 5. Summary, Conclusions and Recommendations

#### 5.1 Summary

The finding of the study indicate that majority of the passengers require short time to be satisfied while a few of the passengers respondents did not find short time travel as factor that influenced their satisfaction. Secondly, punctuality was a factor that contributed to customers' satisfaction. Finally, most respondents strongly agreed that minimal stoppage on the way contributed to passengers' satisfaction.

#### 5.2 Conclusion

The finding of objective one indicated that all the serqual attributes on served influences significantly the overall satisfaction of public transport shuttle transport. It can therefore be concluded that travel time, punctuality, clear information, good staff behavior and assured board security are attributes that attract and satisfy customers to shuttle transport. On relative importance of the attributes, the findings of the regression analysis indicated that frequent departures and clear information were positively and significantly related to overall customer satisfaction of shuttle transport. It can therefore be concluded that customers are attracted to public shuttle transport because of frequency departures as most travelers are conscious of time.

#### 5.3 Recommendations

It is recommended that, shuttle owners should invest their resources on improving quality of services delivered. Adequate travel and service information should be supplied to travelers whenever it is needed. Shuttle SACCOs should increase their fleets to sustain the demands of frequent departures and reduce travel time by purchasing new vehicles. Respondents were on overall satisfied with the services provided by shuttle services. Service providers should engage in needs assessment periodically to provide the key attributes that meet these needs.

To ease congestion in Kenya's major cities, the government should set up transport service that provides complementary services to shuttle transport service.

### Acknowledgement

I am indebted to JKUAT for allowing me to undertake Msc. Degree Programme. I am obliged to register my sincere gratitude to my supervisor, Prof. Henry Bwisa, for his guidance, support and



constructive criticism during the preparation of this project. His wealth of knowledge, experience, immense wisdom and understanding contributed greatly to the success of this study

#### References

Andreassen, T.W. (1995). Customer (Dis) satisfaction with public service: The case of public transportation.

Journal of services marketing, 9(5):30-41.

- Annabel, J. (2005). Complacent car addicts or aspiring environmentalist. Identifying travel Segments using attitude theory, Transport Policy Vol 12 (1) 65-78
- Aworemi, J.R, Salami, A.O, Adewoye, J.O, Ilori (2008) Impact of socio economic characteristics on formal and informal public transport demand in Kwara state, Nigeria. African Journal of Business management, 2(4) 72-76.
- Babakus, E. and Boller, G.W (1992). "An empirical assessment of the SERVQUAL scale",

  Journal of Business Research. 24(3):253-268
- Beirao, G. and Sarsfield Cabral, J.A. (2007). Understanding attitudes towards public transport and private car: A qualitative study. Transport policy, 14(6):478-489

Bergman Bo and KlefsjoBengt (2003), Quality, from customer needs to customer satisfaction. McGraw-Hill.

- Bowen, D.E (1986) "Managing customers as human resources in service organizations,"

  Journal of Human Resources Management, 23(3):371-383.
- Cronin, J. J. & Steven A. T.(1992). Measuring service quality. A Re-examination and Extension. Journal of marketing, 56(3):55.
- Eboli, L. and Mazulla, G. (2007). Service quality attributes affecting customer satisfaction for Bus transit: Journal of public transportation, 10(3) 21-34.

Edward, D. (1986). The essential leadership principles from the father of quality Publisher-Amazon.

Edvarson, B (1998) Causes of customer dissatisfaction. Studies of public transport by incident method. Managing service quality. An international journal, 8(3) 189-1



197.

Friman, M. (2004).Implementing Quality improvements in public transport. Journal of public transportation, 12(4), 49-66

Fujii, S. and Kitamura, R. (2003). What does a one month free bus ticket do to habitual drivers? An experimental analysis of habit and attitude change. Journal of transportation, 30(1) 81-95

Gartersleben, B. and Uzzel (2007). Affective appraisals of the daily commute. Comparing perception of the drivers, walkers and users of public transport. Environment and behavior. International Journal of scientific and Technology research, 8(3) 202-204.

Gronroos, C. (1994). A service quality model and its marketing implication, European journal of marketing, 18(4), 36

Gronroos, C.( 2000). Service management and marketing: A customer Relationship Approach. John Wiley and sons.

Department for transport (2003). Understanding customer needs. United Kingdom: UK Department for transport.

Parasuraman, A., Zeithmal, V.A. Berry, L.L. (1988). SERVQUAL: A Multiple-item scale for measuring consumer perceptions of service quality. Journal of Retailing, 64(1)12-40.

Beirao, G. and Sarsfield Cabral, J.A. (2007).

Understanding attitudes towards public transport and private car: A qualitative study. Transport policy,14(6) 478-489.

Khurshid, R. Naem, H, Ejaz, S., Mukhatar, F. and Batool, T. (2012). Service quality and customer satisfaction in Public Transport sector of Pakistan: An Empirical study: International Journal of Economics and management, 1 (9) 24-30.

Kungaba C. and Mikhailov A. (2010). The effectiveness of SERQUAL in measuring service quality and the impact of Technology on customer satisfaction, Masters Thesis, Karlstads University.

Mackett, Rodger L., and Marion Edwards (1998). The impact of New urban Public Transport systems: will the expectations be met? Journal of transportation, 32(4) 231-245.

Oliver R.L (1980) A cognitive model of the Antecedents and consequences of satisfaction decisions. Journal of marketing research, 17(4) 460-469.



- Parasuraman, A., Berry, L.L and Zeithmal V.A (1991)." Refinement and reassessment of the SERVQUAL scale". Journal of Retailing, 66(3):247-264.
- Pullen, W.T (1993), "Definition and measurement of quality of service for local public transport management: Transport Reviews, security Journal, 13(3):247-264.
- Richter, J.M. Friman, M. and Garling, T. (2008a). Soft transport policy measures: Results of implementation.International Journal of sustainable transportation, 5(4) 199-215.
- Smith, M.J. and Clarke, R.V. (2000). Crime and public transport.
- Crime and public transport. A review of research
- Straddling S. Careno, M., Rye T. and Noble A. (2007). Passenger perceptions and ideal urban bus journey experience. Transport policy, 14,
- Tyrinopoulos and Antoniu (2008). Public transit use satisfaction variables and policy implication, 26(3):373-395.
- UK Department for Transport (2009). Young people and crime on public transport (online). http://www.dft.gov.uk.

Van Vugut, M., Van Lange, Paul A.M. and Meertens, R.M (1996). Commuting by car or public transportation? A social dilemma analysis of travel mode judgements. European Journal of Social Psychology, 26(3) 373-395.0