

# Measuring the Psychological Behavior of Consumers for Medical Services

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**Abstract-** Consumer organizations such as Consumers Union, Medical Organization can design program or medical aid campaign to help consumers select options that will provide optimal health and financial outcomes to fitness and health care so that Consumers can have information about medical care as well as financial solutions to acquire fitness and health care. The objective of the research is to understand Psychographic aspect of Consumer Behavior for health services and accordingly effort to understand how proactive behavior can be inculcate amongst consumers. Data was collected from primary source which are Medical Practitioners, Medical Representatives and Patients. Research method is adaptive as it tries to influence present psychographic consumer behavior towards health and fitness and to measure responses likert scale is used. To do optimal health and financial outcomes to fitness the research method is both Qualitative as well as Quantitative. Structured and unstructured questionnaires are used for all primary sources and for measuring some responses tabulations are graphed for conclusive and descriptive findings. Consumers confidently choose products that provide the best value for the money. When it comes to choosing medicines and care, they often find themselves confused. This research has contributed in two ways, one to know consumer behavior for health services for medical service providers so that they can develop communication programs and secondly consumer awareness regarding medical care and financial aid.

**Keywords:** Consumer Behavior; Psychographic; Optimal Health; Financial Outcome

## Introduction

Under Social utility Health centers have to know Psychographic aspects which include Consumer's Motive, Need, Learning, Perception and attitude which however can bring proactive behavior for understanding health's significance and as an outcome our society can move to achieve better health [1]. Under commercial utility, health centers can learn better communication program which can direct consumers towards them as well as they can know the market of medical aid. Health centers have to know the demographic which too is responsible to establish a kind of consumer behavior as it is affected by age, income level, education, and living standard. Demographic evaluation will not only result in defining consumer age, income level but also consumer purchase behavior which is based on convenience of location [1]. Therefore this research will bring observatory report for commercial act for the health centers to create awareness of wellbeing and can derive optimum revenue too. Figure 1 shows the list of concepts that have been used to elaborate the purpose of the study:

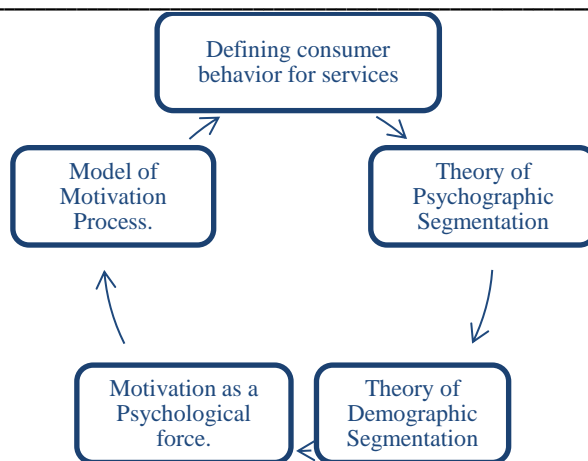


Figure 1.Theoretical Concepts of the study [1]

### 1.1 Purpose of the Study

The objective of the research is to understand Psychographic aspect of Consumer Behavior for health services and accordingly effort to understand how proactive behavior can be inculcated amongst consumers for health and fitness. This research will deal with trivial health issues which when not cared due to kind of behavior give serious outcome, however, this study will also help medical service providers to know consumer behavior for their service thereafter they can also get an aid to design communication Strategy [1,2]. Rising standard of living has brought about development in the personal care services helping a customer to be well groomed. These services are offered by the health care and fitness centers. For the purpose of this study to define CB for health services consumer behavior will be known under following criterion shown in figure 2.

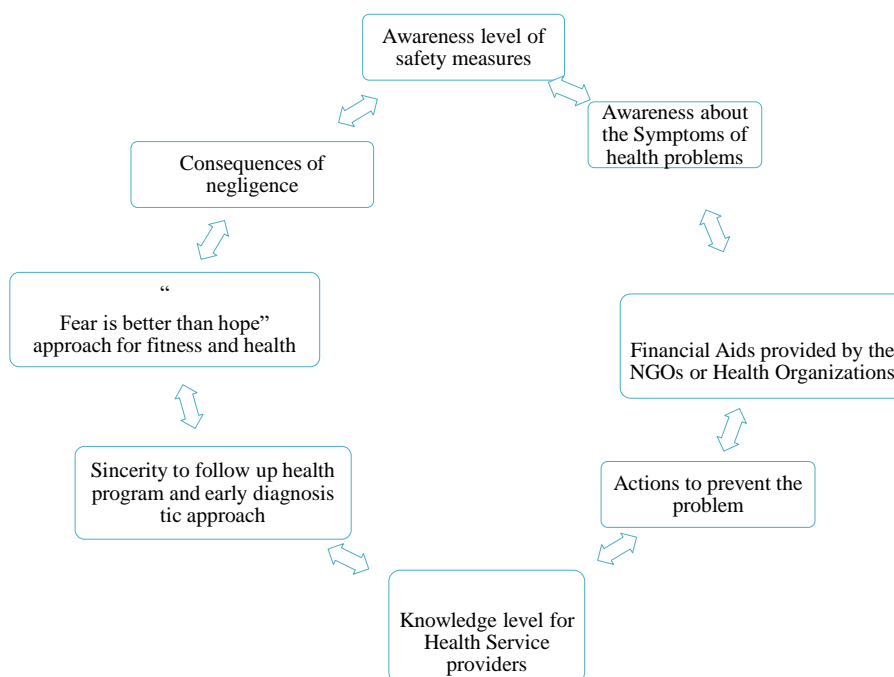


Figure 2. Concepts of Consumer Behavior for Health Services [1,2]

### 1.2 Scope of the Study

The approach of this study will help Health center to understand CB for health services so that they can earn social as well commercial utility.

Under Social utility Health centers have to know Psychographic aspects which include Consumer's Motive, Need, Learning, Perception and attitude which however can bring proactive behavior for understanding health's significance and as an outcome our society can move to achieve better health.

Under commercial utility, health centers can learn better communication program which can direct consumers towards them as well as they can know the market of medical aid.

Also health centers have to know the demographic which too is responsible to establish a kind of consumer behavior as it is affected by age, income level, education, and living standard. Demographic evaluation will not only result in defining consumer age, income level but also consumer purchase behavior which is based on convenience of location. Therefore this research will bring observatory report for commercial act for the health centers to create awareness of wellbeing and can derive optimum revenue too.

### Literature Review

American Academy of Dermatology identify Organization Behavior’s “US trends in lifestyles are a shift towards personal independence and individualism and a preference for a healthy, natural lifestyle” For which they join specialty clinics such as skin care clinics and regular visit to dietician. Lifestyles are the consistent patterns people follow in their lives. For example “Healthy and Balanced Food for a Healthy Lifestyle.”

CVS Caremark Corp talks in almost every sector of the economy, consumers confidently choose products that provide the best value for the money. But when it comes to choosing medicines, they often find themselves adrift amid confusing products, marketing claims and opaque pricing points, a situation that doesn't always lead to the best or certainly the least expensive therapies. Consumer organizations such as Consumers Union are designing programs to help consumers select options that will provide optimal health and financial outcomes. Consumers have a need for impartial information about their drug options, John Santa, M.D., director of the Health Rating Center for Consumer Reports Health, said at a March 17 press conference on Capitol Hill [2].

Thomson Reuters analyzed consumer data from our PULSE Healthcare Survey. Current recession has caused concern for hospitals, but how it is impacting consumer healthcare attitudes, and use 100,000 households participate in this nationally representative Study. The study has nine waves<sup>1</sup> covering more than 80 healthcare topics, including health status, *Psychology of consumer for fitness and health*, insurance coverage, physician and ambulatory care services, hospital inpatient services, health behaviors and attitudes, and current healthcare topics and issues. This study focuses on PULSE consumer data collected between January 2006 and February 2009. Ann Arbor, MI April 20, 2009 – *Psychology of consumer for health and fitness* defines delays and cancel behavior for following health reasons.

Table 1. Reasons for delays for fitness and health [2]

Reasons for delays in diagnosis and treatment
Delay or cancel healthcare treatment for a child under the age of 15.
Delay or cancel therapy such as physical therapy, rehabilitation therapy, and respiratory therapy.
Delay or cancel an elective surgical procedure such as LASIK eye surgery or plastic/cosmetic surgery.
Delay or cancel a diagnostic test such as blood work, x-ray, mammogram, etc.
Delay or cancel a doctor visit for treating a minor illness or injury such as flu, earache, sprained ankle.
Delay or cancel a routine doctor visit such as an annual physical

*Thomson Reuters Study Finds More Patients Postponing Medical Care Due to Cost.*

Science Daily identifies consumer behavior for health services in Indian Context in Lower public strata and defines ways to provide and communicate lower public costs for social services by improving children’s long term welfare, such as pulse polio program, measures against weight loss amongst children, and malnutrition, etc.

Journal of Science Daily talk of the latest research on what motivates people to buy, how brand names affect the brain, Fitness, Gene Therapy, and Heart Disease [2].

Journal of Science Daily Fear of looking unattractive can be a stronger motivation for keeping people going to the gym than the hope of Racial Issues in Perception in Consumer Behavior. *Info Shop study says*, Active consumer is alive, well, affluent and spending money on fitness-related service, this section of the report analyzes the consumer behavior of Fit Consumers.

*Sb* Information explains buying resistance problem begins with understanding how consumers or companies make buying decisions in free educational fitness seminar.

*US Penguin Group* develops an intuitive understanding of consumer behavior and marketing strategies to flaunt and fake their biological fitness under the prospects for survival [2, 3].

In Indian Context, published by Pearson Education Singapore Ltd in the urban area, there has been a growing awareness about health and fitness Behavior.

*Scrib Indian Consumer outlook* talks about fitness amongst youth in India, and the psychological characteristics in the context of Indian consumer behavior “Service quality is fitness for use [2,3].

### Discussion

#### 3.1 Details of Hypothesis

Detail definition of the terms through secondary data and understanding stipulations under health services has been accounted. Consumer psychology is the study of the dynamics underlying consumer behavior specifically concentrating on the use of psychological concepts and methods to explain predict and influence behavior (Assail, 1992). Table 2 presents the four consumer psychological models used for this study.

Table 2. List of Consumer Psychological models [3-6]

Learning Model
The Dynamics of Motivation: Types and Systems of Need- Maslow’s Need Hierarchy
Personality and Consumer Behavior: Brand Personality and Understand Consumer Diversity and Consumer Imagery.
Consumer Learning For Services and Behavioral Learning Theories

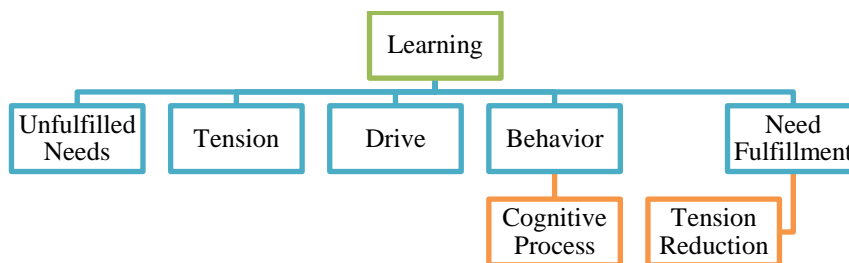


Figure 3. Learning Model of Consumer Psychology [3-6]

Figure 4. shows the Dynamics of Motivation as types and systems of need explained by Maslow’s Need Hierarchy. This is the second hypothesis for consumer psychology.

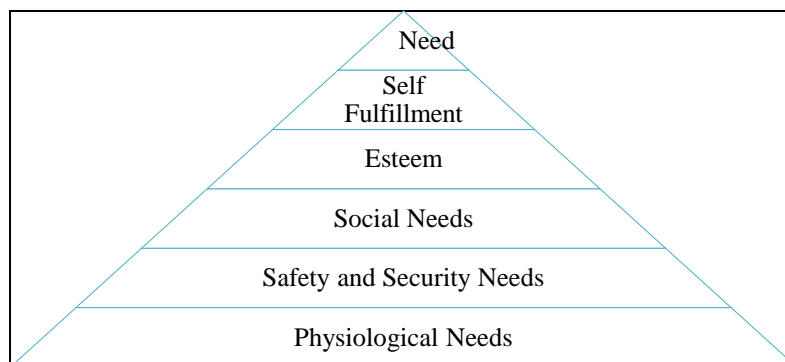


Figure 4. Maslow’s need Hierarchy [3-6]

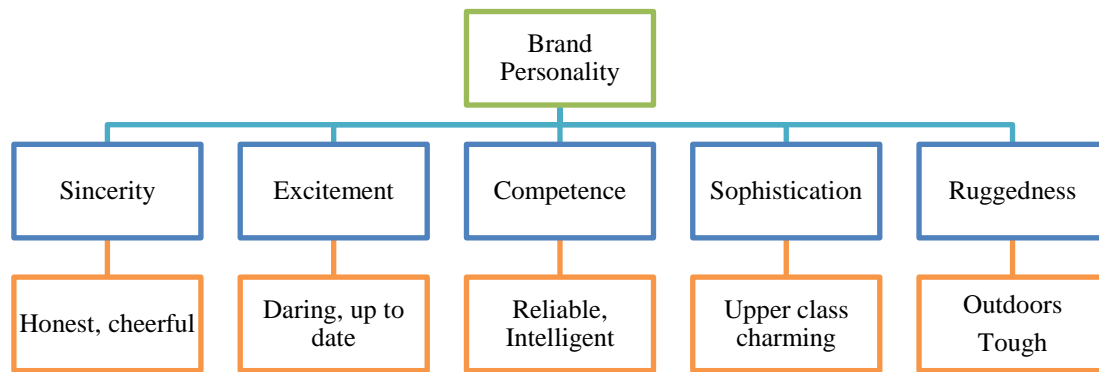


Figure 5. Personality and Consumer Behavior: Brand Personality and Understand Consumer Diversity and Consumer Imagery. [3-6]

Table 3. Consumer Learning For Services and Behavioral Learning Theories [3-6]

Promotional Modal	Tri component Model	Decision making Model	Innovation Adoption model	Innovation Decision Process
Attention	Cognitive	Awareness Knowledge	Awareness	Knowledge
Interest Desire	Affective	Evaluation	Interest Evaluation	Persuasion
Action	Co native	Purchase Post purchase evaluation	Trial Adoption	Decision Confirmation

### 3.2 Research Methodology

Since the research was Descriptive in nature, Qualitative approach was applied. Research methodology was systematic gathering, recording and analyzing of data about the Psychological approach to consumer behavior for health services.

From this explanation the scope of this research was in two ways [4]:

- a. Planning
- b. Interpreting

The study design consisted of taking a cross-sectional view from both stakeholders– doctors and patients about healthcare delivery and utilization.

The medium used was a questionnaire designed on the Likert scale and Servqual 5 dimensions were considered for designing the questions. The questionnaire was administered via internet and telephonic interview. For the purpose of this study 25 direct consumers (patients) and 50 persons related to the consumers were interviewed. 25 healthcare providers were included in the study.

### 3.3 Research Design

There can be many types of research design but broadly there are three [4]:

- a. Descriptive
- b. Experimental
- c. Quasi- Experimental

Research design for this study was Descriptive as descriptive design describes phenomenon without establishing association between factors such as behavioral variables and situational variables existed or forthcoming. Therefore, the study demands for descriptive research design which were intended to produce accurate descriptions of variable relevant to the decision being faced, without demonstrating that some relationship exists between variables only.

Perception measurement was done through Servqual Scale which measured the gap between Customer expectations of services and their perception of actual services.

This scale is based on 5 dimensions-Reliability, Responsiveness, Assurance, Empathy and tangibility. Further Likert Scale was used to scale the respondent from extreme range like strongly agree to strongly disagree.

Data types are nearly innumerable which can be obtained according to the nature of study which is given in the figure 4.

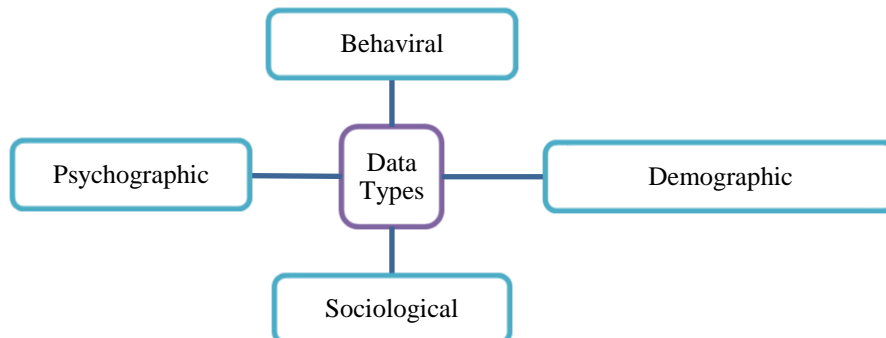


Figure 6. Data types for Consumer Behavior [4, 5]

In this study demographic and psychographic factors are used in particular and following aspects were covered, Table 4 and 5 show the factors covered in both the segmentations.

Table 4. Demographic segmentation [4]

Gender
Marital Status
Age
Educational Level
Occupation
Income Level

Table 5. Psychological segmentation [5]

Knowledge
Opinions
Intentions
Motives

### 3.4 Consumer Research Process

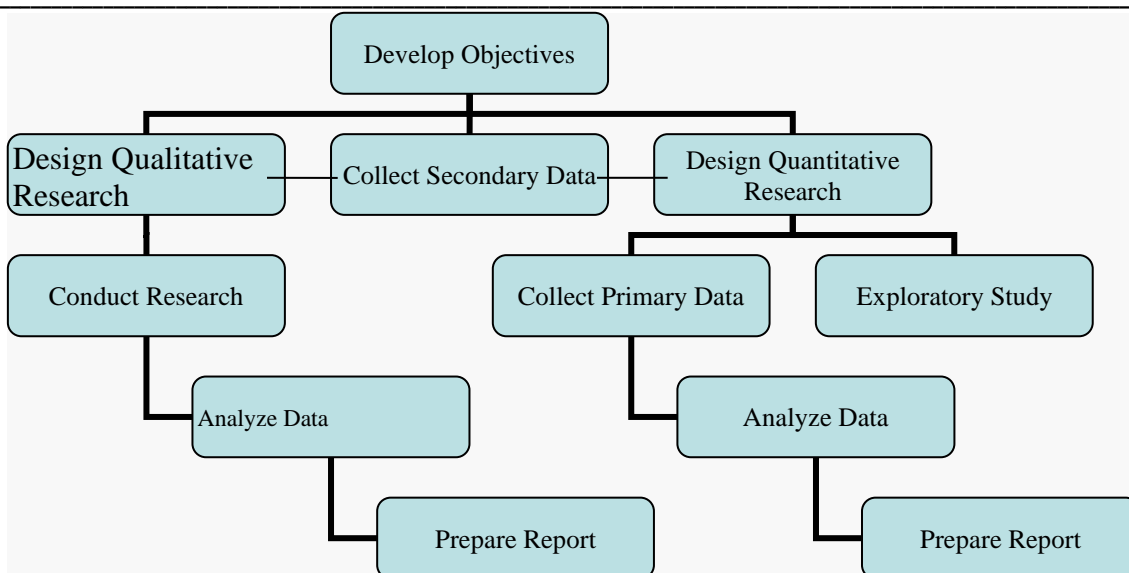


Figure 7. Consumer Research Process [4,5]

### 3.5 Data Types

We have used primary as well as secondary data to file results. In Primary Data the Data was collected from primary source which were Medical Practitioners, Medical Representatives and Patients. Research method was adaptive as it tried to influence present psychographic consumer behavior towards health and fitness and for measuring responses likert scale was used. To evaluate optimal health and financial outcomes to fitness the research method only used was Qualitative Approach. Structured and Unstructured questionnaires were used for all primary sources and for measuring some responses tabulations are graphed for conclusive and descriptive findings were also prepared. This data was collected according to following categories:

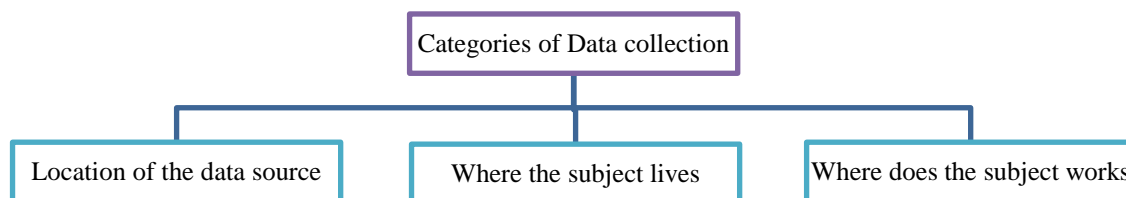


Figure 8. Data Category [5-7]

For the purpose of this study following media was used to collect data and figure 7 shows the list of media.

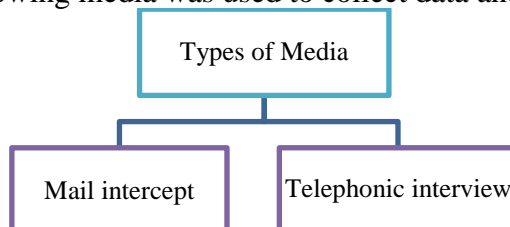


Figure 9. Media Selection and Communication Approaches [6,7]

Questions were both close and open ended as research object was descriptive. For Secondary Data collection sources considered in this study were Information extracted from consumer behavior books for services, journal, periodical, newsletters, and magazines. More information about secondary data is given in bibliography.

### 3.6 Scaling Method for this Study

For the purpose of demographic information six different close ended questions were asked and for detailed information five open ended questions were asked which gave a chance to the respondents to explain her opinions and awareness on fitness issue.

For measuring Consumer perception and expectation for service of quality for health care and fitness Servqual 5 dimensions were measured under 21 Questions which were closed ended, 5 points likert scale ranging from Strongly Disagree 1 to Strongly Agree 5 was used for investigating results. Perception was measured through Servqual Scale; this measured the gap between Customer expectations of services and their perception of actual services. This scale is based on 5 dimensions-Reliability, Responsiveness, Assurance, Empathy and Tangibility.

Lastly Likert Scale was used to measure range of responses from Strongly Agree and Strongly Disagree. Table 6 shows the dimensions and statements measured by Servqual Dimensions in Likert Scale

Table 6. Dimensions of Measurement

Dimension	Statements Pertaining to Dimension
Tangible	1-4
Reliability	5-8
Responsiveness	9- 12
Assurance	13-16
Empathy	17-21

There are many factors that can influence desired and predictive Medical services for consumers, these factors are shown in figure 8 [7-9].

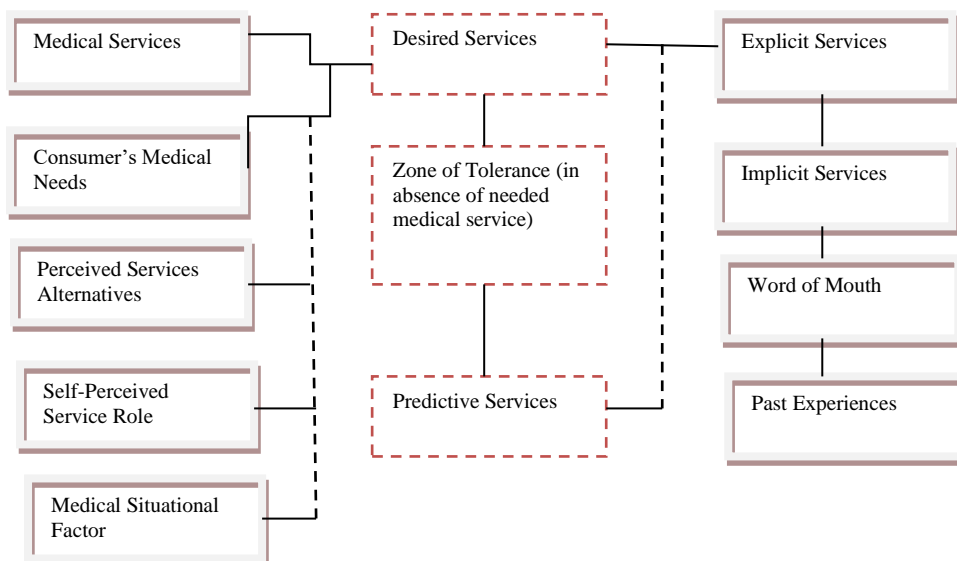


Figure 10. Factors for Medical Services for Consumers [7-9]

Table 7 shows the list of questions pertaining to personal information where consumers were asked to cross or tick to present their data for their demographic profile.

Table 7. Questionnaire for Demographic information

Please Specify your Gender	Male	Female		
Please specify your marital status	Single	Married		
Please indicate your age category	Below 24	25-34	35-45	45 and above



What is your highest level of qualification	Intermediate	Graduation	PG	Doctorate
Please specify your monthly income level	<10000	<15000	<200000	<50000
What is your occupation	Doctor	Teacher	Entrepreneur	Others

Some Open ended questions were also asked to analyze psychological behavior of consumers; Table 8 shows the list of these questions.

Table 8. Open ended Psychological Questionnaire

Do you think health related issues are concern of security need and should be dealt urgently? For Yes or No Give reasons for your answer.
Why do you think it's important to receive treatment in specialized health care centers?
What are the motivating features you look for in health care centers?
What kind of health awareness program you think is the best from health care organization to inform on important issues related to fitness and health?
What is the best media for health awareness program that health care organization can opt for and why?

For the purpose of the study closed ended questions were also asked from the consumers for psychological behavior for fitness and health. Consumers were asked to answer questions for five factors such as tangibility, Reliability, Responsiveness, Assurance and Empathy under psychological behavior, table 9 shows the questions on all these factors [10,11]. Consumers were asked to rate on 7 scale from strongly disagree to strongly agree for measuring expected value and real value for all the five factors.

Table 9. Questions that measured psychological particulars [10, 11]

Factors	Related Query	Expected level							Actually Received						
		Strongly Disagree --- --Strongly Agree							Strongly Disagree --- -- Strongly Agree						
Tangible	Excellent Health Care Centers have Modern investigating machine.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Physical Amenities of health care are excellent and appealing to consumer mindset.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff is neat and good in appearance.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Equipment associated to the service such as cardio and weight training equipment	1	2	3	4	5	6	7	1	2	3	4	5	6	7
Reliability	Excellent Health Care org provide membership that makes medical facility easy and cheaper to purchase.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff are responsive to customers complaints	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff are prepared for Emergencies	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Health Care Org Offer prompt service to its members	1	2	3	4	5	6	7	1	2	3	4	5	6	7
Responsiveness	Medical Staff offer exact consultation to the customers as per their health related need.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Child Minders in excellent health care interact and play with children as a part of Health Care USP	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff are always willing to help	1	2	3	4	5	6	7	1	2	3	4	5	6	7

	Medical Staff are professions and trained while dealing health related issues.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
Assurance	Medical Staff instill confidence in consumers.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Centers provide secure and safe facilities to consumers	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	As a part to offer concession to Health care members offer moderate membership fees.	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff Have Professional Knowledge	1	2	3	4	5	6	7	1	2	3	4	5	6	7
Empathy	Medical Staff show interest in consumer's improvement	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff give individual attention	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Health Care Org provide members social opportunity as part of Medical USP	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Medical Staff Understands the specific needs of all consumers	1	2	3	4	5	6	7	1	2	3	4	5	6	7
	Health Care center have 24 hrs operating services.	1	2	3	4	5	6	7	1	2	3	4	5	6	7

### Results

4.1 Demographic Findings: From figures 9 to 13 show the demographic results, this information was important to understand the profile of consumers and then to analyze their psychological response to health and fitness. Our respondents were more from female groups and they were found extra careful for their fitness than of other medical related issues and they were found spending on keeping fitness plan.

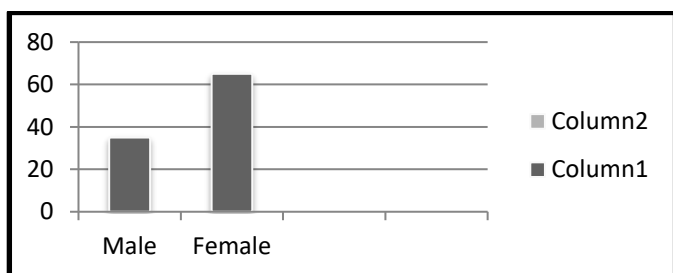


Figure 9. Gender Information

Young age groups show good response to fitness and medical services than of middle aged groups.

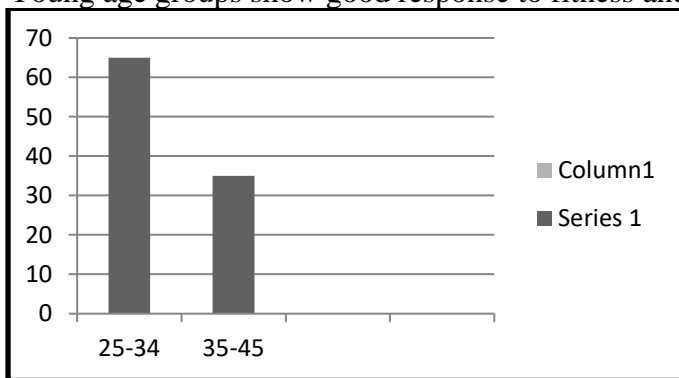


Figure 10. Age Category

Usually it is assumed that people from educated class and good income groups will not delay the health related issues and give extra care to their fitness. One strange result was noticed that groups from social science or academics were found to be using more of fitness and medical services than of medical professionals although reasons for these results were not known.

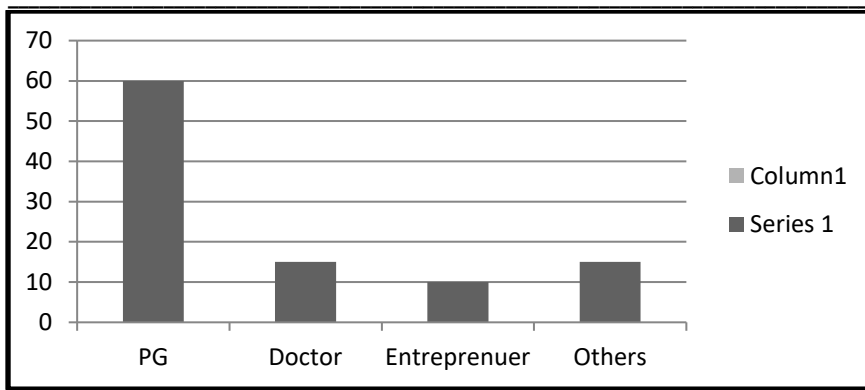


Figure 11. Level of Education

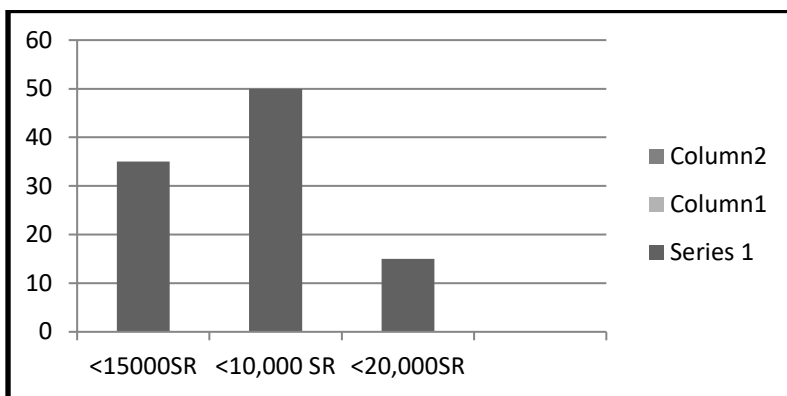


Figure 12. Monthly Income

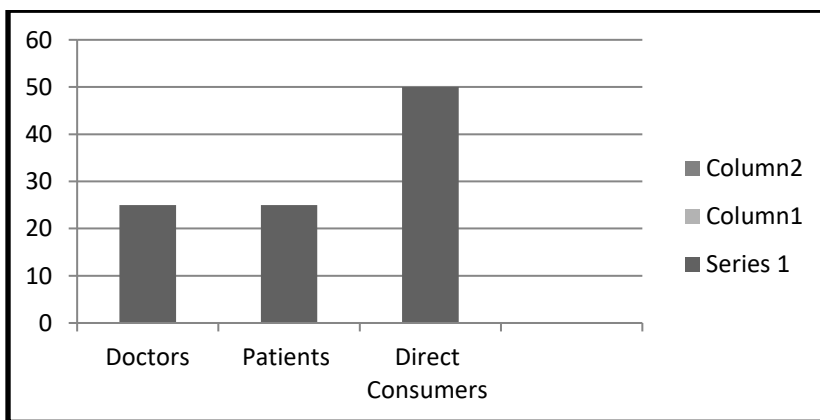


Figure 13. Occupation

#### 4.2 Psychological Findings:

4.2.1 *Tangibility*: Expected level was very high as most of respondents choose 7 degree on likert scale but Actual received services were moderate as most respondents choose from 4 to 6 degree on likert scale.

4.2.3 *Reliability*: Expected level was very high as most of respondents choose 7 degree on likert scale but Actual received services were less than moderate as most respondents choose from 3 to 5 degree on likert scale.

4.2.4 *Responsiveness*: Expected level was very high as most of respondents choose 7 degree but few respondents choose lowest degree too such as 2 on likert scale but Actual received services were less than moderate as most respondents choose from 3 to 6 degree on likert scale.

4.2.5 *Assurance*: Expected level was very high as most of respondents choose 7 degree likert scale but Actual received services were poor as most respondents choose from 1 to 4 degree on likert scale.

4.2.6 *Empathy*: Expected level was very high as most of respondents choose 7 degree likert scale but Actual received services were from poor to moderate as respondents choose from 1 to 6 degree on likert scale.

Consumers confidently choose products that provide the best value for the money. When it comes to choosing medicines and care, they often find themselves confused due to lack of information. Consumer organizations such as Consumers Union, Medical Organization can design program or medical aid campaign to help consumers select options that will provide optimal health and financial outcomes to fitness and health care. Also Consumers can have information about medical care as well as financial solutions to acquire fitness and health care through Consumer union and Medical organization.

The results indicated that the service quality dimensions predicted significant and high proportions of variances in word-of-mouth communications and purchase intentions across all three facilities. The tangible and assurance dimensions offered the most significant contributions. The results further revealed no significant relationships between the price sensitivity and complaining behavior dimensions and perceptions of service quality. These results have theoretical implications for developing a framework for conceptualizing service loyalty and identifying its antecedents. They also have practical implications for designing effective customer retention strategies.

### Conclusion

This research has contributed in two ways one to know consumer behavior for health services for medical service providers so that they can make communication program and secondly consumer awareness regarding medical care as and financial aid.

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