

CUSTOMERS' ATTITUDE TOWARDS SERVICE ASPECTS OF DOMESTIC PURIFIERS IN MADURAI

Dr. K. Jeyakodi

PG & Research Department of Commerce, SN College, Madurai

Abstract

Water is critical for many aspects of life such as economic growth, environmental stability, bio-diversity conservation, food security and health care. In most cases there is no substitute for water. An energy resource can be replaced by another but water as a resource is irreplaceable.

Customer satisfaction is a key to building profitable relationship with consumers to keeping and growing consumers and keeping their customer life time value. Satisfied customers talk favourably to others about the product. After sales service satisfy the customer and retains the customer. The subject matter covered under after sales service include instructions at the time of installation, period of warranty, coverage under warranty, free services availed of during the warranty period, annual maintenance contract, services covered in AMC, time taken to attend service, AMC amount per annum, cost of spares for AMC customers, cost of transportation for AMC customers, service charges for non-AMC customers and cost of spares for non-AMC customers.

Warranty covers both service and components for majority (90%) of the respondents. Only 18 per cent of the respondents entered into the AMC after the warranty period. It has been a known fact that the amount spent for the maintenance of the branded water purifier is considerably different from the amount spent for the maintenance of the assembled water purifier.

Introduction

Water purification is the process of removing undesirable chemicals, materials and biological contaminants from contaminated water. The goal is to produce water fit for a specific purpose. Largely, water is purified for human consumption; however, water purification may also be designed for a variety of other purposes including meeting the requirements of medical, pharmacology, chemical and industrial applications. Customer satisfaction is a key to building profitable relationship with consumers-to keeping and growing consumers and keeping their customer lifetime value.ⁱⁱ Satisfied customers talk favourably to others about the product. After sales service also forms customer satisfaction.

Statement of the Problem

Consumer Behavior involves the thoughts and feelings people experience and the actions they perform in the consumption process. It also includes all the actions in the environment which influence the thoughts, feelings and actions. These include comments from other consumers, advertisements, price information, packaging, product appearance and many others. Consumer behaviour is dynamic, involves interactions and involves exchanges.

The water purifier comes under health care products. It is like any other marketable product. This product is of a commercial nature. It is necessary for the manufacturers and dealers understand the nature of the customers, their requirements and the quality of water in the different areas, so that it is possible to offer water purifiers with different technology and varying price ranges. With increase in competition, it becomes very crucial to understand the behaviour of the consumers.

Water purification systems are sold faster with each passing year and will continue to do so. To what extent the water purifiers offered by the various water purifier manufacturers and dealers and the after sales service provided satisfy the consumers are considered as the crux of the problem. In this context, an attempt has been made to study the consumer behaviour towards domestic water purifiers in Madurai city.

Objective

The specific objective of this article is to elicit the consumers' opinion on the usage of the water purifier and after sales service.

Methodology

The study is an empirical research based on the survey method. The primary data were collected directly from the users of water purifiers through an interview schedule. The population size was roughly estimated as ranging from 25000 to 30000. The optimal sample size was determined as 380 for the population range of 25000 to 30000, the confidence interval of 95 per cent and the level of significance 5 per cent.

Madurai city has 100 wards within the jurisdiction of four zones. The wards which had a minimum of 50 customers were shortlisted. It was found that 56 wards out of the 100 wards satisfied this criterion. One respondent was selected at random from each of these 56 wards. Information was collected from 392 respondents through an interview schedule and out of this 12 respondents who showed inconsistency in their responses were not considered. Responses obtained from 380 respondents were considered for further analysis.

Instructions at the Time of Installation

Table 1 Instructions at the Time of Installation

Sl. No.	Nature of Instructions	Instructions Given	Instructions Not Given	Total
1.	User Instructions	380 (100.00)	0 (0.00)	380 (100.00)
2.	Technical Details	225 (59.21)	155 (40.79)	380 (100.00)
3.	Replacement Details	316 (83.16)	64 (16.84)	380 (100.00)
Note: Figures in parenthesis represent percentage				

Consumers are able to make an efficient use of the water purifier if they are provided with the required user instructions, technical details like the stages of purification and function of each stage and replacement instructions. Table 1 shows the information about instructions provided to the respondents.

It is seen from Table 1 that all the respondents are provided with user instructions. 59.21 per cent of the respondents have expressed their opinion that technical details were given by the service person at the time of installation. 16.84 per cent of the respondents have given their view that the service person failed to explain the need for replacement of filters.

Period of Warranty

Table 2 Period of Warranty

Sl. No.	Period	No. of Respondents	Percentage
1.	1 year	347	91.32
2.	2 years	33	8.68
Total		380	100.00

Sellers of any product provide warranty for the products sold by them. Table 2 gives the period of warranty provided to the consumers of water purifiers.

It is seen from Table 2 that one year warranty is availed of by 91.32 per cent of the respondents and two years warranty is availed of by 8.68 per cent of the respondents.

Coverage under Warranty**Table 3 Coverage under Warranty**

Sl. No.	Coverage	No. of Respondents	Percentage
1.	Service	36	9.47
2.	Components & service	344	90.53
Total		380	100.00

The warranty given to customers includes only service or both components and service. Table 3 shows the coverage

under warranty.

It is seen from Table 3 that dealers provided only service warranty to 9.47 per cent of the respondents. They have to pay for the cost of spares even during the warranty period. The warranty covers both service and components for 90.53 per cent of the respondents.

Free Services Availed of during the Warranty Period**Table 4: Free Services Availed of during the Warranty Period**

Sl. No.	Number	No. of Respondents	Percentage
1.	Up to 3	108	28.42
2.	4 to 6	207	54.47
3.	Above 6	65	17.11
Total		380	100.00

During the period of warranty free services are provided to the consumers. Table 4 shows the number of free services provided during the warranty period.

It is seen from Table 4 that 28.42 per cent of the respondents availed of up to three free services. 54.47 per cent of the respondents availed of four to six free services. 17.11 per cent availed of more than 6 services.

Coverage of Components for Water Purifiers**Table 5: Coverage of Components for Water Purifiers**

Sl. No.	Type of Water Purifier	Components Covered	Components Not Covered	Total
1.	RO Water Purifier	296 (99.33)	2 (0.67)	298 (100.00)
2.	UV Water Purifier	39 (100.00)	0 (0.00)	39 (100.00)
3.	UF Water Purifier	0 (0.00)	34 (100.00)	34 (100.00)
4.	Combined Technology Water Purifier	9 (100.00)	0 (0.0)	9 (100.00)
Note: Figures in parenthesis represent percentage				

Many dealers of RO and UV water purifiers replace components during the period of warranty. Table 5 gives the coverage of components for water purifiers during the warranty period.

It is seen from Table 5 that out of 298 respondents owning RO water purifiers, components are covered for 99.33 per cent of the respondents.

Components are covered for UV water purifiers. Components are not covered for UF water purifiers. Components are covered in the case of purifiers with combined technology.

Annual Maintenance Contract (AMC) after Warranty Period

Table 6 AMC after Warranty Period

Sl. No.	AMC	No. of Respondents	Percentage
1.	AMC	68	17.89
2.	Non-AMC	269	70.79
3.	Not Applicable	43	11.32
Total		380	100.00

Purchasers of water purifiers are provided an option to enter into AMC after the warranty period. The AMC covers only service or both service and components. Table 6 gives the number of

respondents who entered into AMC after the warranty period.

It is seen from Table 6 that, 17.89 per cent have entered into the AMC after the warranty period and 70.79 per cent did not enter into the AMC. The option of the AMC is not applicable to 11.32 per cent of the respondents as the period of usage does not exceed 12 months.

Services Covered in AMC

Table 7: Services Covered in AMC

Sl. No.	No. of Services	No. of Respondents	Percentage
1.	Two	25	36.77
2.	Three	4	5.88
3.	Four	39	57.35
Total		68	100.00

Dealers provide two services in the case of the UV water purifiers. Three to four services are provided in the case of the RO water purifiers depending on

the terms of the dealers. The number of services covered in the AMC is presented in Table 7.

It is seen from Table 7 that out of 68 AMC customers, 36.77 per cent have stated that two services are covered in the AMC. The AMC covers three services in the case of 5.88 per cent of the respondents and it covers four services in the case of 57.35 per cent of the respondents.

Time taken to attend the Service

Table 8: Time taken to Attend Service

Sl. No.	Time	No. of Respondents	Percentage
1.	Within 12 hours	138	36.32
2.	Within 24 hours	158	41.58
3.	Within 48 hours	42	11.05
4.	More than 2 days	42	11.05
Total		380	100.00

Customers of any product expect prompt after sales service. Table 8 gives the time taken to attend the service.

It is seen from Table 8 that 36.32 per cent of the respondents have expressed their opinion that service personnel attend service within 12 hours of making a call. 41.58 per cent have stated that services are attended within 24 hours. 11.05 per cent have given their view that services are attended within 48 hours. 11.05 per cent have expressed their dissatisfaction that the service personnel take more than two days to attend service.

AMC Amount per annum**Table 9 AMC Amount per annum**

Sl. No.	Amount p.a.	No. of Respondents	Percentage
1.	Up to Rs. 1000	22	32.35
2.	Rs.1001 to Rs. 2000	23	33.83
3.	Rs. 2001 to Rs. 3000	5	7.35
4.	Rs. 3001 to Rs. 4000	18	26.47
Total		68	100.00

Table 9 gives the AMC amount per annum charged to the AMC customers.

It is seen from Table 9 that 32.35 per cent have paid AMC amount up to Rs.1000 p.a. and 33.83 per cent have

paid Rs.1001 to Rs.2000 p.a. The AMC amount of 7.35 per cent of the respondents ranges from Rs.2001 to Rs.3000. 26.47 per cent of the respondents pay Rs.3001 to Rs.4000 as the AMC amount.

Cost of Spares for AMC Customers**Table 10: Cost of Spares for AMC Customers**

Sl. No.	Cost of spares p.a.	No. of Respondents	Percentage
1.	Up to Rs. 600	4	25.00
2.	Rs. 601 to Rs. 1200	6	37.50
3.	Above Rs. 1200	6	37.50
Total		16	100.00

In general, the AMC covers both service and spares. A few dealers cover only services or services and pre filter in the AMC. Table 10 shows the cost of spares for

the AMC customers.

It is seen from Table 10 that out of 68 respondents, 42 respondents do not pay separately for spares. AMC covers both services and spares. In the case of 16 respondents, AMC covers only service charges and in some cases it covers pre filter. Out of the 16 respondents, 25 per cent have incurred up to Rs.600 for spares, 37.5 per cent have spent Rs. 601 to Rs. 1200 towards spares for one year and 37.5 per cent have paid above Rs.1200 for spares. The average amount spent by the AMC customer for one year is Rs. 2117.06.

Cost of Transport for AMC Customers

All the respondents have expressed their opinion that the service personnel do not charge separately for transportation expenses.

Service Charges for Non-AMC Customers**Table 11 Service Charges for Non-AMC Customers**

Sl. No.	Service charges p.a.	No. of Respondents	Percentage
1.	Up to Rs. 300	178	66.17
2.	Rs. 301 to Rs. 600	85	31.60
3.	Rs.601 to Rs. 900	2	0.74
4.	Above Rs. 900	4	1.49
Total		269	100.00

The Non-AMC customers have to pay service charges every time they call the service personnel after the warranty period. Table 11 discloses the service charges for Non-AMC

customers.

It is seen from Table 11 that out of 269 Non-AMC customers, 66.17 per cent have incurred up to Rs.300 as service charges. 31.60 per cent have paid Rs. 301 to Rs.600 as service charges. Only 0.74 per cent has paid Rs.601 to Rs.900 and only 1.49 per cent has spent more than Rs.900 for servicing the water purifier.

Cost of Spares for Non-AMC Customers**Table 12: Cost of Spares for Non-AMC Customers**

Sl. No.	Amount spent p.a	No. of Respondents	Percentage
1.	Up to Rs. 1000	143	53.16
2.	Rs. 1001 to Rs. 2000	97	36.06
3.	Rs. 2001 to Rs. 3000	20	7.43
4.	Above Rs. 3000	9	3.35
Total		269	100.00

All Non-AMC customers have to pay for the cost of spares other than service charges. Table 12 gives the cost of spares for Non-AMC customers.

It is seen from Table 12 that 53.16 per cent of the respondents have paid up to Rs.1000 as cost of spares. 36.06 per cent have incurred Rs.1001 to Rs.2000 towards cost of spares. 7.43 per cent have paid Rs.2001 to Rs.3000 as cost of spares for one year. Only 3.35 per cent have spent more than Rs. 3000 for spares. The average amount spent by a Non-AMC customer for one year is Rs.1554.76.

Cost of Transport for Non-AMC Customers

All the Non-AMC customers are not charged separately for transportation expenses. It is included in service charges.

Comparison of Amount Spent for Maintenance by Owners of Branded and Assembled Water Purifiers**Table 13: Comparison of the Amount Spent for Maintenance by Owners of Branded and Assembled Water Purifiers**

Variable	Mean	Standard Deviation	t	df	p
Amount spent for maintenance			4.2 ^a	291.2 ^a	0.000
Branded	1717.16	1200.45			
Assembled	1274.36	775.65			

To determine whether there is a significant variation in the amount spent for the maintenance of the branded and the assembled water purifiers, independent samples 't' test has been applied. The results of the 't' test are presented in Table 13.

- a. Levene's F is statistically significant ($\text{sig} \leq 0.05$), the variances are significantly different and the assumption of equal variances is violated. Hence t and df were adjusted.

It is seen from Table 13 that the average amount spent for maintenance by owners of branded water purifiers is Rs.1717.16 and the amount spent for maintenance by owners of assembled water purifiers is Rs.1274.36. The amount spent for the maintenance of the branded water purifier is significantly different from the amount spent for the maintenance of the assembled water purifier ($p < 0.05$).

Conclusion

The warranty covers both service and components for 90.53 per cent of the respondents. 17.89 per cent of the respondents have entered into the AMC after the warranty period. The amount spent for the maintenance of the branded water purifier is significantly different from the amount spent for the maintenance of the assembled water purifier.

References

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