

Quality of Bus Services in Punjab: A Comparative Study of Public and Private Sector

Dr. Sawinder Kaur

Assistant Professor in Commerce, Department of Distance Education, Punjabi University, Patiala, Punjab

ABSTRACT

Bus transport also appears under the scope of service industry; and survival of any service industry depends on how well it serves and satisfies its passengers. A satisfied passenger is always the biggest asset of any service industry. If there is a gap between the expectations and perceptions of respondents, then, there is a need to improve the quality of services delivered by the organisation. SERVQUAL Model is based on five dimensions, viz. tangibility, reliability, responsiveness, assurance and empathy. To study the quality of bus services and perceptions' of passengers a questionnaire is framed out and it covers the five dimensions of service quality i.e., tangibility, reliability, responsiveness, assurance and empathy. The questionnaire designed for this research work is based on a 5-point Likert scale with the assigned

weights ranging from 5 (strongly agree) to 1 (strongly disagree). After analysis of different parameters of service quality, it is found that the quality of private sector bus transport is better than the public sector. The gap score in private sector is less as compare to public sector. Further, passengers were not satisfied which the quality of bus services in Punjab, but private sector give tough competition by try to capture the passengers by providing good services to public as compared to public sector.

INTRODUCTION

The activities which involved in producing intangible products as education, entertainment, food and lodging, transportation, insurance, trade, government, financial, real estate, medical, consultancy, repair and maintenance occupations are defined as services.



Quality has become a strategic tool for obtaining efficiency in operations and improved business performance (Babakus and Boller, 1992). Transportation also appears under the scope of service industry; and survival of any transport industry depends on how well it serves and satisfies its passengers. A satisfied passenger is always the biggest asset of any service industry. With the advent of private and global players into this market, the competition has become still more stiff (Dhinakaran and Rajarajan, 2014). According to Silcock (1981), service quality in public transport industry includes as the measures of accessibility, reliability, comfort, convenience and safety. Traditionally, the performance indicators for public transport are efficiency and effectiveness. The efficiency includes the measures concerned with the process that produce the services, while the effectiveness determines how well the services provided are with respect to the objectives that are set for them (Pullen, 1993). A number of

researchers have provided lists of quality determinants, the best known determinants emanate from Parasuraman and colleagues from USA, who found five dimensions of service quality, namely, tangibility, reliability, responsiveness, assurance and empathy; and used these as the basis for their service quality measurement instrument, SERVQUAL (Parasuraman et al., 1988; Zeithaml et al., 1990). Service quality is needed for creating customer satisfaction and customer expectations (Kabir and Carlsson, 2010). SERVQUAL Model is a gap score model which is based on the expectations and perceptions of the respondents, which is proposed by Parasuraman et al. (1985, 1988). It is a model which is used to check the gap between the respondents' perceptions regarding the services delivered by the organisation and expectations of respondents regarding the quality of service delivered by the organisation. If there is a gap between the expectations and perceptions of respondents,

then, there is a need to improve the quality of services delivered by the organisation. SERVQUAL Model is based on five dimensions, viz. tangibility, reliability, responsiveness, assurance and empathy. Parasuraman et al. invented a set of 22 items/parameters which were based on these five dimensions. In 1988, Parasuraman et al. developed a gap model which was based on the following dimensions:

Tangibility: Physical facilities like availability of buses, seats, personnel appearance.

Reliability: Ability to perform promised services with accuracy and at time.

Responsiveness: Ability to help customers with response and provide prompt service.

Assurance: Employees' knowledge and courtesy, and their ability to inspire trust.

Empathy: Individual attention to customers.

This model of service quality is derived from the magnitude and direction of five gaps which include consumer expectations-experience

discrepancies in addition to the difference in service design, communications, management and delivery. The first four gaps affect the way in which service is delivered, and the existence of these four gaps leads to the extent of gap five.

Gap 1: Difference between consumers' expectations and managements' perceptions of those expectations, i.e., not knowing what consumers expect.

Gap 2: Difference between management perceptions of consumer expectations and service quality specifications, i.e., improper service quality standards.

Gap 3: Difference between service quality specifications and service actually delivered, i.e., the service performance gap.

Gap 4: Difference between service delivery and the communication to consumers about service delivery, i.e., whether promises match delivery?

Gap 5: Difference between consumer's expectations and perceived service. This gap

depends on size and direction of the four gaps associated with the delivery of service quality on the marketer's side.

The service quality is a function of perceptions and expectations and modelled as:

$$SQ = \sum_{j=1}^k (P_{ij} - E_{ij})$$

Where, SQ = Overall service quality; K= number of attributes.

P_{ij} = Performance perception of stimulus i with respect to attribute j.

E_{ij} = Service quality expectation for attribute j that is relevant norm for stimulus i.

OBJECTIVES OF THE STUDY

1. To assess the quality of bus services provided by public and private sector in Punjab.
2. To assess the perception's of passengers regarding the quality of bus services in Punjab.

RESEARCH METHODOLOGY

A well-structured questionnaire was framed to know the perception and expectation of passengers about the quality of bus services in

Punjab. The perception of the passengers regarding the service quality has been studied on the basis of 5 parameters in the questionnaire.

The questionnaire essentially framed around five dimensions of service quality i.e., *tangibility*, *reliability*, *responsiveness*, *assurance* and *empathy*. The questionnaire designed for this

research work is based on a 5-point Likert scale with the assigned weights ranging from 5

(strongly agree) to 1 (strongly disagree). With the help of certain statistical techniques such as

Chi-square test and t-test, data was assessed to know the perception of passengers. In all 345

passengers were approached to collect the required data for the study. However, 150

questionnaires each were selected for the public and private sector on the basis of preferred mode

of transport by the passengers. Hence, the sample size constituted 300 passengers. This

study adopts the judgment sampling technique to ensure the representation of different sectors of

transportation. The sample was collected mainly

from the bus stands of Patiala, Bathinda, Amritsar and Ludhiana cities. The universe of population is the bus passengers commuting for

a period not less than 2 years in a particular sector of transportation.

COMPARATIVE ANALYSIS OF THE PUBLIC AND PRIVATE SECTOR BUS TRANSPORT SERVICES BY USING SERVQUAL MODEL

In this section, to make the comparison of the quality of bus service provided by the public and private sectors SERVQUAL Model is used. It shows the comparative analysis of gap score (P-E) obtained by the two sectors of bus transport system.

Assessment of the Tangibility Dimension of Service Quality

Table 1 shows the comparative analysis of tangibility dimension of public sector and private sector bus transport.

Table 1:

Comparative Analysis of Tangibility Dimension in Public and Private Sector Bus Transport

Tangibility	Public Sector (P-E)	Private Sector (P-E)	T-value	P-value
T1 Modern looking transport	-0.21	-0.21	-3.301	0.000 *
T2 Bus is clean and hygienic	-0.43	-0.26	-2.223	0.037 *
T3 Employees wear uniform and dressed up	-0.14	-0.30	-1.891	0.336
T4 quietness of the vehicle and system	-0.33	-0.28	-2.113	0.296
T5 Availability of seats	-0.39	-0.09	-2.084	0.041*
T6 Comfort of seats inside buses	-0.11	-0.13	-0.462	0.645
T7	-0.26	-0.27	-0.196	0.842

Temperature inside bus				
------------------------	--	--	--	--

* Represents level of significances at 5% level of significances

Table 1 reveals that there is a significant gap between perception and expectation (P-E) of respondents regarding parameters *T1 (Modern looking transport)*, *T2 (Bus is clean and hygienic)* and *T5 (Availability of seats, which)* shows that there is significant difference between the gap scores of public and private bus transport sector. The analysis shows that the service quality of the private sector is

significantly higher than the public sector. If we compare parameter *T2 (bus is clean and hygienic)* and parameter *T5 (availability of seats in buses)*, the negative gap score for these parameters is less in private sector as compare to public sector of bus transport. But in parameter *T1 (modern looking transport)* negative gap score is same in public sector and private sector of bus transport.

Assessment of the Reliability Dimension of Service Quality

Table 2 shows the comparative analysis of reliability dimension of service quality of public and private sector bus transport.

Table 2:

Comparative Analysis of Reliability Dimension in Public and Private Sector Bus Transport

Reliability	Public Sector (P-E)	Private Sector (P-E)	T-value	P-value
R1 Service performed right at first time	-0.45	-0.49	-0.141	0.891
R2 Time tables maintained at any cost	-0.67	-0.37	-2.123	0.034*
R3 Services are punctual	-0.54	-0.37	-1.005	0.313
R4 Services are error free	-0.63	-0.44	-2.267	0.516

R5 Alternative service are always there in case of damage and accident	-0.53	-0.39	-1.026	0.295
R6 Reliable services provided to passengers	-0.27	-0.06	-2.186	0.046*

* Represents level of significances at 5% level of significances

Table 2 shows that there is a significant gap in parameter *R2* (*Time tables maintained at any cost*) and *R6* (*Reliable services provided to passengers*) of reliability dimension which shows that the quality of services of private sector is better as compare to the public sector.

The gap in these two parameters is lessor as compared to the public sector.

Assessment of the Responsiveness Dimension of Service Quality

Table 3 shows the comparative analysis of responsiveness dimension of service quality of public and private sectors of bus transport.

Table 3:

Comparative Analysis of Responsiveness Dimension in Public and Private sector of Bus Transport

Responsiveness	Public sector (P-E)	Private Sector (P-E)	T-value	P-value
RS1 Employees are always willing to help out	-0.34	-0.23	-0.810	0.403
RS2 Employees always gives correct and prompt information regarding service	-0.49	-0.24	-1.927	0.055
RS3 Employees responsiveness are backed by their knowledge and positive attitude	-0.38	-80.19	-1.840	0.225
RS4 Employees communicate with customers	-0.34	9-0.19	-2.120	0.411
RS5 Method of communication suits needs of customers	-0.39	-0.32	-0.613	0.712

* Represents level of significances at 5% level of significances

Table 3 shows that all the parameters of responsiveness dimension show insignificant

difference between gap score of public and private sectors of bus transport. But table reveals that the quality of private bus transport sector is better as compare to public sector because the negative gap score of private sector is lesser as compare to the public sector bus transport.

Assessment of the Assurances

Dimension of Service Quality

Table 4 shows the comparative analysis of assurance dimension of service quality of public and private sector bus transport.

Table 4:
Comparative Analysis of Assurance Dimension in Public and Private Sector of bus Transport

Assurance	Public Sector (P-E)	Private Sector (P-E)	T-Value	P-Value
A1 Operators provide immediate services when services are hampered	-0.38	-0.23	-1.131	0.259
A2 Employees are polite, proficient and well trained	-0.39	-0.36	-0.189	0.786
A3 Operators had good customer complaint handling system	-0.24	-0.04	-2.271	0.021*
A4 The behavior of operators still confidence in you	-0.37	-0.36	-0.145	0.879
A5 Feeling of security and safety from crime inside buses	-0.41	-0.25	-1.154	0.338
A6 Smoothness of ride and stops	-0.42	-0.40	-1.229	0.654
A7 Fairness/consistency of fare structure	-0.16	-0.22	0.462	0.645

* Represents level of significances at 5% level of significances

Table 4 shows that there is significant gap in one parameter, i.e. A3 (*Operators had good customer complaint handling system*). Where all the parameters of assurance dimension show negative gap-score and quality of these

parameters is unsatisfactory in both the sectors. But the quality of private bus transport is better as compared to public sector because gap in public sector is higher as compare to private sector.

Assessment of the Empathy Dimension of Service Quality

Table 5 shows the comparative analysis of empathy dimension of public and private bus transport sector.

Table 5:
Comparative Analysis of Empathy Dimension in Public and Private Sector Bus Transport

Empathy	Public Sector (P-E)	Private Sector (P-E)	T-Value	P-Value
E1 Operators understand your specific needs	-0.44	-0.27	-1.159	0.241
E2 Operators always give passengers individual attention	-0.40	-0.21	-1.966	0.047*
E3 Operators gives attention to women, children and handicapped	-0.30	-0.11	-1.269	0.181
E4 Operating hours are convenient to all commuters	-0.39	-0.23	-1.126	0.261
E5 Clear and timely announcement	-0.42	-0.08	-2.550	0.011*
E6 Availability of scheduled information by phone/internet	-0.38	-0.32	-1.012	0.157

* Represents level of significances at 5% level of significances

Table 5 shows that the there is significant gap in two parameters viz., *E2 (Operators always give passengers individual attention)* and *E5 (Clear and timely announcement)*. It was analysed that the quality of services is better in private sector as compare to public sector because the negative gap score is lesser in private sector as compare to public sector.

FINDINGS OF THE STUDY

After analysis of different parameters of service quality, it is found that the quality of bus services is not good enough to satisfy the expectations of passengers. But in some extent the quality of private sector bus transport is better than the public sector because the gap score in private sector is less as compare to

public sector. Further, passengers were not satisfied which the quality of bus services in Punjab, but private sector give tough competition by try to capture the passengers by providing good services to public as compared to public sector.

REFERENCE

- [1]. Babakus, E.; and Boller, G. W. (1992), "An Empirical Assessment of SERVQUAL Scale", *Journal of Business Research*, Vol. 24(3), pp. 253-268.
- [2]. Dhinakaran, D.P.; and Rajarajan, R. (2014), "Passengers' Perception towards Service Quality in Tamilnadu State Transport Corporation (Kumbakonam) Limited, Kumbakonam", *Asia Pacific Journal of Research*, Vol. 1, Issue XIII, pp. 170-181.
- [3]. Kabir, M.D.; and Carlsson, T. (2010), "Service Quality - Expectations, Perceptions and Satisfaction about Service Quality at Destination Gotland- A Case Study", Ph.D Thesis, Swedish University, Scotland.
- [4]. Parasuraman, A.; Zeithaml, V.A.; and Berry, L.L. (1988), "SERVQUAL: A Multiple Item scale for Measuring Customer Perceptions of Service Quality", *Journal of Retailing*, Vol. 64, No. 1, pp.12-37.
- [5]. Pullen, W.T. (1993), "Definition and Measurement of Quality of Service for Local Public Transport Management", *Transport Reviews*, Vol.13, No. 3, pp.247-264.
- [6]. Silcock, D.T. (1981), "Measures of Operational Performance for Urban Bus Services", *Traffic Engineering and Control*, Vol. 22, No. 12, pp. 645-648.