Research Article

Analysing The Role Of Customer Service In Generating Customer Loyalty In The Telecom Sector In The Bengaluru Region

P.Pramilamani[1*], Dr.N.R.Saravanan[2]

[1]Research Scholar, Bon secours college for women, Thanjavur, Department of Management studies, Affiliated to Bharathidasan University, Tiruchirapalli, Tamilnadu.
[2]Associate Professor, Annai college of Arts and science, Kumbakonam, Department of Management studies, Affiliated to Bharathidasan University, Tiruchirapalli, Tamilnadu.

ARTICLE INFO	ABSTRACT
	The roles of effective customer services have been analysed within this research to promote effective customer loyalty through improving customer experiences within the industry of telecom in Bengaluru. By identifying the key dimensions of customer satisfactions, this study is going to analyse the significant relationship between customer satisfaction and loyalty concerning with the service quality of telecom companies. A quantitative survey is conducted for this study to analyse the customer experiences for the people of Bengaluru city. The findings of this research outline the significance of effective value added services along with appropriate pricing for telecom service recharge plans especially suitable for young demographics in the city. This study is going to provide significant understanding about the significant drivers for customer loyalty in the Bengaluru market. **Keywords**: Customer Loyalty, Telecom industry, Bengaluru, Customer Services, Customer Satisfaction, Customer Demographics

Introduction

In the last few years, the Indian telecom industry has reflected significant growth and Bengaluru has become one of the prominent markets for telecom market and information technology. With a young and tech-savvy population, Bengaluru stands as an important telecommunication hub within the country. The competitive and diverse telecommunication services are offered in the city with more efficiency and relevancy by different telecommunication companies including BSNL, Reliance Jio, Vodafon-Idea, and Bharti Airtel (Abdullah, Prabhu & Othman, 2022). The key services of telecommunication including mobile data, voice calls, and other value-added services are offered in Bengaluru's dynamic market. However, customer loyalty in such a competitive has become a critical factor for service differentiation in the market and managing higher profitability. In this research proposal, a detailed analysis of Bengaluru's telecom market will be conducted to evaluate the significant roles of customer service in maintaining customer loyalty in the marketplace. By evaluating the key dimensions of an effective customer service system, this study will significantly help in gaining valuable insights into the telecom industry in India.

Research Background

The telecommunication network In India is considered the second largest network based on the number of telecom users around the world. Since the 1980s, the Indian telecom industry has been struggling to generate more profit revenue as there were not sufficient opportunities for private telecom companies to expand (Samarakoon, Dahanayake & Karunarathne, 2021). After the economic liberalization of 1991 in India, different private companies entered into the telecommunication sector revolutionizing the aspects of effective consumer experiences in telecommunication. With the evolving digital infrastructure in the country, the young and tech-savvy population in Bengaluru are expecting a seamless experience of digital services by service provider companies (Sharma, 2021). The digital literacy rate in the country is also emerging with the Indian government's initiatives for various online services while increasing customer expectations and demands for efficient telecom services in the region.

Sr	Title	2014-15	2015-16	2016-17	2017-18	2018-19
1	Telephones (in million)	996.13	1059.33	1194.99	1211.80	1183.41
2	Tele-density (per 100 inhabitants)	79.36	83.40	93.01	93.27	90.10
3	Telephone subscribers (in million)	996.13	1059.33	1194.99	1211.80	1183.41
4	No. of PCOs (in lakh)	7.37	5.89	4.52	3.60	2.55
5	No. of Mobile connection(MTNL)					
	Ported-in	25784	24627	17730	8702	10195
	Ported-out	75464	79007	97091	181160	135104
6	No. of Mobile connection(BSNL)					
	Ported-in (in lakh)	13.83	29.51	33.18	14.80	27.88
	Ported-out (in lakh)	17.62	18.35	32.90	8.90	5.20
7	Internet Subscriber (Millions)	302.36	342.65	422.20	493.96	636.73
8	No. of mobile tower(Lakh)	7.58	10.51	13.84	20.35	21.80

Table 1: Telecommunication in India at a glance
(Source: Guided by Sharma, 2021)

Customers are demanding more than the basic connectivity of calling and internet connection. The demands for different value-added services and robust customer support systems are expected in the market. Moreover, the significant presence of large telecom operators in India has increased the competitiveness in the marketplace by providing different attractive offers and recharge plans with smooth digital experience (Kumar *et al.,* 2021). For fulfilling the need of customer expectations, the effective understanding of different customer service dimensions influencing customer satisfaction and loyalty has become significant for the industry players.

Research Aim
The research aims to conduct an effective analysis of the significant contributions of robust customer service in managing customer loyalty within the specific context of Bengaluru's telecom sector.

Research Objectives
- To identify different dimensions of customer services that have the potential to influence customer loyalty in Bengaluru's telecom industry
- To evaluate the significant relationship between customer loyalty and telecom service quality of the telecom service providers
- To explore the impacts of effective customer services on developing customer loyalty in the Bengaluru region
- To analyse the customer service experiences based on customers' profiles in Bengaluru

Research Questions
- What are the key dimensions for customer services in Bengaluru for driving customer loyalty in the region?
- How the telecom service providers' service quality is related to customer loyalty for the telecom companies?
- What are the significant impacts of customer services in generating loyalty among customers in the Bengaluru region?
- How do customer service experiences vary depending on their demographics and service usage in Bengaluru's telecom industry?

Literature Review

Dimensions of customer services in influencing customer loyalty
Customer satisfaction with different companies can be based on customers' feelings, senses, thoughts, and actions. Different studies have revealed the significance of implementing the SERVQUAL framework to understand various dimensions of customer services that can potentially impact overall satisfaction among customers (Sreenath, 2022). SERVQUAL framework established five key dimensions in ensuring service quality and the framework is efficient in analysing telecom companies' strategic approaches to improve customer services. The quality service delivery of the telecom providers depends on the accuracy and reliability of the services while ensuring efficient contribution of customer services to potential customers. Telecom companies have taken significant approaches to ensure that their technologies and expertise improve the overall performance of network connections in the Bengaluru region (Kukreja & Ajagaonkar, 2021). The increasing customer queries and issues are promptly addressed within the telecom landscape to encourage their sense of empathy for their customers. By developing significant physical equipment, and communication techniques, telecom players have significantly ensured the quality dimensions align with customers' expectations.

Relationship between telecom service quality and customer loyalty
The significant links between these two aspects of telecommunication can be defined from the perspectives of customers on telecom providers' effective service quality and assurance in the market. If the customers get higher quality service in telecommunication, then they are more likely to be satisfied with the service providers and they might recommend others to join the network. It effectively established loyalty in the existing customer base (Kalia *et al.*, 2021). Different service dimensions including reliability, assurance, and responsibilities effectively contribute to the development of customer loyalty. Within the particular Bengaluru region, these dimensions are the key determinants for ensuring loyalty in the marketplace.

Impacts of effective customer services in improving customer loyalty in Bengaluru
By examining the effective needs of customers, digital services, and demographic variations in Bengaluru, the companies have assessed significant aspects of customer loyalty. Larger and effective telecom businesses like Reliance Jio or Bharti Airtel are significantly fulfilling the ever-evolving needs of customers while reaching out and exceeding their expectations in the region (Sharma, 2022). The recent development of the 5G network has enabled the companies to target larger customer segments in the region by launching free internet service to the people. Moreover, Jio's strategies for providing affordable internet and digital connection have significantly influenced the evolving patterns and services development in the region. Moreover, the advancement in customer service technologies has enabled corporations to implement different self-service applications and chatbots. This technological implementation in customer services has effectively helped in addressing customer queries promptly (Sukant, 2021). However, the cultural and economic variations in India significantly influence customers' perspectives based on their demographics and internet applications in Bengaluru.

Customer service experiences based on customer's demographics
Effective experiences of customers have been differently influenced depending upon their individual needs and demographics in Bengaluru. These variations are prominent in analysing the varied customer service strategies in different customer segments in a particular region of India (Mahesh, 2020). Based on the customer's age, work experience, education level, and other preferences, the experiences differ while influencing customer loyalty. These potential variations in customer profiles effectively determine the level of satisfaction based on the service quality in the telecom market.

Theoretical research underpinning
SERVQUAL framework
To measure service quality in the Indian telecom industry, this framework can be utilized and it will significantly provide insights into five key dimensions of customer experiences related to service quality. Five dimensions of this framework include reliability, responsiveness, tangibles, assurance, and empathy for customer perceptions of service quality (Swetha & Dayananda, 2020). The quality of the services can be determined in the telecom sector of India by assessing the expectations and perceptions of different online

network services. By comparing customer expectations with service quality, the framework provides an effective measure of the perceived quality in the telecom industry.

Theoretical framework for customer relationship management (CRM)

CRM theory effectively guides Indian telecom players to develop an effective customer service framework to understand different management aspects of companies. By exploring all the relevant aspects of customer relationships with telecom providers, it can analyse service provider's quality and experiences with services while evaluating their significant impact on customer loyalty (Mathew, 2021). By focusing on the categorization of customers, the creation of potential customer values, and effective customer engagement, CRM approaches ensure the company's effectiveness in establishing loyalty and relationships with customers.

Literature Gap

Previous research has significantly analysed the effective relationship between customer loyalty and service quality within the telecom sector of India. However, these studies have failed to fill the gap of discussion on the performance of telecom services in the specific region of Bengaluru (Chaudhary, 2022). The studies have provided limited insights into the vast differences in Indian customers' demographics, evolving preferences or needs, and diverse telecom services.

Conceptual Framework
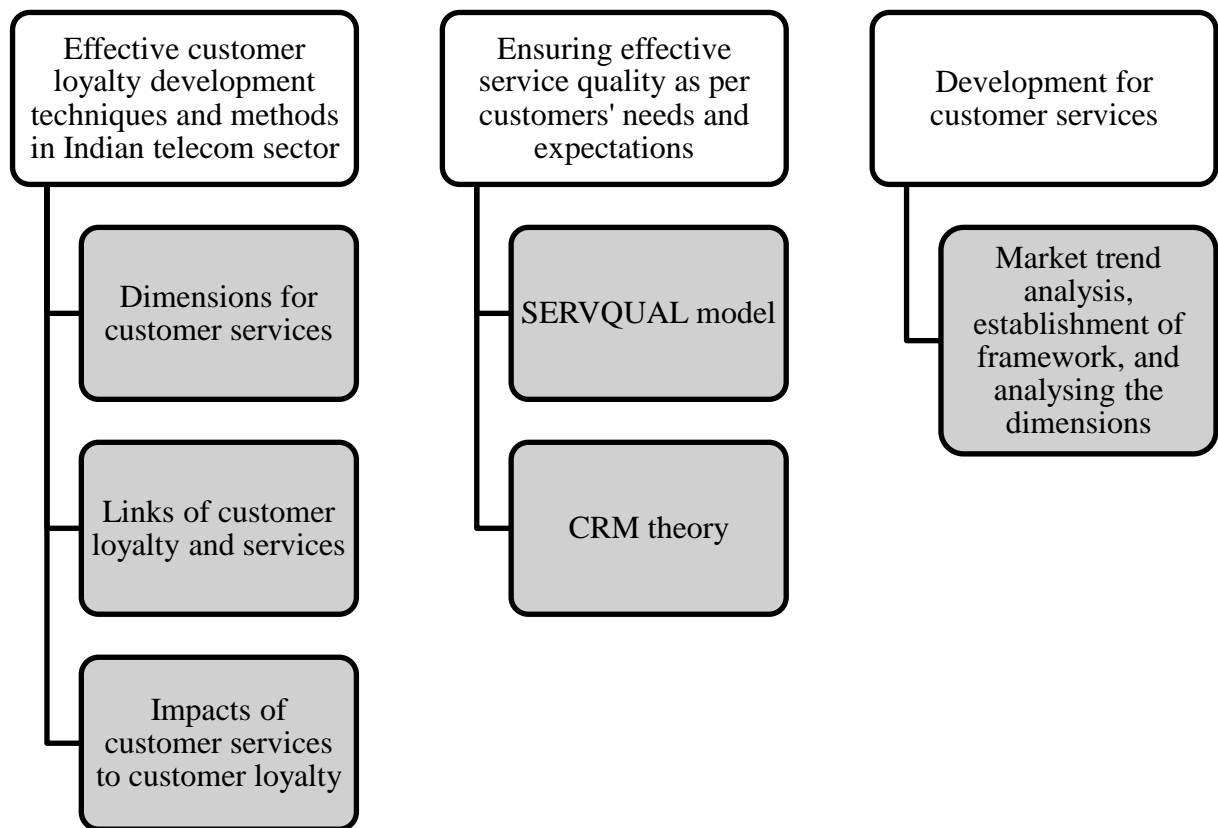
Research Methodology

The methodology determines the structure and design of a proposal entailing the methods for data gathering and data analysis. The quantitative method will be considered in the evaluation of significant roles of customers' telecom experiences in improving loyalty to the telecom brand. The study is intended to adopt the views of potential customers from Bengaluru about their experiences in using the telecom services of different telecom brands (Umarani *et al.,* 2022). Gathering the perspectives of a significant customer base will effectively help in gaining potential insights about the Indian telecom industry's customers and their preferences for telecom services.

A survey with an effective questionnaire set will be conducted for Bengaluru's customers while expressing their preferences for telecom services and the efficient performance of telecom providers (Renuka & Venkatesan, 2023). The survey will consider the responses to the questionnaire from around 150 potential users from Bengaluru city in India. The set of 150 participants in the survey is considered as the sample for the research and 150 is considered as the sample size for this research study. The participants are selected from the city of Bengaluru in India and the survey's responses are obtained through Google form.

The questionnaire of the survey consists of the key demographic questions related to the participant's gender, age, nationality, work experience, occupation, and other potential aspects of customer demographics. By evaluating the answers to these demographic questions, significant ideas and estimates can be obtained about customers' characteristics in terms of telecom service uses within the city (Gajendra *et al.,* 2021). The preferences and experiences of customers for using different company's services are recorded through the survey. The responses for customer loyalty from 10 questionnaires are effectively analysed within this research proposal. Informed consent is taken from the participants along all the ethical considerations have been maintained to conduct the survey and questionnaire through Google form.

Data Analysis
The collected responses are analysed by utilizing the analytics of Google Forms and replacing the total data in the Google sheet. By using the pivot table option in the Excel sheet, the charts for respective responses and customer preferences have been prepared for analysis (Rahul & Varsha, 2023). Integrating all the potential responses along with the visual representations into the Excel sheets, has provided significant insights into the influences of customer experiences in fostering customer loyalty.

Figures on Demographics data
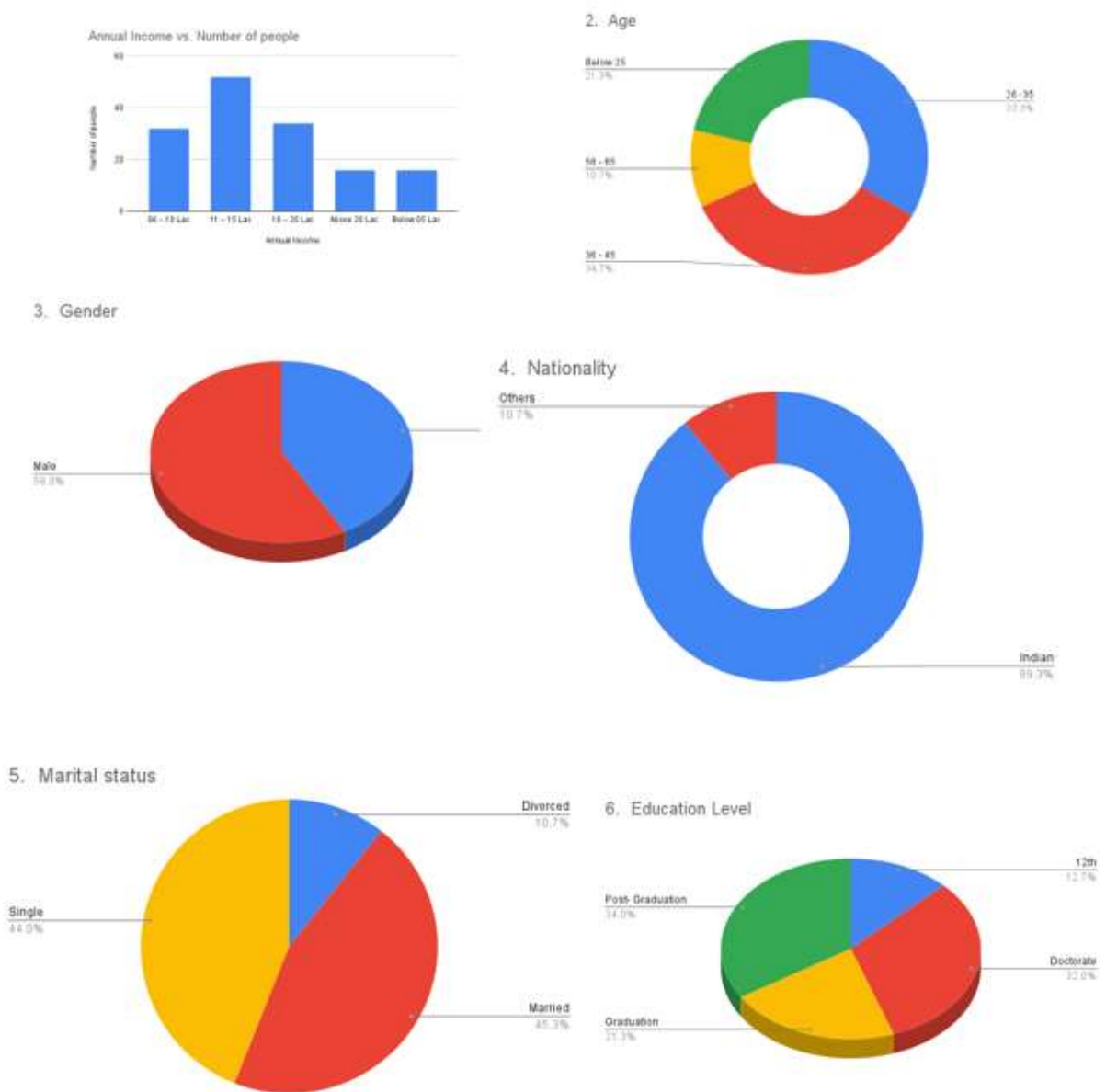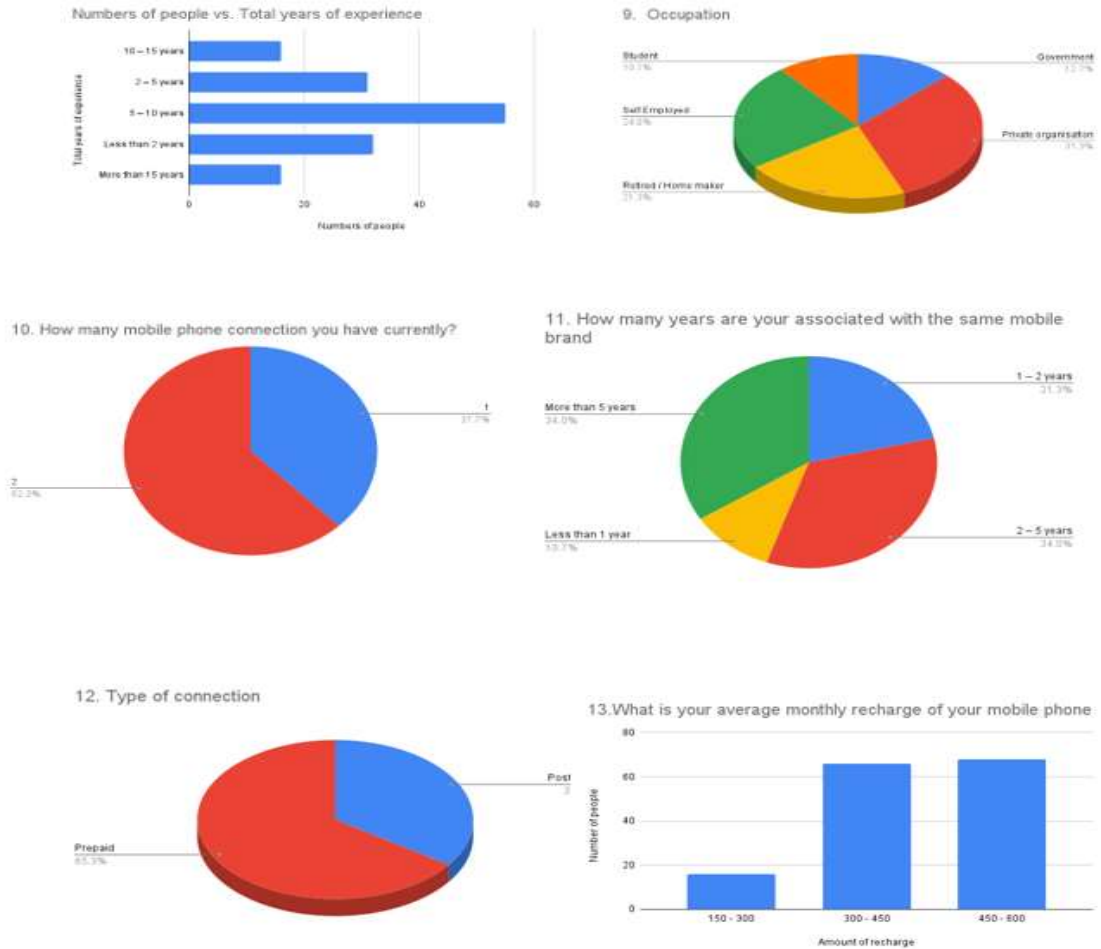
The above demographics responses have highlighted the participants' different characteristics. From the data, it is clear that most of the people have come from different non-metro cities and people from metro cities are fewer in Bengaluru city. Most participants are under the age of 45 in the city and they have contributed most of the population in the city. From the participants, the male population is quite higher than the female population. Almost all the survey's participants are of Indian origin and a few participants are other nationals. The marital status of the people consisted of an equal population for married and single participants. In terms of the education level of the participants, almost every participant has completed their graduation and few people have doctorate degrees also.

The selected participants are mostly associated with private organizations and they often use two mobile connections at a time. It is also observed that the participants have been using the same mobile brand for a long time and they prefer to have a prepaid connection compared to a postpaid connection. The amount paid by the participants in their mobile connection bill lies within the range of 300 to 600 INR which is a significant amount for average Indian people in the city with gross annual income under 15 lac.

### *Ratings of customers in selecting the prominent telecom provider brands*

Responses	Airtel	BSNL	Vodafone	Reliance Jio
Extremely Satisfied	115	54	52	65
Moderately Satisfied	16	16	35	0
Not Satisfactory	0	16	0	0
Not Satisfied	0	16	0	0
Satisfied	19	48	63	85

Table 2: Number of responses for selecting particular telecom brands in Bengaluru

Rating of telecom services based in customer perception
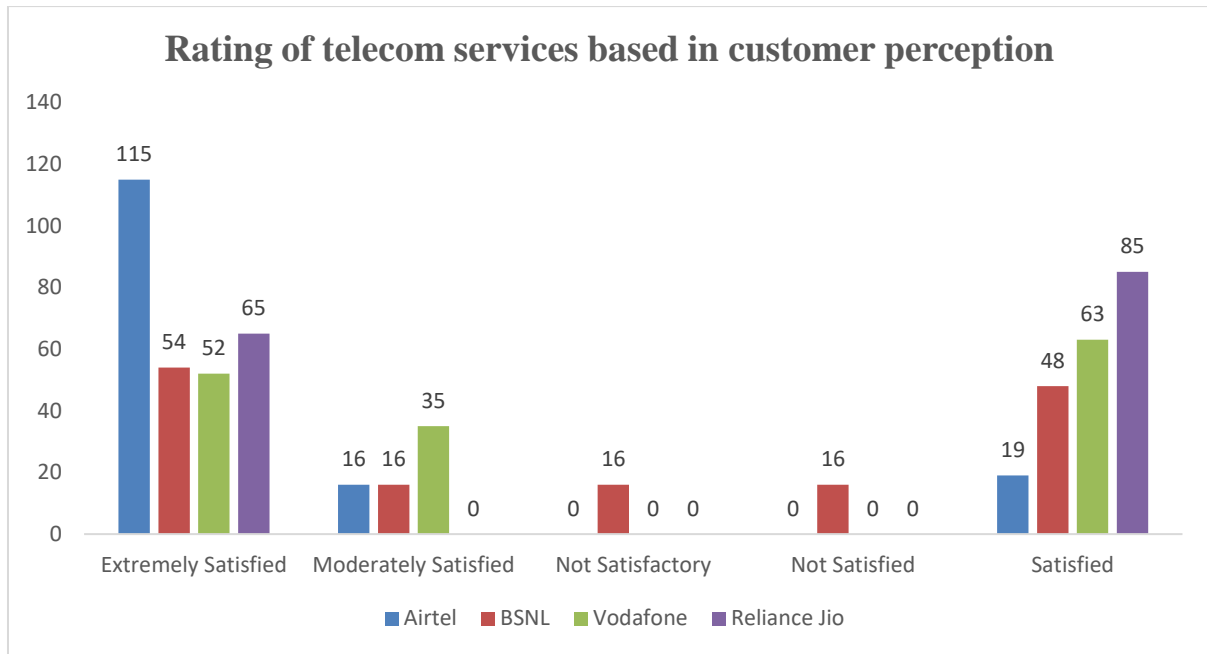
From the significant comparisons between customer perception of the telecom provider brands Jio, Airtel, BSNL, and Vodafone, it can be seen that most participants prefer to use Bharti Airtel as the most efficient and competitive service provider brands in Bengaluru. While Reliance Jio comes second place in terms of satisfactory services for customers, Vodafone-Idea is positioned as the moderately satisfied telecom brand in the city. BSNL's services come in the least position for their services. Despite BSNL's cost-effective recharge plans, its inefficient services and inconsistent network services impacted its market share.

Perspective of customers to recommend telecom companies' service to others
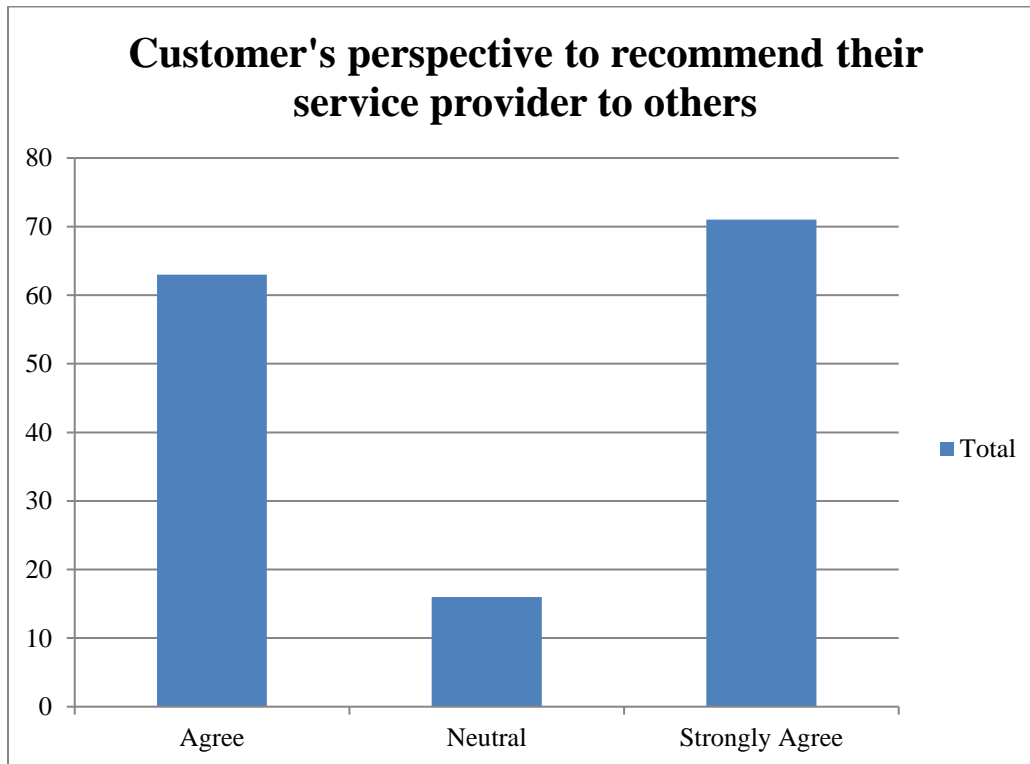
The above graph highlights the potential of different telecom services for different customers. Most participants have provided their opinions for recommending their favourite services to their relatives or family members as satisfactory services.

Customer's perspective about charging of different telecom providers

[Comparing what I get for what I pay my service provider gives me good value.]

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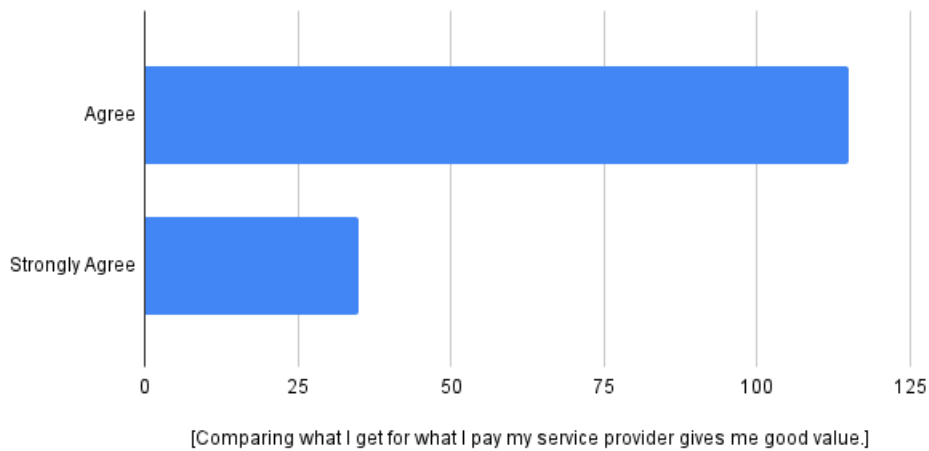
From the survey, the existing charging plans of different telecom brands are referred to as competitive and efficient compared to the market situation. All participants have conveyed their preferred service provider as an efficient telecom brand in the market and they are charging effective pricing for their services. This analysis highlights the fair charging practices of different telecom providers and it gives a significant advantage to the brands in the dynamic telecom market of Bengaluru city.

Satisfaction level of customers for different value-added services

[Value Added Services (data usage etc) given by my service provider are comprehensive and competitive.]
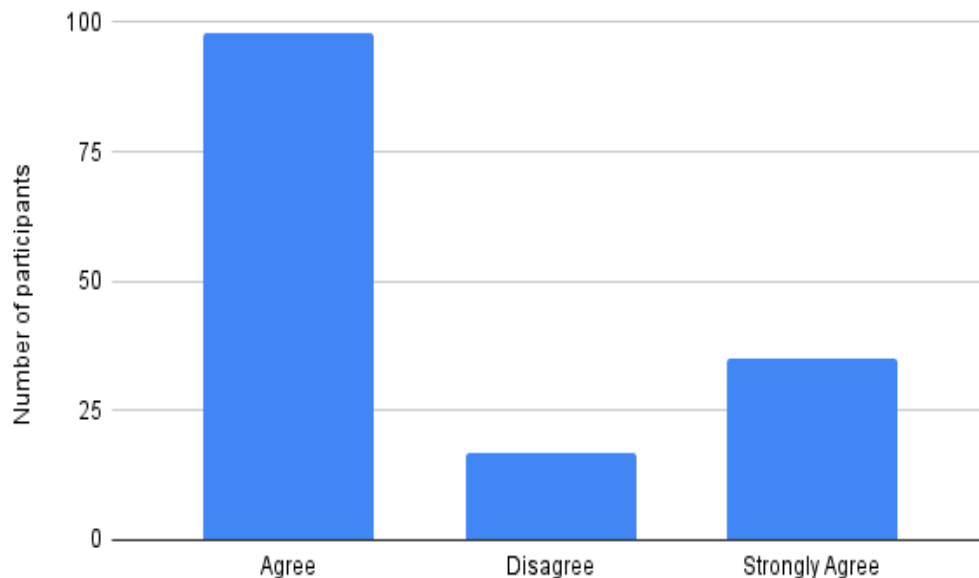
The value services of telecom providers including voice calling facilities, internet connectivity speed, and other services are significant in the existing market as per the questionnaire survey. All the participants were found to be satisfied with the provided value-added service in the telecom sector. People of the city have no issues about the provided services in the market.

Perspectives for effective pricing plan of telecom companies

My service provider gives good range of pricing plans to choose from.
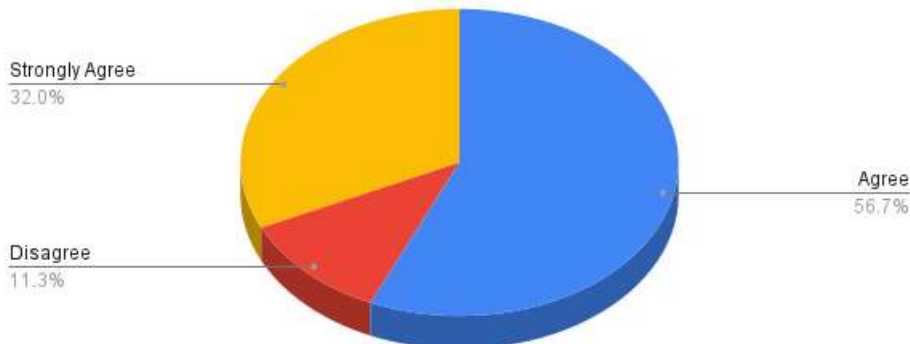
From the above column chart, 98 people out of 150 participants agreed to the fact that telecom providers have enabled effective pricing plans for their customers in Bengaluru while 17 people disagreed with the fact. The other 35 participants strongly agreed with the efficient recharge plan of the service providers.

Empirical findings

Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.590[a]	.348	.330	.385

a. Predictors: (Constant), VI, JIo, Airtel, BSNL

ANOVA[a]

Model		Sum of Squares	df	Mean Square	F	Sig.
	Regression	11.476	4	2.869	19.333	.000[b]
1	Residual	21.517	145	.148		
	Total	32.993	149			

a. Dependent Variable: Customer_Loyalty
b. Predictors: (Constant), VI, JIo, Airtel, BSNL

Coefficients[a]

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
	(Constant)	5.651	.326		17.316	.000
	JIo	.189	.042	.399	4.511	.000
1	Airtel	-.221	.057	-.314	-3.880	.000
	BSNL	.082	.029	.249	2.788	.006
	VI	-.393	.047	-.826	-8.414	.000

a. Dependent Variable: Customer_Loyalty

The correlation does show a weak correlation between customer satisfaction and customer loyalty as the R square value is only 0.348 which is not near to 1. However, the sig value in ANOVA is 0.00 which is less than 0.05 implying that the alternative hypothesis that there is an impact of customer satisfaction of the telecom operators on customer loyalty can be accepted. The regression equation that can be derived includes-

y = mx + C+ Standard error
*Customer loyalty = customer satisfaction with jio * 0.189 + customer satisfaction with airtel * -0.221 + customer satisfaction with BSNL*0.082+ customer satisfaction with VI*-0.393 + 5.651+0.326*
The result shows that with every unit change in the customer satisfaction of Jio and BSNL, there is 0.189 units and 0.082 unit change in customer loyalty. But in the case of Vodafone and Airtel customer satisfaction

does not have any correlation with customer loyalty rather in this case the brand reputation of the operators and the low-priced products may be some of the impacting factors.

Discussion and conclusion

From the quantitative analysis for the above research, valuable insight from the customer's perspective to telecom providers' is gathered from different visual representations. The key dimensions of service providers in Bengaluru city are founded as value-added services, recharge pricing plans, efficient services, and other competitive plans of the service providers (Tyagi & Sindhu, 2022). Customers from Bengaluru city have perceived these dimensions as quite satisfactory for the system. Despite potential demographic variations in the city in terms of the participant's education level, income level, professions, and other demographics, customers agreed to the telecom brands' strategies to implement potential services in the city.

Potential Limitations

Despite significant findings from the above quantitative study, there are potential limitations in generalizing the findings and measuring the potential impacts (Kolli & Balakrishnan, 2020). Due to the cross-sectional design of this research, it finds a correlation between customer loyalty and experiences rather than finding a deep understanding of these metrics. The considered sample size of 150 participants is too small to analyse and draw conclusions about the customers' perspectives on telecom services.

Future Scope

Despite the limitation, this study is going to address the potential research gaps by conducting further qualitative studies about the topic. The longitudinal study can also be conducted in future to analyse telecom businesses within the specific landscape of Bengaluru city against the conducted cross-sectional study (Rayer, 2020). Different comparative studies can also be considered in future for understanding the characteristics of the market and recommending best practices for telecom brands to improve customer experience as well as customer loyalty.

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