



INTERNATIONAL JOURNAL OF CREATIVE RESEARCH THOUGHTS (IJCRT)

An International Open Access, Peer-reviewed, Refereed Journal

“Measurement of Customer based Brand Equity of BSNL”

Jigneshkumar V. Panchal¹ | Dr.Dhaval Pandya²

¹Assistant Professor, L.R.Valia Arts & P.R.Mehta Commerce College, Bhavnagar (India)

²Assistant Professor, School of Commerce & Management, Dr.Babasaheb Ambedkar Open University, Ahmedabad (India)

Abstract:

Marketers are now faced with an increasing number of tactical options that must be efficiently and effectively applied to an increasing number of product variations for the brand. The concept of brand equity was identified as having the potential to provide guidance to marketers to help them to make those decisions. In Today's market, due to fierce competition, companies have to focus on the brand equity. There are basically six components of the brand equity, this research has studied the different components of brand equity of BSNL with respect to Narmada, Vadodara and Bharuch district of Gujarat state.

This study empirically measures the effectiveness of customer based brand equity of BSNL with respect to Narmada, Vadodara and Bharuch district of Gujarat state. A survey of 100 consumers has been conducted and result indicated that majority of the respondents have said that they like, admire and respect the customer who use BSNL. They are also satisfied and have said that BSNL provide reliable service and makers of this service provider are knowledgeable and also consider customers' opinions/suggestions towards the products.

Key words : Brand, Brand Equity

1.About Tele communication Industry in India:

The word telecommunication is derived from Greek word . Tele means 'far off' and the latin word communicare means 'To share'. Telecommunications means the transmission between or among points specified by the user of information without change in the-form or content of the information as sent and received.

India's Telecommunication Industry is the second largest in the world by number of telephone users with 1187.90 million subscribers at the end of Feb.,2021. It has one of the lowest call tariffs in the world enabled by mega telecom operators and hyper-competition among them. Major sectors of the indian telecommunication industry are telephone, internet and television broadcast industry .

1.1.1. The beginning in India

Telecommunications in India began with the introduction of the telegraph. The Indian postal and telecom sectors are one of the world's oldest. In 1850, the first experimental electric telegraph line was started between Calcutta and Diamond Harbour and it was opened for the use of the British East India Company in 1851.

The construction of 4,000 miles (6,400 km) of telegraph lines was started in Nov., 1853. These connected Calcutta and Peshawar in the north; Agra, Bombay through Sindwa Ghats, and Chennai in the south; Ootacamund and Bangalore. William O'Shaughnessy pioneered the telegraph and telephone in India that belonged to the Public Works Department and worked towards the development of telecom throughout this period. A separate department was opened in 1854 when telegraph facilities were opened to the public.

In 1880, two telephone companies namely The Oriental Telephone Company Ltd. and The Anglo-Indian Telephone Company Ltd. approached the Government of India to establish telephone exchange in India. Earlier, the permission was refused by the government on the ground that itself would undertake the establishment work of telephones. In 1881, the Government reversed its earlier decision and a license was granted to the Oriental Telephone Company Limited of England for opening telephone exchanges at Calcutta, Bombay, Madras, Ahmedabad and the first formal telephone service was started in the country

About BSNL:

Bharat Sanchar Nigam Limited (abbreviated BSNL) is an Indian state-owned telecommunications company headquartered in New Delhi. It was incorporated on 15th Sept., 2000 and assumed the business of providing telecom services and network management from the erstwhile Central Government Departments of Telecom Services (DTS) and Telecom Operations (DTO) as of 1st Oct., 2000 on a going-concern basis. It is the largest provider of fixed telephony and broadband services with more than 60% market share, and is the 5th largest mobile telephony provider in India. BSNL is India's oldest communication service provider.

BSNL Mobile is a major provider of GSM cellular mobile services under the brand name *Cellone*. It provides fixed line services and landline using CDMA technology and its own extensive optical fiber network. BSNL provides Internet access services through dial-up connections as prepaid, NetOne as Postpaid and DataOne as BSNL Broadband.

According to a Telecom Regulatory Authority of India Report, BSNL's 10.21% share of wireless subscribers as on 31st Jan., 2021.

About Brand Equity:

According to the American Management Association, a brand is a name term, sign, symbol or design or a combination of all of them, intended to identify the goods and services of one seller or group of sellers and to differentiate them from those of competition.

The Brand Equity, is defined as the differential effect that brand knowledge has on consumer response to the marketing of the brand. A brand is said to have positive customer based brand equity when the consumers react more favorably to a product and it might result in consumers being more accepting of a new brand extension, less sensitive to increased price and with drawl of advertising support, or more willing to seek the brand in a new distribution channel. On the other hand, a brand is said to have negative customer based brand equity if the consumers react less favorably to marketing activity for the brand compared with an unnamed or fictitiously named version of the product (Keller, 2004).

Customer Based Brand Equity:

The customer based brand equity is clearly based on the several blocks which are mentioned are as under :

1. Salience
2. Performance
3. Imagery
4. Judgement
5. Feeling
6. Resonance

1.Brand Salience:

Brand salience, which relates to aspects of the awareness of the brand. The brand awareness, which refer to, the customer's ability to recall and recognize the brand, as reflected by their ability to identify the brand under different conditions.

2.Brand Performance :

The product itself is at the heart of brand equity , because it is the primary influence on what consumers experience with a brand, what they hear about a brand from others, and what the firm can tell customers about the brand in their communications. Brand performance related to the way in which the product or service attempts to meet customer's more functional needs.

3.Brand Imagery:

Brand imagery, which deals with the extrinsic properties of the product or service, including the way in which the brand attempts to meet customer's psychological or social needs.

4.Brand judgment:

Brand judgment focus on customer's personal opinions and evaluation with regard to the brand.

5.Brand feeling :

Brand feelings are customer's emotional responses and reactions with respect to the brand. Brand feelings also relate to the social currency evoked by the brand.

6.Brand resonance:

Brand Resonance refers to the nature of this relationship and the extent to which customers feel that they are "in sync" with the brand.

2.Literature Review

- Nasir(2013), studied about consumer based brand equity: A verification approach in telecom sector of Pakistan. The purpose of the study is to explore more fields of Customer based brand equity in Pakistan telecom sector. Moreover, an effort was made to view the existence of relationship between the brand equity factors. The questionnaire was distributed among the 315 respondents , out of that 207 were filled. Data was analysed through SPSS and relationship between proposed variables were checked through Structural Equation Modeling (SEM).The finding of the study show a significant positive relationship among perceived quality, brand awareness and brand associations were found to be quite strong while the relationship between these three variables and brand loyalty was relatively weaker. This research study highlights the area where companies should focus to gain a sustainable competitive advantage and also find out the root causes of the factors that weaken the relationship of brand loyalty with other variables.

- Buzdar, Janjua and Khurshid(2016), studied Customer based brand equity & firm's performance in the telecom industry. A self administered survey questionnaire was used to collect empirical data on brand perception along with secondary data on cellular companies performance based on their customer base. The finding reveal strong positive relationship between CBBE & company's performance. The finding of the study assist cellular companies to effective advertising campaign & design customer satisfaction policies & programme.
- Gunawardane(2015), studied on impact of Brand Equity towards purchasing decision: A situation on mobile telecommunication services of Srilanka. The purpose of the study to examine the impact of brand equity in Colombo and Gampaha district. 300 questionnaire were distributed & results gathered from the respondents were analysed in order to get the meaningful conclusion. The hypothesis tested based on the brand equity & purchase intention. There was a strong positive relationship between the brand awareness & perceived quality with purchase intention. Results indicated that brand equity positively influences consumer's purchase intention.

3.Statement of the problem

Now a days, research on customer based brand equity is very important because it helps to retain existing customers and also get better prospects.

In Today's market, due to fierce competition, companies have to focus on the brand equity. Maintaining brand equity is a major task, the company must have to be vigilant to it.

4. Objectives of the study

The research objectives of the study with respect to consumers of BSNL brand are as under:

- To study Saliency of BSNL
- To study Performance of BSNL
- To study Imagery of BSNL
- To study Judgements of BSNL
- To study Feelings of BSNL
- To study Resonance of BSNL

5. Hypothesis of the study

1. There is no significant difference between calculated sample mean and hypothesized population mean of Saliency of BSNL .
2. There is no significant difference between calculated sample mean and hypothesized population mean of Performance of BSNL .
3. There is no significant difference between calculated sample mean and hypothesized population mean of Imagery of BSNL .
4. There is no significant difference between calculated sample mean and hypothesized population mean of Judgement of BSNL .
5. There is no significant difference between calculated sample mean and hypothesized population mean of Feeling of BSNL .
6. There is no significant difference between calculated sample mean and hypothesized population mean of Resonance of BSNL .

6. Research Methodology

Sampling unit	: Respondents from Narmada, Vadodara and Bharuch district.
Sample size	: 100 respondents
Sampling method	: Non probability convenience sampling method
Sources of data	: Primary & Secondary (Primary data through respondents & secondary data through books, websites , etc.)
Data collection method	: Survey
Data collection tool	: Questionnaire
Research design	: Descriptive

7. Limitations

1. The sampling done in this study was non- random sampling due to time and cost constraints. Therefore, the results cannot be generalized to the population.
2. The biasness of consumers in answering the questions might be there because the language of the questionnaire was English with which not all consumers might be comfortable.

8. Data Analysis Tools

t-test

The main objective of taking a sample from a population is to get reliable information about the population. From the information obtained from the sample, conclusions are drawn about the population. This is called statistical inference. It mainly consists of two parts:

1. Estimation of parameter (calculated mean)
2. Test of Statistical hypothesis (hypothesis mean)

That means, a constant obtained from all the observations of population is called parameter population or also called calculated mean.

In order to estimate the parameter of a population a sample is drawn from the population. The constant obtained from a sample is called a statistic or hypothesized population mean. T-Test is applicable for interval data.

Cross-Tabulation with Chi-Square Analysis

The chi-square statistic is the primary statistics used for testing the statistical significance of the cross-tabulation table. Chi-square tests determine whether or not the two variables are independent. If the variables are independent then the results of the statistical test will be non-significant and accept the null hypothesis means there is no relationship between the variables. If the variables are related then the results of the statistical test will be statistically significant and reject the null hypothesis means there is some relationship between the variables.

9. Data Analysis & Interpretation

Profile of the respondents			
Variables		Total No. of respondents	Percentage (%)
Gender	Male	80	80
	Female	20	20
	Total	100	100
Age	Below 18 years	04	04
	18-25 Years	13	13
	26-35 Years	19	19
	36-45 Years	22	22
	46-55 Years	29	29
	55-62 Years	11	11
	Above 62 Years	02	02
Educational Qualification	Up to S.S.C	06	06
	Up to H.S.C	23	23
	Graduate	54	54
	Post Graduate	17	17
Occupation	Students	14	14
	Salaried	33	33
	Businessman	28	28
	Professional	08	08
	Housewife	17	17
Annual Family Income	Below Rs. 1 Lac	03	03
	Rs.100000 To 199999	19	19
	Rs.200000 To 299999	27	27
	Rs.300000 To 499999	41	41
	Rs.500000 To 699999	09	09
	Rs.700000 To 899999	01	01
	Rs.900000 & above	00	00

Objective based data analysis

(Test Value-4)

Sr. No	Objective based Questions	N	Mean	Std. Deviation	Sig. (2-tailed)	95% Confidence Interval of the Difference	
						Lower	Upper
1.	Satisfy the basic need	100	4.43	.728	.000	.29	.57
2.	Basic function	100	4.12	.795	.134	.04	.28
3.	Special feature	100	4.21	.795	.010	.05	.37
4.	Reliability	100	4.18	.770	.021	.03	.33
5.	Satisfying customer's requirement	100	4.01	.643	.877	-.12	.14
6.	Tariff plan of BSNL	100	4.07	.655	.288	-.06	.20
7.	Call charge frequently	100	4.12	.656	.070	-.01	.25
8.	Like, admire & respect the people who use BSNL	100	4.16	.801	.048	.00	.32
9.	Promotional offers of BSNL	100	4.07	.782	.373	-.09	.23
10.	Trust on BSNL	100	4.08	.774	.304	-.07	.23
11.	Understand your needs by BSNL	100	4.09	.712	.209	-.05	.23
12.	Care of customer's opinion	100	4.08	.748	.287	-.07	.23
13.	Admire this brand	100	4.15	.796	.062	-.01	.31
14.	Respect this BSNL	100	4.57	4.053	.163	-.23	1.37
15.	Talk/Recommended about BSNL	100	4.13	.861	.134	-.04	.30
16.	Feeling of fun & excitement	100	4.25	.869	.005	.08	.42
17.	Feeling of social approval/excitement	99	4.18	.952	.060	-.01	.37
18.	Loyal to BSNL	100	4.26	.872	.004	.09	.43
19.	Buy whenever I prefer	100	4.21	.946	.029	.02	.40
20.	Really love & it specially meant for me.	100	4.32	.839	.000	.15	.49
21.	Really like to talk about this brand to other	100	4.28	.726	.000	.14	.42
22.	Interested in knowing more about BSNL	100	4.19	.825	.023	.03	.35

Component wise data analysis

Sr. No.	Component wise analysis	N	Mean	Std. Deviation	Sig. (2-tailed)	95% Confidence Interval of the Difference	
						Lower	Upper
1.	Performance	100	4.1735	.52029	.001	.0703	.2767
2.	Imagery	100	4.2350	1.22980	.059	.0090	.4790
3.	Judgement	100	4.0926	.65287	.159	-.0369	.2221
4.	Feeling	100	4.1900	.79782	.019	.0317	.3483
5.	Resonance	100	4.2133	.66442	.002	.0815	.3451

Inference:

Performance: At 95% confidence level, the significance value is 0.001 and therefore we reject the null hypothesis and accept the alternative hypothesis. Also, the t-value is positive, so we can infer that the customers more than do not greatly agree that they find the performance aspect of the BSNL brand to be favourable.

Imagery: At 95% confidence level, the significance value is 0.059 and therefore we accept the null hypothesis. Therefore, we can infer the target audience members find the brand imagery to be favourable.

Judgement: At 95% confidence level, the significance value is 0.159 and therefore we accept the null hypothesis. Therefore, we can infer that the target audience members exactly agree that they find the judgment output to be favourable.

Feeling: At 95% confidence level, the significance value is 0.019 and therefore we reject the null hypothesis and accept the alternative hypothesis. Also, the t-value is positive, so we can infer that the customers more than definitely not agree that they find the feeling aspect of the BSNL brand to be favourable.

Resonance: At 95% confidence level, the significance value is 0.002 and therefore we reject the null hypothesis and accept the alternative hypothesis. Also, the t-value is positive, so we can infer that the customers more than greatly/definitely not agree that they find the Resonance aspect of the BSNL brand to be favourable.

CROSSTAB

Age * Brand Preference (Specially for me)

Age		Specially for me				Total
		Disagree	Neutral	Agree	Strongly Agree	Disagree
Age < 25	Count	1	0	1	5	7
	% within Age	14.3%	.0%	14.3%	71.4%	100.0%
26 – 35	Count	4	3	13	9	29
	% within Age	13.8%	10.3%	44.8%	31.0%	100.0%
36 – 45	Count	3	1	21	18	43
	% within Age	7.0%	2.3%	48.8%	41.9%	100.0%
< 45	Count	3	3	8	7	21
	% within Age	14.3%	14.3%	38.1%	33.3%	100.0%
Total	Count	11	7	43	39	100
	% within Age	11.0%	7.0%	43.0%	39.0%	100.0%

Inference:

As shown in the above table, the highest percentage of target audience members who feel that this brand is especially for me are between 36 – 45 Years age group.

Chi-Square Test

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	9.447(a)	9	.397
Likelihood Ratio	10.165	9	.337
Linear-by-Linear Association	.220	1	.639
N of Valid Cases	100		

Null Hypothesis: There is no association between the age of target audience members and their feeling that this brand is specially for me / Brand preference.

Alternative Hypothesis: There is association between the age of target audience members and their feeling that this brand is specially for me/ Brand preference.

Here, the Pearson contingency co-efficient value is 0.397 which is greater than the 0.05. So, we accept the null hypothesis. So, there is no association between the age and the feeling that this brand is specially for me/ Brand preference.

10. Findings

The findings of the research are presented below:

1. It was found that the target audience members are fully aware of the BSNL.
2. Majority of the respondents i.e. 41 % are agree that BSNL brand is reliable as compare to others.
3. BSNL satisfies the basic requirement of the target audience members, has specific feature, provide good serviceability, take care about the customer's needs and they also admire and respect the other customers who used BSNL brand.
4. Target audience members agree to recommend BSNL to other target audience members and also agree that BSNL provides the feeling of social and also feeling that this brand is especially for them.
5. Majority of the respondents i.e. 83% have trust on BSNL brand.
6. Majority of the respondents says that maker of this brand always care about their valuable opinion regarding the tariff plan, call charges & services related to the product.
7. Majority of the respondents are strongly agree that BSNL brand gives a feeling of fun and excitement to the customers.
8. Majority of the respondents are agree that BSNL brand gives a feeling of social approval/self respect to their customers.
9. Majority of the respondents really love the BSNL brand and also feel that it's specially meant for them.
10. Majority of the respondents really like to talk about BSNL brand .
11. Target audience members do not agree that they are always interested in knowing more about BSNL.
12. The target audience members perceive that performance component of customer bases Brand Equity is less than favorable.
13. The target audience members perceived that judgment component of C.B.B.E is favourable.
14. The target audience members perceived that imagery component of C.B.B.E is favourable.
15. The target audience members perceived that resonance component of C.B.B.E is less than favourable.

11. Conclusions

- Majority of the customers are happy and excited after purchasing this and also feel that these products are meant for them.
- Most of the customers admire , respect others who use these products and also love this product & suggest others to purchase it.

12. Recommendations

- BSNL should come out with an well planned integrated marketing communication programme to consolidate the current high awareness and to develop increased brand preference.
- The company should focus on performance component of C.B.B.E by providing the good services to their target audience members.
- Innovative ideas can be generated and implemented to build emotional ties with the target audience members.

12.References

Books/Journal:

1. Kotler Philip, 8th Edition, *Marketing Management*, Prentice Hall of India, New Delhi, 1994
2. Cooper, D., Schindler, R., Pamela. S (2003), *Business Research*, Tata McGraw- Hill, New Delhi
3. Keller, K. L. (2004), *Strategic Brand Management*, Pearson, New Delhi.
4. Nargundkar, R. (2005), *Marketing Research*, Tata McGraw-Hill, New Delhi.
5. Nasir, R.U. (2013), Customer based brand equity: A verification approach in telecom sector of Pakistan, *Scholarly journal of Business Administration*, Vol.3(3), pp.-60-66
6. Buzdar, M.F., Janjua, S.Y and Khurshid, M.A, (2016), 'Customer based brand equity & firm's performance in the telecom industry', *International journal services & operations management*, Volume 25, No.-3, May 2016, pp.- 334-346
7. Gunawardane, N.R (2015), 'Impact of Brand Equity towards purchasing decision: A situation on Mobile Telecommunication service of Srilanka', *Journal of Marketing Management*, Volume 3, No.-1, June 2015, pp.- 100-117

Websites:

8. <https://business.mapsofindia.com/communications-industry/companies/>
9. https://en.wikipedia.org/wiki/Telecommunications_in_India
10. <https://www.ibef.org/industry/telecommunications.aspx>
11. <https://telecomtalk.info/history-of-indian-telecommunication/67789/>
12. <http://www.technofunc.com/index.php/domain-knowledge/telecom-industry/item/history-of-telecommunications-industry>
13. <https://www.ibef.org/download/Telecommunications-Report-Feb-20181.pdf>
14. <https://traf.gov.in/sites/default/files/TRAI-Annual-Report%20English%29%3D01042015.pdf>
15. https://en.wikipedia.org/wiki/Telecommunications_in_India
16. https://en.wikipedia.org/wiki/Bharat_Sanchar_Nigam_Limited

17. <https://www.qualtrics.com/au/experience-management/research/cross-tabulation/?rid=ip&prevsite=en&newsite=au&geo=IN&geomatch=au>
18. <https://www.indiatoday.in/business/story/telephone-broadband-landline-subscribers-airtel-jio-vodafone-january-trai-1780622-2021-03-18>
19. https://traf.gov.in/sites/default/files/PR_No.27of2021.pdf
20. <https://www.ibef.org/industry/telecommunications.aspx>

