

# Empirical Study and Analysis of Customer Satisfaction on Reliance Jio Network in Hassan Region

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## ABSTRACT

The prime concern of every organization they want to maximize the number of consumers through satisfaction because customers are the real asset of every organization. In business, the satisfaction of customer occupies an important place. Every organization tries to maximize the satisfaction about their product, in order to get more marketing position and profit. For this reason this research work is conducted to find the factors which have a major influence on customer satisfaction about reliance Jio network in Hassan

## INTRODUCTION:

History about Wireless Communication in India. Exactly 23 years ago a telephone call was made in India; it changed the communication revolution in India. In 1995 on July 31 it was the first mobile call in India made between the Union Telecom to each other. After sixteen year later 4G services is made in Kolkata. Only eight companies got the license to provide cellular service in India among Mobile Net service was also one. Two licenses were awarded each for the four metropolitan cities[1&2].

But today there are so many companies are providing service in India. As a result the competition for stable market and retaining the customer between the companies increased. In India the following companies are the major players of mobile telephones industry section are of BSNL, BhartiAirtel, Reliance Industries Ltd's (RIL), Vodafone, Tata teleservices and Idea Cellular etc .In these mobile telephones industry section I selected the Reliance Industries Ltd's (RIL) telecom for survey[3&4].

On memories of 83<sup>rd</sup> birthday anniversary of Reliance Industries founder, dated 27 December 2015 Jio soft with a beta for partners and employees, and publicly became on 5 September 2016. While the company has stated an objective for Reliance Jio Infocomm Ltd. that of putting India on the global map for mobile broadband Internet access there is no denying that this announcement has jolted the telecom ecosystem across the country.

The commercial free service offers starts from the Reliance Industries Ltd's (RIL) telecom industry during September 2016 to 31 Dec 2016. Again this offer service is extended to next three month up to 31 March 2017 onwards till today[5&6].

## MARKET REASEARCH AND METHODS:

### Market Research

Market research playing very important role in market management. Research attempts the limits of knowledge Market research is the course sequence of operation for collecting the information about marketing activities, customer, customers and competition. It can help to learn more about the people and want to sell their company product or service to consumers, what they want, need, believe or how they act. It will allow us to identify and analyze the market need, volume and about competition. It can be used to determine the practicability of about

product or service, identify how to promote their product or service, and develop a competitive marketing strategy[7].

The most basic classification of market research is primary and secondary research.

I) Secondary method:

II) Primary method:

**METHODOLOGY**

Before start methodology a detailed study of literature survey on customer satisfaction, reliance Jio limited, has made first. The questionnaire is prepared considering some of the factors. List out contains repeated factors for customer satisfaction in the literature. By entering the data into the Minitab software, the reliability tests to be carried out for the data. Once the questionnaire is finalized the data to be collected from customer those who using reliance and who willingness to share their experience about service in Hassan region (385 numbers) including both male and female. Data collected to be entered into Minitab software and then analyzed by Taguchi method with each set of responses given by the customer.

1. Purpose of the study.
2. The structure of the study

**RESEARCH DESGIN**

Research is activity done by common group of people refers to a search for knowledge. One can also define Research as a search for information on specific topic by scientifically and systematically. In fact research is an art of scientific investigation. Some people consider the research is movement from the known to unknown.

The degree of satisfaction for the factors were included in the questionnaire to understand the present satisfaction level of the customer while degree of importance for the factors were included to know how much importance will be given by the customer. The total numbers of questions framed under different Main factor are shown in the Table 1.

**Table 1 Framing questionnaire**

S. No.	Factors	No. of
1	D-Demographic	08
2	GI-General Information	05
3	CS-Call Service	03
4	F-Facility	11
6	M-Marketing	07

**Calculation of sample size for infinite population[7]**

Sample Size - Infinite Population more than 50000

$$SS = Z^2 * (p) * (q) / e^2$$

Where q = (1 - p)

$$SS = Z^2 * x (p) * x (1 - p) / e^2$$

SS = Sample Size

Z = Z-value

P = Percentage of population picking a choice, expressed as decimal

e = Confidence interval, expressed as decimal (e.g., .05 = +/- 5 percentage points)

Taguchi Orthogonal analysis for facility option by JIO Network, Data package, Call Rate, Recharge outlet and SMS rate in Hassan shown in Table 2

Table 2 Taguchi Orthogonal array

<b>Taguchi array</b>	<b>L25(5<sup>5</sup>)</b>
Factors	5
Runs	25

Orthogonal layout of L25 (5<sup>5</sup>) design for Network, call rate, Data package, Recharge outlet, SMS rate AND Response Table for Signal to Noise Ratios for Number of respondents about Network, call rate, Data package, Recharge outlet, SMS rate in Hassan region in Table 3

Table 3 SMS rate in Hassan region

Level	Network	Call rate	Data package	Recharge outlet	SMS rate
1	6.453	6.478	6.314	5.194	6.291
2	6.359	6.369	5.595	4.281	6.330
3	4.348	4.287	6.988	6.753	6.268
4	6.164	6.159	4.250	5.801	6.224
5	5.659	5.690	5.836	6.218	5.871
<b>DELTA</b>	<b>2.106</b>	<b>2.191</b>	<b>2.738</b>	<b>2.472</b>	<b>2.062</b>
<b>RANK</b>	<b>4</b>	<b>3</b>	<b>1</b>	<b>2</b>	<b>5</b>

The effect of this factor is then calculated by determining the range:

$$\Delta = \text{Maximum} - \text{Minimum} = 6.453 - 4.348 = 2.106$$

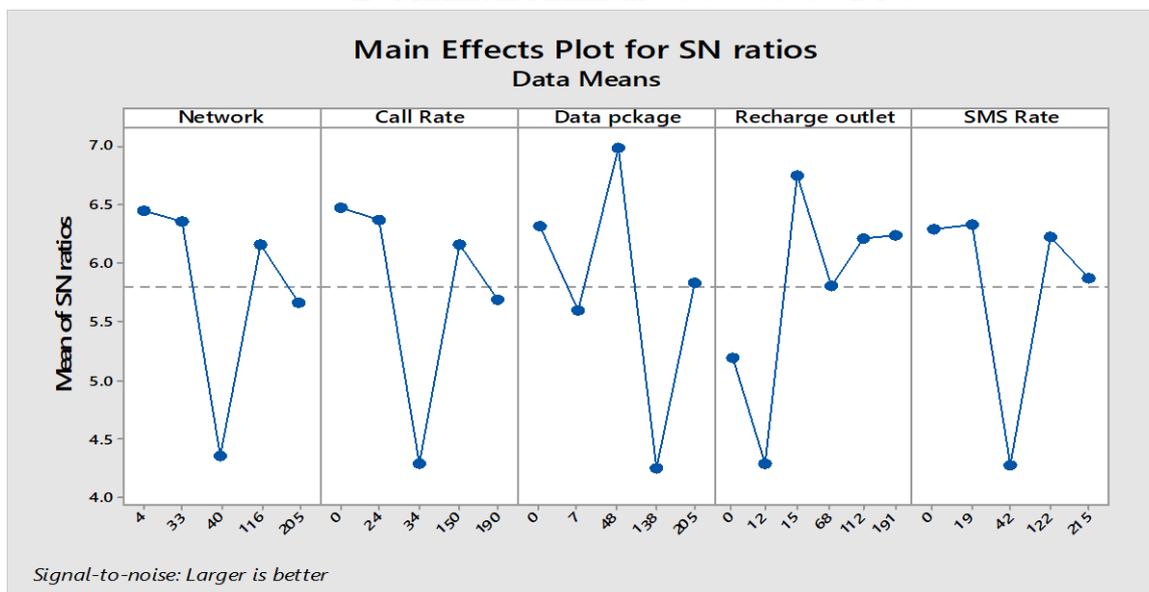


Fig 1: Main Effects Plot for SN ratios for Hassan region

S/N ratio and Predicted S/N ratio for Value added service, Mobile entertainment, New technology, Office/agent proximity, territorial coverage and roaming in Hassan region

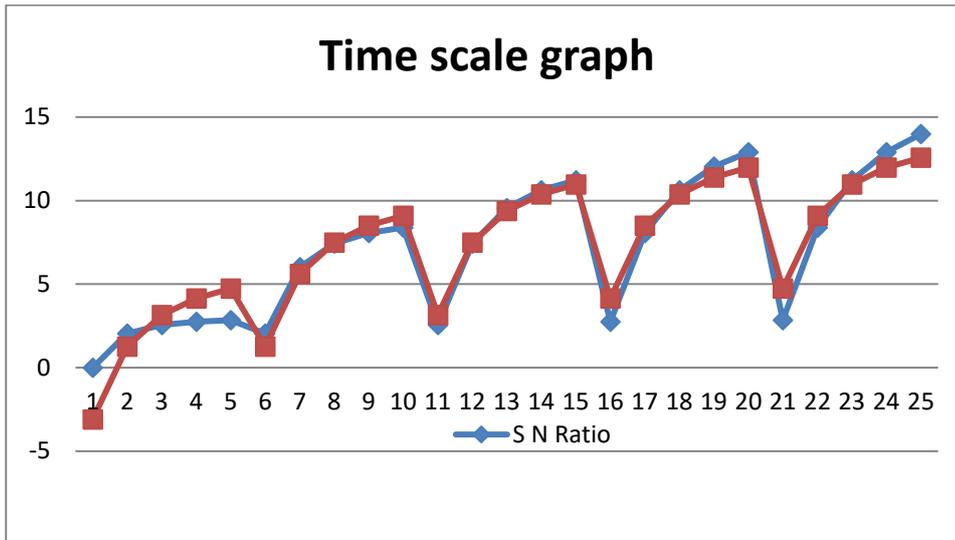


Fig 2 Time scale graph for facility for SN ratio and Predicted SN Ratio for Network, call rate, Data package, Recharge outlet, SMS rate in Hassan region.

**Reliability Test.**

By using Minitab software the reliability test conducted the for Cronbach’s alpha value obtained for following factor is as following ,according to this value it shows its reliability, the customer service is obtained 0.9452 so it is in excellent . Facility is obtained 0.9324 it is also excellent and marketing is obtained 0.8156 value obtained so it is in good. Based on this conducted survey is reliable.

**CONCLUSION**

Every organisation wants to know the customers satisfaction level to improve the market position and creation in the brand value. So this study mainly focused on customer satisfaction level of reliance Jio customer in Hassan region. The effective questionnaires are made for survey in Hassan region. And 398 responses are obtained from Hassan region. On this basis customer satisfaction analysis are made by using Minitab version 17 software. The Reliability test were concluded to find out that in which level the survey study will have. According to the reliability test based on Cornbach’s alpha value, the two factors call service and facility is in excellent position and marketing factors is in the good position. Based on this the conducted survey is reliable.

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