BUYER INFORMATION AND BRAND CHOICE BEHAVIOUR IN MARKETS WITH ASYMMETRIES

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CERTIFICATE

I certify that the work entitled **"BUYER INFORMATION AND BRAND CHOICE BEHAVIOUR IN MARKETS WITH ASYMMETRIES"** is a bonafide research done by **Alice.M.J** for the award of the degree of Doctor of Philosophy in the Department of Applied Economics, Faculty of Social Sciences, Cochin University of Science and Technology, under my guidance and supervision. This thesis is worth submitting for the award of the degree of Doctor of Philosophy in Social Science of the Cochin University of Science and Technology.

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DECLARATION

I hereby declare that the thesis entitled **"BUYER INFORMATION AND BRAND CHOICE BEHAVIOUR IN MARKETS WITH ASYMMETRIES"** is the record of bonafide research carried out by me under the supervision of Dr. C.A. Francis, Professor, School of Management Studies, Cochin University of Science and Technology, Cochin-22. I further declare that this thesis has not previously formed the basis of the award of any degree, diploma or associate ship.

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INTRODUCTION

It is an undisputed fact that the economy and business have undergone a tremendous upheaval during the last decade spurred by technology and shifts in outlook from regional to global. Globalization and liberalization have ensued transition from a period of protectionism to a period of globally opened economy with substantial economic interdependence among countries. This has paved the way for hyper competition in the global market. This is also an age that has witnessed the beginning of a veritable consumption explosion, not only in developed countries, but in developing countries too.

The Indian consumer goods market which is passing through a period of transition has set in a new challenge for the consumers. Government policy changes, as well as technological developments which are taking place at an unprecedented speed have given rise to a complex set of events in the marketplace. Three noteworthy developments that have become the hallmark of this age are:

1. A change in the set of feasible alternatives due to unprecedented growth in the number and variety of consumption goods.

2. Faster product diffusion taking place as a consequence of many factors, most important of which is domestic and international demonstration effect, thoroughly assisted by changes in cultural and infrastructural inputs.

3. Undue involvement of producers in competitive information dissemination through persuasive marketing strategies and their increased seepage due to deeper media penetration to cover all classes of people.

Technology has enabled an ever increasing variety and sophistication in consumer products. Constant innovations have revolutionized the consumer goods market with reduction in the duration of typical product cycles. Technological as well as psychological obsolescence give rise to more, new and better product lines. The character and complexity of products have undergone substantial changes. A prospective consumer faces an array of thinly differentiated alternatives making heavy demands on the cognitive skills required for differentiating one alternative from another.

Faster product diffusion is taking place as a result of many fundamental changes occurring in the present consumption system. Indian consumption is predicted to double by the year 2,008 with favourable demographics, rising income, easy access to credit and a change in attitudes of people towards consumption and composition of consumption basket (DSP Merrill Lynch, 2003). Even though our consumption levels are at present not comparable with the extravagant consumption levels of the west, an underlying pattern of change can be identified in the way consumption is perceived. There are visible structural changes in income distribution, occupational distribution and in the nature of product ownership (NCAER, 2002). The concept of comfort has undergone metamorphic changes, especially so in a state like Kerala. Categories of goods which were once considered as luxuries have slowly graduated into comforts and even necessities.

This change can well be explained by an evolving set of social and psychological variables giving rise to a social climate and cultural values which promote consumerism, higher levels of aspired standard of living and multiplication of possessions for material comforts. Possessions signify a way of living, and have connotations of status enhancing and retaining properties (Sooryamoorty, 1997). Innovative consumption - not necessarily conspicuous -which has become the order of the day, can be assigned more to an articulated socio - cultural order weighing heavily in favour of an orientation towards a 'more' mindset. This tempo of transition is not expected to come to a halt, and can well be expected to repeat itself with greater force. This would most likely lead to an ever increasing growth in the number and variety of goods and associated services.

Hire purchase, credit purchase and plastic payment mechanisms have reduced, at least psychologically, the contemplated costs of a purchase decision in the form of strain it can impose on family finances. Consumption credit at reduced interest costs facilitated by the higher liquidity enjoyed by the financial institutions, has become an important variable in decision making regarding the time of purchase (Majumdar, 2002). In short, buyers end up buying more than what their finances and needs warrant.

The diffusion process referred to above is generally not constrained by supply bottlenecks as was the case years before liberalization. The presence of multinational companies throw up the threat of a possible glut for any particular brand which is not able to lay firm foot in a potentially demand constrained system in which the potential output in any period always exceeds the level of demand at that output (Patnaik, 1999).

The burden of providing information is taken up by the sellers for obvious reasons. Many companies have succeeded in generating and sustaining brand loyalty through various innovative means. Brand building exercises with advertising and other non - price competition efforts are typical of modern corporate sector. Non- price competition creates myopia, increases confusion, intensifies ignorance and makes conscious decision making difficult. It can result in competition breaches resulting in high psychological costs of searching, obtaining and processing information. Extent of market power, market rivalry and even market growth can put the consumer in a difficult situation.

Overt differentiations as well as spurious differentiation, which are sustained through effective entry barriers lend market power to producers. The speed of technology transfer has meant that less time is available to capitalize on competitive advantage through technological change. The brand takes over technology as a source of differentiation. Sound reputation of the brand is very much a function of the quantity of advertisements rather than of efficiency (Needle, 2000). Inefficient brands are not very often driven out by the free market mechanism ensued, as the buyers exhibit certain inbuilt potential to tolerate without complaining. Some brands have enlarged presence either due to goodwill accumulated as a consequence of long stay in the market or due to the solid backing of mighty multinational companies. This sometimes makes buyers oblivious of the presence of 'worth-considering' other brands. Only a part of the market is visible for the buyer and this reduces the number of alternatives that may be considered at any time.

In sharp contrast with developed countries, where the evolution of consumption has been a natural outgrowth of industrialization and economic growth, the consumption process that is witnessed in developing countries is not growth derived. Jeffrey James draws a clear distinction between the target populations of developed and developing countries, as well as between the consumption systems, which he defines as the related package of characteristics such as income, location, consumer skills, infrastructure and so on in which the consumer finds himself. He contends that many products are initially designed in congruence with the consumption systems of advanced countries and that the information database or the support systems necessary for dissemination of information in developing countries have not grown simultaneously. Adjustment and adaptation to this changing environment of imbalances is expected to take place automatically (Jeffrey, 2000).

In more ways than one, the post-globalized generation of consumers can well be defined as "Cohorts" (Kotler, 2002) as far as consumption environment is concerned.[1] He faces a configuration of market characterized by the following asymmetries:

1. Growth in quantity and variety of goods and services not accompanied by a commensurate growth in reliable neutral information which must be a natural corollary.
2. Information asymmetry between buyers and sellers (Akerlof, 1970). There is also another dimension of information asymmetry. Not only is the market for information an immature one, but a distorted one as well. Marketing, as it stands today is a form of distorted communication because marketers control the information that is exchanged. They organize the code and consumers have no choice but to participate (Holt, 2,002).
3. What the buyers know and what they ought to know, partly accounted for by the intractability of the market and partly by the buyers' self-inflicted modesty in search, acquisition and use of information.
4. Imbalances in the power structure. There are asymmetric power relations in attempts at altering the decision environment in one's favour. Actions of buyers and sellers have disproportionate effect on the market environment because of the relative powers enjoyed by firms on account of organizational, structural, functional and other reasons (Porter, 1985).
5. Asymmetric bargaining. A buyer with modest information is disadvantageously placed as far as his ability to bargain in the market is concerned. Due to absence of networks or structures for decision competence, consumers are in a poor bargaining position.

[1] Cohorts are groups of people who share experiences of major external events that have deeply affected their attitudes and preferences.

The above discussed changes are visible and true in the case of market for consumer goods and services of all types.

A look at the consumer market of pre - globalization era is worth undertaking here. It was mainly a sellers' market offering limited choices. Existing stable standards, limited number of alternatives, utilitarian nature of demand, insignificant presence of global players and brands, relatively less false distinctions and the lack of universal usage of many kinds of goods on account of confinement of usage to affordable classes made the problem of choice task a simple one. Need for awareness regarding missed opportunities and alternatives was less. The opportunity cost of choosing a particular alternative was comparatively lower and therefore buyer information problem did not pose as gigantic a problem as it has emerged in recent years.

1.1. Importance of Buyer Information

Consumer behaviour is central to determining the characteristics of an economy and society. Consumer choice, channeled back, dictates production. Consumers' role in a well functioning market is to identify and reward good performance on the part of sellers. Efficient consumer choice acts as a catalyst of competition and efficiency in a well functioning market.

Consumers' sovereignty is to be understood as the ability of the consumer to influence the nature and composition of the choice set itself and not as the freedom to exercise choice from a given set of alternatives presented to him (Scitovsky, 1976). The cornerstone of the market driven economy is the right of any consumer to make an informed and unrestricted choice from an array of alternatives (Blackwell, Miniard and Engel, 2002). To perform this, the consumer needs to know what products, brands, sellers exist and where they are available, what the desirable characteristics of a product are and the extent to which particular product - brand - seller combinations posses the desired characteristics (Maynes, 1973). The sophistication that can be achieved in buyers' choice decisions is determined to a great extent by the quality of the information environment in which he makes the decision. A friendly and efficient information environment is a necessary, though not sufficient, condition for informed choices.

Just as any other market for goods and services, we should expect the forces of demand and supply in the market to wipe out any asymmetry detected and that there will, at any time, be an ideal market for information as well. But the truth is very often different. The very nature of the market for information throw up a threat to its efficient functioning as one cannot expect altruism in information provision when it is done by sellers who must axiomatically be assumed to have self interest.

There are two types of circularities involved which are worth discussing. The first one is a 'vicious' circularity which is caused on account of expectation feedbacks getting conditioned by extraneous factors. In a market configuration where information dissemination is competitively done as a top to down process, filling the need for information would culminate in processes which are comparable to persuading, controlling and dominating. Some amount of myopia is generated in the sense that expectations of the information receivers are conditioned in favour of the informants, so that no or insignificant discontent feedbacks are generated.

The second type of circularity is a 'virtuous' one as far as consequences are concerned. Here the expectation feedbacks are creative. Scitovsky argues that the thoroughness of the pre-purchase search process undertaken by the consumers and the extent of evaluation of information done by them will have a positive effect on the nature of the characteristics which the producers decide to embody in the goods they sell. The lesser the process of acquisition of objective information, the greater the opportunity for minor product differentiation. This makes acquisition of information and efficiency of consumption more difficult. Porter (1985) also maintains that the type of changes introduced over time in product characteristics depend on the nature of the search process engaged in by the consumer. Where this is thorough, he argues, the changes in characteristics in general tend to be substantial. Porter was underlining the need for such states.

The consumer who experiences 'isolation paradox' realizes the ineffectiveness of his actions in the market place to produce any direct or indirect impact and consequently economizes on the effort made for shopping. If all the shoppers follow the same course of action, the market will cease to be competitive (Scitovsky 1976 p.173).

Information provision tends to have two cumulative beneficial micro and macro effects by way of behaviour modification of the providers in the marketplace. Increased information allows some consumers to alter their choices which in turn act as signals to the sellers. Buyers also benefit by way of the macro level effects of reduced prices and the micro level effects of better consumer choice (Mazis, Staelin, Beals, and Salop, 1981). Bargaining leverage, which is the major determinant of buyer power, depends among other things on buyer information (Porter, 1985 p.6).

Information is a necessary though not sufficient input for recognizing and understanding the technological, functional and service related differences of goods. It is also essential for efficiently and objectively evaluating multiple alternatives in order to find out the extent to which there are real differences between them. The content, quality, source, source credibility and the ability of the buyer to use such information have implications on the choices arrived at by them. Success in a choice situation will be defined by an individual as his ability to discriminate effectively on the basis of the information that he has.

1.2. The Problem

Buyers are generally confronted with a three-fold problem. First is the difficulty caused by uncertainty in the case of certain elements of choice. Second, the lack of information to make reasoned choices and the third, indiscriminate misinformation.

The information environment of the Indian consumer goods market exhibits certain incongruities which are the natural outcome of the type of development pattern of the market itself. Large number of brands always jostling for consumer attention makes cut-throat competition inevitable. Creation of brand equity is often attempted by the use of extensive advertising promoting the brands' image. This, accompanied by a demand constrained market, forces the firms to indulge in frenetic promotional activities in order that they may be perceived as offering value for money. There is virtual absence of neutral sources of information. It is only a fact that the market is not successful in providing the right information in sufficient quantity and quality.

The problem is mystified due to the fact that it is asymptomatic in nature in the sense that an average buyer in the market place is unaware of the problem as he is ostensibly bombarded with information from all corners. Therefore no previous systematic effort has come up to solve it. The problem still persists and is likely to get compounded as the markets proliferate.

The 'incongruous marketplace' referred to above, yield scope for myopia given that the buyers have inherently limited processing and computational ability. In the highly ambiguous choice context, there is a manifest mismatch between the difficult task of integrating and using information and the necessary infrastructure to enable the effective performance of this task. On account of these intriguing marketplace complexities, efficiency of choice based on intrinsic product qualities is nearly impracticable and highly demanding computationally.

If these incongruities in the market are objects of serious and meaningful appraisal by the buyers two possible responses should be anticipated. They are :

1. Scepticism in the efficiency of the market to provide reliable and usable information and therefore the demand for more information inputs manifest in 'constructive discontent' by way of consumer activism.
2. Triggering in of reflexive responses important for adaptation caused by one or more than one of the following reasons :
    1. The buyers' lack of realization of the incongruities.
    2. The incongruities not interpreted objectively by the buyers.
    3. The feeling on the part of the buyers that it is inconsequential to react and
    4. The naive indifference on the part of the buyers.

The evidence from the market place is consistent with the latter response. Therefore the market will elicit behavioural outcomes which are in harmony with such a response, throwing up significant issues pertaining to adaptation to resolve this mismatch.

Given the specific properties of information environment to which the buyers are habituated into, it is worth investigating as to how the buyers adapt to such a complex and dynamic environment. How do consumers resolve the problem of deficiency of appropriate information on the one hand and the problem of information deluge on the other ? Little is known about the very many fascinating issues in information acquisition and decision making, as also the process by which the consumers adjust to such a complex and dynamic environment.

Three major postulates of the problem are :

a) The information environment and the buyer predisposition in such an environment.

b) The extent and method of search for information and use of information.

c) The choice of a specific alternative from among competing alternatives.

1.3. Objectives

Following are the objectives of the study.

1. To examine consumers' evaluation of the information environment.
2. To evaluate consumers' perceived self - confidence in information acquisition and brand choice.
3. To measure the extent of external search for information.
4. To appraise the different sources of information for the buyers and their relative importance.
5. To investigate into the perceived diagnosticity of signals which are not function - specific.
6. To identify and interpret factors that determine brand choice.

1.4. Need for and Relevance of the Study

Extant research and literature base on consumer behaviour is mainly western developed countries. They have a conceptual orientation in cognitive psychology. Their methodological preference is for experimental design. Consumer behaviour studies have been limited to advanced industrialized societies, where evolution of consumption has passed through many stages of transformation. Consumer movements in those countries have taken the initiative for educating the consumers to be more efficient in their consumption decision making. Encouragement to consumer behaviour research in those countries has helped in development of a branch of consumer research which has greater relevance to the market environment available in those countries. However, in a developing country like India, where consumption has bypassed many stages of evolution, generalizations taken from advanced countries cannot be applied. There is very little published research on buyer information. Buyer behaviour studies in India - specifically buyer information studies - are either scarce or are conducted mainly from the point of view of enhancing efficiency in marketing. Hence, there is a compelling need for development of literature on consumer behaviour in the market place.

The study is relevant in the wake of the new and shifting preferences of both domestic and multinational companies in the consumer durables, electronics and FMCG segments. As far as market expansion and investments are concerned, India is one of the preferred destinations to many multinationals. India offers a promising and booming market share, ensuring considerably rising revenue contributions and therefore attracts considerable investment from such companies (Richa Mishra & Jyothi Dutta, 2003). The study is relevant at this point of time when consumer demand is expected to grow at a faster rate and global firms have a tendency to invest more in production facilities in India.

1.5. The Choice of the Products for the Study

Goods vary substantially with respect to importance in the consumption basket and frequency of purchase. The buyer information problem does not become one of preoccupying interest in certain types and categories of goods. For example, in habitual and frequent purchases, a lot of learning takes place automatically and unknowingly making the buyer gain expertise. In the case of certain other goods, as in credence goods, the buyer is oblivious of the nature of purchase and consumption and also the extent of need for information. Since the nature and need for information differ across products and situations, no generalizations can be made which are applicable to all situations and commodities. Therefore, in the present study information acquisition and choice making by buyers in a prototypical situation, that is the household consumer durable goods market is considered.

Consumer durables have certain specific characteristics that make them most appropriate to study from the context of information acquisition and brand choice. Unlike experience goods these consumer durables are comfort intensive, longer lasting utilitarian goods whose consumption is cognitively driven, instrumental and goal oriented and accomplish a functional or practical task (Strahilevitz and Myers, 1998). Therefore, it is most crucial that a buyer develops definite pre-consumption expectations regarding specific product features. These household consumer durables are inherently high involvement goods. Their purchase is infrequent and characterized by longer inter - purchase time and therefore the choice task is free from recentness effects. Collective use by multiple users within the household warrant a lot of prior thinking, pooling of opinion, deliberation and comprehensive pre-purchase search for information by more than one member in the household.

The markets for these goods are dynamic due to frequent changes in the composition of the basket of goods and in the means of differentiation. Intense competition - mainly due to similarity in product lines of different firms - within and across the geographical boundaries demands constant innovation. Novelty is most often ensured by superficial alteration of features which does not necessarily embody technical changes. This adds to the complexity of distinguishing between the alternatives. Buyers are less capable of personally evaluating durable products because the long life and varied conditions under which these products are used cloud post-purchase brand comparisons (Stern Louis, 1971).

Quality levels are generally set by manufacturers either by setting levels matching competition, or by benchmarking exercises using data drawn from trade associations. Quality standards are not usually made mandatory. If at all they are, there is no mechanism by which a prospective buyer can check the conformity of a particular brand to such prescribed standards. The highly technical nature of the goods makes the problem worse, more so, due to the non-technical nature of majority of buyers. Left to market forces, inefficient brands become visible only after a considerable period has elapsed since its introduction and therefore if a transaction is unsatisfactory a buyer would have lost a sizeable amount of money.

The atmosphere of transaction in retail stores is also peculiar in that retail outlets sell nearly the same assortment of brands. A typical buyer may not have exposure to different sellers or have knowledge about the combinations of brands which those retailers sell. 'Trial and return if not satisfied' conditions of sale is not common in India. Above all, there is increasing participation in personnel provision on the shop counters by the producers as a method of popularization of products. The buyer, therefore, is exposed to information distortions even at the point of purchase.

Large scale information dissemination by formal or informal agencies does not prevail. Neutral agencies that provide information in a dispassionate manner and quality assurances through 'rating' are virtually absent.' Caveat emptor' which is hardly practical and at the same time consumer hostile is still the dictum in the market.

Since these goods are consumed within the household, their visibility is only in the immediate neighbourhood and therefore product use information sharing is also in smaller circles. This rules out the possibility of consumer originated mechanisms to drive out inefficient brands. In brief, the nature of the durable consumer goods market is a mystery offering scope for a worthwhile inquiry.

1.6. Methodology

The study relates to buyer behaviour with respect to information acquisition and brand choice of the select consumer durables detailed later in this section. The study was conducted in two sequences:

A. The Qualitative Module

This module comprised of detailed review of extant literature on consumer information and brand choice as well as direct observation on the shop floors, discussions with actual and potential buyers, academicians in marketing, sociology and home economics and individuals who are associated with the marketing and sales of the chosen products. In the absence of sufficient reliable previous studies on the topic, these procedures helped in developing insights into the distinct information and choice problem confronted by the buyers and the buyers' perceptions about the problem. This also facilitated generation of possible sets of issues for further enquiry as well as for developing items for the measurement scales and for the modification of scales adopted from previous studies.

B. The Quantitative Module

This module was accomplished in two tiers; the first tier consisted of a preliminary pilot survey of 40 respondents to ensure the feasibility of the interview schedule.

The second tier consisted of a survey of 301 respondents chosen (as detailed below) for collection of information. The conclusions arrived at in this study are based on the information collected in this step.

Five dimensions of the buyer information problem and a single dimension brand choice are chosen for the study. The five dimensions of the buyer information problem are :

1. Buyers' perceptions about the information environment.
2. Buyer confidence with respect to information search and choice.
3. The extent of search for information.
4. The sources of information for the buyer.
5. Diagnosticity of certain types of indicative information.

The single and most relevant dimension of brand choice that is considered in the study is the factors influencing choice of a particular brand from among competing brands.

1.7. Area of Study

The state of Kerala has certain unique features with respect to consumption which other states of the country do not share. As per the latest figures arrived at by the National Sample Survey Organization, Kerala topped in per capita consumer expenditure at Rs.9844/in 1999-2000, improving from the eighth position in 1972-73 and second position in 1993-94. Unofficial estimates also show that the people of Kerala, forming approximately 3.5 percent of the country's population, consume almost 10 percent of the consumer goods produced in the country. These features have made Kerala the target of marketing activities by all kinds and types of producers, both national and multinational. The information environment of the state and high literacy rates also offer extended opportunities for such a research problem.

The geographical area covered by the study is the district of Ernakulam in the state, which is referred to as the 'Industrial District of Kerala'. The choice of the district as the area of study is based on two principal considerations, namely

1. The district is unique with its highest total income among the 14 districts of Kerala, highest per capita income, highest per capita expenditure and highest levels of purchase and consumption of consumer durables of all types (Kerala Economic Review, 2003).

2. The district is also popular in as much as it is the test market for several consumer products over the years. It was therefore, felt that the district would be appropriate for a study on consumer behaviour.

1.8. The Sampling

The universe of the study consisted of all those who have purchased one or more than one of the six products chosen for the study during the period under study. While a random sample of buyers drawn from a universe of all purchasers would have been ideal, there was no method by which such a universe could be identified and listed. Therefore, in the absence of a complete sample frame and source list, a method of sampling was adopted whereby the samples chosen would be fairly representative of the universe.

The method consisted of two sequences.

First, a list of all such retail outlets in the study area which are selling domestic consumer durables were collected. To obtain samples representative of various geographical areas, the physical area proposed for the study was first divided into twelve spatial subdivisions or sample areas on the basis of revenue classifications by government of Kerala, resulting in a frame of areas consisting of twelve regional sub-divisions composed of eleven municipalities and one corporation. The municipalities and the single corporation only were considered as the shops selling the items under study are situated only in urban centres. The Corporation of Cochin was purposely included as a sample area as it consisted of the major chunk of the retail outlets and accounted for the majority of sales in the district. A purposive sample of eight retail outlets, which are expected to be covering a substantial portion of the sales, in the city was chosen. A deliberate sample of four franchise outlets of leading brands of consumer durables considered in the study was also chosen. The eleven municipalities of the district were divided into three sample areas consisting of five, four and three municipalities each.

Two municipalities each were chosen at random from the above three sample areas. One major retail outlet was selected purposively from each of these selected areas, to ensure sufficient samples from urban, rural and semi - urban areas.

In the second sequence, names of sample respondents were collected from the consumer care centers and from customer databases maintained by the retailers and from the bill books of the sellers pertaining to the period of the study. In order to ensure randomness, a systematic method of sampling was adopted whereby names of every tenth buyer were included in the sample. The roster of elements itself can reasonably be considered random for the purpose of the study, considering the basis on which the roster is maintained, and as such a systematic sample may also be considered random. No specific quota was fixed for each separate consumer durable comprising the items under study, as all the items were categorized as possessing common characteristics. Therefore a pluralistic approach to probability sampling is resorted to, which may be termed as a combination of area, stratified, systematic and purposive sampling. Considerable overlap in purchase was observed, as respondents from rural areas reported having bought the durable from a retail outlet in the city but not the other way round.

The samples were households who are buyers of such durables for end use. Both first time purchasers and repeat purchases for replacement were included in the sample. The former is referred to as 'novices 'and the latter as 'non- novices'. Considering the extent of transition that is taking place in the technology and promotional aspects of these consumer durables, the second time buyers are not referred to as experts as is done by Stafford (1989). Five sample respondents who reported re-purchase of the same brand were excluded from the study, as such purchases would be prompted by satisfaction with the brand and therefore their information has come from first-hand experience with the brand.

The sample size was 301. The size of the sample was set in such a way that it is large enough to permit valid analysis of sub-samples used in the breakdown of data to be made so that it is possible to get a satisfactory number in the smallest categories. The sample of 301 was split approximately equally for the six regions under study. 188 samples were chosen from the six sample areas and 133 samples were chosen from the Corporation of Cochin.

The products chosen are non- visible, multiple user household consumer durables which are either comfort intensive or entertainment oriented. The products that are included are consumer durables that satisfy the 'generic needs' of the consumers for household comfort, convenience and entertainment. The composition of such consumer durable goods chosen for the study include three high penetration categories of domestic consumer durables namely colour televisions, washing machines and refrigerators and three other popular household durables namely music systems, microwave ovens, and air conditioners. The set of consumer durables considered for the study are moderately priced consumer durables whose prices are above Rs.4,000 /- to ensure deliberation as has been explained before in this study. The six product categories were not given equal representation in the sample as the proportion of buyers in each case was expected to be different. Usable prior knowledge gained through previous experience with the brand is precluded by not considering repurchase of the same brand. However the possibility of knowledge gained through previous association cannot be ruled out.

An interview schedule was used to collect data from the respondents. The interview schedule was administered in vernacular wherever felt necessary. The interview schedule is given as annexure I.

The schedule consisted of the following categories of questions

1. Rating on Likert scale.
2. Rank order.

3. Multiple choices.
4. Dichotomous.

Buyers were requested to consider only the purchase situation under reference in order to ensure that the responses did not reflect cumulative experiences of product choice in general.

1.9. The Period of Study

The study covered a period of eight months between October, 2002 and May 2,003. Extra ordinary time periods of promotion sales like festival seasons were excluded to moderate the effects of such marketing efforts.

The respondents were contacted as far as possible within twenty days from the purchase of the item to control the influence of decay in situational involvement levels.

Data collected during the above time interval were edited and coded. Data were analyzed using Statistical Package for Social Sciences (SPSS).

1.10. A Note on the Statistical Tools

a) Measurement Scales used

Four scales of Likert type are used in the study to measure the following constructs:

1) Buyers' perceptions about the intrinsic friendliness of the market for consumer durable goods chosen for the study.
2) Magnitude of reported consumer confidence with respect to information search and brand choice.
3) Extent of external search comprehensiveness.
4) Characteristics considered for making choice of the brand from among the alternatives.

The scales (2) and (3) mentioned above are adopted from existing validated scales developed by theorists for measuring the same constructs. Modifications to such scales were done to suit the market and information configurations available in our country without affecting their reliability and validity. Separate scale validation was not done for the two scales so adopted. Sources of the above two scales are detailed in the text of the analysis.

Scales (1) and (4) were developed in the course of the qualitative module of the research with input from the discussions with experts, shop owners, shops and sales personnel, colleagues, other researchers, buyers and other relevant people. Validation of the scale has been done as detailed in the analysis of the respective scales. The steps in the scale development and procedures are summarized in the text of analysis. Scales one, two and four mentioned above use a five point scoring format and scale three uses a four alternative format.

The reliability of the scales was checked by scale reliability analysis in the SPSS programme. Alpha reliability using split -half method is used. The measures of reliability are presented along with the text of the analysis in each case.

The items under consideration and the respective variable names assigned are given in annexure II.

A composite segmentation index like socio-economic classification or social class based on demographics such as age, sex, education, and income is not attempted as considerable homogeneity was observed in these variables. Instead, behavioural parameters of 'search' and 'confidence' are taken as the basis of segmentation. The modal value of incomes reflects samples to be economically upscale. Nevertheless, certain variables are studied separately for these demographic characteristics.

b) Uni -variate Analysis

Simple statistical measures such as frequencies, cross tabulations and descriptive statistics such as percentages, arithmetic mean, standard deviation, skewness, ANOVA, Student's 't' etc. are used for exploring composition within variables. Non-parametric tests such as Chi-Square, Mann-Whitney and Kruksal Wallis tests were also applied.

c) Multi-variate Analysis

Appropriate statistical measures such as Factor analysis, Principal component analysis, Cluster analysis and Correspondence analysis were used to arrive at conclusions. Graphs and diagrams are placed in the text of the chapters reporting analysis.

P value is the probability of committing type I error, that is the probability of rejecting a null hypothesis when it is true. Throughout the study, the type I error is kept at five per cent level, that is we reject a hypothesis if P value is less than 0.05.

The study does not propose a general hypothesis as it examines the buyer information problem from multiple angles precluding aggregation into a single dimension. However, at appropriate stages in the analysis, hypotheses were formulated and tested in order to extract underpinnings in the data and to test relationships and / or independence.

1.11. Assumptions

Buyer information is assumed to be the most important input in brand choice decision.

1. Acquisition and use of external information is assumed to have preceded brand choice.

2. The buyer is assumed to be aiming at rational choices which would optimize his utility function.
3. Intangible use criteria (Porter,1985 p.143) are assumed away. The motivations of purchase are economic in the narrow sense.
4. The household is assumed to have expressed collective preference in the choice.
5. Knowledge is taken as given. Usable prior information is assumed away since re - purchase of the same brand is not considered.
6. Instrumental motives predict reasons for the purchase of the items.

1.12. Operational Definition of Terms

(i) Buyer Information

Buyer Information refers to the set of stimuli available in the external environment. It is the entire array of product related data available to the consumer for supplementing the information recalled from memory and is acquired from outside sources through deliberate external search.

(ii) External Search

External Search refers to the conscious and deliberate pre- purchase search for information from outside sources such as commercial sources and non-commercial sources.

(iii) Consumer Confidence

Consumer confidence is the self-perceived capacity of the buyers for effective action in the marketplace. It is a measure of the buyers' felt capacity for assimilating and distinguishing between information and considering alternatives which will maximize their utility function.

(iv) Information Environment

Information environment is the entire set of arrangements evolved and prevailing for provision and acquisition of product and brand related information to the buyers before purchase.

(v) Intrinsic Friendliness of the Market

Intrinsic friendliness of the market refers to the characteristic of the market which represents an enabling information environment where reliable information can be easily accessed to and choice can be exercised independently and objectively, without being influenced by coercive factors.

1.13. Limitations

The study is subject to the following limitations.

1. The Lack of generalisability of the findings, given the fact that a single district alone is considered and also that only specified consumer durables are included in the study. The variables affecting buyer information and brand choice would differ across different product categories and therefore the results of this study may not be applicable to other product categories in the same information environment.

2. The study is based on reported measures on the variables. The study is subject to all errors that may be caused on account of differences between reported responses and actual behaviour due to traits of buyers such as under - reporting and exaggeration.

3. Even though enough care is taken to control idealized responses, the possibility of such idealized responses cannot be ruled out.

4. Lack of specific information from theories of consumer behaviour developed in a developing economy setting has made the design of the study comparatively difficult.

5. Consumers' lack of awareness of the information problem and the resultant possible bias in reporting.
6. The study assumes equal acquired passive information for all buyers which is unrealistic.
7. Consumers' involvement with other receivables is held constant.

1.14. The Report

The report of the study is organised as follows:-

Chapter 1 - Introduction - deals with the background of the study, the problem under study, the importance, need and relevance of the study, methodology used and the limitations of the study

Chapter II -Review of Literature - presents review of previous literature under four heads namely 1) The constrained consumer 2) Factors affecting information search 3) Sources of information and their influence and 4) Deliberation and use of information in brand choice.

Chapter III - Intrinsic Friendliness of the Market and Buyer Confidence - This chapter deals with the analysis of consumers' evaluation of the intrinsic friendliness of the information environment. It also reports the measure of the extent consumers' perceived self - confidence in information acquisition and brand choice.

Chapter IV - Extent of External Search - presents analysis on the extent of external search for information done by the buyers.

Chapter V - Sources of Information - describes the different sources of information used by buyers before purchase decision is made. It also presents evidence on the extent of informational influence of others.

Chapter VI - Use and Diagnosticity of Information which are not Function-Specific - deals with the analysis of the diagnosticity of signals which are not function specific in decision making.

Chapter VII - Brand Choice - details the factors that determine the choice of a particular brand from among different brands.

Chapter VIII - Findings and conclusions.

CHAPTER II

REVIEW OF LITERATURE

The purpose of this chapter is to review previous studies that have dealt with aspects of the same or similar problems. This survey of literature is not exhaustive. The compilation covers mainly books on Consumer Behaviour, Marketing and Economics and Journals of Economics, Consumer Research Marketing and Marketing Research.

2.1. The Constrained Consumer

James (1970) addresses the problem of choice and formation of preferences in a market characterized by cut-throat competition and rivalry. With claims and counter claims for various products and many brands, the choice task is made complicated. Consequently, buyers have to rely on surrogate clues like brand names and price to ascertain the quality of products. Such criteria of choice, he argues, leave much to be desired.

Alvin Toffler (1970) in his fascinating and well documented book, discussing the effect of technology on consumers, holds that the rate of technological change and its effects on society are creating severe problems for people in all roles including consumers. He introduces the concept of 'over choice', a state in which the advantages of diversity and individualization are cancelled by the complexity of the buyers' decision-making process. Consumers purportedly feel overburdened by too much choice, product complexity and information, some of which are useless for sound decision making.

Maynes (1973) in a study on consumerism identifies informational imperfections of consumer market as the major constraint in consumers' efficiency to perform their roles in a market effectively. Technical complexity accounts in a large measure for the extent of consumer ignorance concerning most modern products. This difficulty applies to the ascertaining of prices and the extent to which a brand possess the desired characteristics as well as to knowing what characteristics are desirable. Consumers' bargaining power is seriously impaired by lack of appropriate information required to bargain efficiently.

Akerlof, (1970) in his path breaking study maintains that information in the market place is very often asymmetric. He showed how trade can almost completely collapse when agents on the one side of the market have imperfect information and know only the distribution of product quality rather than the quality of each item traded.

Cochrane and Shaw Bell (1956) while conferring the informed consumer with the distinction of being the catalyst of competition, throw light on the consumer information problem. The individual consuming unit, the authors observe, cannot, acting independently, acquire in an efficient manner the information that he needs to make choices. Appliances have been a mystery to typical households and it requires proficiency to choose and use the same. Two possible approaches suggested for getting informed are acquiring the requisite expertise to evaluate products and product tests through experience. The inability to get expertise or to make tests prior to purchase is particularly disadvantageous where purchases are infrequent and costly. The typical consuming unit lacks time and resources to become adequately informed with respect to potentialities and limitations of the alternatives. Moreover an active desire-resistance conflict involves psychic cost and tensions, which consumers seek to avoid even at the expense of efficient disbursement by purchasing by rule, habit or impulse.

Hansen (1972) contents that the mounting variety and increasing competitiveness of the durable goods market make free and intelligent choice by the consumers difficult. Unusually greater complexity and faster pace of technological advancements in the case of durable products make the problem of adequacy and comprehension of product performance information compounded. Longer lifespan and varied conditions under which these products are used, clouds post - purchase comparisons and makes the consumers less capable of personally evaluating durable products.

Russo (1988) cites a number of reasons why consumers are not able to use more information to make calculated decisions. Some of the possible reasons can be attributed to certain inherent characteristics of the consumer himself. When compared to sellers, consumers have only limited knowledge as their knowledge is 'domain specific'. Sellers have genuine and persistent motivation to be knowledgeable about their strategies with regard to positioning and disclosure of facts. Consumers who are confronted with an overwhelming number and complexity of consumption decisions do not have an equivalent disposition to be dynamic and intuitive. Consumers are also constrained by certain limitations of the information environment itself. Often crucial information will be missing, incomplete, inappropriate or biased.

Scitovsky (1976) diagnoses an element of regress in the domain of consumers' leverage in ensuring competitiveness. He observes that there is an element of 'isolation paradox' in the interactions between producers and consumers. Thus the consumer finds himself in a situation where his own actions' direct impact on competitiveness is negligible. His most rational course of action, therefore, is to save time on shopping. If we all follow this course of action, he warns, none of us will shop carefully, the market will cease to be competitive and all of us will be worse off than we would be, had we all devoted extra time to careful shopping.

Stern (1971) writing on consumer protection through increased information, considers the language of advertisement as an important factor that contributes to the problem of adequacy of product information. He endorses the view that most advertising down the years have done little more than say sweet - nothings about a product. Advertisements have contained the least information and rely mainly on adjectives, charm, or manner of presentation coupled with unspecific and unsupported claims of superiority. He contends that the difficulties of attempting to provide greater information to consumers are substantial. The problem of communicating technical information to a non-technical audience, the time and space limitations of the vehicle of communication and the cost of the time and space used are all crucial.

Kurien (1997) recalling Akerlof's theory of asymmetric information, states that the most likely scenario for practically all manufactured goods is that the seller will have more information than most potential buyers. The presence of intermediaries who are not disinterested parties in a deal will lead to further asymmetries in information. Whenever it is to their advantage, they must be presumed to distort information. As such, as exchange increases and markets proliferate, it will become more and more difficult to concede the condition that all participants have the required information.

Mishra, Heide, Stanton and Cort (1998) comment that marketing relationships between buyers and sellers often are characterized by information asymmetry, in the sense that the supplier possess more information about the object of an exchange -e.g. product or service -than the buyer.

Bettman, Johnson and Payne (1991) suggest that the organization of information has overriding importance, as it affects the consumer's task of decision making. Advertisements usually discuss only favourable subset of available information on one brand at a time. In such an environment where information is received sequentially rather than simultaneously, the decision making problem gets confounded. A consumer exposed to such information would find the choice of the best brand in a product category on the basis of recall and ordering of attributes nearly impossible. The process, they argue would be simple if a table summarizing the values of the brands' attributes were available such as the tables presented in Consumer Reports.

Amory (2000) labels neo-liberalism as a political ideology, which advocates market as a space of freedom. Consumer choice replaces citizenship as a pre-eminent right. Corporates need dependent consumers and therefore they deny their right to know and to choose. The citizen consumers' right to product choice is limited to the corporate product lines and may not include 'process destinations'. Illusory product diversity replaces the right to know, to participate, to regulate and to govern.

Spence, Michael (2002) in an article on signaling and informational structure of markets narrate that there are many markets with information gaps. These include most consumer durable goods among others. These information gaps might alter some of the performance characteristics of the markets in which they appear.

Muthukrishnan and Kardes (2001) maintain that the level of ambiguity in the choice context may often determine the degree of uncertainty with which preferences are held in choice. Following Ellsburg, they identify objectively ambiguous contexts as those in which available information is scanty or obviously unreliable, highly conflicting or where expressed expectations of different individuals differ widely. When choice sets in the market place are characterized by high ambiguity caused by missing information, even side by side comparisons may not reveal which option is superior. Ambiguity of this nature, they depict, is widely prevalent in the market place.

Tybot (2002) in a study on the effects of claim similarity and concurrent repetition demonstrates that when consumers are confronted with similar competitive brand claims from different producers which they process under low attention, repetitions of these claims may paradoxically make people more susceptible to memory confusion and choice uncertainty.

Vaishna Roy (2003) observes that the deluge of consumer goods which has occurred since liberalization has not taken place in an appropriately mature market and that the average consumer continues to be largely ignorant about his rights, about what to really look for or what offers him value for money when he goes shopping for a durable. With large number of products and claims, there is a high possibility that a consumer purchases a worthless product paying a high price.

2.2. Factors affecting Information Search

Cunningham (1964) postulates that purchase decisions can be viewed as decisions involving perceived risk. The risk perceived stems either from uncertainty measured by the subjective probability that the product will perform as expected or from the consequences or costs that may result from making the wrong decision or both. People behave so as to reduce their perceived risk. The study concludes that greater the perceived risk greater is the likelihood that a person will seek information that will enable him to reduce it.

Cravens, Hills and Woodruff (1976) quote research findings which indicate that relative to middle income consumers, lower income consumers tend to search less for information before making purchase decisions, are less mobile shoppers, rely on personal contacts and friendly merchants, and generally engage in behaviours which are less consistent with the 'economic man' type of consumers.

Johnson and Russo (1984) indicate that expert consumers have distinct product category knowledge as they have better developed product category cognitive structures, which enable them to develop more abstract and deeper levels of categorization. They use this capability of theirs to engage in more efficient information search.

Bettman and Park (1980) argue that the relationship between experience and information search is more likely to be an inverted 'U '. Johnson and Russo (1984) support the same point of view. They point out that in the presence of expertise and increased experience, there will be an increase in the ability to encode new information and therefore people tend to search more in the initial stages. This accounts for the increasing part of the inverted 'U'curve. On the other hand, as experience increases beyond a particular point, the consumers have increasing ability to ignore irrelevant information. This accounts for the declining part of the inverted 'U' curve.

Moorthy, Sridhar, Ratchford and Talukdar (1997) maintain that economic incentives for search explain an inverted U relationship. If consumers have little experience in a category and have difficulty in making distinctions among the brands that they are willing to consider, there is little incentive to engage in search process. As experience is gained, consumers become aware of more attributes and are able to make finer distinctions between brands. As a result, they develop a greater incentive to search. Finally, when consumers have a great deal of experience, there is relatively less uncertainty about brands and their attributes. At this point information search becomes a non-value added activity, that is additional information is no longer valuable.

Iyer and Smith (1989) present overt evidence to show that if consumers are under time pressure, search activity will be severely restricted. Without time pressure opportunity is higher and search tends to increase. Also consumers will spend less time searching different sources as time pressure increases.

Srinivasan, Narasimhan and Ratchford (1991) in an empirical examination of a model of external search for automobiles observed that time pressure can have a negative impact on information search. Time pressure while shopping reflects the customers' time availability and therefore their time costs.

Subjects who experience time pressure obviously reduce information search or follow patterns of search which are time saving.

Brucks (1985) focuses on variations in product related knowledge. A distinction is drawn between subjective and objective expertise; the former refers to the knowledge of attributes by the consumer whereas the latter reflects the consumers' own subjective evaluation of his own knowledge. Since experts are knowledgeable in a formal way with regard to attributes in the choice sets, and since they have stored them in memory, they seek information about a greater number of product attributes. They also tend to seek less information about inappropriate alternatives. Experts also appeared to search more selectively and more efficiently than novices.

Noel Capon and Roger Davis (1984) examining the impact of basic cognitive ability measures on consumer information processing strategies conclude that consumers with higher basic cognitive abilities such as intelligence and ability to integrate complex information, are more likely to acquire more information than consumers with little or no knowledge. They are also able to process this information in more complex ways.

Schaninger and Sciglimpaglia (1981) in a study on influences of cognitive personality traits and consumer demographics on information search, infer that consumers with higher education tend to involve more in pre-purchase information search than the less educated ones as they possess some accumulated product knowledge which is easily accessible and testable for making further modifications. The more educated also have the added advantage of greater accessibility to sources of information and as such they tend to make use of those sources.

Alba and Hutchinson (1987) put forward consistently differential patterns of search by consumers with different levels of knowledge. Consumers with moderate level of knowledge search the most as they are more motivated and are capable of deciphering new information drawing on their already existing knowledge. Experts indulge in 'smart search' since they know how to selectively direct their search towards the most relevant or diagnostic information.

Urbany, Dickson and Kalappurackal (1996) assert that similarity on key attributes possessed by rival brands is a key determinant of information search. As attributes of available competing brands converge to homogeneity, the perceived benefits from information search diminish progressively. Thus the greater the perceived attribute congruity across alternatives, the lower the effort invested in information search.

James Jeffrey (2000) identifies interdependence between the extent of information search and the nature of characteristics which producers decide to embody in the goods they sell. The less thorough the process of acquisition of information, the greater the opportunity afforded to the producers to differentiate his product in minor ways, making acquisition of information and efficiency in consumption even more difficult. Where information search is thorough, the changes in characteristics will, in general, tend to be substantive as opposed to 'cosmetic 'alterations thought to typify markets characterized by poor quality search.

2.3. Sources of Information and their Influence

Beatty and Smith (1987) present a taxonomy of sources of information. Five major groups of sources are pinpointed. They are :

i. Retailer : where the consumer collects information from stores or dealers or from packages and pamphlets.

ii. Media : i.e. information from marketer dominated commercial sources.

iii. Interpersonal sources : where the consumers gather information from others with whom they are associated.

iv. Independent sources : where the consumers consult sources such as books and publications, which are not generated by the marketer.

v. Self : i.e. the consumer uses own consumption experience through product trials.

Retailer and media are the most common sources used by consumers followed by own experience of consumption.

Hoyer and Mac Innis (1999) detail the sources of influence in terms of marketer or non-marketer-dominated sources. Incidentally it happens to be a word -picture of the various sources of information. The first category refers to marketer-dominated sources delivered via mass media and includes advertising, sales promotions, publicity and special events. The second head, which outline marketer-dominated sources delivered personally, comprise of sources like salespeople, service representatives and customer service agents. Under the third form which is marked out as non-marketer dominated sources delivered via mass media, the authors mention, among other sources, news about new products and services, television programmes, publications of organizations, consumer reports etc. The list under non-marketer dominated sources delivered personally contains sources of word-of-mouth communications namely friends, family, neighbours, casual acquaintances and even strangers.

Feick and Price (1987) put forward opinion leaders and market mavens as credible sources of information. Opinion leaders, because of their position, expertise and knowledge, are capable of disseminating trustworthy information. Consumers in general rely on market mavens who, due to their general interest in markets, accumulate a lot of information from various sources regarding product attributes and market place as a source of information.

Smith and Swineyard (1983) studying the differential impact of product trial and advertising as sources of information, conclude that product trial leads to higher information acceptance than advertising. This happens, they argue, because of the fact that people rarely derogate themselves as sources of information and they see information acquired by experience relatively more reliable and therefore more acceptable. The higher information acceptance leads to higher order beliefs and affect. Contradictory to this, the study finds that lower order beliefs and affect are formed from exposure to advertising.

Arndt (1968) in a study on the relative weight assigned by consumers to the different sources of information in the ultimate decision making context, construe perceived risk as a decisive factor in choice of source of information. The findings of the study suggest that consumers who perceive high risk in connection with the product either avoid adopting it or if at all they adopt, do engage in more extensive decision processes in which personal information sources become important. i.e. high-risk products make the more credible sources such as personal information more important.

Business Line - Indica Research (2001) on car buying behaviour in India reports that on an average a buyer gathers information from three or four sources. Of these, talking to the dealer is the most common source and also considered as the second most reliable. Next in popularity are the views of friends and relatives. Car advertisements were used to gather information only by forty six per cent of the respondents and only twenty seven per cent felt that they were reliable. Despite the cyber boom, internet was used as a source only by nine percent of the buyers and only seven percent of the total respondents felt that it was a reliable source.

The study also vehemently supports the view that branding is here to stay, especially in a product category like cars where it is often difficult to distinguish between competing brands on purely technical or functional parameters. The brand has thus become the most meaningful differentiator and a guarantee of 'safe 'choice.

2.4. Deliberation and Use of information in Brand Choice

The earliest study reported on the extent of pre-purchase deliberation by buyers is that of Katona, George (1951). Katona expresses scepticism about the availability of evidence regarding foresight in consumers' purchase plans. Numerous empirical investigations by him resulted in interesting findings. Under certain circumstances, such as buying a house or a car, consumers make genuine decisions after carefully considering alternatives. Otherwise they follow habitual patterns of behaviour. His research findings indicate that for purchases exceeding $1000, planning and genuine decision-making are frequent; for purchases of several hundred dollars, planning and decision-making are less frequent; and for purchases of less than $100 planning and decision-making are infrequent.

Katona and Mueller (1954) found considerable variations in the extent of advance deliberations among households. The actions of only on fourth of the group appeared to conform to the idea of economic man. Almost one third of the time buyers did not consult more than two sources of information, they mainly consulted friends relatives and others before they made the purchase. Even for purchases which involved considerable amount of money, buyers did not indulge in extensive search.

Kerby (1967) found brand name generalizations i.e. previously formed cognitive and affective relations with a brand name or product class characteristic generalized to a new product with an old brand name, does not occur with consumer durables. The study suggests that semantic generalizations come only when the products are relatively unimportant, requiring a minimum of intellectual and emotional effort.

Cohen (1971) opines that the consumers are selective in his acceptance of information offered. This selectivity, according to her, is partly due to a difference between the objective environment in which the consumer really lives and the subjective environment he perceives and responds to. The consumer reacts to information not only with his intelligence, but also with habits, traits, attitudes and feelings. In addition, opinion leaders, reference groups and so on influence his decisions significantly. There are pre-dispositions at work within the individual that determine what he is exposed to, what he perceives, what he remembers and the effect of the communication upon him.

Newman and Staelin (1972) in a study on pre-purchase information seeking for purchase of new cars and major household appliances report less than optimal search for information by buyers. Only one half of all consumers purchasing major household appliance visit more than one retail outlet or consider more than one brand.

Hansen (1972) comments that if 'rational choices 'ever are found in consumer decision making, it is likely to be in connection with first purchase of major durables. The nature of the problem is complex enough to arouse such processes and since the satisfaction derived from the durable products is not realized immediately, the choice processes would include future states of affairs as cognitive elements. However one cannot generalize that all choices made in the course of decision process to be rational. Many semi - complex choices would be found, but 'clue-guided choices' are not likely to be frequent, as the consumer will not have many clues to rely on. Whereas forced learning may occur in the awareness phase, information acquisition is the most likely activity in the interest and evaluation phases during which a considerable number of alternatives may be considered and many different information sources will be attended to.

Meyer (1981) constructing a model on multi- attribute judgments under attribute uncertainty and information constraint conclude that if a consumer does not have information on the value of a particular attribute for some alternative, he or she may infer that attribute's value from other available information. His results show that consumers infer a discounted value for a missing attribute value, that is, a value which is less than the average value of that attribute across other alternatives.

Ford and Smith (1987) find that the consumer uses available attribute information for formation of inferential beliefs in consumer evaluations and generalizations. Consumers' inferences about a missing value for a given brand are influenced more by information about other attributes of that brand than by information about the same attribute for other competing brands.

Lynch and Srull (1982) document that novel and unexpected information is more likely to gain attention, to be processed more extensively and to be better recalled. They also conclude that novel information captures attention at the expense of other information in the decision process due to the individual's limited attention and processing capabilities. Therefore new attributes of a product, if perceived novel, are likely to get more importance.

Mizerski (1982) studying experimentally the disproportionate influence of unfavourable information, notify that the findings of the experiment support hypothesis proposing that unfavourble ratings, as compared to favourable product ratings on the same attributes, prompts significantly stronger attributions to product performance, belief strength and affect towards products. People pay more attention to negative information and give it more importance and therefore it is more influential. Since such information is amazing, atypical and unconventional, people conjecture it to be more diagnostic. Negative information also evokes the attitude of attributing a problem associated with the product to the product itself and not to the consumer who uses it. Therefore unfavourable information has a disproportionate influence on decision-making

Furse, Punj and Stewart (1984) in a study on the extent of information search and forethought in the automobile purchases found that about twenty five percent of automobile buyers did no searching for information from outside sources in spite of the fact that the item purchased was important and involved higher financial outlays.

Keller and Staelin (1987) studied the effect of quantity and quality of information on decision effectiveness and suggest that along with the quantity of information, the quality of information also has to be considered. Quality of information is the cumulative importance of information. Their study revealed that increases in information quantity without commensurate *increases in quality, reduced decision accuracy. A given quantity of* information, when quality is increased resulted in better decision accuracy. Consumer confidence increases in magnitude when the total amount of information was enriched both quantitatively and qualitatively.

Herr, Kardes and Kim (1991) in a study on word of mouth and product attribute information assign word of mouth the role of a very important persuasive source as it involves face to face and vivid interactions with another person. According to them word of mouth is, compared to written information, more convincing and more eloquent, and therefore more influential.

Varghese, Ogale and Sreenivasan (1996) commenting on the buying habits of consumers state that their buying practices are on the whole irrational, unintelligent and 'un-businessman-like' because they are poorly informed regarding the availability of products and methods of identifying quality. Basically they lack knowledge of sources of reliable information.

Jacoby, Speller and Berning (1974) attempt to explain that if the amount of information in a choice environment exceed the capacity of the consumers, then they might become confused and make poorer choices. In their study they found that increasing package information load tends to produce dysfunctional consequences in terms of the consumer's ability to select that brand which was best for him. In other words, the subjects felt better with more information, but actually made poorer purchase decisions.

Leckenby (2001) examines the effect of information overload in an online environment and traces the possibility of information overload when people make a choice with an amount of information that exceed their capacity. Information overload was found to be less detrimental for those who have a high-level of product information than for those who have less or no product knowledge. Consumers' product knowledge or information accessibility worked in such a way that it decreases information overload to some degree and increases choice quality.

Hundal and Sandhu (1987) in a case study of buying behaviour of television buyers in Punjab, come to the conclusion that the recommendations of friends and relatives influenced brand selection in a little less than fifty per cent of the cases. In contrast, advertisements contributed to brand selection decision only in thirty nine per cent of the cases.

Bhavani Prasad and Sitakumari (1987) in a study on the impact of advertising on consumer durable goods market, bring in evidence to prove that buyers tend to visit on an average only one shop and shop for durables with pre-determined ideas about purchase of a particular brand. Friends are the main influence in brand choice decisions followed by relatives.

Mallikarjuna Reddy (2001) in a study on audio choice in the twin cities of Hyderabad and Secunderabad found that eighty one per cent of the respondents considered company's reputation as the most important factor while choosing audio appliances. Majority of the respondents considered price as an important factor as they correlated price with quality.

The above review focuses on the buyer information and brand choice problem mainly from the point of view of authors in a developed country setting. Buyer information being an under researched area, there is paucity of relevant literature generated through research in the Indian context. A few marketing research organizations are involved in product -specific and brand -specific studies mainly for improving the marketability of those products and brands. Although National Council of Applied Economic Research conducts Market Information Survey of Households, the main thrust of such studies is on trends in consumption in general and on other related variables contributing to changes in levels of consumption and composition of consumption.

CHAPTER III

INTRINSIC FRIENDLINESS OF THE MARKET AND BUYER CONFIDENCE

A. PROFILE OF RESPONDENTS

Understanding the nature and characteristics of the respondents in the study is crucial for making valid inferences about their information acquisition and choice behaviour. The socio- demographic variables describing the respondent characteristics are categorized under the heads sex, age, education, income, occupation and nature of place of residence. Respondents are also classified on the basis of nature of purchase. The following tables present the distribution of respondents on the basis of the above mentioned variables.

Table.3.1

Gender -wise Distribution of Respondents

Gender	Percent
Male	75.1
Female	24.9
Total	100.0

Source: Primary Data

Table.3.2

Distribution of Respondents according to Age

Age -group	Percent
Less than 25	2.9
25 to 35	34.2
36 to 49	35.5
50 to 64	19.9
65 and above	7.3
Total	100.0

Source: Primary Data

Table.3.3

Distribution of Respondents according to Education

Level of Education	Percent
Less than 10th std	13.9
Less than graduation	26.2
Graduation	25.6
Post graduation	15.6
Technically graduated	10.9
Professional Degree	7.6
Total	100.0

Source: Primary Data

Table.3.4

Distribution of Respondents according to Monthly Household Income

Monthly household income (in Rupees)	Percent
Less than 5,000	23.6
5000to 10,000	20.3
10,000to 15,000	12.3
15,000to 20,000	19.6
Above 20,000	24.2
Total	100.0

Source : Primary Data

Table.3.5

Distribution of Respondents according to Occupation

Nature of Occupation	Percent
Salaried	57.1
Profession	7.6
Manufacture	16.7
Seller -supplier	5.9
Retired / no occupation	12.6
Total	100.0

Source: Primary Data

Table.3.6

Distribution of Respondents according to Place of Residence

Residence	No. of respondents	Percent
Urban	133	44.2
Semi-urban	70	23.2
Rural	98	35.6
Total	301	100.0

Source: Primary Data

Table. 3.7

Distribution of Respondents according to Nature of purchase

Nature of purchase	Percent
First Purchase	60.1
Second Purchase	39.9
Total	100.0

Source: Primary Data

Gender -wise distribution of respondents show that three fourth of the respondents were males. Nearly 70 per cent of the respondents belonged to the two age-groups namely 25 to 35 years and 36 to 49 years, with nearly equal percentage of frequencies in each case.

Distribution of respondents education -wise shows that respondents with education 'more than tenth standard but less than graduation' and 'graduation' together form 50 percent of the total. The monthly household income data show greater concentration of frequencies on the lower and upper income classes, with the two extreme end classes having nearly equal frequencies. The most noticeable feature is that as high as one fourth of the respondents reported monthly household income greater than Rupees 20,000/-

The occupation - wise distribution of the respondents shows that more than half of the respondents in the study were salaried class, with the next higher percentage belonging to self-employed and / or manufacturing group.

Urban based respondents formed 44 percent of the total and 35.6 percent belonged to rural areas. The distribution showing the nature of purchase of the items reveal that 58.9 per cent percent of the purchasers were first time purchasers and 41.1 percent were buying the same item a second time. Few respondents who reported third or fourth purchase are also classified as second time purchasers. The repeat purchasers who are included in the study are buyers who have opted for a different brand of durable under consideration.

B. INTRINSIC FRIENDLINESS OF THE MARKET

Intrinsic friendliness of the market for these goods is conceptualized as a multi - dimensional construct which can broadly be looked at from two angles namely the market environment characteristic with respect to transparency which has direct bearing on efficiency of choice, and the consumer characteristic which determine the ability of the consumer to operate effectively in a given environment. It is assumed that the more favourable the information environment prevalent in the market, the greater the potentiality for operating effectively in the market place.

Four important manifestations of the problem prevalent in the information environment are:-

1. The source efficiency problem.
2. The source credibility problem.
3. Uncertainty arising out of opportunistic distortions by interested parties.
4. Buyers inability to assess quality standards due mainly to:
    a) Inherent information comprehension and processing deficiencies,
    b) Superficial product differentiation and
    c) Technical nature of the decision.

3.1. Buyer Perceptions on Market Choice Friendliness

Attitudes are mental states used by individuals to structure the way they perceive their environment and guide the way they respond to it (Aaker, 1970). Attitude towards the friendliness or absence of it in the market environment is important, as attitudes are precursors of behaviour.

Choice efficiency is a function of market environment. The determinants of the quality of the market to enable efficient choices can generally be classified into:

1. Properties of physical environment
2. Reliability of information
3. Equity in interactions
4. Expertise of participants
5. Quality of outcomes

In the present study, an attempt is made to measure the perceptions of the buyers regarding the intrinsic friendliness or transparency of the market with regard to the above characteristics of the market environment. The objective of the analysis is to capture buyers' retrospections about the different aspects of the market environment in which they operate.

No previously developed and validated scales are known to be prevalent to measure the intrinsic friendliness of market environment. Therefore a scale was developed in the course of this study to measure the intrinsic friendliness of the market environment on the above two dimensions namely consumer characteristics and market environment characteristics with regard to the five determinants of market friendliness detailed above.

The review of existing literature as well as insights derived from qualitative research on the above determinants helped generate a total of 37 items which could be used as surrogates to measure the construct 'intrinsic friendliness of the market environment'. Content validity and face validity tests with inputs from experts revealed presence of redundant items and they were deleted at different stages. Elimination of items that do not characterize the above identified problems evolved a final list of 14 variables, seven variables representing market information environment and seven variables representing the buyers' comprehension problem respectively. Therefore a set of seven items were included for measuring the construct 'perceptions on market place transparency' and seven items pertain to 'perceptions on consumer efficiency to recognize and discriminate'.

The broad headings to which the items pertain to are detailed below.

a) The conceptualization of market transparency was done on the basis of three seller dimensions which are informational, functional, credibility and three dimensions of buyer behaviour namely information, bargaining strength and efficiency to discriminate.

b) The potential vulnerability due to buyers' comprehension deficiencies and limited processing abilities, as also due to the non - transparency of the information environment. The sub - dimensions referred to are 'quality or transparency of the information environment' and 'buyer expertise'.

The scale was framed with statements representing favourable and un favourable items mixed up. Five levels of direction-intensity descriptors were used. They are : Strongly agree, Somewhat agree, Neutral, Somewhat disagree, and Strongly disagree. The favourable statements were worded in such a way as to express the desired state of environment. The unfavourable statements were reverse scored in order to keep consistency of direction. The scale is presented as part of the interview schedule given in Annexure I.

The alpha reliability measure shows and reliability co - efficient of 0.67. This is considered sufficiently high taking into account the fact that the study is set in a background where studies on buyer information problem are not commonplace.

The responses on the 14 variables under study were converted into the following scores for the respective answers.

Table: 3.8

Scores Allotted on Responses

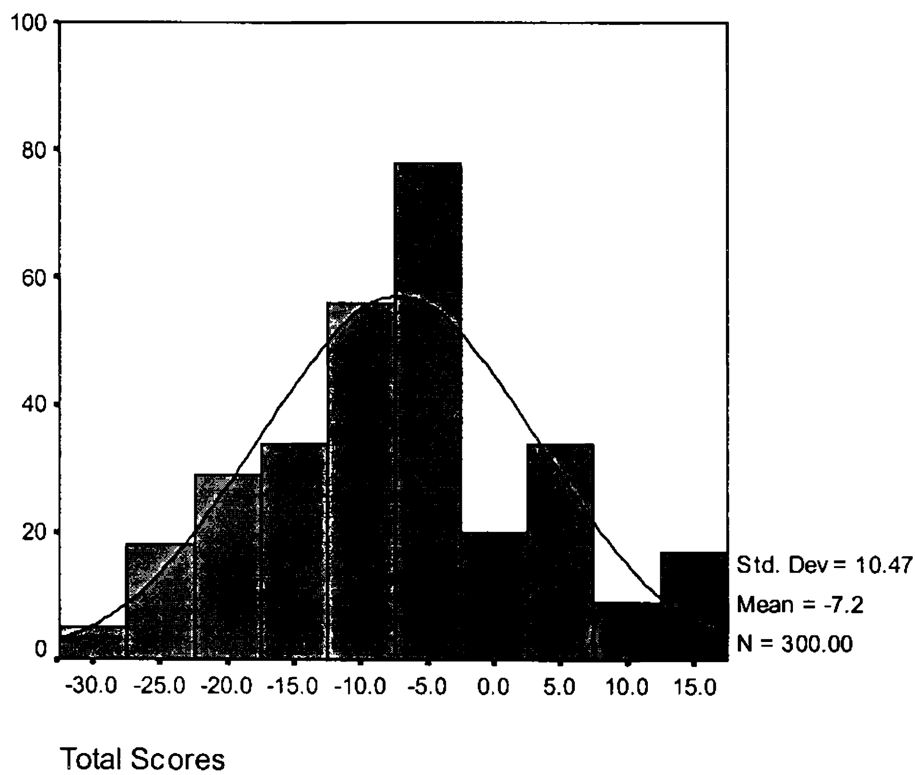
Attitude	Score
Strongly agree	+2
Somewhat agree	+1
Neutral	0
Somewhat disagree	-1
Strongly disagree	-2

The minimum and maximum possible scores for each respondent on the fourteen statements ranges between -28 to+28.

Summated score method was applied to analyze the responses. The total score on these 14 variables for each respondent was calculated. These aggregate scores for individual respondents were categorized into three distinct segments. Clearly inconsistent responses to the questions are antecedents to lack of clear cut idea with regard to the nature of the problem under consideration. Therefore, respondents whose scores are between -3 and + 3 - chosen as arbitrary neighbourhood of zero - are expected to have no concrete idea and therefore are treated as neutral with regard to opinion on market friendliness.

Figure 3.1shows the distribution of total scores.

Figure 3.1
Distribution of Respondents Based on
Summated Scores on the Intrinsic Friendliness Scale



Source: Primary Data

The mean of the distribution is -7.2 and standard deviation 10.47.

The three classes detailed below are formed with group I having scores of values between -28 to -3, group II with total scores between -3 to+3 and group III has scores between +3 and +28. The respondents whose scores range between -28 and -3 felt that the market was intrinsically unfriendly for the task of information acquisition and brand choice, whereas those whose scores fall between +3 and +28 found the market as friendly. The values of the score aggregates closer to plus or minus 28 shows consistently strong opinion in favour or against the stated items in the scale.

The following table shows the distribution of respondents according to the bifurcation of scores mentioned above for determining different groups on the basis of their attitude scores on market friendliness.

Table : 3.9

Distribution of Respondents Based on Scores on
Attitude regarding Friendliness of the Market

Respondent Scores	Per cent of total	Attitude Group
-28 to -3	58.0	Perceived Not Friendly
-3 to+3	27.7	Neutral
+3 and +28.	14.3	Perceived Friendly
Total	100.0	

Source :Primary Data

Group I consists of respondents who reported intrinsically unfriendly information and choice environment. The percentage of respondents in this group is 58. The respondents who fall in Group II are not basically having instantly recognizable notions and as such are considered 'neutral or not having specific opinion' about market friendliness or otherwise. 27.7 per cent of the respondents fall in this category. Group III respondents had opinion weighing favourably and therefore perceived the market as intrinsically friendly. 14.3 percent belonged to this group.

It is worth discussing here that a substantial number of respondents felt that the market was not intrinsically friendly to enable efficient choices.

In order to identify the relative distribution of responses, skewness of responses on each variable was calculated yielding the following results.

Table : 3 :10

Skewness of Items comprising Attitude to Intrinsic Friendliness of the Market

Descriptive Statistics

Items	Skewness	
	Statistic	Std. Error
There are reliable sources	-.049	.160
Easily know the best	.736	.160
Confuse with conflicting claims	.784	.160
Shops are dependable	-.179	.160
Buyers have ignorance	1.097	.160
Wise decisions difficult	.515	.160
There is misrepresentation	.370	.160
Undue influence	.160	.160
Depend on ads	.686	.160
Can choose best brand	.898	.160
Do not know what to look for	.938	.160
Depend on others' choices	1.503	.160
Quality too technical	.174	.160
Not difficult if one tries	.541	.160

Source :Primary Data

The two variables 'availability of reliable sources' and 'shops are dependable' have negative skewness of -.049 and -.174 respectively showing favourable attitude on these two variables. The variables ' buyers' ignorance ' and 'depend on others' choices ' have high positive skewness, showing high degree of perceived unfriendliness on these two counts.

3.2. Socio- Demographic Variables and Perceived Market Friendliness

Perceived friendliness of the market can be studied in relation to various socio-demographic characteristics such as age, income, education, occupation, place of residence and so on. Therefore the analysis of perceived market friendliness of different groups with respect to each such variable is studied.

3.2.1. Age and Perceived Market Friendliness

The following table shows the distribution of skewness of total scores on the scale distributed according to age of the respondents.

Table: 3.11

Distribution of Skewness on Total Scores- Age -wise

Age -group	Skewness of total scores
Less than 25	.181
25 to 35	-.145
36 to 49	-.401
50 to 64	-.255
65 and above	.467
Total	.250

Source: Primary Data

It can be seen from the above table that the sum of responses on the various items on the scale shows negative skewness for all age groups in the middle range except the two age groups at the extreme namely respondents 'below age 25 years' and respondents 'above sixty five years of age'. These two sets of respondents perceived greater unfriendliness for the market in the provision of information for effective choice.

3.2.2. Income and Perceived Friendliness of the Market

Similar analysis was conducted for the variable income of the respondents. The following table shows the distribution of skewness according to different income groups.

Table: 3.12

Distribution of Skewness on Total Scores according to Levels of Income

Monthly household income (In Rupees)	Skewness of total scores
Less than 5,000	.904
5000to 10,000	-.259
10,000to 15,000	.412
15,000to 20,000	.005
Above 20,000	-.325
Total	.250

Source: Primary Data

The results of the analysis show that the skewness of total scores on responses of the lowest income group namely 'monthly household income less than Rs.5000/-' is positive and the highest, implying greater frequencies of total scores on the lower end of the values of the variable. This is evidence to show higher perceived lack of friendliness of the market with respect to information and choice making. The group with the highest incomes namely 'monthly household income greater than Rs. 20,000/-' had skewness on total scores -.325 showing greater concentration of values of total scores on the high end of the values of the variable, meaning higher perceived friendliness of the market with respect to information and choice making.

3.2.3. Nature of Place of Residence and Perceived Friendliness of the Market

The degree of exposure to information and diffusion of information can be expected to be different with respect to different places of residence of the respondents. The skewness of total scores according to place of residence shows the following results:

Table: 3.13

Distribution of Skewness on Total Scores According to Place of Residence.

Residence	Skewness of total scores
Urban	-.102
Semi-urban	-.192
Rural	.347
Total	.250

Source: Primary Data

The total scores of respondents residing in rural areas showed positive skewness of .347 indicating greater perceived unfriendliness compared to residents of urban and semi-urban areas.

Results of analysis of nature and extent of skewness with respect to variables such as education, occupation, gender and nature of purchase did not show any specific pattern of differences between the various groups.

From the above results it can be concluded that the analysis of skewness of total scores on the items comprising the scale measuring intrinsic friendliness of the market shows greater perceived lack of friendliness of the market for groups of respondents who are the youngest, the oldest, having the lowest income or whose place of residence is rural area.

C. BUYER CONFIDENCE

From the foregoing analysis, it is evident that a little more than half of the buyer respondents in the study perceived the information environment to be incoherent for the task of choice. These perceptions are likely to have outcomes which would reduce the self- perceived efficacy of the buyers in the performance of the task of brand-choice. Therefore an attempt is made to measure the buyer self- confidence as felt by the buyers themselves with regard to information acquisition and brand-choice.

Buyer confidence is the extent to which an individual feels capable and assured with respect to his or her marketplace decisions and behaviours (Bearden, Hardesty and Rose, 2001). It is a measure of practical knowledge that the buyer has in acquiring the necessary information before purchase and in making the appropriate brand-choice decisions. It reflects skills and competence to effectively function in the market place to ensure one's advantage in a purchase event. When levels of confidence differ, it can have manifestations on the various constituents of purchase behaviour like search, acquisition and use of information in brand choice. Buyer self confidence is one of the factors that influence the extent and nature of external search. (Wells And Prensky,1996).

Social psychologists in general have reported an inverse linear relationship between generalized and specific self confidence and persuasability. Others report that neither generalized nor specific self-confidence can be determinants of pursuasability in the marketing context (Abe shuchman, 1969).

In order to measure the extent of buyer self confidence, the relevant part of the consumer general self confidence scale developed by the Bearden, Hardesty, Rose (2001) (Annexure III) is adopted with slight modifications to suit Indian conditions. The scale referred to above annexure III measures consumer self-confidence in six dimensions namely, information acquisition and processing, consideration set formation, personal outcomes, social outcomes, personal knowledge and marketplace interface. The variables adopted in the present study pertains to buyer self -confidence as felt by the buyer with respect to two dimensions of information acquisition and consideration set formation broadly represented by the following scale items :

1. Sources of information to be explored pre- purchase.
2. Recognition of brands that meet own expectations and therefore worthy of forming part of the consideration set.
3. Buyer skills with respect to finding necessary information and assessing the value of such information.
4. The ability to discriminate between retail outlets.

Reliability of this scale for the present study was tested using Alfa-split -half method- and the coefficient Alpha estimates for internal consistency reliability are as follows

Table: 3.14

Reliability Analysis -Scale measuring Consumer Confidence (Split-Half)

Coefficient of Concordance	W= .0745
Reliability Coefficients	8 items
Correlation bet. Forms. = 7673	Equal-length(Spearman-Brown)= .8683
Guttmann Split-half = .8680	Unequal-length(Spearman-Brown)= .8683
Alpha for part 1 = .7883	Alpha for part 2 = .7302
4 items in part 1	4 items in part 2

Source: Primary Data

Principal component analysis was done in order to converge the information contained in eight variables under consideration. The following tables show the results.

Table: 3.15

Iteration History

	Variance Accounted For		Loss		
Iteration Number	Total	Increase	Total	Centroid Coordinates	Restriction of Centroid to Vector Coordinates
21	5.129890	.000008	10.870110	10.675701	.194408

Source: Primary Data

Table: 3.16

Correlations of Transformed Variables

	Where to look for info.	All sources of info.	Confident in ability to research info.	Skill to get info.	Brand that meet expectations	Sure of shops to go to	Assess value of info.	Recognize worthy brands
whlukfor	1.000	.482	.449	.427	.292	.525	.317	.343
allsource	.482	1.000	.625	.417	.512	.568	.475	.215
confres	.449	.625	1.000	.582	.588	.412	.432	.324
skilinfo	.427	.417	.582	1.000	.690	.439	.596	.475
meetexp	.292	.512	.588	.690	1.000	.437	.451	.358
suroshop	.525	.568	.412	.439	.437	1.000	.507	.235
asvalinf	.317	.475	.432	.596	.451	.507	1.000	.368
recbr con	.343	.215	.324	.475	.358	.235	.368	1.000
dimension	1	2	3	4	5	6	7	8
eigenvalue	4.176	.953	.792	.662	.477	.428	.299	.212

Source: Primary Data

The following table shows component loadings of different variables.

Table: 3.17

Component Loadings of Different Variables

Items	Dimension	
	1	2
Where to look for information.	.653	-.313
All sources of information.	.755	-.411
Confident to research purchase	.778	-.059
Skills to obtain information.	.812	.339
Brands that meet expectations	.765	.209
Sure of shops to go to	.717	-.397
Assess value of information.	.721	.120
Ability to recognize worthy brands	.545	.594

Source: Primary Data

The distribution of the loadings shows considerable loadings on all variables except 'confidence regarding ability to recognize brands worth considering'.

Table: 3.18

The Variations Accounted for by the First Two Principal Components

Dimension	Cronbach's Alpha	Variance Accounted For
		Total (Eigenvalue)
1	.869	4.176
2	-.057	.953
Total	.920	5.130

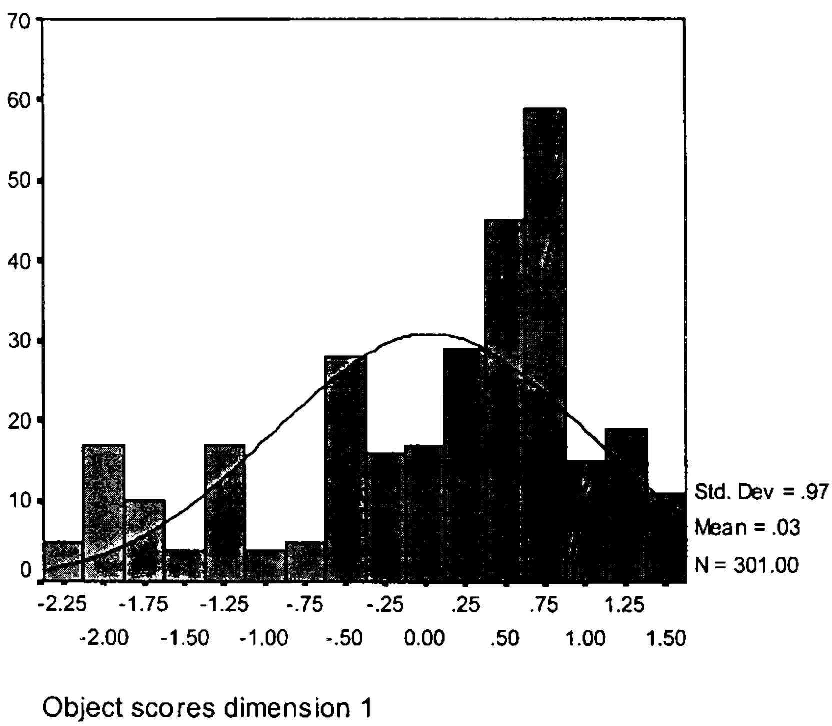
Source: Primary Data

As can be seen from the above analysis, the first principal component explains 81.4 percent of variance and therefore only the first principal component is considered. Therefore the analysis that follows pertains to the first principal component only. Consequently the results are affected by potential deficiencies and errors on account of leaving out nearly 19 percent of the variation. Since only one Principal component is considered uni-variate techniques are adopted.

The overall measure of consumer self-confidence is depicted below as the histogram of principal components as follows.

Figure 3.2

Distribution of First Principal Component - Confidence



(Scores on Principal Component -1 Consumer Confidence.)

Source: Primary Data

The skewness of the above distribution is - 0.801 which explains a high degree of negative skewness. The study reveals that the extent of self-reported self-confidence with respect to information acquisition and search is very high.

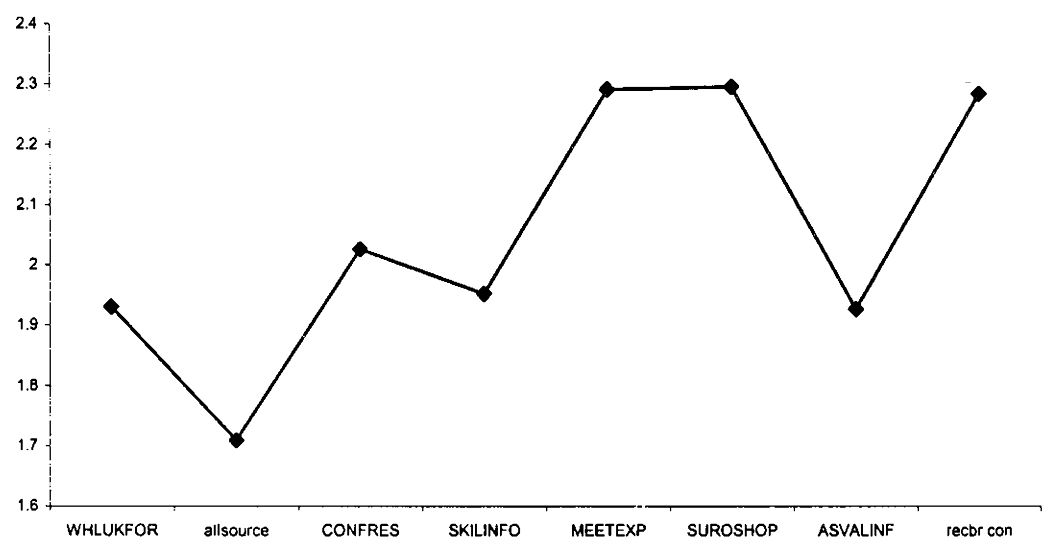
3.3. Distribution of Principal Component Values for Different Variables

The distribution of the values of principal components for the eight variables representing confidence with respect to acquisition of information and brand-choice is given in the line graph that follows.

Figure: 3.3

Distribution of Principal

Component Values for Different Variables.



Source: Primary Data

Out of the eight variables, the variables on which the highest reported confidence is observed are with respect to 'recognition of brands that meet expectations', 'certainty about the shops to go to' and 'the ability to recognize the brands worth considering'.

3.4. Classification of Respondents on the basis of Object Scores of Confidence

The first principal component is bifurcated on the basis of standardized values. An arbitrary value of 0.5 is chosen for demarcating the reported confidence of the respondents into two classes namely 'highly confident' and 'confident'. Those respondents whose principal component values are less than zero are labeled 'not-confident'. Those who had values of principal components between zero and 0.5 are termed as 'moderately confident' and those who corresponded to principal component values greater than 0.5 are referred to as 'highly confident'. The analysis thus yielded three types of reported confidence groups. The percentage membership of each such group is shown in the following table.

Table: 3.19

Distribution of Respondents into Different Groups Confidence -wise

PC Value	Percentage of respondents	Label
Less than zero	39.8	Not confident
0 to 0.5	15.25	Moderately confident
Greater than 0.5	45.00	Confident

Source: Primary Data

A little less than 40 percent of the respondents had negative values on the first principal component and therefore they are categorized as 'not confident', 15.25 percent were 'moderately confident'. The most noteworthy finding is that 45 per cent of the respondents reported themselves as 'confident' in information search and choice of brand.

3.5. Socio-demographic Variables and Expressed Confidence

Consumer confidence differences for various demographic variables are studied to explore the possibility of linkage between these variables and expressed confidence. The variables, association of which is studied are age, sex, education levels, income and occupation levels each relating to socio-economic aspects of the buyer and two other variables namely nature of purchase and item purchased. As such, seven separate ANOVA was conducted with buyer demographics age, sex, education, income, occupation, item purchased and nature of purchase as independent variables.

3.5.1. Buyer Confidence and Age

Buyers differ in their confidence with regard to information acquisition and search. Age can be an important variable which determines the extent of confidence.

The average of PC representing consumer confidence for various age groups is as follows :

Table: 3.20

Age - wise Distribution of Values of Mean of First principal Component

Age in yrs	< 25	25 - 35	36 - 49	50 - 64	> 65
Mean PC	-.509	.083	.223	.045	-1.330

Source: Primary Data

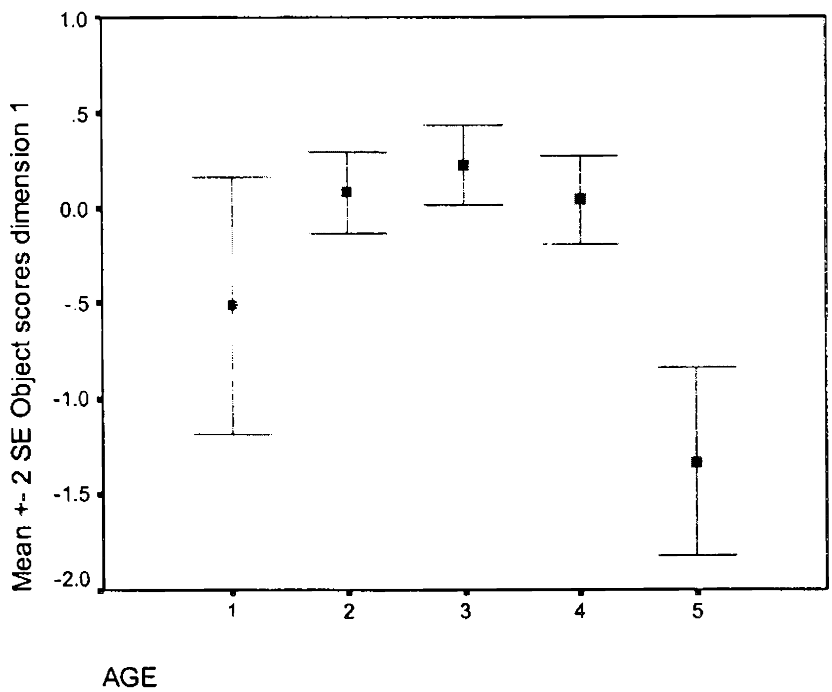
It is evident from the above table that the expressed confidence levels represented by mean- values of first principal component is negative for the age groups 'less than 25 years of age ' and 'above 65 years of age'. The values are respectively -.509 and -1.330. Both the age groups come under the category 'not confident'. Therefore further analysis is conducted on the expressed confidence of different age groups.

3.5.2. Error bar of confidence for different age groups

Graphical representation of age group wise distribution of expressed confidence using error bar is shown below.

Figure : 3.4

Age-Group wise Distribution of Expressed Confidence



Source: Primary Data

The first age group i.e. 'age less than 25' and the fifth age group i.e. 'above 65 years of age' are significantly different from other age groups. Therefore the reported confidence is less for the oldest and the youngest age groups. However the respondents who were older than 65 reported least confidence with regard to information search and choice. The three middle age groups viz. '25 - 40 years', '40 to 50' and '50 to 65 years' reported somewhat the same level of confidence. ANOVA was conducted to examine whether the three middle age groups had similar confidence. Therefore the hypothesis 'Confidence with regard to information search and choice of different age groups are the same' is tested for significance. The following table shows the results.

Table: 3.21

Chi-square test for Independence -Confidence and Age

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	1.212	2	.606	.718	.489

Source: Primary Data

The results of the Chi square tests show that P value is greater than 0.05 and therefore we conclude that there is no significant difference between the confidence expressed by these three age groups.

It is of interest to find if the two extreme age groups namely 'less than 25' and 'above 65' have the same levels of confidence. Assuming equal variances, Student's T test was conducted. The results are tabulated below.

Independent Samples Test

Table: 3.22

Result of Independent Samples t - test of Confidence of Two Extreme Age Groups

	Levene's Test for Equality of Variances		t-test for Equality of Means		Sig. (2-tailed)	M Diff
	F	Sig.	T	df		
Equal variances not assumed			1.961	14.644	.069	.82080

Source: Primary Data

ANOVA results show that there is no significant difference between these two age groups with regard to reported confidence and therefore we accept the hypothesis that these two groups have equal mean of principal component value of confidence.

Similar analysis was conducted in the case of other variables. The hypotheses considered were that there is no significant difference between various groups representing different values of variables namely, education, income, occupation and item purchased in respect of reported confidence in information acquisition and brand choice.

The results of the ANOVA are tabulated below:

Table: 3.23

Results of ANOVA Conducted for Testing Significance of Difference in Respect of Reported Confidence

Variable	Mean Square	F	Significance	Accept/Reject Ho
Education	11.966	15.844	.000	Reject
Income	12.207	15.245	.000	Reject
Occupation	12.030	14.965	.000	Reject
Item Purchased	3.121	3.345	.000	Reject

Source: Primary Data

Detailed discussion with respect to the ANOVA results tabulated above are presented below.

3.5.3. Education Levels and Confidence

The results of categorical ANOVA (given in table 3.23 above) shows that the two attributes education and confidence are not independent. The levels of expressed confidence by different groups having different levels of education is shown in the following table.

Table: 3.24

Levels of Education and Mean value of PC -1 for Confidence

Education	<10th	<Grad	Grad.	Post-gr.	Technical	Professional
Mean PC	-.180	-704	.559	.245	-.218	.696

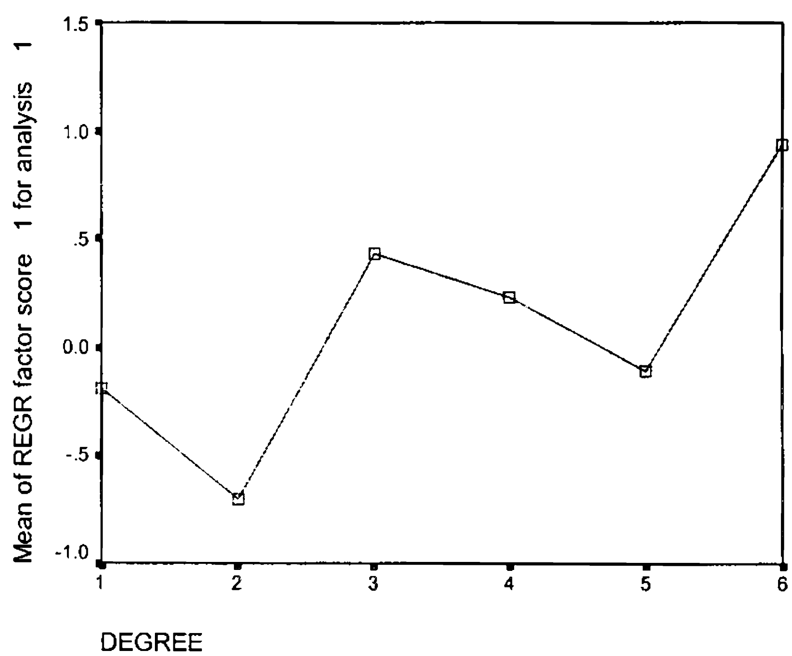
Source: Primary Data

The confidence levels of different groups having different levels of education are different. The highest confidence was reported by respondents with professional degree, followed by graduates. The least score is for the category 'less than graduation'. The respondents who are 'technically graduated ' had mean standardized score less than zero, a negative value very close to the scores of the respondents who came under the first category 'less than tenth standard '.

The above results are presented using the line graph shown below.

Figure: 3.5

Education levels and Mean Score on PC 1-Confidence



Source: Primary Data

3.5.4. Income Levels and Confidence

The mean PC for various income groups are as follows.

Table: 3.25

Distribution of Income in' 000s of Rupees and Mean value of PC-1- Confidence

Income	<5	5 -10	10-15	15-20	>20
Mean PC	-.653	-.226	.142	.673	.223

Source: Primary Data

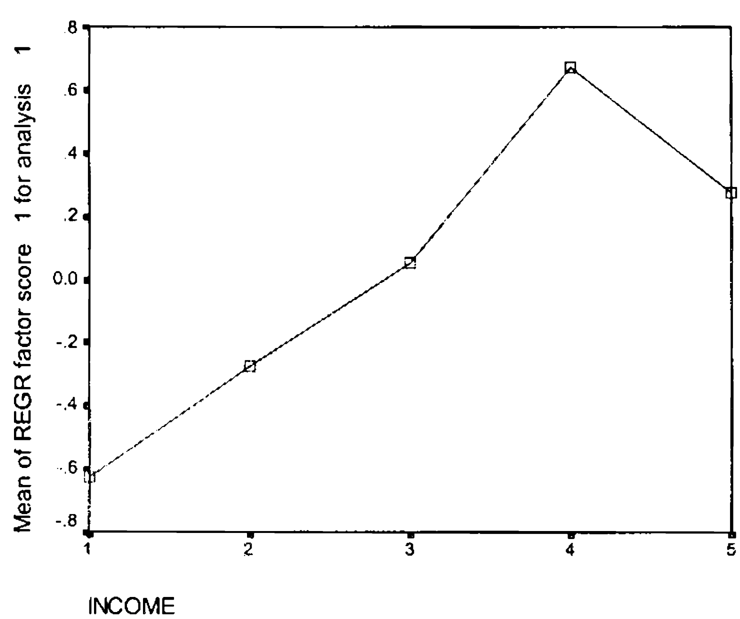
Significant differences are observed with regard to expressed confidence for different income groups. The general tendency of confidence is to rise as income increases. The lowest income group exhibited tendency to have the least confidence. The mean of the regression factor scores show negative values for the first two classes of income groups which is classified as less than Rs. 5,000 and Rs. 5000- Rs.10,000 /-

The above results are presented graphically as follows.

Figure: 3.6

Levels of Income and Mean Value of PC 1-Confidence

Confidence -Income



Source: Primary Data

3.5.5. Buyer Confidence According to Occupation

The reported confidence with regard to information acquisition and choice for various occupation groups are as follows.

Table: 3.26

Occupation and Mean Score of PC-1 Confidence

Occupation	Salaried	Profession	Self. empl.	Manufacture	Others
Mean PC	.182	1.001	-.307	-.667	-.724

Source: Primary Data

The hypothesis stating equal confidence for different occupation groups is rejected. The results of the study show that expressed confidence of different occupation groups are different. While positive scores are found in the case of 'salaried' and the 'professional group', the highest mean score is for the professional group. The group labeled 'others' comprising of respondents who had casual jobs, the unemployed, the housewives and the retired expressed the lowest confidence. Their mean PC score for the group representing 'others' is as low as -.724 which is in sharp contrast with the figure for mean PC value of 'professionals' which is 1.001.

3.5.6. Confidence and Gender of the Respondents

In a social set up where major decisions are the male prerogative, it is natural that we must expect gender differences in capabilities with respect to information acquisition and choice. As such the hypothesis 'there is no difference in confidence between male and female with regard to expressed confidence' was tested.

The following cross tabulation shows the distribution as percentage of total of the respondents gender and confidence wise.

Table: 3.27

Distribution of Respondents according to Confidence and Gender

Cross tabulation (Per cent of total)

Gender	Confidence Group			Total
	Low	Moderate	High	
Male	29.0	10.4	35.9	75.3
Female	10.8	4.8	9.1	24.7
Total	39.8	15.2	45.0	100.0

Source: Primary Data

Table: 3.28

Results Chi-Square Tests for Independence -Confidence and Gender

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	2.292	2	.318
Likelihood Ratio	2.291	2	.318

Source: Primary Data

The table value above showing the chi-square test for independence shows that the P value is greater than 0.05 and therefore we conclude that there is no significant difference between male and female in the matter of reported confidence and that the results are compatible with the hypothesis.

3.5.7. Nature of Purchase and Expressed Confidence

The novices are empirically found to have less confidence than the non-novices who have had experience with the product- though not the brand - before. Therefore the hypothesis that novices and non- novices have equal reported confidence is tested.

Table: 3.29

Chi-Square Tests for Independence- Nature of Purchase and Expressed Confidence

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	166.855	65	.000
Likelihood Ratio	220.884	65	.000
Linear-by-Linear Association	.464	1	.496

Source: Primary Data

The test results show that the P value is lesser than 0.05 and therefore we reject the hypothesis and conclude that there is some association with regard to nature of purchase and confidence. The results from the data show that novices and non novices differed in the extent of expressed confidence.

The above analysis shows that there is significant difference with regard to expressed confidence for different age, education, income, occupation groups. The first purchasers and second purchasers as well as the purchasers of different items under study differed in confidence. But there is no difference in confidence between male and females.

One limitation of the study of perceived confidence is felt to be that the respondents tend to attribute more and unwarranted knowledge about brand awareness and choice, most probably due to their tendency to mistake their perceptions for knowledge. To that extent consumer behaviour with respect to perceived confidence in information search and brand choice is not a mature field of study in the given information setting.

CHAPTER IV
EXTENT OF EXTERNAL SEARCH

To answer the question why people buy a particular alternative, it is important to understand what precedes that stage. Our analysis on the friendliness of the market revealed the fact that buyers are sceptical about the nature of the information infrastructure and choice environment in which they find themselves. The pertinent question at this juncture is, given the properties of the market environment, what behaviour do they carry out by way of search for information to resolve the problem of choice.

Ger, Belk and Lascu (1993) writing on marketing and developing economies maintain that consumers in former communist countries have been experiencing confusion in their search for information on products and services because they lack knowledge on how to judge quality, how to acquire information and how to evaluate alternatives. Consumers in these new market economies are faced with an abundance of choices never before experienced. As a result, many consumers rely on friends' choices or buy prestige brands rather than searching in detail. In this backdrop, one should expect similar behavioural dispositions in the case of buyers in newly globlised economies.

In the case of the specific appliances chosen for the study, the buyers are encountered with the problem of making clear distinctions between products which are apparently and functionally similar and serving the same purpose. Some amount of incidental learning which is not deliberate takes place often. In the case of goods for which the probability of involvement is high, buyers will not be satisfied with the information that they have learned incidentally. They are, in all probability, more likely to make attempts to resolve this problem by engaging in active information search. The non- availability of information from sources which are believed to be reasonably reliable by the buyers will restrict the opportunity to search for information. Therefore the study proposed to find the extent and nature of information search done by the buyers before purchase.

From the analysis detailed in chapter III, we have developed buyer taxonomies based on intrinsic friendliness of the market. The nature of the market confronted by the buyers should be expected to have influence on the nature and extent of search done by buyers.

4.1. The conceptual issues

4.1.1. The Cost- Benefit Framework

The amount of pre-purchase information search is determined by the buyers through a cost -benefit analysis. The costs of information search include the cost of search and the computational efforts involved in deciding the type and sources of information search. The extent of search that has to be put in, in a particular context is decided by the decision maker by striking a trade-off or compromise between the desire to make a correct decision and the desire to minimize effort (Bettman, Johnson and Payne, 1991).

The total cost of search is the sum of

1. Direct objective costs
2. Direct subjective costs
3. Indirect objective costs and
4. Indirect subjective costs

The benefits of search would include the probability that it will result in better quality decisions and therefore less regrets about the choice later (Scott Maynes, 1973).

External search is defined as the degree of attention, perception and effort directed towards obtaining environmental data or information related to the specific purchase under consideration (Engel Blackwell Miniard, 1998).

4.1.2. External Search

Information search and acquisition occur mostly during the interest and evaluation phases during which buyers tend to tap many different information sources and consider different alternatives. Durable product purchases being sufficiently important to elicit involvement, it is possible for the respondents to distinguish, without much difficulty, between interest and evaluation phases. However the present analysis is restricted to information search during the alternative evaluation phase, that is the phase succeeding the decision to buy phase, when decision to buy has taken place but the specific decision regarding the brand has not been arrived at. Therefore, incidental ongoing search is excluded and deliberate pre-purchase external search alone is included. The analysis of external search is based on the frequencies reported by the buyers regarding the various activities undertaken by them which may be documented as search. Involvement and external search are assumed to be positively correlated. The study also will throw light on the intensity of search and deliberation the buyers have exercised before purchase.

4.1.3. Variables Affecting Search

Buyers vary in their inability to tolerate cold winds of ignorance while making purchase decisions. Therefore, buyers differ in their attitude towards information search and gathering (Stigler, 1970). This is reflected in variations in the amount and type of information collection effort engaged in by different people. Many studies have examined the extent of search and correlated variables. Hansen(1972) points out uncertainty reduction to tolerable levels as the reason for information search. Moore and Lehman

(1980) establishes relationship between uncertainty and extent of search. Alba And Hutchinson (1987) and Russo (1984) argue that uncertainty actually reduces search behaviour. Urbany, Dickson and Wilkie (1985) identified two types of uncertainty viz. knowledge uncertainty and choice uncertainty. Their findings were that while choice uncertainty apparently increased search, knowledge uncertainty had a weaker effect on search.

Katona and Eva Mueller (1954) compiled an index of deliberation to explain the extent of pre-purchase effort indulged in by buyers before making purchase decisions. Kiel and Layton's (1981) study on the behaviours and correlates of information seeking by Australian new car buyers examines three dimensions of information seeking - a source dimension, a brand dimension, and a time dimension. Using cluster analysis, consumer taxonomies based on such behaviour were developed. They are - a high search group, a low search group, and a group consisting of three clusters of selective information seekers. Investigating the structure underlying twelve search variables, the study identified four factors which accounted for 62 percent of total variance. They are retailer search, media search, inter personal search and time spent on search.

Beatty and Smith (1987) developed derived weights based on the search indices developed by Duncan and Olshavsky, on television sets and Bennett and Mandell for automobiles where interpersonal search neutral sources search, retailer search and media search are assigned weights one, two, four, two respectively, implying equal weight for media and neutral sources search.

The major determinants of pre-purchase search are involvement in the purchase, market environment and situational factors. People differ in their ability and motivation to gather information. Kassarjian (1981) correlated search effort to involvement of consumers in the purchase activity and identified three consumer types - high involvement, low involvement ("detached type") and low involvement ("know nothing").

Market environment is another variable which determines pre-purchase search. Information search is greatly reduced when well known brands are available. Consumers tend to lump these brands into a 'safe' or 'low risk' category on the basis of familiarity (Sheth and Venkitesan, 1968). The disinclination to seek out information need not be regarded as irrationality on the part of the consumer because the total volume of information from a thorough search could be so confusing that the consumer might well decide that he would have been better off without it. Failure to inform one fully about alternatives and attributes is commonplace. This is mainly due to the various costs of information search and the inadequacies in the communication systems that service consumers with information (Chaffee and Mc Leod, 1973).

4.1.4. Variables Considered in the Study

Some bases of market behaviour are cognitive while some are affective in nature. While the rationality or otherwise of a choice cannot be questioned, we can well evaluate it in terms of procedural rationality, assuming behaviour to be procedurally rational when it is the outcome of appropriate deliberation (Simon, 1964). Deliberation reflects the amount of thought which the individual gives to a particular problem, the extent of enquiry into own knowledge and extent of comparison and evaluation (Hansen, 1973). However, the internal psychological processes which a buyer goes through are not attempted to be explored in the present study.

Information search is a multi-dimensional construct. There are many sources from where information can be sought, as well as many types of information that are worth giving attention to. Therefore the number of sources used is taken as an item in the measurement scale adopted. Having felt the need for the product and since such purchases involve generally no routine or impulse buying, consumers spend time thinking about which brand to buy and exploring the possible sources of information. Buyers differ considerably in the duration of time expended on searching and decision making. The time intervals differ according to the product under study (Newman and Staelin, 1972). Therefore time spent on search is considered as an item under study.

Preliminary survey involving 40 respondents revealed either no use of neutral sources or use of sources which were apparently neutral by less than one percent of the respondents. As such, in the measure of external search, the item 'neutral sources search' is not included. Also discussions with spouse and children as an external source is precluded due to conceptual and measurement problems. Correlates of search activity are studied. Certain constructs which approximate to information search namely number of persons consulted, the number of shops visited, number of alternatives considered, time spent searching for information etc. are assumed to reasonably represent deliberation and has been considered in the scale, to explain the extent of pre-purchase effort indulged in by the buyers before arriving at a decision, given the extent of internal search. The extent of information search is also used as a criterion for segmenting respondents as search is treated as a behavioural characteristic in the study.

The products chosen in the present study inherently warrant extended search time and decision making time. The time spent on purchase also represents deliberation and research to a great extent and also reflects a person's attitude towards developing confidence about the performance of the brand through physical examination of different brands on a side by side comparison basis and also through demonstration. Minimum time spent can either represent lower levels of motivation in information search, or a pre-conceived notion of the futility of search generated from felt inability of discriminating between different brands and a distaste for shopping around. The time so spent, as reported in many cases, coincide with the time for accumulating the necessary financial resources for the purchase when people did not have a preference for availing of consumption credit or hire purchase facility.

Another dimension of search behaviour is the number of brands about which the consumer sought out information. Usually there are pertinent and extraneous variables that affect the choice of alternatives to be considered. The number of brands considered can be presumed to reflect the magnitude of search. Yet another construct is the number of attributes on which information is sought. Considering such multiple manifestations of information search, a scale was developed with seven relevant variables singled out from the scales developed by Kiel and Layton (1981), Sharon E. Beatty and Scott M. Smith (1987) and P. Dickson and William Wilkie(1991) for measuring the same construct. Each item was assigned with four alternative responses. The list of variables considered in the three scales referred to is given in Annexure IV.

The measure of external search is based upon seven items representing four major dimensions of search as detailed below.

1. Sources explored for search namely retailer search, inter -personal search and media search.
2. Number of alternatives considered.
3. Number of attributes weighed up.
4. Time spent on search.

Six behavioural frequency questions and one question on dimension of time spent on information seeking were asked. Each of behaviours was measured by requiring the respondents to recall the frequency of such actions during the pre-purchase information search process. The time dimension of search includes time spent in number of days thinking about which brand to buy and searching for information.

It is argued that in the response formulation process the respondents may have a tendency to use processes other than episodic enumeration. Since buying of durables are infrequent and the choice process is most often vividly re-collectible and also since the data are collected within three weeks of purchase when memory is still fresh, the problem of omitting important episodes is less. Therefore the errors due to under reporting or over-reporting of frequencies, though cannot be ruled out, are expected to be minimized.

4.2. Relative importance of various search dimensions

The table below shows the mean, standard deviation and skewness of the various dimensions of search. The highest mean is for the number of characteristics on which information was sought while the lowest is for number of media searched.

Table: 4.1

Descriptive Statistics of Frequencies of Search Variables

Search variables	Mean	Std. Deviation
No. of characteristics	3.01	1.01
No. of persons	2.42	1.34
No. of alternatives	2.16	.95
No. of sources	2.03	1.05
No. of retailers	2.03	1.25
Time seeking (Days)	12.7	1.01
No. of media	1.70	1.19

Source: Primary Data

It is evident from the above analysis that buyers do not indulge in elaborate pre-purchase search for information. On an average they consulted 2.42

people, 2.03 numbers of sources, visited 2.03 numbers of retailers and used 1.70 numbers of media. The time spent as reported by buyers on deliberation and pre-purchase search averaged to 12.7 days.

An important dimension of search behaviour is the number of brands about which the buyer seeks information. It is well known that the size and composition of the consideration set has important implications for consumer choice. Many studies have reported that consumers usually consider only few alternatives even when many alternatives are prevalent in the market. There are internal psychological factors as well as extraneous factors that influence the size of the considerations set. The size of the consideration set on a given choice occasion reflects the trade-off between the cost of searching for and evaluating more alternatives and the increase in utility that can be expected from such an increase in the number of items in the consideration set (Hauser and Wernerfelt, 1990). The more costly it is to acquire information relative to the expected gains of information, the fewer the number of alternatives about which the consumers inform themselves and the more inelastic the demand curve (Nelson, 1970).

Kahn, Moore and Glazer (1987) assign two reasons for considering less number of alternatives viz. 'Buyer involvement' and 'Constrained choice'. The latter occurs when situational or extrinsic factors dictate a specific set of partitions. Making use of the concept of constrained choice in consideration set formation in markets with the specified asymmetries, the possibility of resorting to formation of choice sets predominantly known either by advertisements or by use by others is high.

The first step in the choice process is delimiting the acceptable and unacceptable alternatives. It depends on the recall of brands based on various criteria like familiarity, salience, preference etc. The boundary of consideration set for a choice is preset by some criterion of familiarity. Mostly these are brands which are predominantly prominent by advertisements or recognized as being used by others who are significantly meaningful to us as evidenced from our analysis which are presented later in the study.

The average number of alternatives considered or the size of the consideration set was as low as 2.16. Incidentally 'the number of alternatives considered' has the lowest standard deviation indicating a high degree of consistency in this aspect. Considering only two or three alternatives alone when many are actually available in the market, cannot be taken as a sign of 'buyer involvement with knowledge' as suggested by Kahn, Moore and Glazer (1987). Therefore it is possible to generalise that buyers do not consider all 'possible' alternatives while purchase decisions are made.

The highest average of 3.01 is observed in the case of the number of product characteristics on which the buyers sought to find information. The product characteristic refer to only the physical characteristics of the product like specific physical features, functions, colour, design, size etc. The standard deviation of the various measures of information search is consistent in magnitude, with the least score on variation for the item 'the number of alternatives 'considered.

The findings are in conformity with earlier studies (eg. Katona and Mueller, 1955). However, these earlier studies pertain to countries which did not share the asymmetries and features observed in the present market configuration. Kiel and Layton (1981) reported that more than 30 per cent of the Australian car buyers visited only one shop and 36 percent only two shops. In another study. Claxton, Fry and Portis (1974) found that typically buyers of cars and major appliances searched less. Fifty percent of them visited only one store, 27 percent visited two or more stores and only 23 percent visited three or more than three stores. This is evidence to show that consumers making complex purchase decisions seldom make extensive search for information or evaluate alternatives completely.

One of the most frequently identified methods of simplifying the decision is to create a cut off on one or more attributes. A cut -off exists when they decide a predetermined acceptance level for an attribute. The decision maker then eliminates any alternative that fails to surpass the minimum acceptable level. Such cut - offs are the basis of the well known compensatory choice strategies (Scitovsky, 1972). The question is whether such cut - offs are influenced by external factors present in an information context. This aspect is considered in the forthcoming chapters.

Further analysis aimed at determining the relationships among the seven search variables representing various dimensions of search is based on multivariate analysis of items in the modified scale, mentioned in the former part of this chapter. Scale Reliability was checked using Alpha reliability (split - half) which indicated the level of reliability as shown below :

Table: 4.2

Results of Reliability Analysis of Scale Measuring External Search

(Alpha- Split half)

Reliability Coefficients

N of Cases = 301	N of Items = 7
Correlation bet forms = .6114	Equal-length Spearman-Brown = .7589
Guttman Split-half = .7580	Unequal-length Spearman-Brown = .7589
4 Items in part 1	3 Items in part 2
Alpha for part 1 = .6872	Alpha for part 2 = .6726

Source: Primary Data

The scale possesses reasonably high validity. For reducing the data into principal component analysis spline ordinal assumption was applied. The following results emerged.

Table: 4.3

Iteration History

	Variance Accounted For		Loss		
Iteration Number	Total	Increase	Total	Centroid Coordinates	Restriction of Centroid to Vector Coordinates
16	4.863821	.000006	11.136179	10.772939	.363240

Source : Primary Data

Table: 4.4

Model Summary: Variance Accounted For by Dimension 1 and 2.

Dimension	Cronbach's Alpha	Variance Accounted For
		Total (Eigenvalue)
1	.824	3.582
2	.251	1.282
Total	.908	4.864

Source: Primary Data

a Total Cronbach's Alpha is based on the total Eigenvalue.

Table: 4.5

Correlations Transformed Variables

Fourth factor	No. of sources	No. of characteristics	No. of alternatives	No. of retail shops	No. of media	No. of persons	No. of days seeking
No. of sources	1.000	.498	.631	.346	.564	.380	.492
No. of characteristics	.498	1.000	.292	.005	.332	.308	.438
No. of alternatives	.631	.292	1.000	.303	.346	.274	.320
No. of retail shops	.346	.005	.303	1.000	.375	.217	.363
No. of media	.564	.332	.346	.375	1.000	.419	.357
No. of persons	.380	.308	.274	.217	.419	1.000	.565
No. of days seeking	.492	.438	.320	.363	.357	.565	1.000
Dimension	1	2	3	4	5	6	7
Eigen value	3.292	1.020	.882	.633	.575	.332	.266

Source: Primary Data

The following table shows the loadings of the items on the first principal component which alone is considered for further study. The loadings on the second dimension are insignificant.

Table: 4.6

Component Loading variable Principal Normalization

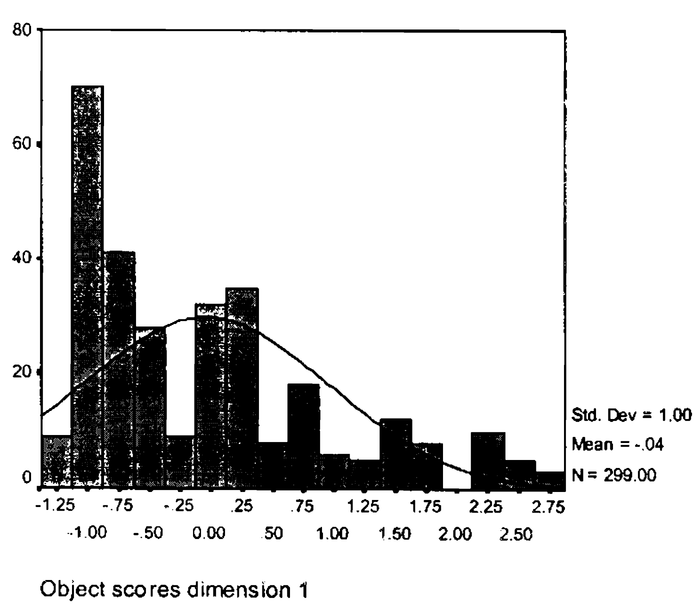
Items	Dimension	
	1	2
No. of sources	.848	-.002
No. of characteristics	.631	.673
No. of alternatives	.672	-.176
No. of retail shops	.525	-.730
No. of media	.703	-.105
No. of persons	.714	.085
No. of days seeking	.748	.124

Source: Primary Data

The Histogram showing the distribution of the first principal component is presented below.

Figure: 4.1.

Distribution of Principal Component-1 -Search Comprehensiveness



Source: Primary Data

Skewness calculated on the transformed data revealed the presence of a very high degree of positive skewness +0.8633 which indicate high concentration of frequencies in the lower end of the search dimensions.

From table 4.4 above it can be seen that the first principal component accounts for 73.64 percent of the variance. Therefore only the first principal component is considered. K means cluster analysis revealed three clusters of search segments based on external search comprehensiveness namely 'low - search oriented', 'moderate- search- oriented' and 'high-search-oriented'. The resulting clusters and their respective percentages of respondents are shown below:

Table: 4.7

Distribution of Respondents according to Search - Cluster Membership

Group Name	PC Values	Label	Percentage of Respondents.
Group I	<-0.5	Low Searchers	47
Group II	-0.5to +0.5	Moderate Searchers	27
Group III	> 0.5	High Searchers	26

Source: Primary Data

The clustering is done based on Principal Components representing seven variables.

4.3. Confidence and Search

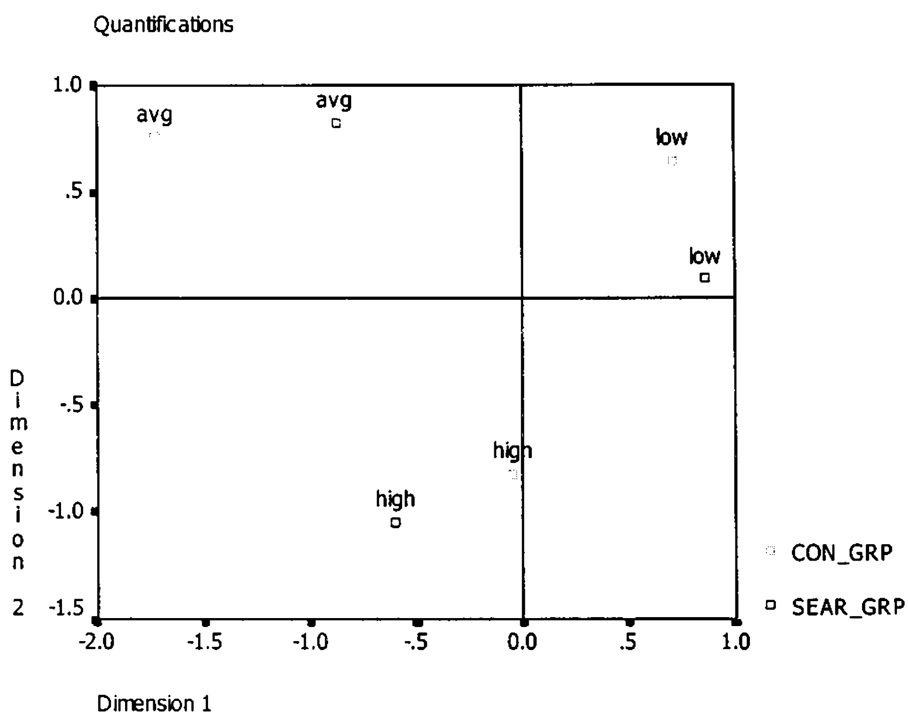
The previous two analyses pertained to the two behavioural responses buyers have expressed, given the information environment discussed earlier in chapter III. It was felt worth considering whether the two dimensions of search and confidence are related.

The tool of correspondence analysis was used to describe the correspondence between the two behavioural characteristics of search and confidence. One of the goals of correspondence analysis is to describe the relationships between two nominal variables in a correspondence table in a two - dimensional space, while simultaneously describing the relationships between the categories for each variable. For each variable, the distances between category points in a plot reflect the relationships between the categories with similar categories plotted close to each other.

The analysis generated the following bi-plot.

Figure 4.2

Correspondence between Confidence and Search.



The bi -plot shows that the two attributes search and confidence are associated. The behavioural dispositions of 'high search' and 'high confidence' are associated. Similarly confidence and search at the other two levels namely 'moderate search' and 'moderate confidence' (represented by 'avg' in the above bi-plot) and 'low search' and 'low confidence' are identified to be having one to one correspondence.

4.4. Nature of Purchase and Search Group Membership

Given the information environment, the first purchasers and the second purchasers are most likely to be different in their search for information. The first purchasers generally have less exposure to the product or brand, and this should make them more extensive - search prone. The knowledge levels of the repeat purchasers will be comparatively greater and therefore their need for information search can be expected to be relatively lower.

The respondents consisted of first time buyers and repeat purchasers of the same product but not of the same brand. Earlier studies have reported that acquaintance with the product will alter the nature and extent of pre-purchase search. Therefore it is of interest to find out whether these two groups differed in the extent and nature of search as represented by search group membership. The hypothesis that there is no significant difference between novices and non-novices in respect of extent of search is tested for significance.

The following table shows the distribution of the sample respondents according to their nature of purchase and search group membership.

Table: 4.8
Distribution of Respondents according to Nature of Purchase and Search Group Membership

Nature of purchase	Search group Per cent			Total
	Low	Moderate	High	
Novices	39.7	33.8	26.5	100.0
Non-novices	55.8	18.9	25.3	100.0
Total	46.3	27.7	26.0	100.0

Source: Primary Data

The above table shows that among the first time buyers the percentages for various search groups are 39.7, 33.8 and 26.5 respectively. For the repeat purchasers the percentages corresponding to the three search groups respectively were 55.8, 18.9 and 26.0. The presence of high percentage of low - searchers in the group named non-novices calls for special attention. Therefore the possible difference between the various groups is tested statistically for significance. The results are tabulated below:

Table: 4.9

Chi-Square Tests for Independence- Nature of Purchase and Search Group Membership

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	10.767	2	.005

Source: Primary Data

Chi-Square test results show that P value is .005 which is the cut -off level for acceptance. We therefore conclude that the two variables namely 'nature of purchase' and 'external search' are independent. Novices and non-novices engaged in the same extent of search pre-purchase.

4.5. Socio-demographic Variables and Search Behaviour

Socio-demographic variables like age, income, education, occupation and place of residence can have implications on the type and extent of search done by buyers. Earlier studies in different information and socio- economic environments have shown relationship between socio - economic and demographic variables and purchase involvement which is directly related to search. For example studies by Katona and Mueller (1955) and Newman and Staelin (1972) establish positive relationship between education and extent of search. Similarly a study by Slama and Taschian (1985) also found a positive and direct relationship between education and involvement and curvilinear relationship between income and purchase involvement. Kiel and Layton (1981) found that there is positive relationship between price and search behaviour, so that greater the net price paid, the longer the search time period and greater the score on the aggregate index.

The analysis that follows is expected to throw light on whether any specific segment of the sample exhibited tendencies to search less (more). Also an attempt is made to possible hypotheses regarding the type that nature of people who search less (more) in the given the information environment.

4.5.1.Education and Search

Levels of education can have impact on the extent of search done by buyers. Therefore an attempt was made to explore the possibility of such dissimilarity for different education levels of respondents.

The following table shows that the composition of different education groups with respect to search.

Table: 4.10

Education and Search -Group Membership

(Cross tabulation- per cent within Education)

Education							
Search Group	<tenth	<graduation	Graduate	Post- Grad	Technical	Prof. Deg	Total
Low	90.6	52.5	39.0	25.0	32.0	33.3	46.3
Moderate	6.3	26.2	33.9	30.6	36.0	33.3	27.7
High	3.1	2[illegible].3	27.1	44.4	32.0	33.3	26.0
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0

Source: Primary Data

Table: 4.11

Chi-Square Tests for Independence: Education and Search -Group Membership

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	39.577	10	.000

Source: Primary Data

In the case of education levels 'less than tenth standard', the percentage of low searchers is as high as 90.6 percent of the total. The low-search group membership was highest in this education group compared to all other education groups. The proportion of low- searchers declines as the level of education increases, but this result is not consistent for 'technically educated' and for the ones 'holding professional degree'. The opposite tendency is observed in the case of high search group; the proportion of low- searchers increases as levels of education increases. The result does not hold good consistently for the above mentioned two groups, but one observable difference between these two latter groups as compared to others is that the proportion of respondents in all the three search groups is almost the same.

Chi -Square test was used to find whether there is any association between the two attributes, 'education' and 'search group membership'. The P value in table 4.11 shows that the hypothesis that 'the variables education and search are independent' cannot be accepted and therefore we conclude that there is association between them. The extent of search done by buyers of different levels of education appears to be different with the respondents of lower levels of education conspicuous by their presence in low -search groups.

4.5.2. Income and Search

Income levels of individuals can have important bearing on many behaviours including search undertaken by people. A few studies report negative correlation between levels of income and extent of search. We suggest two propositions as possible theoretical explanations. The first one relates to the concept of marginal utility of money which tends to be lower for the richer classes and therefore the valuation of perceived risk in monetary terms tend to be lower for them. As a consequence, it is more likely that the motivation to do extensive pre-purchase search is lower. The second reason proposed relates to better accumulated knowledge possessed by the economically better off sections from earlier direct exposure to products and brands and user situations, which gives them better awareness regarding the nature and performance of different brands and hence the lower felt need for extensive information search. Therefore it is worth examining whether there is any association between these two variables.

The following table shows the distribution of respondents with regard to income and search group membership.

Table: 4.12

Income and Search Group Membership

(Cross tabulation- Percentage within Income)

Search group	Income'000 Rs					Total
	<5	5 -10	10-15	15-20	>20	
Low	75.9	35.4	44.8	34.1	37.5	46.3
Moderate	9.3	18.8	31.0	36.4	44.6	27.7
High	14.8	45.8	24.1	29.5	17.9	26.0
Total	100.0	100.0	100.0	100.0	100.0	100.0

Source: Primary Data

Table: 4.13

Chi -square Tests for Independence: Income and Search Group Membership

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	40.503	8	.000

Source: Primary Data

The proportion of low searchers in lowest income group is substantial. It is as high as 75.9 percent of the total low - searchers. The percentages in low - search group decreases as the level of income increases but not consistently. The proportion of high - searchers in the income group consisting of income between Rupees five to ten thousand is as high as 45.8 percent. As high as 82 per cent (37.5 and 44.6 per cent respectively for low and moderate searchers) of the group representing monthly household income levels greater than Rs.20, 000/were either low searchers or moderate searchers. As can be observed, the percentage of high - searchers in the lowest and the highest income groups tend to be nearly equal and different from other three income groups, but the percentage of low and moderate searchers within the lowest and the highest income groups differ substantially. There is evidence from the data to the argument that lower income groups tend to search less.

To test the differences, if any, between different income groups with respect to search intensity chi-square test was conducted. The chi- square test results given in table 4. 13 show that these two variables are not independent. There is some association between these two attributes. Income group membership seems to have implications on the search comprehensiveness that people undertake.

4.5.3. Occupation and Extent of Search

In order to find out the nature of association between the type of occupation that people engaged in and the extent of search, cross tabulation of these two variables was done and the results are given in the following table.

Table: 4.14

Occupation and Search Group membership

(Cross -tabulation- Per cent within Occupation)

Search Group	Occupation Groups					Total
	Salaried	Profession	Selfemp.	Manufacture	Others	
Low	43.2	27.8	44.7	57.1	69.0	46.3
Mod	23.5	55.6	26.3	35.7	27.6	27.7
High	33.3	16.7	28.9	7.1	3.4	26.0
Total	100.0	100.0	100.0	100.0	100.0	100.0

Source: Primary Data

Data pertaining to the above two variables show that the composition of the occupation group which comprises of 'others /retired 'and 'no job' category with regard to search is highly skewed, with 69 percent of them belonging to the low - search group and only 3.4 percent fall under the high - search category. Samples belonging to other categories of occupation did not show substantial variations with respect to search group membership frequencies. However, chi-square test on the above data, testing independence or otherwise of nature of occupation and search group membership yielded the following results.

Table: 4.15

Chi -square Tests for Independence: Occupation and Search Group membership

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	22.499	8	.004

Source: Primary Data

The P value of .004 shows that the hypothesis of no significant difference for different occupation groups is not supported by findings and therefore we conclude that the people who are engaged in different occupations do differ in the extent of pre-purchase search for information.

4.5.4. The Nature of Place of Residence and Extent of Search

In order to find out whether there is any significant difference between the extent of search done by residents of different places namely urban, rural and semi-urban, chi- square test was done on the data pertaining to place of residence and search group membership. The results are given below.

Table : 4.16

Place of Residence and Search Group Membership

(Per cent within Place of Residence)

Place of residence				Total
Search Group	Urban	Semi-urban	Rural	
Low	38.3	58.6	50.9	46.3
Mod.	34.2	15.5	26.4	27.7
High	27.5	25.9	22.6	26.0
Total	100.0	100.0	100.0	100.0

Source: Primary Data

In all the three different groups formed on the basis of residence, the low searchers are predominant, consistent with the general trend in the samples.

Table: 4.17

Chi -square Tests for Independence: Place of Residence and Search Group Membership

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	9.076	4	.059

Source: Primary Data

As revealed by the results of the chi-square test, there seem to be no association between the nature of place of residence and extent of search. Rural, urban and semi-urban buyers do not differ significantly in the extent of search before purchase.

4.5.5. Age and Search Group Membership

In the previous analysis it was found that there is association between age and perceived confidence expressed by buyers and that the young and the old were noticeably different from other age groups on the above construct. The variable, age of the respondents, is expected to have some influence on the extent and type of search behaviour under taken by respondents. Therefore it was of interest to find out the impact of age on the extent of search. The following table shows search group membership of respondents according to different age groups.

Table: 4.18

Age and Search Group Membership

(Percent within Age)

Search Group	Age groups					Total
	< 25	25 - 35	36 - 49	50 - 64	> 65	
Low	50.0	48.1	25.6	62.2	94.1	46.3
Moderate	nil	32.9	29.3	31.1	nil	27.7
high	50.0	19.0	45.1	6.7	5.9	26.0
Total	100	100	100	100	100	100

Source: Primary Data

Table: 4.19

Chi -square Tests for Independence: Age and Search Group Membership

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	50.410	8	.000

Source: Primary Data

The results of the analysis show that the age of respondents has considerable impact on the extent of search. We find that nearly 95 percent of the respondents who are in the age group 'above 65 years of age' fall in the low search group. This finding is in congruence with the findings of Slama and Taschian (1985) who report that the retirees had a mean value of purchasing involvement less than that of other groups. The results of the Chi-square tests with P value .000 also affirm the fact that the independence of these two attributes cannot be sustained and that there is association between age of the respondents and extent of search.

To summarize, the variables education, income, age, occupation and nature of purchase have association with the extent of search. The nature of place of residence of the respondents does not show any association with the extent of search.

In general respondents who had lower levels of education and income were involved in low search. A substantial portion of respondents with no job at present or those who reported miscellaneous jobs or those who had retired including housewives belonged to the low search group. Barring a few, the old did not search much and they were conspicuous by their presence in the low search group. Different occupation groups differed in the extent of search comprehensiveness. The first purchases and the repeat purchases of the product- not of the brand-did not differ in the extent of search

CHAPTER V

SOURCES OF INFORMATION

The availability of different sources of information depends, in part, on the nature of the product and the product characteristics, stage of product diffusion, extent of competition, attitude of the buyers regarding the need for heterogeneous sources of information and the general predisposition of the market towards provision of usable information. Where product complexity and knowledge requirements are high, as in the case of computers, it is more likely that some mechanism for information provision may emanate. The products chosen for the study typically warrants an information intensive environment. Since purchase of these products generally involve no routine or impulse buying, buyers will most probably be oriented towards seeking information from different sources.

Although there has been a quantum jump in the type and class of information that is available universally, the nature of growth of organized sources of information in the Indian market scenario has been uni - dimensional and lopsided in that the commercial sources have virtually taken precedence over other sources of information. In contrast with the practice available in economies with greater maturity in information provision and usage, primary communication in the form of trial before purchase is not the usual practice followed in India. Descriptive beliefs (Fishbein and Azjen,1975) which result from direct experience with the product are most likely to contribute substantially and positively towards favorableness of attitude to the product. Such indisputable beliefs from direct experience with the brand before purchase is, most often, not possible in the context of Indian market as personal trial at home before purchase is not the practice. It therefore becomes necessary that buyers collect secondary evidence for assessing the quality of the brand and the desirability of purchase.

Unintentional information precedes the stage of deliberate information search. The extent and nature of information gathered so cannot be quantified. Therefore only information gathered intentionally from different sources is included in the study as they are most likely to influence buyers' attitude to a particular brand and therefore their choice.

People differ in their ability and motivation to gather information. They tend to inform themselves in many ways. Different people give attention to different sources of information. Use of different sources is generally resorted to by buyers for

i) Formation of attitudes towards the brand

ii) Reinforcing the already existing attitudes and

iii) Nullifying the existing viewpoint.

People place different weights on different sources of information. Buyers tend to select the appropriate information by deciding first what information is to be examined. There are some routines followed by buyers to assess how scientific and trustworthy a particular source of information is. Some sources are perceived as more scientific and credible and therefore more reliable than others. For some buyers, it is the accessibility of information that matters and for yet others it is the ease with which it can be deciphered and used.

A fruitful question to ask at this juncture is how buyers choose from among different sources. People engage in behaviours expecting positive and negative consequences for their actions. For each action a balance sheet with positive and negative consequences could be developed. Actions with a higher expected profit are preferred over actions with lower profit or loss. (Raaij W. Fred, 1991). In the choice of the source of information, buyers respond rationally by comparing the costs and benefits. Buyers usually do not find it worth using those sources which are costly - financially, psychologically and cognitively. They consider the consequences and anticipate favourable consequences to follow. The selection and use of the most reliable and appropriate information also represent endeavors for reducing the risks and costs associated with using a non - authenticated source. In other words it is an attempt to reduce dissonance post- purchase.

The common criteria applied for choice of sources of information are:

1. The ease of comprehension. Technical details or use of concepts which are technical in a communication makes comprehension difficult, especially for the non - technical majority.[2] This is the case with many informative advertisements.

   Communications which try to capture the emotions of the informed though easily comprehended, do not necessarily add much to information. The quality or the relevance of information is difficult to ascertain in such cases.

2. The relevance of the information provided.
3. The credentials of those generating the information as well as the ease with which the authenticity of the information source or information can be validated.j
4. The extent of commercial interests perceived as influencing the content of the information.
5. The perceived extrapolative power of the quality of the product that is valid from such communication.
6. The felt genuineness of the claims when varying degrees of hype is used.
7. The attractiveness of the source.

The sources of information for the particular products under consideration can generally be classified on the basis of sources as

[2] However, in the present communication set up very often technical terminologies are profusely used in order to elicit the notion of brand superiority.

a) Commercial -marketers, manufacturers' catalogues, promotional brochures, sales persons, advertising etc.

b) Non-commercial sources, mainly personal sources such as conversations with family members, peers, friends, relatives, neighbours, colleagues or even strangers and other impersonal sources.

c) Neutral sources, that is, any source whose aim is not persuasion and / or promotion of self-interest, like consumer interest groups, professional organizations, governmental agencies, product rating agencies, voluntary organizations, individuals, consumer research organizations, bulletins of consumer unions, of universities, shopping guides, guides to buying, recommended buys, reports in newspapers, magazines, bulletins of trade associations, government reports and reports from consumer organizations. However the neutral sources as available in developed countries are conspicuous by their absence in India.

The major types of information from commercial sources may further be subdivided into

1. Personal communication, where salespeople are involved.
2. Impersonal communications like messages from television, news paper, magazines, billboards, hoardings, brochures, pamphlets, and similar media.
3. In - store cues like product display, package and label information, and information received from shopkeepers, sales persons on the shop counter during the information search period or at the point of purchase.

On the basis of nature of presentation, sources can be classified into visual and non- visual. Information can be received from such sources either in an accidental manner or on deliberate seeking.

On the basis of the extent of control exercised by the user over the information, sources can be further classified as self-paced and externally paced. While printed communication of all types come under self-paced sources as they have varying periods of shelf life and can be conveniently used by the information seeker, communication from media like televisions, are externally paced as the recipients of the communication have no control over it.

For the purpose of the study, available sources of information were classified into six sources namely television, printed advertisements, word of mouth, billboards, brochures and shopkeepers. Word of mouth refers to all non-commercial personal sources as described in the previous section. Commercial sources are further classified into television advertisements, advertisements in print media like newspapers magazines, informational and advertising claims made in brochures, leaflets, pamphlets and advertisements of all types available on hoardings. Television advertisement is treated as a separate source as it was felt that there is widespread use of this medium as a consequence of much penetration of satellite communication system. Internet as a source of information was resorted to only by four respondents which is only a negligible portion of the total sample and therefore not included as a source for the purpose of analysis.

Respondents were required to assign ranks to the various sources of information that they have used in the present purchase according to the order of importance. The most important source is assigned rank 1; the source which is next in importance is assigned rank 2 and so on.

The average rank assigned by the respondents for the different sources of information is tabulated below.

Table: 5.1

Descriptive Statistics of Ranks on Information Sources Used by Respondents

Sources	Mean	(sd)
Television	2.44	(1.02)
Printed ads	2.55	(1.07)
Word of Mouth	1.77	(.92)
Bill boards	5.00	(.92)
Brochure	4.92	(.98)
In store	3.22	(1.58)

Source: Primary Data

The most important source of information, i. e the one with the minimum average score on ranks is ' word of mouth' with a mean score on rank 1.77, followed by television advertisements as the second most important source with a mean score of 2.44. Newspaper, magazines etc which come under the category of self-paced sources is the third important source with mean score 2.55. It is evident that brochures, hoardings of different types and in-store information are less important. The least important of all sources of information is billboards, displays and such other similar advertisements.

Considering the dispersion in ranks, ranking with the highest consistency or with the least standard deviation is for word of mouth and billboards with equal values for standard deviation 0.92.

5.1. Sources of Information for Different Search Groups

Different search groups differ in their intensity of search. One should expect differences in the way the different search groups use various sources of information. Therefore, the different sources of information used by different search groups are studied. The average rank assigned by each search group for the different sources of information is tabulated below. (The standard deviation corresponding to each average value is given in brackets).

Table: 5.2

Use of Different Sources of Information by Different Search Groups

(Mean and Standard Deviation of Ranks Assigned)

Search groups		Television	Print ads	Word of mouth	Billboards	Brochure	In store
Low	Mean	2.30(.96)	2.86 (.96)	1.83(1.13)	5.08(.98)	4.78(1.19)	2.85(1.40)
Moderate	Mean	2.96(.96)	2.26(1.15)	1.70(.63)	5.15(.80)	5.33(.62)	3.11(1.48)
High	Mean	2.15(.99)	2.40(1.01)	1.72(.78)	4.66(.90)	4.69(.74)	4.04(1.75)

Source: Primary Data

For all search groups, information from others or word of mouth is the most important source of information. The average rank for it in each case is the least with highest standard deviation for the 'low - search group'. The 'low - search' group and the 'high - search group' ranked television as the second most important source of information, while for the moderate - searchers news paper, magazines and other such self-paced sources were ranked as second most important source. While news paper etc. and in store information were ranked almost equally by the low –search group in the third place, the moderate and the high - search groups placed television advertisements and self-paced sources in the third place respectively. The general predisposition for all search groups is to rank brochures, billboards and such other sources as least important.

We expect differences in sources of information for different search groups identified based on search comprehensiveness. To test if there is significant difference in the mean scores, non-parametric ANOVA is used. Kruksal Wallis test was applied to find out whether there is any significant difference between different search groups with regard to different sources of information.

5.2. Television Advertisements

The case of television advertisements was considered first. It was hypothesized that there is no significant difference in mean rankings of different search segments with respect to television advertisements. The following table shows the total of ranks assigned by different search groups for television advertisements as a source of information in the current purchase.

Table : 5.3

Results of Kruskal-Wallis Test -Search Groups and Aggregate Rank on Television Advertisements.

Search groups	Mean Rank
Low	94.81
Mod	132.64
High	87.23

Source: Primary Data

Table: 5.4

Kruksal Wallis test: Search Group Membership and Attitude on Television Advertisements.

Television	
Chi-Square	20.855
df	2
Asymp. Sig.	.000

Source: Primary Data

The results show that P value is .000 and therefore, we conclude that in the case of television advertisements there is significant difference between different search groups with respect to ranking of sources of information. Therefore the null hypothesis is rejected. Different search groups do not consider television advertisements as equally important as a source of information.

Similar tests were conducted in the case of other sources of information and the results are tabulated below.

Table : 5.5

Kruskal-Wallis Test for Significance of Difference between Ranks Assigned by Different Search Groups

	Search groups	Mean Rank
News paper	Low	110.54
	Moderate	80.22
	High	86.24
Word of mouth	Low	113.34
	Moderate	119.09
	High	115.48
Billboards	Low	63.29
	Moderate	64.32
	high	46.45
Brochures	low	63.25
	Moderate	79.99
	high	51.98
In-store	low	94.35
	Moderate	106.48
	high	136.80

Source: Primary Data

Table 5.6

Kruskal-Wallis Test: Search Group membership and Ranking of Different Sources of Information.

Test Statistics

	Print ads	W of mouth	Billboards	Brochure	In store
Chi-Square (2 df)	13.173	.353	6.330	11.922	16.817
Asymp. Sig.	.001	.838	.062	.003	.000

Source: Primary Data

a Kruskal Wallis Test.

b Grouping Variable: Search Group.

Results of the above analysis show that in the case of word of mouth, there is no significant difference in the mean rankings of different search groups. Therefore in the case of word of mouth, we accept the hypothesis that there is no significant difference between different search groups. The P value in the case of word of mouth is 0.838 which is much higher than the cut-off value of 0.05. Therefore we conclude that all search group members ranked word of mouth as equally important in the present purchase situation. This is perfectly in congruence with the theory of interpersonal influence in information provision.

In the case of 'billboards' also, there is significant difference between different groups. For the high search group hoardings, billboards etc. are not an important source of information.

5.3. Confidence Groups and Sources of Information

The analysis was further extended to study the nature of information sources used by different confidence groups.

The table below tabulates distribution of information sources for different confidence groups.

Table : 5.7

Distribution of Sources of Information Confidence Group -wise

Case Summaries

Con.-grp		Television	Print ads	W of mouth	Billboards	Brochure	In store
Low con.	Mean	1.80	2.97	1.60	4.73	5.25	3.55
	S.D	.84	1.06	.33	.65	.86	1.06
Mod con.	Mean	1.82	3.00	1.64	4.00	5.67	3.82
	S.D	1.25	1.15	.65	.00	.58	.75
Confident	Mean	2.16	2.92	1.56	5.13	4.50	3.47
	S.D	1.25	.68	.50	.87	1.07	1.44
Total	Mean	1.97	2.95	1.58	4.92	4.82	3.54
	S.D	1.10	.91	.50	.83	1.05	1.22

Source: Primary Data

The most important source of information for all confidence groups is word of mouth. This highlights the social context in which brand choice decisions are made. The standard deviations of various confidence groups with respect to word of mouth are also more or less the same indicating a high degree of agreement in ranking.

Incidentally the second most important source of information for all confidence groups is television advertisements. It is a paradox that the most important source of information for the respondents who reported high confidence in information search and brand choice is neither neutral sources nor written sources like brochures which explain the characteristics and attributes of products.

Therefore the study also proposed to find out the relative importance of word of mouth assigned by the group who reported high confidence in information acquisition and brand choice.

Table: 5.8

Distribution of Ranks assigned to Word of Mouth by Respondents who Reported High Confidence

	High Confidence group	
	Rank	Percent
Word of mouth	1	47.1
	2	28.8
	3	13.5
	4	10.6
Total		100.0

Source: Primary Data

The percentage of respondents in the high confidence group who have ranked word of mouth as rank 1 is 47.1 which means nearly half of them valued word of mouth as the most important source of information. Rank 2 for word of mouth was assigned by 28.8 percent making the total of those who have assigned either rank one or rank two 75.9 per cent of the total. This finding explains the overwhelming importance of others in a brand decision making context.

It was also considered pertinent to find out if there is any significant difference between different confidence groups with respect to the relative importance of different sources of information so that valid conclusions can be drawn about the use of sources in the information context that is available. Therefore, it was hypothesized that the relative importance of different sources of information is same for different confidence groups.

Table : 5.9

Ranks Assigned by Different Confidence Groups for Different Sources

	Confidence groups	Mean Rank
Word of mouth	Low	105.60
	Mod	125.49
	High	120.80
Billboards	Low	63.65
	Mod	36.50
	High	64.17
Brochures	Low	81.67
	Mod	76.03
	High	46.68
In-store	Low	97.31
	Mod	136.69
	High	108.36
Television	Low	106.66
	Mod	115.18
	High	95.73
Print-ads	Low	108.37
	Mod	59.92
	High	94.63

Source: Primary Data

Table : 5.10

Results Kruskal Wallis Test of Relative Importance of Various Sources of Information Confidence Group-wise

	Television	Print ads	W of mouth	Billboards	Brochure	In store
Chi-Square	3.198	18.316	4.096	11.542	30.302	10.278
Asymp. Sig.	.202	.000	.129	.003	.000	.006

Source: Primary Data

a Kruskal Wallis Test

b Grouping Variable: Confidence group

From the above table we find that the P value is greater than 0.05 in the case of word of mouth and television advertisements and therefore the hypothesis of equal importance is applicable only for these two sources. Hence we conclude that television advertisements and word of mouth only are assigned equal importance by all. There is no significant difference in ranks assigned by different confidence groups for sources of information namely television advertisements and word of mouth. In the case of all other sources namely brochures, newspaper magazines and other written ads, and in store information, the respondents have differed in reported relative importance.

5.4. Most Reliable Source of Information

Buyers usually use more sources of information than one before making a purchase. Some sources serve the informing function while others have both informational as well as contributory role in facilitating brand choice. It is most likely that buyers place different degrees of faith in different sources of information. People become selective, focusing only on a subset of information sources mainly due to the difference between the objective environment in which the consumer 'really' lives and the subjective environment which he perceives and responds to. There are dispositions at work within the individual that determine what he is exposed to, what he perceives, what he remembers and the effect of communication upon him (Dorothy Cohen, 1984).

The extent of informational beliefs, that is beliefs formed by accepting the information provided by outside sources (e.g. mass media) depends on source characteristics such as reliability, expertise, and power of the information source (Raaij, 1991). Buyers mainly base their decisions on those information which are diagnostic as well as reliable. As such, an attempt is made to identify what is considered as the most reliable source of information from the point of view of the respondents. This also reflects constructive decision making, in the context of information deficiency or asymmetry, on the decision to use which source of information by means of a cost - benefit analysis.

Table : 5.11

Distribution of Respondents according to Most Reliable Source

(Percentage of Total)

Most reliable Source	Percent
Television Ads	7.4
Sig. Others	52.4
Shops	24.2
Other ads	16.0
Total	100.0

The most reliable source of information was reported to be the information received from 'significant others'. More than half of the respondents reported 'significant others' as the most reliable source of information. The next most reliable source of information is 'sellers and sales people' as reported by one fourth of the respondents. Advertisements in television was seen as a reliable source only by 7.45 per cent of the respondents. Other advertisements which form self paced sources, were seen most reliable by 16 per cent of the buyers.

Television being one of the most important and most accessible sources of information, it is of interest to find out how far respondents consider it as worth relying on. Therefore the group which reported television advertisements as the most important source was filtered out and their responses specifically analysed with respect to source credibility and reliability. The results are tabulated below.

Table : 5.12

Most Reliable Source for Respondents who Ranked Television as the Most Important Source

Tele ad = 1 (filter) * Most Reliable Source of Information Cross tabulation

(Per cent within rank 1 for television ads)

Television ads	Most Reliable Source			Total
	Sig. Others	Shops	Other ads	
13.8	52.1	25.0	9.1	100.0

Source: Primary Data

Out of the total of 58 respondents who ranked television as the most important source of information, only 8 (13.8 per cent) reported it to be the most reliable source. A very high degree of consensus could be observed when 52.1 percent of such respondents confirmed their belief in the reliability of information from others. Information from shop keepers was found to be most reliable by 25 per cent of those whose most important source of information was television advertisements.

Table : 5.13

Most Reliable Source of Information for Different Confidence Groups

(Per cent within Confidence Group)

Con. Groups	Most reliable source				Total
	Television ads	Sig.others	Sellers	Other ads	
Low	9.8	54.3	27.2	8.7	100.0
Moderate	8.6	71.4	2.9	17.1	100.0
High	4.8	44.2	28.8	22.1	100.0
Total	7.4	52.4	24.2	16.0	100.0

Source: Primary Data

The most reliable source of information for all confidence groups is information received from others. In the case of low and moderate confidence groups, they form respectively 54.3 and 71.4 per cent. For the high confidence group, the percentage is 44.2. Only negligible percentage of the different confidence groups considers television advertisements as most reliable. In the case of high confidence group, only less than 5 per cent reported it as the most reliable source.

The buyers' inferences about the reliability or otherwise of a source of information are formed by using their previous experience and knowledge structures. Buyers anticipate motivations of self interest in the information provided by seller oriented sources, the exact degree of which cannot be predicted with accuracy. This necessitates buyers to make inferences about their reliability and this has important outcomes for consumer behaviour with respect to formation of beliefs about the most reliable source of information.

Attribution theory holds that buyers tend to develop attributions towards others in evaluating the words or deeds of others. The consumer tries to determine if the other person's motives or skills are consistent with the consumer's best interest. Once judged congruent, the consumer is most likely to respond favourably.

The physical and geographical distance of the information provider, the motives ascribed for information provision and the impersonal nature of the information provision in the case of commercial sources lead consumers to be motivated to come to subjective reasoning about their trustworthiness. That is, buyers attribute self interest in the communications done by seller oriented informants. Buyers know that they have to use some degree of discounting for the exaggeration of claims usually alleged in the case of commercial informants. Although the degree of discounting warranted varies for varying claims, buyers cannot discriminate cost-effectively and accurately the required level of discounting. Information received from real life source tends to be more comprehensible and unambiguous. The person who disseminates information makes it apparently realistic. The persuasive value of information disseminated through word of mouth is greater (Herr, Kardes and Kim, 1991). Therefore the buyers have a propensity to generally associate greater costs in arbitrarily depending on advertisements.

From the above findings, it follows logically that, given the information environment the friendliness and transparency of which is doubtful and also given the choice between a non - social source and a social source, buyers should prefer the latter as they are able to form correct judgment about the intent of the informant. The selection of the most reliable and most suitable source of information by the buyers also represent strategies, suited for reducing the risks and costs associated with using an untrustworthy source. Moreover, greater objectivity in decision may be felt when using word of mouth as a source of information since word of mouth most often takes the form of provision of solution to the problem of brand choice. People tend to internalize the criteria employed by others using these standards to justify that decision to themselves and others (Itamar, 1989).

The findings are in congruence with the view thrown up in a similar study by Indica Research (2001) wherein the team of researchers reported that car advertisements were used to gather information only by 46 percent of the respondents across the cities surveyed and only 27 percent of them declared that they are reliable. Car advertisements, they deduce, do not have any perceptible impact on the choice of a specific brand by the prospective buyer.

5.5. Sources of Information - Ranking by Novices and Non-novices

Novices and non-novices can be expected to have different sources of information as their experience levels and knowledge levels can be expected to be different. Therefore the hypothesis that there is no difference in the ranking of different sources by novices and non- novices was tested. The results are tabulated below

Table : 5.14

Results of Mann-Whitney Test for Difference in Sources for Novices and Non-novices

Test Statistics

	Tel ad	Print ads	W of m	Billboards	Brochure	In store
Mann-Whitney U	4764.000	3554.500	5827.500	1505.500	1600.500	5269.000
Wilcoxon W	11319.000	8405.500	10198.500	3716.500	4681.500	9274.000
Z	-.909	-2.150	-.999	-.856	-2.036	-.669
As. Sig. (2tailed)	.364	.032	.318	.392	.042	.503

Source: Primary Data

We accept the hypothesis that there is no true difference in ranking of sources between novices and non-novices in the case of television advertisements, word of mouth, billboards and in-store information. But they differed in the use of printed advertisements and brochures.

The overall finding is that for all levels of search, confidence or nature of purchase respondents have assigned lowest ranks for word of mouth and television advertisements indicating their predominant position as sources of information.

5.6. A Note on Neutral Sources of Information

People search for and use information about the presence of which they are aware of. There are at least seven neutral sources of information for buyers in United States of America. Though anyone can be sceptical about the rate and intensity of use of such sources by buyers, it is an undeniable fact that there are sources of information other than seller oriented ones, whose primary motivation in providing information is not self- interest. Consumer Unions, Consumer Research Organizations, Consumer Interest Groups, Voluntary Organizations, Rating Agencies, Individuals and Universities engaged in consumer research are providing usable information. 'Consumer report' is considered as the Bible of American consumers (Desikan, 2000). In countries where consumerism has been active, there has been a simultaneous growth in the information provision set up as well.

The popularity and widespread use of neutral sources are obviously absent in India. The use of neutral sources has not received popularity for various reasons even though such sources are available for durables like personal computers and producers' goods. For example the magazine 'Digit' which gives information on computer related issues presents analysis of various brands and models of computers and accessories and their ratings with respect to value for money. The use of such information by actual or potential buyers, the reliability and neutrality of such ratings etc. are not adequately researched. In the present study an enquiry was attempted to find out the extent to which people have made use of neutral sources of information. Less than ten percent of the respondents reported having searched for neutral sources. However, respondents generally were not aware of the existence of any type of neutral source of information. The buyers who reported having used such sources described neutral sources as occasional unauthenticated articles that appeared in local dailies and infrequent write-ups in widely circulating magazines mainly in vernacular which were obviously of unproven neutrality.

5.7. Education Levels and Print Media

The use of advertisements appearing in print media of various types is of interest as there is faster proliferation of visual media. Print media can be used only by people who are literate enough to understand the contents of the advertisements. As such one can anticipate the existence of some relationship between levels of education and use of print media. The following table gives the education -wise distribution of respondents who have reported print media as the most important source of information.

Table : 5.15

Education wise Distribution of Respondents who reported Self -paced Printed Ads as Most Reliable Source.

	Education levels				
	< grad	Grad	Post grad	Technical	Total
Per cent	10.8	35.1	40.5	13.5	100.0

Source: Primary Data

Those who reported self-paced media as the most important source 89.1 per cent belonged to education level 'graduation and above', 40.5percent had post graduation as their level of education and 13.5 percent belonged to technically educated group. The percentage of such respondents who had education less than graduation was 10.8.

5.8. Informational Influence of Others

Human beings depend heavily on the people around them for cues on how to make decisions. The persuasional as well as informational influence of others in brand choice cannot be exaggerated. The presence of some externalities in an individual's consumption in the form of information dissemination cannot be over-ruled in the light of the findings of the study reported above.

The role of personal influence in consumption decisions has been extensively studied from the time of Veblen. While Veblen concentrated on imitation of consumption or the tendency of the lower classes to emulate the behaviour of their higher class counterparts and the conspicuous nature of consumption, others demonstrated the importance of the motivation of conformity to others' consumption and accountability for choice decisions.

Inter personal communication is widely studied and is held to be a major source of market information. In most of the studies in which comparisons were made of the use of different sources of information, personal sources were named more frequently than mass media sources (Kiel, 1989).

In the present study, only interpersonal influence from the information seeking perspective is studied. It is assumed that the use of personal sources of information is motivated by information seeking behaviour alone, that is for drawing worthwhile inferences about the quality of the brand when there is ambiguity with regard to the possibility of use of available information and not for conformity behaviour.

The areas considered in the study are

1. The relative importance of others in information provision
2. The perceived reliability of information from others
3. The felt importance of the need for endorsement of quality by others
4. The reason why information is sought to be obtained from others and
5. The type and nature of the most preferred informant.

Summing up research results on personal influence Blackwell and Miniard (1994) point out that the use of personal sources of information is most likely when

i) The product is complex and its quality is difficult to evaluate using objective criteria so that the experience of others serves as 'vicarious trial.'

ii) The buyer lacks sufficient information to make an adequately informed choice, or lacks the ability to evaluate the product or service.

iii) Other sources are perceived as having low credibility.

iv) An influential person is more accessible than other sources and hence can be consulted with the saving in time and effort.

v) There are strong social ties in existence between transmitter and receiver of information on products and brands.

The present market configuration under study shares all the five features mentioned above and as such we can well expect personal sources as an important one.

Information from others is considered conclusive and reliable since it is seen as originating from first-hand experience with the brand. For the same reason it is considered as more valuable. Primary communication either in the form of use or in the form of demonstration is not common before purchase in India. So people are inclined to use others' experiences as primary communication. Much of the information obtained from others is given the status of reality, as if it were as valid as direct observation of physical reality. This tendency to treat information as reality is reinforced by the fact that a large proportion of unverified information is shared by people (Mc Leod and Chaffee,1972).

The reception of information is also governed by cost -benefit analysis. The obvious benefits of soliciting information from others are :

i) The value of the information in decision-making because of its usefulness when objective non - social information is lacking or are conflicting.

ii) Its unbiased nature when compared to 'change-advocate' information.

iii) The relief of decision anxiety and

iv) The social legitimization provided.

The potential costs are the risk of poor information and the assumption of a subordinate position by the information seeker. Personal communication enables the recipient to gain confidence from the prior experience of others and therefore he is able to avoid extensive information seeking and processing. In particular, information provision takes the form of a conclusive recommendation about what decision to take and this allows the information seeker to economize on the amount of information to be processed (Gatignon and Robertson, 1991).

However expertise does not seem to be the major reason why references are taken from others (Leonard Barton, 1985). Social relations among buyers play an integral part in the diffusion of information on the market by the buyer either on products or brands. The relationship with the informant can be either vertical or horizontal, the former applies in cases where the informant is socially, educationally or culturally superior and in the latter case information dissemination takes place between peers.

It is always more probable that this type of informational and persuasional influence occur among peers. This is referred to as 'peer influence', a term that refers to information transmission between those who are similar in social class, age, education and other demographic characteristics. Reference group impact is often greatest when there is at least some degree of prior relation or association between the informant and the recipient.

At the micro level strong and homophilous ties are more likely to be activated for the flow of reference information. People are liable to interact with others who are like themselves. This is proof of the fact that of an individual's potential personal sources of information, the more homophilous the tie, the more likely that it is activated for the flow of reference. Also when a consumer is in social relations with both strong and weak ties, strong ties are more likely than weak ties to be activated for reference flow. Strong ties are also more influential in receivers' decision-making than weak ties because of higher source credibility assigned to them. (Brown and Reingen, 1987).

Jacqueline (1987) points out that the `greater perceived credibility' is most often the reason why personal influence generally has more decisive role in influencing behaviour than advertising and other market-dominated sources which are uniformly positive about the quality of the product.

Communication theory explains individual influence in terms of source credibility and source attractiveness. The attractiveness of the individual as a source of information is determined by the individual's prestige, similarity with the receiver and his or her physical characteristics. Credibility is in part decided by the strength of ties. Interpersonal ties are greater between individuals who are similar and between individuals who interact frequently. Therefore, personal influence will be more readily accepted from sources that are perceived to be similar to the recipient as also from people who interact frequently with the recipient (Gatignon and Robertson, 1991).

In the light of the above theoretical observations an attempt is made in the study to find out the nature and type of informant in the present purchase occasion.

Table : 5.16

Distribution of Respondents according to Type of References

Type of people	Percent
Higher Class	0.00
Similar	42.9
More Educated	12.1
Technical	35.1
Associated with sales	10.0
Total	100.0

Source: Primary Data

The data reveal that while taking testimonials about the quality and functioning of the brand of the durable, about 43 per cent of the respondents have sought the opinion of similar people who they are associated with. Thirty five per cent have taken advice from technically qualified people. Contrary to expectations only 10 per cent of the respondents sought advice from shops and people associated with the sales of that particular product. Uncertainty in assessing the value of information is reduced by word of mouth received from similarly placed experienced people.

5.9. Reference and Levels of Education

The relationship between type of reference and the nature of the person from whom reference is taken is studied in the following section.

Table : 5.17

Distribution of Respondents according to Source of Reference and Education (Percentage within Reference and Education)

Reference	Per cent	Levels of education						Total
		<10th	<Gradu	Post-grad	Tech grad	Profess	others	
Similar	within reference	6.1	30.3	36.4	15.2	6.1	6.1	100.0
	within education.	18.8	49.2	61.0	41.7	24.0	33.3	42.9
	of total	2.6	13.0	15.6	6.5	2.6	2.6	42.9
More edu.	within reference	25.0	32.1	7.1	25.0	10.7	nil	100.0
	within education.	21.9	14.8	3.4	19.4	12.0	nil	12.1
	of total	3.0	3.9	.9	3.0	1.3	nil	12.1
Technical	within reference	21.0	18.5	21.0	6.2	18.5	14.8	100.0
	within education	53.1	24.6	28.8	13.9	60.0	66.7	35.1
	of total	7.4	6.5	7.4	2.2	6.5	5.2	35.1
Ass.sales	within reference	8.7	30.4	17.4	39.1	4.3	nil	100.0
	within education	6.3	11.5	6.8	25.0	4.0	nil	10.0
	of total	.9	3.0	1.7	3.9	.4	nil	10.0
Total	within reference	13.9	26.4	25.5	15.6	10.8	7.8	100.0
	within education	100.0	100.0	100.0	100.0	100.0	100.0	100.0
	of total	13.9	26.4	25.5	15.6	10.8	7.8	100.0

Source: Primary Data

The results of the analysis show that similar people were consulted mostly by people in the category 'less than graduation', 'graduation' and 'post - graduation'. 49.2 per cent of those who come under the category 'less than graduate, 61 per cent of the graduate category and 41.7 per cent of the post graduates had consulted similar people for collecting information. The least formally educated group i.e. those who had education levels 'less than tenth standard' and the two categories namely 'technically educated' and 'professional degree holders' consulted by and large technically qualified people who were accessible to them. The respective percentages within those qualification levels who consulted technically qualified people are 53.1 per cent, 60.0 per cent and 66.7 per cent. It is noteworthy that two third of all professional degree holders depended on technically qualified people, but none of them reported having depended on shopkeepers, sales people or those who are associated with the sales of the product under consideration. Similar findings are observed in the case of technically graduated people also. The percentage of such technically graduated people who depended on sales people sources is as low as 4 per cent. In contrast to what may generally be expected, the percentage of least formally educated group who depended on sales personnel is only 8.7 per cent.

Extending the accessibility possibility criterion for consultation, we can expect differences in the degree of knowledge possessed by those who were consulted. Here 'technically qualified' does not explain the level of sophistication in technical knowledge possessed by the ones who are consulted.

5. 10. Reference and Nature of Purchase -Novices and Non-novices

It was felt pertinent to examine whether novices and non-novices differed significantly in respect of the type of references made before brand decisions were made. Data were tabulated and chi-square test was conducted to test the hypothesis that these two attributes are independent.

Table : 5.18

Distribution of Respondents according to Nature of Purchase and Reference

Reference:	Nature of purchase		Total
	First	Repeat	
Similar	40.4	46.3	42.9
More edu.	12.5	11.6	12.1
Technical	36.0	33.7	35.1
Ass. with sales	11.0	8.4	10.0
Total	100.0	100.0	100.0

Source: Primary Data

Table : 5.19

Chi-Square Tests for Independence : Nature of

Purchase and Type of Reference.

	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	3	.811

Source: Primary Data

The above table shows that irrespective of the nature of purchase, similar people were more often consulted. The 'P' value shows that the type of people who were consulted by the novices and non-novices were not different.

5.11. Reference and Age

The table below shows the distribution of respondents according to sources of reference and age.

Table : 5.20

Distribution of respondents according to References and Age

(Percent within age)

Reference	Age groups(in years)					Total
	<25	25-35	36-49	50-64	>65	
Similar	62.5	38.0	46.3	22.2	94.1	42.9
More.edu	12.5	5.1	13.4	26.7	nil	12.1
Technical	nil	41.8	35.4	42.2	nil	35.1
As. sales	25.0	15.2	4.9	8.9	5.9	10.0
Total	100.0	100.0	100.0	100.0	100.0	100.0

Source: Primary Data

The study reveals an interesting finding that a substantial proportion of the youngest and the oldest consulted similar people, the oldest conspicuous by their near total reliance on similar people. 94.1 per cent of the oldest people consulted similar people for information. These two groups, however, have not consulted technically qualified people. The three middle age groups have mostly consulted similar or technically qualified people. The percentages in each case for the similar and technically qualified are not substantially different. Therefore, it can be said that the sample data support evidence that the youngest and the oldest consulted similar people mostly, but the middle age groups took references from technically qualified people apart from similar people.

Table : 5.21

Kruskal Wallis Test: Age and Type of Reference

Test Statistics

	Reference
Chi-Square	21.267
df	4
Asymp. Sig.	.000

Source: Primary Data

A Kruskal Wallis Test

In order to find if there is any difference between different age groups, non-parametric Kruksal Wallis test was applied and the results show that there was difference between different age groups with regard to the type of people from whom references were taken.

5.12. Search -Groups and Reference

We expect the different categories of people identified on the basis of search comprehensiveness to be seeking reference from different types of people. In order to find out whether there is any difference between different search groups with respect to the type of people from whom references were taken. Kruskal Wallis Test was conducted for the same. The results are tabulated below.

Table : 5.22

Distribution of respondents according to

Reference and Search Comprehensiveness

(Per cent within Search group)

Reference	Search groups			Total
	Low	Moderate	High	
Similar	30.8	35.9	71.7	42.9
More. educated	9.3	28.1	Nil	12.1
Technical	48.6	23.4	23.3	35.1
Ass. with sales	11.2	12.5	5.0	10.0
Total	100.0	100.0	100.0	100.0

Source: Primary Data

Table :5.23

Chi-Square Tests for Independence : Search Group Membership and Type of Reference

Test Statistics

	Reference:
Chi-Square	21.103
Df	2
Asymp. Sig.	.000

Source: Primary Data

a Kruskal Wallis Test

b Grouping Variable: Search group

The results of the analysis show that there is significant difference between different search groups with respect to the type of people who were consulted for information and therefore the hypothesis that there is no difference is rejected. People who differed in search intensity did differ with respect to the type of people who were consulted.

5.13. Confidence-Groups and Reference

Similarly the differences between different confidence groups were studied with respect to types of people from whom references were taken and similar tests of significance were applied. The results are tabulated in the following tables.

Table:5.24

Distribution of Respondents according to Reference and Confidence -Group. (Per cent within confidence group.)

Reference	Confidence- Group			Total
	Low	Moderate	High	
Similar	55.4	57.1	26.9	42.9
More. educated	10.9	31.4	6.7	12.1
Technical	21.7	8.6	55.8	35.1
Ass. with sales	12.0	2.9	10.6	10.0
	100.0	100.0	100.0	100.0

Source: Primary Data

While more than half of the low and moderately confident respondents took references mostly from similar people, with respective percentages in each case as 55.4 and 57.1, more than half of the high confidence group took references from technically qualified people. Only less than one third of the members of the high confidence group consulted similar people. The references from people associated with sales in each case was lower.

Table :5.25

Kruskal Wallis Test: Confidence Group

Membership and Type of Reference.

Test Statistics

	Reference
Chi-Square	25.641
Df	2
Asymp. Sig.	.000

a Kruskal Wallis Test

b Grouping Variable: confidence group

The results showing P value as 0.000 did not support the hypothesis that there is no true difference between different confidence groups with respect to source of reference, and therefore we reject the hypothesis. There are apparently significant differences between the different confidence groups on this count.

5.14. Reasons Assigned for Advice and Reference

Confronted with the problem of making efficient choices in the absence of reliable and sufficient information, buyers try to reduce post - purchase dissonance by indulging in information seeking from others. Buyers usually assign different reasons for consulting others.

The table below illustrates the various reasons assigned by the respondents for consulting others before making a purchase.

Table:5.26

Distribution of Respondents according to Reasons Assigned for Reference

Reasons assigned	Percent
Inexperience	40.5
Choice confusion	21.6
Availing first-hand information	37.9
Total	100.0

Source: Primary Data

40.5 per cent of the respondents reported the reason for consultation as lack of experience and therefore resultant lack of brand knowledge. 21.6 per cent reported confusion and choice ambiguity as the major reason, while 37.9 percent were of the disposition that they had sought advice in order to secure what they considered valuable information from those who have acquired first hand information and experience of the particular brand of the product.

We find that advice seeking emanates fully from information seeking behaviour and not from conformity because responses have not come forth on that alternative during the survey. This is true in the case of such consumer durables and therefore personal influence of others is limited to informational provision and not to conformity influence.

5.15. Endorsement of Brand Quality by Others : Filling a Need Gap

From the previous analysis it is evident that buyers have a predisposition towards word of mouth and that their perceptions of the true value of the brand is very much dependent on such consumer to consumer interactions. Seller oriented sources do communicate the plus points of their brand, but this invariably leaves a need gap for information that emanates from trial and satisfaction. Interpersonal communication relieves decision anxiety (Gatignon and Robertson, 1991). The recipient is able to gain confidence from the prior experience of others who have had first hand information from trial and personally verified learning or may be able to avoid extensive information seeking and processing. In particular, as has been referred to above, an endorsement by somebody who has used the particular brand or product would demonstrate the status of a conclusive recommendation so that it would mean reliable information without much pain.

5.16. Endorsement of Quality by Significant Others

Endorsement of quality by significant others is important when other sources of information are either insufficient or are not specifically helpful to arrive at conclusions. Product endorsement by 'accessible others' or 'significant others' alone was considered in the study. Endorsement of quality of a particular brand is assumed to be understood by the buyer to be arising from genuine liking of the product by the endorser. Therefore endorsement by celebrities was not included in the study.

There can be differences in attitude of buyers towards endorsement of quality by others. Some may base their choice on some objective criteria which they have used to evaluate product quality, some may use information or endorsement by others for the purpose of augmenting own beliefs, some may use it for legitimizing. Yet others may use it as a source of information itself on which to arrive at decisions.

The following frequency table presents the distribution of responses on the felt importance of endorsement of quality by others in a choice situation.

Table : 5.27

Distribution of Responses on Need for Endorsement Quality by Others

Response	Per cent
Not Important	22.1
Important	77.9
Total	100.0

Source: Primary Data

The analysis given above shows that close to 80 percent of the respondents felt that endorsement of quality by others is important. This is in congruence with our findings in the earlier analyses.

5.17. Endorsement and Nature of Purchase

Need for endorsement of quality by others was examined from the point of view of first purchasers and repeat purchasers. The results are tabulated below.

Table : 5.28

Attitude towards Endorsement of Quality by

Others and Nature of Purchase

(Per cent within Nature of purchase)

Response	Nature of purchase		Total
	Novices	Non-Novices	
Not Important	26.5	15.8	22.1
Important	73.5	84.2	77.9
Total	100.0	100.0	100.0

Source: Primary Data

73.5 percent of the novices and 84.2 percent of the non-novices were of the opinion that endorsement of quality by others is important.

Table 5:29

Chi-Square Test for Independence: Endorsement of Quality by Others and Nature of Purchase.

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	3.709	1	.054
Continuity Correction	3.114	1	.078
Likelihood Ratio	3.821	1	.051

Source: Primary Data

Chi- square test was conducted to see whether there is any significant a difference between the first time purchasers and repeat purchasers with respect to opinion on the need for endorsement of quality by others. The results show that there is no true difference between the two sets of buyers classified on the basis of nature of purchase.

5.18. Extent of Confidence and Need for Endorsement of Quality by Significant Others

Endorsement of quality by significant others who have either bought the same brand or have had some experience with products of similar nature is considered to be valuable when there is uncertainty about the quality of different alternatives available. Generally people who express greater confidence in making purchases or brand choice should not be disposed to give too much of importance to endorsement of quality by others. At the same time, the opposite should be true, that is people who have no confidence must show greater inclination towards accepting endorsement by people around them. Buyers who sense superior levels of confidence in information acquisition and consideration set formation are more likely to feel distinctly self sufficient in performing tasks associated with brand choice without the active supporting testimonials from others. Therefore we propose the hypothesis that there is no true difference between different confidence groups with regard to endorsement of quality by others.

The following table shows the average values of object scores on PC-1of confidence of respondents classified on the basis of need for endorsement by others.

Table:5.30

Distribution of Object Scores PC -I Confidence and the Felt Need for Endorsement of Quality by Others.

Endorsement -Confidence

Endorsement	Object scores PC-1-confidence.
Not Important	.64303
Important	-.17244
Total	5.3779E-04

Source: Primary Data

Those respondents who held the belief that endorsement of quality of the brand under consideration by others is important and necessary, had lower self - assessed confidence as is evident from the average PC value corresponding to such group. The mean PC value of such group is --. 172 i.e. less than the average standardized mean, whereas those respondents who expressed their opinion negatively on the need for endorsement of quality by others had, average PC value +.64, which is five times the mean PC value of the other group.

The following cross tabulation is done in order to test the above mentioned hypothesis on difference between different confidence groups regarding the felt need for endorsement of quality by others.

Table: 5.31

Distribution of Respondents according to Confidence Group and Need for Endorsement

(Percent within Confidence Group)

Response	Confidence Group			Total
	Low	Moderate	High	
Not important	5.4	20.0	37.5	22.1
Important	94.6	80.0	62.5	77.9
Total	100.0	100.0	100.0	100.0

Source: Primary Data

Table : 5.32

Chi-Square Tests for Independence : Confidence Group Membership and Felt Need for Endorsement.

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	30.304	2	.000

Source :Primary Data

Table:5.33

Endorsement of Quality by Others -Confidence Group-Wise.

(Per cent within endorsement)

Response	Confidence Groups			Total
	Low	Moderate	High	
Not important	9.8	13.7	76.5	100.0
Important.	48.3	15.6	36.1	100.0
Total	39.8	15.2	45.0	100.0

Source :Primary Data

From table 5.32, we find that, 94.6 percent of the low confidence group was positive about the need for endorsement of quality by others. Eighty percent of the moderate confidence group members felt endorsement of quality by others as important. Only 62.5 percent of the high confidence group felt that endorsement is important.

From table 5.33 above, it can be seen that of those who reported endorsement of quality by others as not important, 9.8 per cent belonged to low confidence group, while 76.5 per cent were members of the high confidence group. A little less than half of the people who felt such endorsement necessary, belonged to the low confidence group while the respective percentages for the medium and high confidence groups were 15.6percent and 36.1 percent.

Combining the results of the above two analyses, it can be concluded that as the level of confidence increased, the absolute percentages of respondents who felt importance of the need for endorsement of quality declined.

Buyer confidence is anticipated to reflect the capabilities of the buyer from information processing stand point and therefore, when compared to a less confident buyer, a more confident buyer must be more fluent in interpreting and using information without resorting to externally available criteria like endorsement of quality by others. Therefore the hypothesis that there is no significant difference between different confidence groups in the attitude towards endorsement of quality by others was considered for testing.

Since confidence groups are formed on the basis of principal components continuous Student's T test is applied. Levene's test of homogeneity of variance shows that the two groups with divergent attitudes towards endorsement have different variability. Therefore we use Student's T for unequal variance.

Table : 5.34

Distribution of Mean PC Scores on Confidence and Felt Need for Endorsement

Group Statistics

	Endorsement	Mean	Std. Deviation	Std. Error Mean
Object scores dimension 1	Not important	.64303	.911020	.127568
	Important	-.17244	.966312	.072025

Group Statistics : Source :Primary Data

Table :5.35

Results of Independent Samples Test Confidence and Need for Endorsement

Independent Samples Test

	Levene's Test for Equality of Variances		t-test for Equality of Means						
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95 Confidence Interval of the Difference	
								Lower	Upper
Equal variances assumed	7.473	.007	4.968	229	.000	.75216	.151414	.453813	1.050499
Equal variances not assumed			5.134	84.558	.000	.75216	.146496	.460860	1.043452

Source :Primary Data

From the above value of P (P = .000) we come too the conclusion that there are differences in the felt need for endorsement by different confidence groups. The data do not support the hypothesis that there is no true difference between different confidence groups with regard to the need for and importance of endorsement of quality by others.

From the foregoing analysis it can be concluded that social relations among buyers play an integral part in the diffusion of market information. Interpersonal search and heavy dependence on others are quite against the atomistic "individualism"[3] proposed by micro economic theory of choice.

[3] The idea that an individual can himself or herself pursue their own private concerns and objectives in a socially non-interactive manner. -(Davis1992) advocated by the neo-classical economists in the behaviour of consuming units.

CHAPTER VI
USE AND DIAGNOSTICITY OF INFORMATION WHICH ARE NOT FUNCTION-SPECIFIC

The above discussion on sources of information used by buyers before making brand choice decisions brings forth two important aspects of the prevalent information environment. First, the lack of neutral sources of information and second, the heavy dependence of the buyers on social and personal sources of information.

There are many costs involved in searching for information. There are financial costs and time costs involved, but basically the psychological costs of searching is high as there is a greater degree of uncertainty associated with markets characterized by asymmetries of different types referred to earlier. Evans and Bettramini (1987) throw light on the situational complexity of the physical context in which the consumer durables are bought and sold and the consequent disproportionate influence and control the seller wields. These result in an information search designed both to fit the brand to the consumer's needs and to prepare the consumer to achieve the most satisfactory outcome.

Confronted with the problem of making appropriate inferences regarding the attributes of the products, the consumers use extrinsic cues to assess product or brand quality. Such cues are used in addition to or as a substitute for information on characteristics that explain specific product attributes. These cues are perceived as diagnostic and play a very important role as indicative information for assessing product quality.

6.1. Formation of Inferential Beliefs

Beliefs that go beyond direct experience and information from others and from the mass media are called inferential beliefs (Fishbein and Ajzen 1975).

The process of forming inferential beliefs is a reasoning process, using such processes as causal attribution, tactics and cue utilization, and logical reasoning. In a causal attribution process a person tries to find the most likely cause of an event or behaviour mainly by excluding less likely causes. With several measures over time, the co - variation principle (with the criteria being distinctiveness, consistency and consensus) guides the person to infer the most likely cause (Van Raaij,1987). A cue is similar to an attribute. Cues are utilized in order to reach quick conclusions. People use subjective assessments about performance when they are not sure about the actual performance or when direct cues are not available for assessing precisely the possible outcome of the purchase.

Petty, Rao and Strathman (1991) point out that variables can have more meanings than one. A variable can have the same effect on judgment via different processes. A variable can serve as an argument, it can serve as a cue, or it can affect the extent and nature of information processing. One of the powerful but complicated features of Elaboration Likelihood Model, according to the authors, is that any one variable can serve in multiple roles though in different situations. Referring to the example of price perceived quality, it is pointed out that highly priced goods may be perceived as possessing high quality by employing the rule of thumb - the costlier the product the better the quality. People indulge in associative thinking; price here serves as a peripheral cue. Inferences regarding quality may be drawn due to an expert's knowledge, where the buyer knows about the relative quality of the product and therefore feels that high price reflects high quality. Price has served as a product relevant argument here. Price can also serve as a motivator of thought when price information causes the buyer to think about other information /arguments in a commercial communication. Valid inferences are drawn here in a procedurally rational manner.

It is also possible that consumers learn over time that some markets, such as those for personal computers are more competitive and in these markets equally priced brands offer comparable value and higher priced brands offer higher value or quality (Liechtenstein and Scot, 2,001).

Signaling theory as applied to brand names postulates that certain actions can be resorted to by the sellers to convey credible information about unobservable product quality (Robert Frank, 1998). Market share enjoyed by a particular brand is one of the best predictors of popularity and reliability of the brand. Therefore very often buyers tend to depend on the market share statistics in order to form judgment about the quality of a product.

Research in Information Economics focus on signals as mechanisms to solve problems that arise under asymmetric information. A firm or individual credibly conveys the level of some unobservable element in a transaction by providing an observable signal. Kirmani and Rao (2000) developed a typology that classifies signals and discusses the signaling properties of several marketing variables. The primary dichotomous classification of signals into 'default - independent and default – contingent' is based on the monetary consequences incurred by the firm. The former is further classified as sale - independent and sale - contingent signals based on whether sale occurs or not. Investments on advertisements and brand name building which are incurred to inform the buyers about the presence in the market or for persuading them are sale independent, while low introductory prices, coupons and other incentives come under sale -dependent signals. The latter is further sub-divided into revenue - risking and cost - risking on the basis of the nature of possible monetary loss the firms have to incur. High price and brand vulnerability are examples of revenue risking signals and warranties and guarantees are examples of cost risking default contingent signals.

Indicative information or signals of value (Porter,1985p.144) that is, information which are not attribute specific, were studied under various heads namely

1. Guarantees and warranties
2. Price information
3. Popularity of the brand
4. Symbols conferred by standards institutions
5. Extent of advertising done by the brand and
6. Buyers' knowledge of the use of the same brand by people who are closely associated with them.

Having detected the fact that buyers do not necessarily get information on attribute importance from neutral sources, and that they rely heavily on personal sources as a means of reducing uncertainty, it is possible that there are other supplementary mechanisms by which they draw inferences about product attributes and product efficiency. The study has, therefore, considered correlated associations made by buyers i.e. how such indicative information are analysed and judged by consumers to infer quality standards.

6.2.Guarantees and Warranties-Do They Substitute Attribute Information ?

Most buyers do not know the technological details or what exactly to look for to assess the quality of a brand or product. Trust in a brand in such cases is therefore driven more by non - attribute based information than by attribute values. Very often guarantees, warranties and such other assurances given by the producers or retailers have the impact of communicating effectively about the reliability of the brand.

Shimp and Bearden (1982) report a summary of effects of warranties as follows:

Warranties influence consumers

1. By representing assurances of product quality and value
2. By increasing consumers' specific self -confidence
3. By reducing consumers' feeling of risk and
4. By increasing satisfaction through dissonance reduction.

6.3. Reliability Inferences from Guarantees and Warrantees

How an appliance works, that is the underlying technology, need not be of concern to the buyers if they can have faith in the set standards and the suppliers' conformity with such standards. In any country there will be stringent product specifications mandated by the government for virtually every significant product with a technical dimension. Technical product standards specify the parameters that determine whether or not the product works, that is whether it serves the purpose for which it is meant for. Conformity to the set standards can be determined by objective measurements or tests. Therefore, information on such conformity would have extended meanings as far as a consumer is concerned and are therefore most likely to cause perceptual enhancement. The use of such extrinsic cues along with information on product characteristics, tend to increase the fluency with which decision tasks are performed. In doing so, buyers are using some subjective assessments of the objective reality in order to detect performance.

Guarantees, warranties and such other quality assurances given by the producers and standards of quality set either by the government or by national or international agencies are generally considered diagnostic of the reliability of the product. Therefore, an attempt was made to explain the use of such indirect evidence as information to assess the quality of the brand by the buyers.

The table below shows the responses of the respondents on the importance of guarantee and warranty information in the choice of the particular brand.

Table : 6.1

Distribution of Respondents according to Responses on the Importance of Guarantees and Warranties

Response	Percent
Important	70.1
Not Important	16.9
Difficult to evoke	13.0
Total	100.0

Source :Primary Data

Warranties and guarantees were reported to be important in the decision to purchase by 70.1 percent of the total respondents. 16.9 percent of the respondents felt that these were not important in the choice of the brand. Another thirteen percent felt that guarantees are difficult to evoke and therefore not very useful. The results of the above analysis show that buyers do consider the guarantees and warranties offered by the brand while making a choice.

Conformance to prescribed standards is signaled by certifications granted by designated authorities. A few widely known examples of such accreditations prevalent in the market are ISO, ISI etc. Awards are approvals given for specific achievements in the field of production, marketing or quality standards. Such accreditations do not or need not necessarily come from governmental agencies designated for the purpose or from approved trade associations. Both these are very often used as methods of propaganda by the firms. Therefore it was felt pertinent to examine whether such cues or signals were considered by purchasers as indicative of quality standards in the absence of objective information and evidence.

Table : 6.2

Classification of Respondents on the Basis of Reliability of Signals like Awards, ISO, ISI etc.

Responses	Percent
Trust them	67.5
Simply no criterion	9.1
Not considered at all	13.4
Can be secured unfairly	10.0
Total	100.0

Source : Primary Data

As high as 67.5 percent of the respondents felt that I S. O. /I SI/Awards received etc. are indicative of trustworthiness of the brand and therefore are more reliable indicators for gauging the reliability of a brand. Only an insignificant percentage of respondents felt that they were not worth considering either because these are given by all the brands prevailing in the market or since they felt that any producer could secure them by unfair means.

Table: 6.3

Cross Tabulation of Opinion on Warranties and Guarantees, ISO, ISI etc (Per cent of Total)

Responses on warranty /Guarantee	Response on ISO,ISI, Awards etc.				Total
	Trust	Not trust	Not con.	Unfair	
Important	54.1	2.6	6.9	6.5	70.1
Not important	7.8	6.5	1.3	1.3	16.9
Difficult to evoke	5.6	Nil	5.2	2.2	13.0
	67.5	9.1	13.4	10.0	100.0

Source :Primary Data

The above table shows that out of the 70.1 percent of the total respondents who felt that warranties and guarantees are important, 54.1 percent held the view that symbols like I S O, I S I and awards are important in signaling the quality of products and brands. The above results are conclusive evidence that buyers consider such information as diagnostic.

Opinion on the diagnosticity of such indicative information split according to various search groups revealed the following results.

Table : 6.4

Responses on Importance of ISO and ISI etc Search -group wise.

(Percent of Total)

Search groups	Responses on ISO ISI etc.				Total
	Trust them	Not trust them	Not - considered	Get by Unfair means	
Low	38.3	2.5	5.6	2.5	48.8
Moderate	23.5	Nil	4.3	Nil	27.8
High	15.4	1.2	Nil	6.8	23.5
Total	77.2	3.7	9.9	9.3	100.0

Source :Primary Data

Table : 6.5

Chi-Square Tests for Independence: Search Group Membership and Responses on Reliability of ISO ISI etc..

	Value	Df	Asymp. Sig. (2-sided)
Pearson Chi-Square	30.258	6	.000

Source :Primary Data

As high as 38.3 percent of the 48.8 per cent respondents belonging to low search group felt that I S O, I S I and awards are trustworthy. Out of 27. 8 per cent who belonged to the moderate - search group, 23.5 percent and 15.4 per cent of the total 23.5 percent of high search group believed that they are indicative of trust worthiness of the brand.

The results show that members of the low search group have greater tendency to consider such information as diagnostic. Out of the 70 percent of the respondents who felt that guarantees and warranties are important while choosing a particular brand, 54.1 percent belonged to the low search group, 7.8 percent belonged to the average a search group and 23.5 percent to the high search group. Combining the above two results, we conclude that the low search group members have greater tendency to utilize such extrinsic cues in the assessment of product quality.

6.4. Price Information - Is it diagnostic of quality?

Economic quality, that is quality which is cost effective, is a major concern of the buyer. Traditional economic theory consider price as a very important variable in decision making. Price has a negative influence on choice, ceteris paribus. However, the behaviourist dimensions of price analysis concentrated mainly on assessing and comparing the ability to pay. But more than a monetary expression of value, price has spillover effects in the sense that price beliefs influence perceptions of quality. Price sometimes becomes a quality signal, a proxy for quality. In some ways price assumes the character of a product attribute which can lead to subjective evaluations of product quality. Price information, is expected to be encrypted and judged as an indicator of product quality. It is only simple logic to think that high price means high quality.

The dimension of price quality perception–price as an antecedent of quality - has been studied extensively. Price becomes a significant indicator of quality when alternative information about true quality is not available (Kotler, 2002). One of the basic aspects of a brand strategy, which emanates from price quality perceptions of buyers, is positioning of brands in terms of price - quality tier, referred to as brand tier in which they compete. Being positioned as 'high quality - high price' or 'low quality - low price' has strategic implications in marketing (Lemon and Nowlis, 2002).

The perceptions or attributions people hold about high price of different brands were examined and the results are tabulated below:

Table : 6.6

Distribution Showing Perceived Reasons for High Price of Brands

Reasons assigned	Percent
High repute	23.8
High quality	35.9
More functions	.4
Better technology	25.5
All the above	14.3

Source :Primary Data

Thirty six percent of the respondents associated high price with high quality, while only an insignificant number felt that it is due to more number of functions. 23.8 percent of the respondents felt that high price is because of the high reputation that the brand is enjoying and 14.3 percent felt that it is due to a combination of all reasons.

Price can be one of the positioning strategies and may not be correlated with quality. Price differentials need not reflect quality differences. The socio-demographic variables like gender, age, income, education, occupation and place of residence were examined to trace differences if any with respect to perceptions on price and quality. The results did not show any association between these variables and perceptions on high prices. The study was further extended by bifurcating the responses of different search groups with regard to use of such price information. The following table shows the distribution of respondents on perceptions of high price of some brands, search group wise.

Table : 6.7

Search Group wise Distribution of Respondents on

Perceptions on High Price of Brands

(Percent within high price)

Reasons assigned	Search group			Total
	Low	Moderate	High	
High repute	65.5	21.8	12.7	100.0
High quality	57.8	27.7	14.5	100.0
More functions	100.0	Nil	Nil	100.0
Better technology	37.3	28.8	33.9	100.0
All the above	Nil	36.4	63.6	100.0
Total	46.3	27.7	26.0	100.0

Source : Primary Data

We find that 65.5 percent of those who felt that high price of a brand is due to high reputation of the brand, belonged to the low search group. 57.8 percent of the respondents who associated price with quality belonged to the low - search group, while the percentage for the high search group was only 14.5 percent. 63.6 percent of the high search group felt that high prices are warranted by multiplicity of explanations including all the other factors.

From the above results, it can be inferred that correlated associations between price and specific constructs on quality are resorted to mostly by the low search group members. High search group members generally attributed a combination of all the suggested reasons for high price. The low search group had well defined notions about reasons for high price as their responses converged on particular attributions and not on overall quality.

6.5. High Price-Expressed Associations by Different Confidence Groups

The study also found out expressed price associations by different confidence groups. The results are tabulated below.

Table : 6.8

Confidence Group wise Distribution of Expressed Associations of High Price

(Percent within High price)

Reasons assigned	Confidence Group			Total
	Low	Moderate	High	
High repute	40.0	14.5	45.5	100.0
High quality	48.2	24.1	27.7	100.0
More functions	100.0	Nil	Nil	100.0
Better technology	30.5	11.9	57.6	100.0
All the above	33.3	Nil	66.7	100.0
Total	39.8	15.2	45.0	100.0

Source :Primary Data

The above table shows that 40 percent of the low confidence group associated high price with higher reputation of the brand while the percentage in the same category who felt that high price is due to higher quality was 48.2. The percentages of respondents who felt that high price is due to the high reputation in the case of high confidence group were 45.5 percent. 66.7 percent of the high confidence group felt that high prices of certain brands are due to multiple reasons.

A stream of similarity is observed between the responses of different search and confidence groups. People have tendency to associate price with quality when they have either lower confidence or lower tendency to search for information. The findings are in conformity with earlier studies which report formation of price quality inferences and price perceived quality effects.

Tellis and Wernerfelt (1987) in their study on effects of high price as a signal of high quality found that the tendency to ascribe price quality correlations are greater in the case of durable goods.

6.6. A Substantial Price Cut- How is it Perceived ?

In the analysis that preceded we found that people associate indirect meanings to attributes though they may or may not be the exact reason. An attempt is done in this section to find out how people analyze substantial price cuts offered by different brands ostensibly for increasing their sales. The opinions expressed by the respondents are tabulated below.

Table : 6.9

Distribution of Respondents ' Opinion on a Substantial Price Cut

Reasons assigned	Percent
No opinion	2.6
Unsold stocks	32.5
Quality compromise	26.0
Favour buyer	6.9
Competition	32.0
Total	100.0

Source :Primary Data

A substantial price cut was assigned to accumulated inventory of durables by 32.5 percent of the respondents. An equal number of respondents felt that it is a method of competing and surviving in the market. 26 percent of all the respondents felt that quality is compromised when there is a substantial price cut. Very few respondents felt that the producers intended to favour the buyers by offering lower prices.

6.7. Advertisements as Signals of Product Quality

Extent of advertising done by a particular brand usually conveys certain indirect signals to potential buyers. Repeated and heavy advertising in various media can evoke certain generalizations about the quality and reliability in the minds of buyers. Therefore the study attempted to find out the beliefs people have about associations of heavy advertisements with quality. A positively worded five response question was asked. The responses are tabulated below:

Table : 6.10

Distribution of Responses on Heavy advertisement as a Signal of Product Quality

Responses	Percent
Strongly Disagree	3.0
Somewhat Disagree	29.0
Do not know	8.7
Somewhat Agree	33.8
Strongly Agree	25.5
Total	100.0

Source :Primary Data

It can be seen from the above table that one third of the respondents somewhat agreed with the statement that heavy advertisements can be taken as a signal of product quality. One fourth of the respondents strongly agreed with the statement. These findings are sufficient to explain correlated associations of quality with heavy advertisement.

From the foregoing analysis it is evident that buyers use certain clues or signals in order to arrive at conclusions regarding the nature and desirability of a particular brand. These clues differ from respondent to respondent depending on their attitudes and behavioural dispositions.

CHAPTER VII
BRAND CHOICE

The question why people choose a particular brand and not others is not very simple. It is a complex one involving multiple reasons ranging from individual liking to consumer conformity to preferences of others. Theoretical and empirical literature on variables considered for brand-choice suggests that buyers assign numerous reasons for choice of a particular brand. Some reasons are attribute specific whereas others are extraneous considerations as far as brand attribute or brand performance is concerned.

Quality of the brand, which is most often reported as the single most overall reason assigned by buyers for choice of a particular brand, actually refers to a relatively global evaluation of the characteristics of the brand. It has connotations of superiority or excellence of the brand when compared to other brands. However, when buyers refer to quality as the reason for the purchase, it is actually perceived quality that they refer to. Perceived quality is consumers' judgment about the brand's overall capability of serving the purpose for which it is meant for. Porter (1985 p.150) draws a distinction between the two concepts of quality and differentiation. While differentiation encompasses quality, it is a much broader concept. Quality is typically associated with the product while differentiation strategies are attempted to create value for the buyer throughout the value chain.

Simonson (1989) brings forth the idea that 'asymmetric dominance' relationship has greatest impact on choice when the decision maker has difficulty in determining preference. Consumer uncertainty with respect to preference and choice is resolved by them by selecting the alternative that is supported by the best reasons. According to this approach, the effect of an aspect of an alternative on its choice probability is the function of how compelling an argument it provides for or against selecting that alternative.

People sometimes view decisions based on shallow but nice sounding rationales as better than decisions based on complex thorough decision analytic techniques. When decision makers are uncertain about the alternative they prefer most, the reason associated with 'asymmetric dominance' helps them to break the tie and reach a decision in favour of the dominating alternative.

We have already examined the extrinsic cues used by buyers to determine the desirability of a purchase. In the present study, intangible use criteria such as style, prestige, perceived status and other receivables are ruled out ex- hypothesi, and therefore brand-choice tends to be a function of product related characteristics.

The study assumes that for a purchase which has the potential of being fairly important from the point of view of the buyer, it is most likely that a buyer would weigh and evaluate many product -specific and non-product-specific characteristics. Factors that determine brand choice depend on what information they have sought for, what they have received and how much importance it has got in the process of evaluation of alternatives. These factors explain attitude towards the brand and are predictors of choice behaviour.

Black and Boyd (1998) reports selected attributes consumers use to evaluate brands as follows :

1. Cost attributes represented by purchase price, operating costs, repair costs, costs of extras or options, cost of installation, trade in allowance, likely resale value etc.
2. Performance attributes constituted by functional performance, efficiency, durability, quality of materials, construction, dependability, safety and styling.

3. Social attributes like reputation of brand, status, image, popularity with friends, liking by family members, style, fashion etc. and

4. Availability attributes like availability in local stores, credit terms, and quality of service available from local dealer, delivery time and so on.

Garvin (1984) discusses eight dimensions of product quality as:

1. Functional performance
2. Durability
3. Conformance with specifications
4. Features
5. Reliability
6. Serviceability
7. Fit and finish
8. Brand name.

Given the nature of the information environment, the factors responsible for brand - choice identified in previous studies done in different economic and social set-ups may not be readily applicable to the brand choice decisions made in this set-up. The Brand choice behaviour is too complex for explanation and beyond the scope of a few studies. Therefore an attempt is made here to identify the factors that determine brand-choice.

Although behavioural decision theorists have made a distinction between judgment and choice task, in the present study choice is treated as a function of evaluative judgments of different brands by buyers. Consumers while making purchase may rely more on recall of general knowledge about the brands considered, because of general knowledge's greater accessibility and perceived diagnosticity (Alba, Hutchinson and Lynch Jr.,1991). Much behaviour is driven by pure affect rather than on the basis of cognitions about the attitude object (Wright, 1975). Theoretically, buyers can use many attributes in the form of features or benefits to evaluate products or brands in order to arrive at a choice. But practically they use only those subsets of characteristics about which they are aware of (Boyd, 1991).

The sequence of purchase for major consumer durables stretches over a long period and therefore the earlier purchase experience is of little value since market conditions would have radically changed during the intervening period. The response a consumer makes in a given choice situation is often the result of a complex interaction between individual, group and socio-cultural factors and the particular situation (Montgomery and Ryans, 1973).

7.1. Item Development for the Study

Review of existing research literature, consultation with experts and guided judgment of the researcher generated a pool of 64 items which were pre-tested in three stages for finding the most appropriate items that represent and determine brand-choice. In the first stage the survey instrument was presented to fellow research scholars to identify ambiguous and irrelevant items. In the second stage, feedbacks from three academic experts in the field of marketing, sociology and home economics were taken. Items which were confusing and irrelevant as far as the specific products were concerned or which were repeated so that they convey the same meaning as others and which had problems of translation into vernacular were deleted.

In the third stage, a pilot survey was conducted with 40 respondents. Preliminary factor analysis helped in deleting items which did not discriminate well. The major items deleted at this stage include previous experience with the brand, durability, material with which the product is made, electricity consumption, cost of maintenance, convenience of application, colour, looks, space occupation, operation friendliness, size, attraction, technical superiority, conspicuousness and status factors. Twenty items were finally retained in the schedule and was used for the survey. The scoring format was five points ranging from 'extremely important' to 'not at all important '.

7.2. Relative Importance of Various Items

The following table shows the arithmetic mean, standard deviation and skewness of the importance ratings given to the various items considered for brand-choice.

Table : 7.1

Descriptive Statistics of Ratings of Importance of Various Items

Item	Mean	Std. Deviation	Skewness
Reputation of brand	4.2187	.8701	-.770
Use by many	4.0625	1.0140	-.924
Repair/ Spares	3.9687	.9327	-.444
Use by peers	3.9375	1.1622	-1.450
Dealer service	3.9062	1.2011	-1.001
Price	3.7500	.7620	.000
Recommended by others	3.5938	1.0115	-.871
Functions performed	3.5938	1.0429	-.175
Quality of others of same brand	3.5312	1.0772	-.582
Colour, Design, Looks etc	3.5000	1.0473	-.449
Appeared good in shop	3.5000	1.1359	-.563
Familiarity through ads	3.5000	.8799	-.606
Guarantee/ Warrantee	3.4062	1.0429	-.553
Foreign technology	2.9063	1.3763	.179
Knowledge of store	2.9062	1.2276	-.257
Price reduction	2.7813	1.0994	.464
Recommended by shopkeeper	2.2813	1.2243	.320
Free gifts/receivables	2.0313	.8608	.585
Credit	2.0312	1.1212	.668
Lucky draws/Sweepstakes	1.6250	.7513	.761

Source :Primary Data

The highest average score is for the item 'reputation of the brand' with consistently high ranking as represented the standard deviation of the item 0.8701, followed by 'the brand known to be used by many people'. Eight items got an average of less than three, the average values for three items namely 'free gifts given', 'credit facility associated with the brand' and 'favourable recommendation of the shopkeeper' were very close to two. The items 'sweepstakes, lucky draw, contests and coupons' had the lowest average. These items with relatively lower average values also have positive values of skewness showing that majority of the respondents reported lower importance ratingsfor them. The item 'brand known to be having foreign technology' had slight positive skewness. The item 'price of the brand ' had consistent ratings with standard deviation very close to the lowest standard deviation and skewness equal to zero, showing that the distribution of ratings for this item followed a perfect normal distribution.

The following table shows the percentage of respondents who reported the items as 'somewhat important 'or 'very important respectively.'

Table : 7.2

Percentage of Respondents Indicating Item as

"Somewhat Important 'or 'Very Important.'

Item	Somewhat Important	Very Important.'	Per cent of Total
Reputation of brand	31.3	46.9	78.2
Use by many	37.5	40.6	78.1
Repair/ Spares	34.4	34.4	68.8
Use by peers	43.8	34.4	78.2
Dealer service	28.1	40.6	68.9
Price	46.9	15.6	62.5
Recommended by others	43.8	15.6	59.4
Functions performed	34.4	21.9	56.3
Quality of others of same brand	46.9	15.6	62.5
Colour, Design, Looks etc	40.6	15.6	56.2
Appeared good in shop	37.5	18.8	56.3
Familiarity through ads	43.8	9.4	53.2
Guarantee/ Warrantee	37.5	12.5	50.0
Foreign technology	25.1	15.6	40.7
Knowledge of store	31.3	6.3	37.6
Price reduction	12.5	9.4	21.9
Recommended by shopkeeper	15.6	3.1	18.7
Free gift/receivables	6.3	0	6.3
Credit	15.6	16.2	31.8
Lucky draws/Sweepstakes	00	00	00

Source :Primary Data

The items 'reputation of the brand', 'knowledge of use by a large number of people' and 'use by members of the peer group' are assigned greater importance by around 78 per cent of the respondents. 'Free gifts and such other receivables', 'contests, lucky draws and sweepstakes' were not ranked important in brand choice. None of the respondents reported 'lucky draws and sweepstakes' as either important or very important.

In order to identify interpretable factors, factor analysis which is helpful in reducing data was done. The Principal Component Method, using Varimax rotation, reduced the 20 variables into six factors having eigenvalues greater than 1.0.

The following table shows the percentage of variance explained by the six factors, the eigen values of which are greater than one.

Table: 7.3

Total Variance Explained

Component	Initial Eigen values		
	Total	Per cent of Variance	Cumulative Per cent
1	**5.416**	**27.081**	**27.081**
2	**3.496**	**17.478**	**44.559**
3	**2.654**	**13.268**	**57.826**
4	**1.664**	**8.322**	**66.148**
5	**1.237**	**6.185**	**72.333**
6	**1.045**	**5.224**	**77.557**
7	.769	3.845	81.402
8	.694	3.470	84.872
9	.641	3.206	88.078
10	.535	2.675	90.753
11	.409	2.043	92.796
12	.354	1.771	94.567
13	.302	1.509	96.077
14	.260	1.298	97.374
15	.145	.726	98.100
16	.137	.683	98.783
17	9.208E-02	.460	99.243
18	7.197E-02	.360	99.603
19	5.335E-02	.267	99.870
20	2.608E-02	.130	100.000

Extraction Method: Principal Component Analysis.
Source :Primary Data

The first factor explains the maximum variance that is 27.081 per cent. The six orthogonal factors together explain 77.557 percent of the total variance. The rest of the variance is accounted for by factors whose eigen values are less than one.

As the next step, the correlation matrix was used to find out the appropriateness of factor analysis the correlation matrix is given below :

As the next step, the correlation matrix was used to find out the appropriateness of factor analysis the correlation matrix is given in the annexure V.

Formal statistics for testing the appropriateness of factor analysis namely Bartlett's test of sphericity and Kaiser Meyer Olkn (KMO) measure of sampling adequacy were performed. The results of the two tests are given below.

Table:7.4

KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.515
Bartlett's Test of Sphericity	Approx. Chi-Square	424.889
	Sig.	.000

The null hypothesis that the population correlation matrix is an identity matrix is rejected by the Bartlett's test of sphericity. The value of chi-square at five percent level of significance is 424.889 and therefore the null hypothesis is rejected. The value of Kaiser Meyer Olkn (KMO) measure of sampling adequacy is also large enough as it is greater than the t-test criterion of 0.5. Therefore factor analysis was found appropriate for the data.

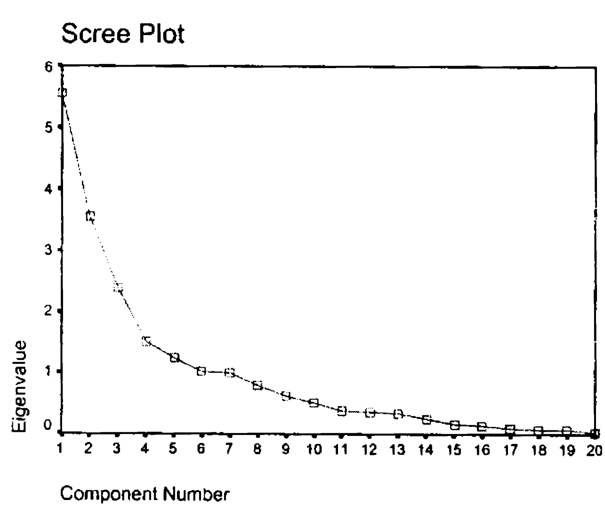
The method of factor analysis chosen is principal component analysis as it would identify the minimum number of factors that will account for the maximum variance in the data. Similar previous research studies which have identified specific number of factors which are empirically established are not prevalent. In the absence of evidence to develop a preconceived idea about the number of factors to be expected from the data, an arbitrary decision about the number of factors was not possible. Therefore the number of factors was determined by using a combination of two approaches namely the scree plot and the eigen values.

The cut off value for factor variable correlation is taken as 0.66 and therefore only variable loadings greater than this cut off value is taken into consideration.

The scree plot from the data is presented below

Figure :7.1

Scree Plot



It is evident from the above scree plot that there are six factors which have eigen values greater than one.

The factor loadings are presented in the table below.

Table:7.5

Factors Influencing Brand – Choice

Rotated Component Matrix

	Component					
	1	2	3	4	5	6
OTRGUDS	**.915**	5.096E-02	1.155E-02	.101	-6.775E-02	-7.354E-02
KNOSTOR	**.805**	-.200	.187	-.258	9.701E-02	-9.813E-02
DEALSER	**.750**	.339	8.789E-02	-.219	-.105	-4.731E-02
FORTEC	**.730**	.264	6.722E-02	4.268E-02	-7.756E-02	.154
REPRSPR	**.708**	2.354E-02	.240	1.529E-02	-3.219E-02	-.274
CLORDSN	.589	.117	.151	9.622E-02	.534	.163
APGUD	.578	-.425	-.208	.364	-.151	-4.256E-02
USEOTRS	1.348E-02	**.890**	.113	3.518E-02	-4.434E-02	.227
RECOTHRS	.376	**.756**	-6.214E-05	-.226	7.812E-02	.136
PEERUSE	.157	**.714**	.100	-.413	-4.199E-02	-.308
REPUTE	2.183E-03	**.708**	-.243	-4.674E-02	.358	-.257
FREEGFT	8.967E-02	-8.077E-02	**.911**	.228	-5.339E-03	4.518E-03
LUCKDRO	.131	.169	**.850**	7.095E-02	-9.190E-02	-.106
CREDIT	.388	-4.267E-02	**.686**	-.117	.218	.140
SHOPREC	.302	3.238E-02	.563	-.210	.494	.269
PRICRED	3.771E-02	-.289	.169	**.848**	-6.870E-02	6.673E-02
PRICE	-.100	-9.596E-02	7.463E-02	**.831**	.314	.211
GURWR	.217	.387	.334	-.447	.185	.371
ADFAMLR	-.275	.191	5.411E-02	.157	**.789**	-.124
FUNCTNS	-.253	3.325E-02	6.099E-02	.278	-4.362E-02	**.844**

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.
a Rotation converged in 11 iterations.
Source :Primary Data

The first four factors contained five, four, three and two items respectively and the fourth and fifth factors contained one item each. The variable factor correlations are given in brackets in the following discussion.

The first factor which explains 27 percent of the total variance, is tied to items reflecting 'trust and service reliability'. A buyer generates the subjective criteria of trust in the brand from the assurance that he has built up either in the brand or in the exchange partner's trustworthiness and integrity from his own previous associations. The variables that loaded with the first factor are 'knowledge of good performance of other products of the same brand'(.915), 'previous knowledge of the shop' (.805), 'dealer's service' (.750), 'foreign technology'. (.730), 'availability of repairs and spare parts' (.708). The two variables 'knowledge of good performance of other products of the same brand' and 'previous knowledge of the shop' represent some rule of thumb based on favourable associations worked out by earlier experiences.

Brand extensions and umbrella branding are methods resorted to by firms in their brand development. Experimental research has shown evidence that the parent brand's perceived quality affects the extension evaluations and vice versa. Consumers use experience in one product to develop perceptions about the quality of other products of under the same brand name. Previous association with the shop, either during a previous purchase situation or personal intimacy with the shop owner or any sales personnel acts as an assurance in a particular purchase event. It is most probable that the brands carried by shops with which the buyers have had satisfactory previous acquaintance will be preferred to those that are carried by shops which are not previously known. Dealer service refers to the dependability on the performance of the shop outlet of various functions related to sale, delivery, installation, provision of operation instructions, operationalization of guarantees and warrantees given by the producer of the product as also the after sales service. All the enthusiastic procedures adopted by the seller for the provision of needed service by the buyer will confer trust on the seller. The more technologically sophisticated the generic product, the more dependent are its sales on the quality and reliability of its accompanying customer services (Kotler, 2002).

Availability of repair service and spare parts in the event of breakdown represents an important constituent of service reliability and is partly linked with the shops, as shops maintain service personnel especially in non - urban centers where the manufacturers do not maintain exclusive service centers. The use of foreign technology especially in products which are technically complex or which have electronic components is a value proposition as far as Indian buyers are concerned, as they perceive foreign technology to be comparatively more reliable and sophisticated. The use of foreign technology enhances the trustworthiness of the product with respect to quality and performance.

The second factor is characterized by items representing 'social attributes' namely 'the brand known to be used by many others' (.890), 'recommended by others' (.756), 'seen as being used by members of the peer group' (.714), and 'reputation of the brand' (708). The informational and persuasive influence of others is already established in the previous chapter as an important component in brand choice behaviour. Relational variables do play an important role in brand choice decisions. Previous knowledge of choice by significant others and positive assurances by them tends to generate positive schema about the brand leading to convinced action favouring the brand.

The third factor can be interpreted as 'susceptibility to incentives and promotion'. The items that loaded on this factor are 'free gifts, compliments and other attractions associated with the brand' (.911), 'lucky draw, contests and other offers by the brand' (.850) and 'availability of credit' (.686). The goods chosen are known to be subject to high indulgence by sellers in non-price competition by offering free gifts and chances of participation in contests for winning extraordinary prizes.

Cost attributes loaded on the fourth factor and therefore it represents the 'cost and bargains' factor. The attributes 'price reduction' and 'price' loaded on this factor with respective factor loadings of (.848) and (.831).

The fifth factor is 'familiarity through advertisements' which had a loading of (.789). The sixth factor represent 'functions and performance by the brand' with the loading of (.844). This factor represents the importance of the physical performance and functioning of the brand.

7.3. Tactics Followed by Buyers for Simplifying Decision Tasks

Factor analysis has revealed that buyers exhibit tendencies of anchoring their choice on factors other than brand attributes linked to performance. Calculated choices based solely on what may be reasonably termed as more rational set of decision parameters are likely to be prohibitive cost-wise, as it may involve expending an extra - ordinary amount of time and energy for extensive deliberation and complete evaluation. The problem is confounded by buyers' inherent inabilities to organize and process information fully, as also by the enormous cognitive requirements for the performance of the choice task. Therefore in actual practice, buyers, either because they want to economize on deliberation resources or because they are aware of their lack of knowledge as to what to do, simplify choice problems by the use of appropriate tactics. This involves the use of some rules of thumb which are apparently reasonable but not necessarily reciprocally optimal, in order to shorten the time and work required to find a reasonably good solution.

Consumers usually experience various types of risks when they buy a product. These can be psychological, social, financial or physical risks.

Roselius (1971) points out that consumers reduce the different types of risks which they anticipate by

1. Buying well known major brands
2. Exhibiting brand loyal behaviour
3. Using consumer advisory and testing services such as that of consumer associations

4. Buying the brand offering the best warranties and guarantees.
5. Buying the most expensive brand.
6. Using free trial options when offered.

It was of interest therefore to draw out information from buyers as to what tactics were followed by them in order to reduce their perceived risk and to arrive at efficient choices.

Responses were elicited from the sample buyers as to what additional strategies were employed in the choice of the brand. An open end question requiring the respondent to give a descriptive picture of how the purchase was made and how the information problem was solved brought forth a number of answers. These were analyzed under the heads mentioned in the following table. A preliminary study of such non-attribute based factors also generated these items as common approaches followed by buyers while making choices. The table below shows the distribution of responses.

Table:7.6

Strategy Followed by buyers to simplify Choice

Strategy	Valid Percent
Shop in trusted shop	18.2
Buy a much advertised brand	8.7
Buy the cheapest brand	5.6
Buy the brand Recommended by others	39.4
Buy a well known brand	28.1
Total	100.0

Source :Primary Data

The respective percentages of responses on each of these tactics reveal that the most common of all these, is following recommendations of significant others with the percentage reported having followed this in the present purchase as high as 39.4 percent. 28.1 percent of the respondents mentioned that 'brand name' was the most important of all considerations and 18.2 per cent of the sample shopped in a favourite shop which was known to them before. The least common of all the tactics is 'buying the cheapest', succeeded next in importance by 'choosing a much advertised brand '.

Table : 7.7

Tactics Chosen by People in Brand choice -Confidence -Group Wise (Percent within Confidence Group)

Confidence Group	Tactics					Total
	Fav.shop	Advertised	Cheapest	Rec.others	Brand name	
low	5.4	12.0	Nil	53.3	29.3	100.0
Moderate	8.6	5.7	Nil	51.4	34.3	100.0
high	32.7	6.7	12.5	23.1	25.0	100.0
Total	18.2	8.7	5.6	39.4	28.1	100.0

Source : Primary Data

Table:7.8

Chi-Square Tests for Independence: Confidence and Type of Tactics used.

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	48.872	8	.000

Source :Primary Data

Chi-Square Tests show that there is difference between different confidence groups with regard to the type of heuristic that they used while making choice.

In order to find the type of tactics used by members of different search groups, cross tabulations were prepared and the results are given below:

Table: 7.9

Cross Tabulation of Tactics Applied in Brand Choice -Search Group- Wise

(Percent within Search Group)

Search Group	Heuristic					Total
	Fav.shop	Advertised	Cheapest	Rec.others	Brand name	
Low	18.7	Nil	11.2	43.9	18.7	100.0
Moderate	29.7	Nil	Nil	45.3	21.9	100.0
High	5.0	16.7	1.7	25.0	51.7	100.0
Total	18.2	8.7	5.6	39.4	28.1	100.0

Source : Primary Data

It can be seen from the above table that compared to high searchers the tactics of doing shopping in the known favourite shop was done mainly by low and moderate searchers. They also showed comparatively greater tendency to buy the brand based on the recommendations by others with the respective percentages for the two groups as 43.9 and 45.3.Only one fourth of the 'high searchers' followed this tactic. For the 'high searchers' buying a well known brand was the most popular tactic with 51.7 per cent of them following the same while brand choice decisions are made.

7.4. Buyers ' Perceptions about Ads with Too Much Hype

Sellers of different brands use superlative terms to highlight either product features or emotional appeals in their attempt to impress upon the buyer the relative superiority of their brands. Therefore it is of interest to find out how the buyers perceived them as sources of information as also how much trust they had on such advertisements.

The table below shows the distribution of respondents.

Table:7.10

Distribution of Respondents according to Attitude Towards Advertisements with Too Much Hype

Attitude of respondents	Percent
Believe	14.3
Disbelieve	24.7
Give no notice	39.4
Partially Believe	21.6
Total	100.0

Source :Primary Data

14.3 per cent of the respondents said they do believe in such claims, 24.7 percent said they will disbelieve any such hype advertisements. The percentage who reported that the will disbelieve such advertisements is 39.4 and the percentage who reported that they will partially believe them was 21.6.

7.5. A Digression into the Social Dimension of Choice

The brand-choice decisions have a social dimension also as far as members of the family have designated roles and tasks in the Indian context. Decision making is usually done by the head of the family or by the older male members of the family. As traditional relations within the family ascribe greater discriminating abilities and powers to males on account of their greater exposure to the world at large, allocation of decision making to male members can be regarded as a method by which optimal or learned decisions are made. Since it is assumed that the selected goods are collectively consumed and that the family has expressed their collective opinion in the choice, it was felt relevant to examine the specific task performed by members of the family with regard to information acquisition and choice.

The two dimensions of information acquisition and brand choice are studied from collected responses on information gathering and brand choice decision making. The following table presents the distribution of respondent son the basis of information gathering and decision making.

Table : 7.11

Distribution of Respondents according to Information Gathering and Decision Making

(Gather * Decision Cross tabulation)

(Percent of Total)

Information gathering	Decision making						Total
	Husband	Wife	Older sons	Old children	Hus & wife	Others	
Husband	23.8	.9	00	4.8	11.7	00	41.1
Wife	3.9	6.5	00	00	1.3	00	11.7
Older sons	2.6	00	6.1	00	00	00	8.7
Old children	00	1.7	2.2	4.8	4.8	00	13.4
Husb & wife	00	00	.4	00	24.2	00	24.7
Others	00	00	00	00	00	.4	.4
Total	30.3	9.1	8.7	9.5	42.0	.4	100.0

Source :Primary Data

The above table shows that around one fourth of the time information gathering and decision making was done by husbands alone, another one fourth of the time information gathering and decision making were done by both husband and wife. In 41.1 percent cases the husband was the gatherer of information, the percentage for wife alone is 11.7 percent. In one fourth of the cases the information gatherer happened to be both husband and wife. In a little less than one third of the cases the husband was the decision maker, but wife made the decision alone only 9.1 percent of the time. Both husband and wife together made the decision in 42 percent of the cases. Only in 6.5

percent cases did the wife gather the information and made the choice on her own.

The above percentages are based on reported data and the results are subject to the bias in reporting occurring from normative beliefs about what ought to be conveyed to others about decision makers at home which in the Indian background is the older male members of the family.

Separate cross tabulations were prepared for decision making when the gatherers were either husband or wife.

Table:7.12

Distribution Showing Information Gathering and Decision Making When Information Gathered by Husband

(Gather * Decision Cross tabulation)

(Per cent of Total)

Information Gather	Decision Making				Total
	Husband	Wife	Old children	Hus & wife	
Husband	57.9	2.1	11.6	28.4	100.0
Total	57.9	2.1	11.6	28.4	100.0

Source :Primary Data

Table:7.13

Distribution Showing Information Gathering and Decision Making When Information Gathered by Wife

(Percent of Total)

Gather	Decision			Total
	Husband	Wife	Hus & wife	
Wife	33.3	55.6	11.1	100.0
Total	33.3	55.6	11.1	100.0

Source :Primary Data

The results from table show that when the husband was the gatherer of information, in 57.9 percent cases he himself was a decision maker and in 28.4 percent cases both husband and wife made the decision. In contrast to this, when the wife was the gatherer, she herself made the decision in 55.6 percent cases and the husband made the decision in 33.3 percent cases. Both husband and wife together made the decision in 11.1 percent cases

As shown in the following table when both husband and wife gathered information together in 98.2 percent of the cases joint decision making by the husband and wife occurred.

Table:14

Distribution of Joint Decision-Making and Information Gathering by Spouses

Gather * Decision Cross tabulation

(Per cent of Total)

Gather	Decision		Total
	Old.sons	Hus& wife	
Hus& wife	1.8	98.2	100.0

Source :Primary Data

7.6. Information Gathering and Decision Makers for Age Group above 65 Years of Age

As the oldest in the sample respondents differed from others in various aspects under the study, it was of interest to examine information gathering and decision making of this group. Therefore the following analysis.

As shown in the following table in the case of buyers who are older than 65 years of age, brand choice decisions are made in nearly two thirds of the cases by the older children the family. Only in negligible number of cases did the decision come from both the husband and wife.

Table:7.15

Distribution of decision makers for age group above 65 years of age

(Age * Decision Cross tabulation)

(Per cent of Total)

Age	Decision Making			Total
	Husband	Older children	Hus& wife	
>65 years	29.4	64.7	5.9	100.0
Total	29.4	64.7	5.9	100.0

Source :Primary Data

In the case of respondents who were older than 65 years of age, in about one third of cases older children were the decision makers and in 29.4 per cent of cases it was the husband alone who made decisions. Joint decision making by both the spouses were rare.

Table : 7.16

Distribution according to Age group and Information Gathering

(Age - Gather Cross tabulation)

Per cent of Total

		Gatherer			Total
		Husband	Old. sons	Hus & wife	
Age	>65 years	88.2	5.9	5.9	100.0
Total		88.2	5.9	5.9	100.0

Source :Primary Data

Similar results are found in the case of information gathering also where the age of the buyers exceeded 65 years in 88.2 percent of the cases the husband was the gatherer of information.

From the preceding analysis, it can be inferred that older buyers in the sample responded differently given the information environment.

CHAPTER VIII

FINDINGS AND CONCLUSIONS

The period of transition set in by globalization and liberalization has ensued a considerable degree of homogeneity with western societies with respect to quantity and quality of goods and services. There is a sluggish growth of reliable sources of information and enlarged presence of seller oriented sources for providing information which is the most crucial input for efficient choice. The consequent asymmetries in the information environment give rise to many incongruities in the market place. Buyers face the problem of integrating either deficient or distorted information and resolving the mismatch between the necessary information and the complex task of decision making. Taking a conceptual digression from the fully informed consumer, the study is aimed at finding out how the buyers adapt to the prevalent complex and dynamic market configuration by taking an archetypical situation of information gathering and brand- choice decision of select household consumer durables.

The study was based on a set of 301 sample respondents who were either first time purchasers or repeat purchasers for household use, of the items under study in the sample area comprising of rural, urban and semi-urban areas. Data were collected using interview schedule and analysis of the same was done with standard statistical computer programs.

Findings and Conclusions

The following are the major findings of the study.

Intrinsic friendliness of the market as projected by the buyers, looked at from market environment characteristic and consumer characteristic, measured on a fourteen item five point Likert scale using summated score method, revealed that majority of the buyers, irrespective of whether they were first time purchasers or repeat purchasers, considered the information and choice environment as unfriendly and incoherent for the task of efficient choice.

Buyer confidence as perceived by buyers with respect to information acquisition and brand-choice represents the felt competence to effectively function in the market. Measured on a five point scale adapted from an already existing scale to measure the same construct, and analysed using Principal Component analysis, the study revealed that the extent of self-reported confidence with respect to information acquisition and brand-choice is very high. The highest expressed confidence was in respect of three aspects namely : recognition of brands that meet buyer expectations, for formation of consideration set and the knowledge of retail outlets to be visited for making the purchase.

Clustering based on levels of expressed confidence yielded three discrete groups of buyers as -Confident, Moderately Confident and Low Confident. A little less than half of the respondents reported themselves as highly confident while forty percent of them were not confident, fifteen percent of them were moderately confident.

The disaggregated analysis of expressed confidence for various socio-demographic variables reveals the following

a) Least expressed confidence was observed for the youngest and oldest age groups, but the oldest prevailing over the youngest with respect to lack of confidence. However, the confidence levels of the two groups are not found to be significantly different.
b) The members of the three age groups between the two extremes mentioned above did not differ significantly with respect to expressed confidence.
c) The reported confidence of different groups having different levels of education was different. Respondents with formal education less than

graduation expressed less confidence, with the least confidence expressed by the group which had formal education less than high school pass. The technically qualified people too had lower confidence. The professional degree holders expressed highest levels of confidence.

d) Significant differences were observed with regard to expressed confidence of different income groups. The general tendency of confidence is to rise as income increases, but the lowest income groups were conspicuous by substantially lower levels of confidence.

e) The different groups categorized on the basis of occupation showed different levels of confidence, with the highest score on confidence for the professional group followed by the salaried group. Negative scores on principal component was found in all other cases with the least confidence reported by the miscellaneous group consisting of retired, unemployed, housewives and casual job holders.

The respondents who held the belief that endorsement of quality of brand by others is important, had substantially lower confidence compared to those who held the opposite view.

The felt need for endorsement of quality by others was different for the three different confidence groups. Almost all the respondents in the 'not confident group' voiced positive need for endorsement of quality by others. The need for endorsement was considered not important by a greater proportion of respondents who expressed high confidence. Novices who were first time purchasers of the product and non- novices who were repeat purchasers did not differ much with regard to expressed confidence.

The nature of the information environment as perceived by the buyers and their felt confidence are expected to have implications on search behaviour, which is taken to represent strategies for resolving choice problem, as also the extent of involvement and deliberation before purchase. Following are the observations with regard to extent of search done by the respondents.

a) In conformity with the findings of earlier studies, the present study also revealed that the buyers do not indulge in elaborate pre-purchase search for information. On an average, they considered approximately two alternatives, utilized nearly two information sources and media, consulted less than three people and visited few stores.

b) Based on the extent of search comprehensiveness measured by principal components analysis, buyers were categorized into three groups namely low–search oriented, moderate-search oriented and high–search oriented. A little less than half of the respondents belonged to the 'low search' group.

As has been revealed by the correspondence analysis and the resultant bi-plot the two behavioural characteristics of confidence and search show one to one correspondence at all three levels namely low, moderate and high.

The analysis of association between socio-demographic variables and search behaviour revealed that the variables education, income, age, occupation and nature of purchase have no association with the extent of search.

In general, lower levels of education, income and occupation showed lower levels of search. The oldest were also low searchers. The repeat purchasers of the product searched less than the first purchasers.

The most important source of information was word of mouth or information from others followed by television advertisements. The least important source of information was billboards, displays and similar forms of advertisements.

The mean importance assigned to word of mouth by various search groups and confidence groups revealed the disproportionate influence that interpersonal sources have in information dissemination.

The most reliable source of information was identified as 'information from significant others' as reported by more than half of the respondents. The second most reliable source of information was sellers and sales people.

More than half of the respondents who reported television as the most important source considered 'word of mouth' as the most reliable source of information.

Ranking assigned to different sources were not different for the first time purchasers and repeat purchases.

For all levels of search, confidence and nature of purchase, ' word of mouth' and television advertisements were the predominant sources of information.

The use of neutral sources was resorted to only by a negligible proportion of the sample respondents. Sources reported by them as neutral were also of doubtful neutrality.

Print media have been mostly used by respondents whose educational levels were 'more than graduation'. The percentage of less educated who used print media was insignificant.

Testimonials about the quality and functioning of the brand were mainly taken from similar people who they were associated with.

Respondents belonging to different levels of education differed in the type of people who were consulted before purchase decision. Respondents who had lower levels of education mainly consulted similar people. The least formally educated and professional degree holders consulted technically qualified people who were accessible to them.

First purchases and repeat purchases consulted people who were 'similar' to them. There was difference between different age groups with regard to people who were consulted. Majority of the youngest and oldest consulted people who are similar to them.

There were significant differences between different confidence groups and search groups with regard to the type of people who were consulted before purchase of a particular brand.

The most common reasons assigned by the respondents for taking references from others are, in the order of mean importance assigned to them, inexperience, need for availing first-hand information and avoidance of choice confusion.

Endorsement of quality of the brand by others was considered important by more than three fourth of the respondents.

Novices and non -novices differed with respect to importance and need for endorsement of quality by others.

Three fourth of the high confidence group felt that endorsement of quality by others was not important, but only a lesser percentage of the low confidence group felt that it was not important. Almost ninety five percent of the low confidence group felt that endorsement of quality was important. Lesser number of people who belonged to the high confidence group expressed need for endorsement of quality by others.

Those who reported no need for endorsement of quality by others had generally high levels of reported confidence.

The study of correlated associations made by the respondents on characteristics which are not attribute -specific and their diagnosticity with respect to quality of the brand revealed the following.

a) Guarantees and warranties which are quality assurances given by producers were considered important for determining the quality and therefore desirability of purchase of a brand by a little less than three fourth of the respondents.

b) Two third of all respondents felt that I S. O. /I. S. I., certifications and similar other signals of virtue are indicative of trustworthiness and are therefore also evidence of reliability.

c) More than two third of the respondents who reported guarantees and warranties as important also felt that I S. O. /I SI, awards etc. are signals of quality.

The members of the low search group have greater tendency to consider such indicative information as diagnostic.

A little more than one third of respondents correlated high price and high quality. Better technology and high reputation of the brand are the other reasons assigned to by one fourth of the respondents each.

The respondents who associated high price with high quality and high reputation mostly belonged to the low search group.

Nearly two third of the high search group felt that high price of brands is due to multiplicity of reasons. Similar results are reported by different confidence groups.

A substantial price cut was perceived as caused by accumulated inventories by one third of the respondents, another one third felt that it represented strategies for surviving competition. Nearly one fourth of the respondents felt that a price cut meant compromise on product quality. Very few felt that it was to favour the consumer.

One fourth of the respondents strongly agreed and one third of all somewhat agreed to the statement that heavy advertising can be taken as a signal of good quality.

Of the multiple items considered for brand choice, the highest importance was for reputation of the brand and the knowledge of the use of the brand by many others.

The items ranked lowest on the basis of the importance in brand choice were free gifts and other receivables, credit, lucky draw and such other competitive offers.

Factor analysis of the items using varimax rotation evolved six factors of brand choice explaining more than seventy seven percent of the variability.

The first factor was tied to items reflecting 'trust and service reliability'. The variables loaded in the order of value of correlations are: knowledge of well functioning of other goods of the same brand, previous knowledge of retailer/shop, service reliability of the retailer, foreign technology of the brand and availability of repairs and spare parts.

The second factor is characterized by items representing 'social attributes' like, use by many others, use by peers, recommendation by significant others and reputation of the brand. The third factor represents 'susceptibility to incentives and promotions'. Free gifts, lucky draw and credit facilities loaded on this factor. 'Cost and bargains' is the fourth factor and price and price reduction loaded on this factor. 'Familiarity through advertisements' and 'functions and performance by the brand' loaded on the fifth and sixth factors respectively.

Brand choice decision has the social dimension too considering the specific social context of the economy. Around one fourth of the time, information gathering and decision making were done by husbands alone and in one fourth of the time by both the spouses. In about one third of the cases the husband made the decision alone, and in forty two percent cases both husband and wife made joint decisions

Where the spouses jointly gathered information, in almost all cases there was joint decision making by both of them.

In the case of buyers who were very old, information gathering was mostly done by the husband alone and involvement of wife was not worth mentioning. However brand choice decisions were made by older children in the family and joint decision by husband and wife was rare.

Given the information environment, buyers economize on deliberation resources and simplify the task of brand -choice by resorting to certain rules of thumb. The most common of all these tactics followed by the buyers is considering the recommendations of significant others. Considering the brand name, that is the reputation enjoyed by the brand, is the next most commonly followed method of optimization. Depending on favourite shops was mainly resorted to by low searchers. The high searchers mainly used the tactic of buying the most popular brand. Very few resorted to either buying the cheapest brand or to going in for a much advertised brand.

There was no significant difference between the different confidence groups and search groups with regard to the type of heuristic used for maximizing satisfaction.

The analysis of perceived source credibility of advertisements with claims of too much hype and use of the same in brand choice decisions show that about one fourth of the respondents had tendency to disbelieve them, one sixth of the total respondents tended to believe them and one fifth of them felt that they are partially believable, forty percent of the respondents reported that they gave no notice to them.

The overall conclusion of the present study is that in markets with multiple asymmetries, buyers are generally sceptical about the ability of the market to enable consumers' efficient functioning in the market with respect to information acquisition and brand choice. Given the market environment, buyers generally engage in minimum external search for information, seek for and rely on sources which are predominantly personal. Non-attribute specific cues are also heavily used as signals of quality.

Suggestions for future research.

This study represents only a starting point. The field of consumer behaviour abounds in issues which are fundamental to the discipline and specifically to buyer information. The state of the art of consumer research in our country offers scope for both basic research and applied research on aspects of consumer behaviour with respect to information seeking and decision making.

Further enquiry is called for into the nature and content of information and also how the various information are encoded and combined for evaluation of alternatives in order to develop perceptions of performance.

Consumer sentiment towards marketing efforts and information distortions is another worthwhile area of enquiry. The possible effects of incentives on informed choices, undue pressure in information, the relative diagnosticity of different signals and buyer scepticism or optimism of the information environment are other areas where meaningful studies can be made. Another fruitful area of research is the identification of the informational and persuasional influence of others. Similar research can be extended to different categories of products and situations.

Buyer information studies from a social policy perspective is a challenging area where lots of research is called for. Since products and perceptions change over time, possible variations in the complex but understandable nature of the buyer can be studied in such contexts.

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ANNEXURE -1

Interview Schedule

BUYER INFORMATION AND BRAND CHOICE BEHAVIOUR IN MARKETS WITH ASYMMETRIES

Name of the respondent : (Optional) M/F

I. The item that is recently purchased by you :

II. Nature of the purchase 1. First Purchase 2. Second Purchase 3. Repurchase of the same brand

III. Kindly mark your agreement / disagreement to the following statements

Strongly disagree - Somewhat disagree - Neutral - Somewhat agree - Strongly agree

1. There are reliable sources of information about the quality of different brands available in the market.
2. Buyers can easily know the best from among similar brands.
3. Buyers often get confused with conflicting information. (R)
4. Shopkeepers are reliable, we can depend on them for correct information.
5. There is ignorance or lack of sufficient buying knowledge for the buyer (R.)
6. Wise buying decisions are often very difficult. (R)
7. Misrepresentation about product / brand are common. (R)
8. Companies do not unduly influence buyers in choice.
9. Buyers mainly depend on advertisements for information. (R)
10. Buyers are most often able to choose the best brand.
11. Buyers mainly look for what others buy and make decisions. (R)
12. Buyers know exactly what to look for, for determining the quality of the brand.

13. Quality characteristics of an appliance are too technical for an average buyer to understand. (R)
14. It is not difficult to get correct information if one tries.

{(R) Denotes items that are reverse scored}

IV Kindly mark the appropriate numbers for the following questions

Fully- Somewhat fully - Neutral - Partially -Not at all

1. I know where to look for to find correct information before making a purchase
2. I know of all the sources of product information
3. I am confident in my ability to research important purchases
4. I have the skills required to obtain needed information before making purchase
5. I know which brands meet my expectations
6. I am sure about the shops I must go to
7. I have no difficulty in assessing the value of information
8. I am confident in my ability to recognize the brands worth considering.

V Please tell us how important each of the following was in making your decision to choose this brand Extremely important- Somewhat important - Neutral -Somewhat unimportant - Extremely unimportant

1. The Price of this brand
2. This brand was familiar due to advertisements
3. I knew this brand as one used by many others
4. The brand / company has high reputation
5. The functions performed by this brand
6. This brand gives more guarantees/warranties
7. This brand offered price reduction /discount
8. This brand gives free gifts with the purchase

9. This is having attractive schemes like lucky draw, car, gold etc.
10. This is available in stores known to me
11. Service and dealing s of the dealer of this brand is good
12. This brand was recommended by others
13. I have seen this brand being used by people whom I know closely
14. This brand was recommended by the shopkeepers
15. This brand appeared good when I visited the shop
16. Other goods from the same company are known to be functioning well
17. This brand has foreign technology
18. It is possible to get repairs /spare parts easily
19. Credit facilities given by the brand
20. Colour, design appearance etc. of this brand

VI. Which were the sources of information about this brand of appliance? Give Rank no. 1 to the most important source of information, Rank 2 to the source next in importance and so on.

1. Television ads
2. Newspaper and magazine ads
3. Others/word of mouth
4. Billboards /Hoardings
5. Promotional Brochures
6. In store information -sellers/display

VII. Did you have information from any of the following sources?

1. Consumer periodicals
2. Guides to buying
3. Bulletins of consumer unions
4. Reports of consumer Researchers

5. Rating Agencies

6. Internet

VIII. Which of the following would you consider to be the most reliable and useful source of information?

1. Advertisements in Television

2. Information from others

3. Information from shopkeepers /Salespeople

4. Advertisements in newspapers /magazines etc.

IX. Information regarding ISO, ISI, Awards etc. How does it influence your choice?

1. Trust these brands, they are more reliable

2. They are simply no criterion

3. Not considered at all while choosing

4. Feel that anybody can secure it by corrupt means

X. Warranty /Guarantee information in the choice of this brand

1. Warranties /guarantees are important for choosing a particular brand

2. They are not important because all give it

3. Warranties are very difficult to evoke, as it is difficult to prove manufacturing defects

XI Measures of External Search.

1.	Number of information sources used	1.	2	3	.>3
2.	No. of characteristics on which information was sought	1	2	3	>3
3.	Number of alternatives considered	1	2	3	>3
4.	Number of retailers visited	1	2	3	>3
5.	Number of media searched	1	2	3	>3
6.	Number of persons consulted	1	2	3	>3
7.	Time spent on seeking information (days)	<5	5-15	15-30	>30
8.	Time spent on purchase (in hours)	1	2	3	>3

XII. Type of people from whom referrals were taken

1. Older
2. Similar
3. Richer
4. More Educated
5. Technically qualified
6. Associated with sales

XIII. What prompts you to take advice from others while choosing a brand?

1. I am not experienced or sure about which brand to buy, so I ask others
2. I was confused about choice, so I depend on them
3. I want to get information from people who have really used the product
4. If I make a mistake, I will look foolish, so I depend on others

XIV. High prices of certain brands are due to

1. High reputation of the brand
2. Quality is higher
3. More number of functions
4. 4 Better technology
5. 5.All the above

XV. Information about a substantial price cut, how would you take it?

1. Large unsold stocks
2. Quality is compromised
3. The company wants to favour the consumer
4. Method of competing and surviving

V. Endorsement of quality by others, Is it important?

Yes/No/Not sure

XVI. Which is the order of your choice

1. Stores first, then the brand
2. Brand first, and then the stores

XVII. What short cut did you follow to make this choice easier?

1. Shop in a favourite shop
2. Buy a much advertised brand
3. Buying the cheapest
4. Following WOM/ others
5. Buy the most popular brand

XVIII. Heavy advertisements can be taken as a signal of good quality

Strongly disagree   Somewhat disagree   Neutral

Somewhat agree   Strongly agree

XIX What is your reaction to advertisements with too much 'hype'?

1. Believe it since there will be some truth in that
2. Disbelieve it
3. Give no notice to that
4. Partially believe it

XX. Did you experience real difficulty While making this choice?

Yes/No

XXI. Pleas tell us how this choice was made ? (Descriptive Question)

XXII. About You

A. Into which of the following groups does your age fall?

1. Less than 25
2. Between 25 and 35
3. Between 36 and 49
4. Between 50 and 64
5. 65 and above

B. Which if the following best describes your education?

1. Less than SSLC
2. Less than Graduation
3. Graduation

4. Post-graduation
5. Technically graduated
6. Professional Degree

C. Into which of the following of monthly income do you belong to

1. Less than 5000
2. 5000 to 10,000
3. 10,000 to 15,000
4. 4.15,000 to 20,000
5. Above 20,000

D. Into which category does your occupation fall?

1. Salaried job
2. Profession
3. Self employment
4. Seller/Suppliers
5. 5 Others.

E. Locality

1. Corporation
2. Municipality
3. Panchayats

ANNEXURE II

Variables used in the study

WHLUKFOR	I know where to look for to find correct information before making a purchase
ALSOURC	I know of all the sources of product information
CONFRES	I am confident in my ability to research important purchases
SKILINFO	I have the skills required to obtain needed information before making purchase
MEETEXP	I know which brands meet my expectations
SUROSHO	I am sure about the shops I must go to
ASVALINF	I have no difficulty in assessing the value of information
RECBR CON	I am confident in my ability to recognize the brands worth considering.
PRICE	The Price of this brand
ADFAMLR	This brand was familiar due to advertisements
USEOTRS	I knew this brand as one used by many others
REPUTE	The brand / company has high reputation
FUNCTNS	The functions performed by this brand
GURWAR	This brand gives more guarantees/warranties
PRICRED	This brand offered price reduction /discount
FREEGFT	This brand gives free gifts with the purchase
LUCKDRO	This is having attractive schemes like lucky draw, car, gold etc.
KNOSTOR	This is available in stores known to me

DEALSER	Service and dealing s of the dealer of this brand is good
RECOTHRS	This brand was recommended by others
PEERUSE	I have seen this brand being used by people whom I know closely
SHOPREC	This brand was recommended by the shopkeepers
APGUD	This brand appeared good when I visited the shop
OTRGUDS	Other goods from the same company are known to be functioning well
FORTEC	This brand has foreign technology
REPRSPR	It is possible to get repairs / spare parts easily
CREDIT	Credit facilities given by the brand
CLORDSN	Colour, design appearance etc. of this brand

ANNEXURE III

Scale items used by Sharon. E. Beatty and Scott M. Smith

Product categories considered

1. Small Black and white televisions (priced Less than $200)
2. Black and white or color televisions (priced between $200.00 and $399.00)
3. Color televisions (priced more than $400.00)
4. Video cassette recorders
5. Home computers

Dimension	Items
Media search	1. Number of Television and media ads recalled during search 2. Number of newspaper and magazine ads seen during search
Retailer search	1. Total number of hours spent searching inside retail stores 2. Total number of phone calls made to retailers 3. Total number of visits made to the retailers 4. Total number of brands or models examined
Interpersonal search	1. Number of friends, relatives and neighbours consulted while searching
Neutral sources search	1. Number of consumer reports or similar neutral publications consulted while searching

Geoffrey .C. Kiel and Roger .A. Layton

Variables	Unit
1. Introspection time	Weeks
2. Search time	weeks
3. Phone calls	Calls
4. Trips made to undertake search	Trips
5. Dealers visited	Dealers
6. Time spent visiting the dealers	Hours
7. Owners consulted	Owners
8. Opinion leaders consulted	People
9. Ads recalled	Ads
10. Other written items recalled	Items
11. Brands deliberation	Brands
12. Dealer deliberation	Dealers

P. Dickson and W. Wilkie

1. Total time spent considering the purchase
2. Total number of stores visited
3. Total number of brands considered
4. Total time spent shopping
5. Number of information sources used
6. Number of marketer source

ANNEXURE IV

CONSUMER SELF-CONFIDENCE SCALE ITEMS

Factor item

Information Acquisition (IA)

I know where to find the information I need prior to making a purchase

I know where to look to find the product information I need

I am confident in my ability to research important purchases

I know the right questions to ask when shopping

I have the skills required to obtain needed information before making important purchases

Consideration-Set Formation (CSF)

I am confident in my ability to recognize a brand worth considering

I can tell which brands meet my expectations

I trust my own Judgment when deciding which brands to consider

I know which stores to shop

I can focus easily on a few good brands when making a decision

Personal Outcome Decision Making (PO):

I often have doubts about the purchase decisions I make

I frequently agonize over what to buy

I often wonder if I've made the right purchase selection

I never seem to buy the right thing for me

Too often the things I buy are not satisfying

Social Outcomes Decision Making (SO)

My friends are impressed with my ability to make satisfying purchases

I impress people with the purchases I make

My neighbors admire my decorating ability

I have the ability to give good presents,

I get compliments from others on my purchase decisions

Persuasion Knowledge (PK):

I know when an olfer is "too good to be true"

I can tell when an offer has strings attached

I have no trouble understanding the bargaining tactics used by salespersons

I know when a marketer is pressuring me to buy

I can see through sales gimmicks used to get consumers to buy

I can separate fact from fantasy in advertising

Marketplace Interfaces (MI):

I am afraid to "ask to speak to the manager"

I don't like to tell a sales person something is wrong in the store

I have a hard time saying no to a salesperson

I am too timid when problems arise while shopping

I am hesitant to complain when shopping

ANNEXURE V

CORRELATION MATRIX

Descriptive Statistics

	price	adfamlr	useotrs	repute	Functns	gurwr	pricred	freegft	luckdro	knostor	dealser	recothrs	peeruse	shoprec	apgud	otrguds	fortec	reprspr	clordsn	credit
price	1.000	.289	-.021	-.109	.355	-.233	.664	.258	.056	-.233	-.344	-.220	-.492	.078	.186	-.069	-.054	-.102	.243	-.066
adfamlr	.289	1.000	.108	.358	.088	.053	.083	-.021	.000	-.134	-.137	.054	.032	.165	-.355	-.221	-.226	-.138	.140	.147
useotrs	-.021	.108	1.000	.459	.208	.372	-.248	.072	.201	-.151	.349	.686	.523	.089	-.364	-.002	.212	.002	.243	.083
repute	-.109	.358	.459	1.000	-.183	.254	-.319	-.268	-.068	-.131	.144	.434	.556	.062	-.212	.010	.179	.009	.124	-.140
functns	.355	.088	.208	-.183	1.000	.157	.314	.051	-.036	-.333	-.263	-.070	-.341	.067	-.068	-.261	-.027	-.279	-.103	.094
gurwr	-.233	.053	.372	.254	.157	1.000	-.314	.165	.324	.257	.366	.437	.501	.489	-.231	.204	.207	.113	.310	.375
pricred	.664	.083	-.248	-.319	.314	-.314	1.000	.348	.132	-.111	-.187	-.373	-.491	-.097	.452	.156	-.057	.025	-.014	.058
freegft	.258	-.021	.072	-.268	.051	.165	.348	1.000	.717	.186	.065	-.059	-.062	.542	.016	.086	.111	.242	.233	.601
luckdro	.056	.000	.201	-.068	-.036	.324	.132	.717	1.000	.310	.210	.133	.194	.399	-.113	.174	.214	.213	.205	.474
knostor	-.233	-.134	-.151	-.131	-.333	.257	-.111	.186	.310	1.000	.650	.254	.109	.383	.451	.673	.453	.533	.439	.401
dealser	-.344	-.137	.349	.144	-.263	.366	-.187	.065	.210	.650	1.000	.605	.389	.216	.177	.663	.521	.544	.346	.362
recothrs	-.220	.054	.686	.434	-.070	.437	-.373	-.059	.133	.254	.605	1.000	.636	.304	-.211	.323	.412	.157	.350	.154