CHAPTER I
INTRODUCTION

Health is man's most precious possession. It influences all his activities and shapes his destiny. It is the solid foundation on which man's happiness rests. The meaning of the term 'health' as a subjective concept, varies with individual and group, time and place and socio-cultural contexts. Taking a more sociological viewpoint, however, the World Health Organization (WHO) states that health is 'A state of complete, physical, mental, and social well-being and not merely as absence of disease or infirmity.' Perhaps no one on earth enjoys complete physical, mental, and social well-being. Therefore, we can more usefully define health as a relative physical, mental, and social well-being. This definition directs attention to the importance of society in shaping the health of its citizens. Health is as much a social as a biological issue. According to modern concepts, health implies a sound mind in a sound body in a sound family in a sound environment.

It is difficult to conceive of health without its contrasting concept, that is, disease and illness, while the former is medical in character, the latter is basically social. According to Coe, [Dak 1991 5] contrasted with disease, which is a concept of biology and more specifically of pathology, illness is defined as a phenomenon, which is apparent to the individual state of perception of self. A disease can occur in individuals without any awareness of feeling of sickness and without anyone else knowing them to
MAJOR CARDIOVASCULAR DISEASES

Cardiovascular diseases or heart diseases are of many types. These diseases include high blood pressure, atherosclerosis, heart attack, stroke, congestive heart failure, rheumatic heart disease, and congenital defects.

HIGH BLOOD PRESSURE is a silent killer. It has no characteristic symptoms, and in more than 90% of the cases, the cause is unknown. If hypertension is not controlled, serious cardiovascular complications may result. One in every six adults has some elevation of blood pressure. If severe and persistent, this condition can result in stroke or congestive heart and kidney failure, and is a major risk factor in coronary artery disease.

CONGESTIVE HEART FAILURE is not a disease, but a complication of either a cardiovascular or lung disease. It is a circulatory failure, which occurs when the heart is unable to pump sufficient blood to meet the requirements of the body.

ARTERIOSCLEROTIC HEART DISEASE or atherosclerosis, is the most common cause of heart disease. It is slow and progressive, and is characterized by heart attack and stroke.

HEART ATTACK, OR MYOCARDIAL INFARCTION [MI], occurs when the coronary artery is completely blocked [occluded] and a portion of the heart muscle is suddenly deprived of blood. Some individuals may develop chest distress with exertion due to inadequate blood supply.
RHEUMATIC HEART DISEASE is usually a childhood disease, and most frequently strikes between the ages of five and fifteen. The disease develops as a result of rheumatic fever, preceded by a streptococcal infection, usually a sore throat.

CONGENITAL HEART DISEASE describes defects, which are present at birth and usually are detectable almost immediately. The infant may evidence difficulty in breathing [dyspnea] and may be cyanotic, or 'blue', in appearance, if blood is being shunted into the arterial system without being oxygenated.

RISK FACTORS IN HEART DISEASES:

A risk factor is a condition associated with the development of the disease of heart and blood vessels. The more the risk factors, the greater is the chance of developing heart disease.

There are risk factors that cannot be controlled or changed, and there are risk factors that can be controlled.

Risk factors that cannot be controlled,
1. Age
2. Gender
3. Heredity

Risk factors that can be controlled,
1. High blood pressure
2. Smoking
3. Blood cholesterol levels
4 Stress

In addition, there are other factors such as

1 Diabetes
2 Lack of exercise
3 Obesity

AGE AND GENDER

Both men and women are prone to heart and blood vessel disease. But estrogen delays the onset of disease in most women by about 10 years.

HEREDITY

Some studies [The Week-Jan 20, 2002] say that if two immediate family members have a heart attack (myocardial infarction) before age 55, the risk of developing heart disease is five to ten times greater than in a family with no history of heart attack.

HIGH BLOOD PRESSURE

Blood pressure is the force of blood against the walls of arteries. Normally, arteries are muscular and elastic. They stretch and contract as blood goes through them. High blood pressure may increase the possibility of strokes due to damage to the blood vessels that lead to the brain, it may cause kidney damage, congestive heart failure and may increase the risk for coronary artery disease.

SMOKING

Smoking is a major cause of heart and blood vessel disease. Overall, smokers experience a 70% greater death rate from heart and
blood vessels disease than non-smokers, those who smoke two or more packs per day, have a death rate two to three times greater than non-smokers. Inhaling cigarette smoke produces temporary effects on the heart and blood vessels.

**CHOLESTEROL LEVELS**

Cholesterol is a substance manufactured by the body, but it may also be found in certain foods. Egg yolk, shrimps, oysters, fatty red meat, lard, butter, and whole milk dairy products are high in saturated fats, which may raise cholesterol blood levels in most people. Some vegetable oils, such as palm kernel oil, coconut oil, and cocoa butter are high in saturated fat.

**STRESS**

If a person finds a situation or anything stressful, his/her feelings will trigger a physiological response. Psychological responses to stress include an increase in heart rate, blood pressure, and rate of breathing. These symptoms are caused by the release of adrenaline, which also narrows the arteries, and results in greater workload on the heart. If the person is unable to control stress, he/she may be at risk for high blood pressure.

**DIABETES**

High blood sugar is associated with an increased risk of developing coronary artery disease. Diabetes is also associated with other risk factors like obesity, increased blood cholesterol level, and high blood pressure. Regular checkups and weight control is absolutely necessary.
OBESITY

Weighing 30% more than the ideal weight can double the risk of developing heart disease. Other risk factors such as high blood pressure, high cholesterol and onset of diabetes may also be linked to obesity.

EXERCISE

Many studies have shown that people who lead sedentary lives run a higher risk of heart attack than those who get regular exercise. The doctor should test the individual carefully to determine the reserve and capability of the cardiovascular system, and then prescribe the appropriate kind and amount of exercise.

SOCIO-ECONOMIC STATUS

Eminent epidemiologist, Sir Geoffrey Rose [Sethi, 1998] has stated that ‘the primary determinants of disease are mainly economic and social’. It has been common to characterize heart disease as a disease of affluence.

ALARM SIGNALS OF HEART TROUBLE:

Basically there are four cardinal signals [symptoms] [Wasir 1997 3] that make one suspect and bring the person with heart disease to see a physician. These are:

1. Central chest pain. One of the many causes of chest pain is heart trouble.
2. Palpitation. It is the uncomfortable awareness of one’s heartbeat.
3 Breathlessness In the event of breathing difficulty, one is likely to think of lung problems, but breathlessness may occur, often not only due to exertion, but also when the patient is at rest, due to diseases of the heart.

4 Fatigue and Giddiness [blackouts] As a symptom of heart disease, fatigue is a manifestation of poor circulation of oxygenated blood to working muscles.

IMPACT OF HEART DISEASE:

The patient’s perception of his/her illness largely determines his/her adjustment to illness. The patient becomes more emotionally insecure and dependent on family. Illness such as heart disease has its effect upon the personality of the patient and his relation to his family and others. Family support is crucial to the patient’s rehabilitation. Families are often active participants in the initial definition of illness and in decision making about treatment options. Family is the group in which the patient lives. The real meaning of the family for the patient lies not in its structure but in the interaction of the family members within that structure. The character of illness can affect the patient and also his/her family.

Family relationship can also affect the patient’s reaction to stress caused by his illness. If interpersonal relationships in the family are happy and strong, they provide additional strength for the individual to fight the illness. The major happenings – death, unemployment, serious prolonged...
illness or other catastrophes impose new and unexpected burden upon the family and call for new patterns of behaviour

A heart patient has to cope with the threats of lasting physical impairment and at times shortened life expectancy. The illness can interfere with family relations, leisure activities, and occupation. Since the duration of treatment is long, the costs of care are very high in relation to what the average family can afford. There is a lurking fear in the patient's mind of becoming a financial burden on the family. There is a great fear on the part of patients, especially who are young, regarding the disease affecting those sectors of their life which are of greater importance to them such as non-acceptance in work and his/her position in the social circle. Over and above, the fear of death and shattering of dreams for the future, loom large in the minds of chronic patients. For some patients, life revolves round their illness [Jones, 1995, pg 41]. Although, there is considerable variation throughout Europe, individuals with heart disease may be precluded from returning to certain occupations. In the United Kingdom, very few can hold heavy goods or public service vehicle licenses. Train drivers and pilots automatically lose their jobs. Studies on patients of heart disease have revealed that the number returning to work, their rate of return and their efficiency when they do go back, depend on a variety of medical, demographic, psychological, and social factors. A variety of factors influence individual's reaction to heart disease. Some
are inherent in the patient, while others depend on their work/job or the environment.

Adaptation to heart disease is a complex phenomenon involving a process of continual adjustment for patient and family. Although, the whole family gets affected by heart disease, the spouse is most seriously involved. Heart disease can produce severe emotional distress in the spouse, including feeling of guilt, fear, anxiety, and depression. Adjustment problems may be associated with overprotectiveness by the spouse, increased dependency on the part of the patient, role reversal, financial strain, and reduced social support.

It has been observed that people who have some knowledge of the nature of heart disease and its symptoms are terribly afraid of the disease. Courses of action to cope with this health problem are resorted. This coping strategy may be medical, religious, or social. Some may unconsciously or consciously try to deny the seriousness of the disease. Some may resort to home medicine. Many take to herbs, while some resort to religion. As the disease slowly advances the patient may seek treatment outside his/her home.

In the initial stages of illness, the patient and the family resort to crying, alienating themselves from others, and blaming others in order to minimize the burden of the illness. In course of time, the patient and the family may have to cope with the illness by reorganizing their life in order...
to meet the burden of treatment. The severity of impact on the family depends on the proximity of the relationship with the patient. The intensity of the impact of illness will be greater on the spouse than others. However, if the patient has been the sole breadwinner, his illness can affect his children too. The patient and the family have to prepare themselves to meet the challenges posed by the illness. Both prevalence and incidence of heart failure increase steeply with increasing age. A challenge for future must be early recognition and timely and adequate treatment of heart failure.

HEALTH CARE SERVICES

Different medical systems have emerged during different historical periods. India is a vast country with chequered history. During its long period of continuity, a few major medical systems mainly, ayurvedic, unani, allopathy, and homeopathy were developed. Besides, there also existed a broad arena of folk medicine.

Home medicine is literally medicine of the people. It comprises medical operative beliefs and practices, which are in principle available to all the members of society. Home medicine represents the non-institutionalized aspects of the medical cultural pattern. The ayurvedic system, which dates back to ancient India, was a part of a wider religious syndrome. It is an indigenous system of medicine. The unani system of medicine had entered India during the period of Muslim invasion. Unani...
medicine did not have access to people living in Southern India. With the attainment of Independence, the allopathic system of medicine got introduced to India through the British system of medicine.

This study attempts to understand the psychosocial aspects of patients and their families suffering from heart disease.

**METHODOLOGY**

In India, there have been very few studies on the sociological aspects of heart disease. The aim of this study is to understand the heart disease-related problems of patients and their families in the sociological sense.

**[1]. OBJECTIVES:**

The study depends mainly on primary data. The following are the objectives of the study:

1. To prepare the socioeconomic profile of the respondents with reference to age, sex, education, economic status, religion, occupation, place of living, and family. The study of this profile will provide the base for the study in hand.

2. To find out the relationship between the socioeconomic conditions, occupational status, and habits in relation to heart disease. Many an illness has been associated with socioeconomic factors and occupations, which cause stress. Indulgence in habits such as smoking, tobacco chewing, and alcohol consumption can have a
bearing on the acquisition of heart disease, irrespective of socioeconomic status and occupational status. Hence a study has been contemplated to throw light on the impact of socioeconomic status, occupational status, and personal habits on the health of the respondents.

3. To find out the knowledge and opinions of the patients regarding their illness and health care services. Illness never means the same to all patients. Each patient views his or her medical problem in his/her own way. Thus an attempt will be made to find out how the illness has been perceived by the patient and its impact on him or her.

4. To find out the knowledge of the family regarding the patient's illness. The patient's family and illness are intertwined in a complex dynamic network and it is of utmost importance to arrive at an understanding of the family's views regarding the cause and course of illness. Thus an attempt will be made to find out how the illness has been perceived by the family.

5. To find out the impact of heart disease on the patient. Patients with chronic illness are faced with the difficulty in resuming normal roles and the necessities of adjusting their activities to a health disorder. Impact of each illness is coloured by their perception of illness. The study will throw light on what the disease means and does to an individual patient.
To examine the impact of disease on the family. Illness not only affects the particular person, but it does affects directly and indirectly, the whole family. The effect of the nature of illness has its bearing on the family structure, family relations, and family income. Thus the study will help to have an understanding of the effect of illness on the family and its members.

To find out the coping strategies employed by the patients and family to handle the problems arising out of this illness. Patients when found with illness problems make use of coping mechanisms. These could be medical, religious, or psychosocial. Each individual has his/her own modes of reacting to stress/problem. At the same time, family support is also crucial to the patient. The families are also often-active participants in deciding the suitable strategies to face or minimize the problem caused by illness. Thus an attempt has been made to know the common coping strategies used by the patients also to detect some exclusive coping strategies used by the respondents.

To suggest suitable measures for bringing about awareness of illness and to evolve appropriate policy measures.

[ii]. SCOPE AND COVERAGE OF THE STUDY:

The purpose of the present study is to gather information on the psychosocial and economic problems faced by the heart patients, as well as their family/caretakers.
Heart disease or cardiovascular disease predominates as causes of death and disability in the western world and are of increasing importance in the developing countries. The causes of heart disease have not been fully established, but several risk factors have been identified. These factors are non-modifiable factors and modifiable factors. Modifiable factors include smoking, socioeconomic status, lifestyle patterns, and so on. The focus of many studies has been on the physiological aspects of illness. Therefore, a need for an exploration of social aspects of heart disease is felt by the researcher. Marked variations in health exist among different subgroups of the population and social factors play a major role in the onset of illness and survival. This proposed study aims at understanding these sociological aspects of heart disease, which influence the disease etiology. The major intention of this study is to get an awareness and insight regarding the unique problems of members of the family and heart patients.

(iii) UNIVERSE:

The researcher decided to make a sociological study of heart disease in Mangalore. Mangalore City is in Dakshina Kannada district of Karnataka State. It is connected by rail, road, sea, and air services to other parts of the country. Mangalore is a unique city with full-fledged service sectors with special prominence in hotel industry, banking, and educational facilities. Moreover, it offers one of the best health care services in Dakshina Kannada. It has got a good network of health care
General health awareness among the people of Mangalore is appreciable with the various health care awareness programmes, availability of medical facilities and of doctors proficient in different medical fields. The city of Mangalore offers well-developed heart care units and personnel. People from different parts of the district as well as outside the district and state seek medical care in Mangalore. Therefore, the researcher has chosen Mangalore as the universe of study.

It is proposed to conduct the study on the persons with heart disease who seek cardiac care in the city and their family/caretakers. Thus heart patients and their family members/caretakers constitute the universe of study. The focus of attention of this study is on the cardiac patients who have a history of heart disease at least for five years at the time of data collection. The researcher has made an attempt to gather information at different types of hospitals which provide heart care and who are being treated by only by exclusive cardiologists who have done super speciality [DM – Doctorate of Medicine] in Cardiology. These are well-known cardiologists who render their services at private hospitals, institutions run by charitable trusts, which have well-equipped heart-care units and government hospitals.

To decide about the scope the researcher had discussions with experts of both social and medical field. Based on these discussions three types of medical care institutions were identified. They are government
hospital, private hospitals, and charitable institution, which receive a large number of cases of heart patients

A precise list for patients cannot be prepared as heart disease can be acute or chronic and the patients come to these institutions only when they suffer from heart problems. And as heart disease is unpredictable, it was not easy to get a list of cardiac patients all the time. Information was gathered from the heart patients and their family members/caretakers when they visited these hospitals during the period of study.

Discussions with medical experts indicated that only a few hospitals in the city have the facilities to provide such expert service. The researcher prepared a list of hospitals and the experts serving in the city of Mangalore. To get a proper representation, one government hospital, two private hospitals, and one charitable institution were chosen. After discussion with experts in the medical field and based on the information given by these experts and the hospitals which provide heart care, a list of heart patients was prepared. There is only one government hospital in the city. Amongst many private hospitals, there were two private hospitals and one charitable institution with full-fledged cardiac facilities existing at the time of data collection. These are the hospitals where exclusive cardiac specialists render their services. Hence these institutions were chosen for collecting information.
To gather information for the study, the researcher contacted the heart patients and their families. However, contacting the patients and their family members was not easy and people from different states and regions approach experts and hospitals in the city of Mangalore. They consult and take treatment either in local nursing homes or go back to their place of living. An attempt has been made to gather information about such patients from the hospitals and nursing homes, who are under the care of heart specialists.

(ii) SAMPLING:

To reduce bias and obtain accuracy in the measurement in research, it is important to make use of proper sampling method. Probability sampling cannot be applied in this study. This sampling procedure is not feasible since family members and heart patients who are the respondents of this study were not available for contact. Therefore this study has an accidental sampling method.

Lists of hospitals that are equipped for cardiac care by exclusive cardiac specialists are prepared. As there are many consultants who also provide medical care to all types of disease, it was decided after a discussion with the cardiac experts to study the heart patients and their family members who are under their exclusive medical care. These cardiologists practice only cardiology as they have attained a superspeciality degree in cardiology. At the time of data collection, there were only three exclusive cardiologists practicing in the city. Therefore these
experts were approached and after a discussion with them, three types of hospitals were taken into consideration. One was a government hospital, since many patients from the lower economic status approach government hospitals for medical care, this hospital was chosen. People approach charitable hospitals in order to reduce the cost of medical care. Hence the existing charitable hospital was chosen for study. According to the experts in the field, many patients with the history of heart disease prefer to seek medical care in private hospitals. Even those who belong to lower income group and low economic status prefer seeking private medical care as many of the facilities are lacking in government hospitals. Moreover, there is a tendency among experts to refer cases to private hospitals where they provide medical care. The list of patients prepared is based on the information given by these experts.

Therefore it was decided to study one hundred and fifty patients with at least five years [minimum] history of heart problem. And another one hundred and fifty respondents are family members/caretakers of these patients. A record of the number of patients with heart disease is not available to make a population frame. To contact three hundred patients and family members/caretakers was a difficult task. Therefore the researcher decided to gather information from a cross section population of the patient and family members on the following criteria:

1. Patient in government hospitals
2. Patients in charitable institutions
Patients in private hospitals

An attempt is made to collect information of the total number of patients referred and admitted to these hospitals. However, it was not easily available. Hence the researcher had decided to cover a cross section of one hundred and fifty patients and their family members/caretakers giving due importance to the institutions from where they have obtained the medical care service such as government hospitals and private hospitals and hospitals run by charitable institutions. Based on the discussion with the medical practitioners, one hundred and fifty patients were identified and could get a list of forty patients at government hospital, thirty at charitable hospital, and eighty from private hospitals was prepared.

Considerable amount of time was spent on data collection as this problem came intermittently. Whoever came to the hospital during data collection were included in the scope of the study. In the given point of time, only forty patients were traced at government hospital, thirty at charitable institution, and eighty at private hospitals were identified, though it was intended to cover tentatively 50% of these three types of hospitals.

(v) METHOD OF DATA COLLECTION

To obtain a detailed and complete data, a standard interview schedule was prepared for two different types of respondents. As information is collected from two different sources, that is, the heart...
patients and the caretaker who is usually a family member, two sets of questions were required. As the study required collecting information, which are also very personal, an interview schedule was prepared. The study also requires data on family, social, psychological, and economic aspects. An interview method was adopted. Unless the researcher interacts with the respondents and has a rapport with them, reliable, dependable information cannot be collected easily. Considering these issues, it was decided to gather information by personal contact.

(vi) TOOLS OF DATA COLLECTION

In order to standardize data collection, the researcher has decided to prepare an interview schedule for data collection. The preparation of tools of data collection took much of time since the topic taken for the study is new to the field. Hence a lot of preparation was required to finalize the methodology of data collection. The researcher had a pretest of the tools of data collection before using them for data collection.

(vii) DATA ANALYSIS AND INTERPRETATION

Data has been collected by using the interview method. Coding is done with the help of variables, classification of responses, codebook, and code sheets. Data has been reduced to code book. Based on these code sheets, data is analyzed. Analysis is done by using single frequency tables, co-variant tables, and pie chart.
(viii) PRE-TEST

Before venturing into pre-test, the researcher had discussed with some of the cardiologist and social science experts to decide on the items to be considered while undertaking pre-test. Based on such discussion, an interview schedule was designed and pre-tested on fifteen patients and fifteen family members chosen from government, charitable, and private hospitals. The schedule contains both pre-coded and open-end questions.

(ix) HYPOTHESIS

1. The prevalence of heart disease is higher among males than females.
2. Social factors are major determinants of heart disease occurrence and survival. These social factors include socioeconomic status, social stress, level of awareness of illness, and social habits such as use of tobacco, alcohol, and smoking.
3. The awareness of illness influences the attention paid to the disease and the type of services sought to maintain health.
4. The stress on the patient and family is higher when the breadwinner is affected by heart disease.
5. The psychosocial impact of the illness is more than the economic impact.
6. Better positive coping mechanisms can be seen in patients who have supportive families and social systems.
(x) SCHEME OF STUDY

The study has been divided into eight chapters

CHAPTER I outlines the statement of the problem, scope, and objectives. It also presents sample tools and techniques adopted in the present study.

CHAPTER II presents the review of literature.

CHAPTER III portrays the socioeconomic profile of the patients and their families.

CHAPTER IV examines the patient’s perception of illness.

CHAPTER V investigates the impact of heart disease on the patients.

CHAPTER VI unfolds the impact of heart disease on the family/caretaker.

CHAPTER VII investigates the coping strategies employed by the patients and family/caretaker.

CHAPTER VIII contains major findings of the study.