CHAPTER II

RESEARCH METHODOLOGY
AIMS AND OBJECTIVES OF THE STUDY

The present study mainly aims at finding out the social background conditions, such as the place of residence, religion, caste, type of family, education, occupation, family income, family interaction and family attitude of the schizophrenic patients. More specifically, the main objectives of the study are:

1. To identify the social characteristics of the schizophrenic patients;
2. To explore the sources of referral and methods of management prior to hospital consultation;
3. To focus on the family situations and conditions of the patients;
4. To know about the family members' attitude towards mental illness;
5. To identify the patterns of utilization of the psychiatric services by the patients in Goa; and
6. To evolve social models of mental health care delivery, mental health education, community care and rehabilitation, involvement of public and relevant social action.

Hypotheses

In the light of the results of other studies and based on our experiences in this institute the following
hypotheses were formulated for the present study:

(1) Schizophrenic patients are mostly from the unemployed or from the lower levels of occupations;

(2) Lower castes are over-represented among schizophrenic patients;

(3) Family communication is disturbed in most of the families of schizophrenic patients;

(4) There are disturbances in the family environment such as cohesiveness, expressiveness, and the general atmosphere of most of the schizophrenic patients;

(5) The highest burden experienced by the families of schizophrenic patients is the financial burden.

As it was difficult to identify schizophrenic patients in the community, (though there are many untreated schizophrenics in the open society), it was decided to consider the admitted cases of schizophrenics in the Institute of Psychiatry and Human Behaviour, Panjim, which is the only Institute catering to mental patients. So the patients for this study were selected from the Institute records from January 1987 to December 1987.

These records contain relevant information regarding the admitted patients such as hospital number, name and address, nationality, birth place, residence, age, identification mark, marital status, sex, occupation, mother
tongue, referral address, religion, education, income of the patient, family income, type of admission, diagnosis, date of admission and remarks.

For the purpose of the study the following criteria were used to select the patients:

(1) Patients who were diagnosed in the Institute of Psychiatry and Human Behaviour as schizophrenics on the basis of I.C.D - 9;

(2) Patients who were admitted in the hospital for the first time for treatment;

(3) Patients who are residents of Goa.

Two hundred such patients who were admitted in the Institute were selected for detailed social investigation.

Panjim is the capital of the State of Goa. Four hundred and fifty one years of Portuguese rule over the dominion and its isolation from the mainland has given Goa a distinct identity (1510 - 1961). Goa has acquired many western cultural traits. It presents a happy blend of eastern and western cultures. Goa is recognized world-wide as a prominent tourist destination. Nature has gifted Goa with 100 kms of sea-shore and the most enchanting of scenic water ways. It is a place dotted with historical and cultural land-marks which together with beauty spots and fascinating customs and festivals constitute the main source of attraction for lakhs of visitors from all over the country and abroad every year.
The biggest advantage of Goa over other tourist destinations on the country is that it is a compact area situated with scenic beauty, historical monuments and places of religious significance. Added to this are the imposing churches, Hindu shrines, the mosques, the old but impressive forts etc. All these are great attractions for tourists and lakhs of tourists visit or come to stay in Goa and this in turn leads to the rise of prices of commodities and as a result, cost of living in Goa is considered to be higher compared to the other parts of the country.

Migration from other parts of the country also has added up to the increase in population. People come in search of jobs to Goa mainly from the neighbouring States. Financial assistance on liberal terms, supply of machinery on purchase basis, supply of power at concessional rates, exemption from sales tax etc., were some of the incentives provided to set up industrial units, village and small scale as also large and medium scale units. During the last two decades many small, medium and large scale industries had come up and thus Goa has changed from the trade-oriented economy to an industrial economy.

According to the Census of 1981, Goa has about 10 lakhs of population of which 7 lakhs are from rural areas.

Literacy rate of the total Goan population is 57.25% (males 65.99 and females 48.29%). Literacy rate of
the urban population is 64.99%. Among the urban males it is 71.96% and among urban females it is 57.39%. The All India literacy rate is 36% (males 47% and females 25%) only.

Thus, Goa is fast growing as one of the important States of India and day by day the attraction of Goa is increasing. Increase in the educational institutions in Goa has led to spread of education and this in turn, has increased the number of unemployed in the State.

Medical facilities in Goa

Goa had the hospital-oriented medical relief started in the year 1510, which was the first in the whole of Asia Region. During the Portuguese regime, Goa was divided into sixteen sanitary jurisdictions, viz., the Port Health Area of Mormugao, 13 Health Centres and 2 Sub-Health Centres.

Most of the hospitals and health centres catered to the medical needs of the people in the urban areas and the rural areas were very much neglected. Hospital attached to the Medical School (Escola Medica) was the only general hospital run by the government having 100 beds. The other three general hospitals were run by voluntary agencies and were situated at Ribander, Mapsa and Margao. They had 89, 97 and 126 beds respectively. There were also regional hospitals situated at Reis-Magos, Ponda and Collem having 8, 10 and 12 beds respectively.
Among the special hospitals, Leprosy hospital at Macazana, which was initially run by the voluntary organization was brought under the control of the Directorate of Health Services in the year 1957.

Although urban areas were provided with some medical facilities with the exception of a few, in general, the hospitals and the health centres were ill-equipped, under-staffed and housed in unsuitable buildings and having no residential quarters for doctors, nurses and other auxiliary staff.

A very impressive feature of the Portuguese regime was the existence of good sanitary regulation specially as regards control of communicable diseases and environmental sanitation.

There are five dispensaries located at Vasco Dodamarg, Polem and Mollem, where small pox vaccinations and other health check up was carried out for the visitors coming to Goa as a measure to prevent transportation of communicable diseases from outside Goa. The towns of Panjim, Mapsa, Margao were provided with safe portable supply.

As on 19th December 1961, i.e., on the day of liberation from the Portuguese rule, there were 16 sanitary jurisdictions.
The teaching of modern medicine started in Goa in the 17th century itself at Old Goa where under the auspices of Military doctors of Portuguese Army a course in Medicine for local graduates was conducted. The Medical School at Panjim, which was started in the year 1842, happened to be the first of its kind in India.

With the increase in health and medical facilities after liberation and also because of the norms suggested by the government of India the staff position of the health departments has gone up.

The post liberation period has witnessed all round progress in the field of health and medical facilities in Goa. In pursuance of the Alma Ata Declaration incorporating the goal of "Health for all by 2000 A.D", this State is fast moving forward towards the goal.

The rural areas were neglected during the Portuguese regime. It is only after liberation that rural dispensaries were started. There are in all 28 Rural Medical Dispensaries in this State besides four urban Health Centres in the four main towns of Goa; Panjim, Margao, Vasco and Mapsa.

All the above mentioned Urban and Rural Health Centres are under the Directorate of Health Services except
the urban Health Centre at St. Cruz and Rural Health Centre at Mandur, which are under Goa Medical College (D. H. S., 1989).

At present there are 9 hospitals under the Directorate of Health Services, 4 hospitals under Goa Medical College, besides Institute of Psychiatry and Human Behaviour and Dental College. In addition to these, there are 3 central/semi-government hospitals and 87 private hospitals in Goa. Thus the total number of hospitals in 1990 are 105. The number of doctors in Goa is much higher compared to the other states in India.

Facilities for the treatment of mentally ill patients have been available in Goa since 1957, when the Mental Hospital was set up by the Promadoria during the erstwhile Portuguese regime. This hospital was also named 'Abade Faria' Hospital in memory of the world famous Goan Hypnotist (Fernandes, 1989).

Prior to the establishment of the Institute of Psychiatry and Human Behaviour the Mental Hospital functioned under the Directorate of Health Services, catering to the needs of grossly disturbed patients as well as certified lunatics under the Indian Lunacy Act, 1912. The Department of Psychiatry at the Goa Medical College, established in 1969 was also catering to the needs of mental patients under a general teaching hospital setting.
In order to provide optimal health care, in this territory the then Government of Goa, Daman and Diu amalgamated the Mental Hospital at Althino and the Department of Psychiatry at the Goa Medical College into one single Department (Institute of Psychiatry and Human Behaviour).

One of the aims in framing this institute was that it was felt necessary that a sustained effort be made to remove the stigma attached to mental illness and to provide coordinated mental health care making optimal use of the available resources and personnel. Research activities and training facilities are also carried out in the Institute.

The Institute of Psychiatry and Human Behaviour is a 272 bedded hospital. This is the only Institute in Goa that caters to the mental health care of the population of the state. In addition, it caters also to the adjoining states of Maharashtra and Karnataka. Around 200 to 250 patients attend on every working day, the out-patient Department of the Institute for treatment purposes.

Besides the regular O. P. D. Services, the IPHB conducts specialized clinics, viz., Child Guidance Clinic, Intensive Follow-up Clinic, Epileptic Clinic, Lithium Clinic and Alcohol and Drug De-addiction Clinic.

There is a 24 hour casualty service rendered by this Institute. Extension Satellite clinics are being
conducted at fortnightly intervals at Margao Hospicio Hospital of DHS and Rural Health Clinic at Mandur of GMC (Fernandes, 1989).

**Tools and Techniques of data collection**

For gathering detailed data and information, the following tools and techniques were used:

1. Interview schedule (Appendix - II).
2. Brief Psychiatric Rating Scale (Appendix III).
3. Family Interaction Pattern Scale (Appendix IV).
4. Family Environment Scale (Appendix - V).
5. Family Burden Scale (Appendix - VI)

(1) **Interview Schedule**

A structured interview schedule was constructed for the purpose of collecting the necessary information from the patients' close family members, such as mother, father, spouse, siblings and other relatives. Mothers and spouses constitute majority of the informants. The quality of information which one gets from this group is fairly genuine, authentic and reliable. Because of their proximity to the patient, they tend to know more about the patient and are willing to share the information with the researcher cum therapist.
After preparing the interview schedule a pilot study was undertaken with 10 patients and their families in order to know about different gaps and limitations of the interview schedule. It was difficult to collect information on certain areas like family income, interpersonal relationships, sex life etc. Moreover some patient's relatives were not willing to spend time to answer to the many questions in the interview schedule. So the number of questions in the interview schedule was reduced, some sequences were changed and language improved with respect to some questions. With these modifications, the tools were finalized to use in this study.

(2) Brief Psychiatric Rating Scale (BPRS) developed by Overall and Gorham (1962) is used in order to get an idea about the clinical condition, i.e. the severity of the symptoms, of the patients at the time of admission.

The scale consists of 16 symptom profiles derived from several large sets of symptoms -- descriptive items, employing factor analysis. Each of the 16 items is measured on a seven point scale of severity. Currently BPRS is widely used in India and in other countries. The scale was well proved for its validity and reliability in measuring the clinical condition and its change in psychiatric patients.

(3) Family Interaction Pattern Scale devised by Bhatti (1979) is used to study the interaction patterns of the
families of Schizophrenic patients. The scale depicts 3 types of interactional patterns:

(i) cordial;

(ii) indifferent; and

(iii) antagonistic.

The scale has been devised to aid the interview assessment of family interaction but not to score the interaction quantitatively. The scale studies family interaction in 15 dimensions in the form of answers to 15 questions in the scale.

(4) Family Environment Scale (FES) is used to assess the family environment of the schizophrenic patients. It focusses on the measurement and description of the interpersonal relationships among family members on the directions of personal growth emphasized within the family and on the basic organizational structure of the family. In this, cohesion, expressiveness and conflict subscales assess relationship dimension. The second group of sub-scales assess personal Development or personal Growth Dimension and the last two subscales of organization and control measure system maintenance.

(5) Family Burden Scale of Pai and Kapur (1981) is used to find out the extent and category of burden experienced by the families of the schizophrenic patients. Both objective and subjective burdens are studied by this scale. The
validity and reliability of the scale were established in India.

(6) Cohen and Struening's Attitude Scale (1964) is used to measure the opinion of the family members towards mental illness and mental patients. It is used to get an idea about the attitude of the family members of schizophrenic patients.

This scale was developed employing factor analysis of data obtained on 51 items administered to 8248 subjects in 19 occupational groups. The responses of each item were measured on a five-point scale, ranging from strongly agree to strongly disagree. By factor analysis, 51 items were grouped into five dimensions -- authoritarian, benevolence, mental hygiene, social restrictiveness and inter-personal aetiology. The method of scoring was designed in such a way that higher score indicated positive attitude. The validity and reliability of the scale were established (Cohen and Struening 1962; Costin and Karr, 1962).

In addition to these the investigator made use of the clinical records of the patients, home visits and other documents to collect relevant information for the study. Besides these the histories of five typical cases were studied in detail by the case study method (Appendix - I).
Method of analysis

The information collected was systematically processed and tabulated on various social dimensions. Wherever possible groupings were made to arrive at meaningful inferences and associations.