CHAPTER - IV

DESIGN OF THE STUDY

4.1 STATISTICAL DESIGN

The study is of survey type. Investigation in the slum areas of Calcutta with multi-religious and multi-lingual population is quite an ambitious job in so far as their locations, accessibility and the socio-cultural background of the people are concerned. The study probes into the state of literacy and primary education in slum areas. So the survey was conducted over two selected slum areas of Calcutta.

4.2 LOCALE

There are several slum areas with multi-religious and multi-lingual population in Calcutta. Of them the comparatively bigger are located in Gardenreach-Metiaburuz and Tiljala-Tangra areas. Both of these were selected as the locale of the study considering their size and composition of the population.

The Calcutta Municipal Corporation Wards numbers of those survey areas are:

a) The Tiljala Tangra area covers C.M.C. Ward Nos. 56, 57, 58 and 59;

b) Gardenreach Metiaburuz comprise Ward "Nos. 133, 134, 135, 137, 138, 140 and 141.

The population of those Wards are given in Chart No. 2.
42. **Tools**

The present study probes into the condition of literacy and primary education in two slum areas of Calcutta having multi-religious and multi-lingual population.

The study has in its focus two broad aspects: State of literacy and state of primary education. It requires family data for estimating the rate of literacy and school data to assess the state of primary education. In order to meet them, the following tools were prepared:

1. Family Data on the education of members of the slum families.
2. Data Blank on School attendance and drop outs for different lingual and religious groups.
3. Information Blank on the educational facilities available in C.M.C. schools.

The tools were developed under three stages:

**Stage - I:** Items were prepared initially on the different sub-aspects of each Data/Information Blank.

**Stage - II:** At this stage expert opinions were sought on the nature, number and appropriateness of the items framed. The following persons constitute the expert body:
After thorough verification and examining every item regarding their suitability, experts returned their papers with valuable and necessary suggestions.

Stage - III : On the basis of the suggestions made by the experts in the form of modification, addition or omission of the items the final forms were prepared and these are given in the appendix (Page No. 84-88).

1. FAMILY DATA : For collecting information about the percentage of literate parents, adults and children of School going age, family Data has been prepared. This Data consists of different items like:-

a) Total number of adults, school going age children.
b) Education of the adult (Male and Female) and children
c) Numbers of children discontinuing studies (girls or boys), particular stage of discontinuation.
d) Parents' literacy - Fathers' and Mothers' literacy stage.
2. DATA BLANK: The items included are:
   a) Number of admission in each class (I to IV)
   b) Average Age at the time of admission
   c) Number of dropouts in each class
   d) Medium of instruction
   e) Religion of the students
   f) Average Attendance
   g) Mother tongue
   h) Dropout in religion and language.

All the items are arranged to find out the rate of dropouts in different religions and languages.

3. INFORMATION BANK: This tool has been prepared for obtaining information about the availability of educational facilities in C.M.C. Schools. The items included in the Blank are as follows:

1. Hygienic condition
2. System of health check up
3. Tiffin system
4. Availability of educational apparatus
5. Games and sports facilities
6. System of evaluation
7. Parent - Teacher Co-operation
8. Special educational guidance to the exceptional students
9. Reward and Punishment.
Besides these tools a few questions have been asked to the dropouts and teachers on the spot basis. [p. 80-82]

4.4 Scoring
Simple statistical computations have been done for scoring.
In family Data the number of literate parents, children and dropouts have been simply added to find out the total numbers.

In Data Blank also, the total number of admission and dropouts in different religions and languages separately in slum and non-slum area C.M.C. Schools have been scored simply by adding the data.

In information Blank, for each item, yes/no are there. Yes is weighted 1 and the answer No is weighted '0' (Zero).

4.5 Validity
The tools have consensus validity. All the items/heads of all the tools are thoroughly verified by the experts to whom these were given for verification and suggestion. The tools possess content and construct validity.

4.6 Reliability
The tools are in the forms of Data Blank and information Blank. These Blanks contained no item eliciting opinion or feeling and
as such reliability is not of much importance. For Blanks concerning schools, data were collected from the register books of the schools and school facilities were verified by the investigator herself. Family data were collected by the investigator herself.

4.7 Sampling

In survey type study it is always best to know about the entire universe of information over total population, but it is hardly physically possible. Such information is usually obtained through a representative sample of the universe. The universe comprises different language and religion sub-groups. In order to collect information on the state of literacy of the slum areas a truly representative sample has to be a stratified random one. But considering the problem of accessibility of the areas particularly for a women investigator, non-cooperation and even hostility on the part of the respondents, the investigator had to compromise with the sample of convenience. Statistically speaking, randomness is lost to a degree, but it is not lost absolutely in as much as different families were approached without any bias and data were collected only from those families which opted to cooperate. So for administering tools of literacy a sample of convenience has been selected.

For the state of primary education the sample covered the CMC schools of the slum areas under investigation.
An appeal had been made to the Education Department of Calcutta Corporation, by the investigator for the permission of the survey in their schools. The Department made the arrangement accordingly.

Another sample consisting of a small number of CMC schools of non-slum parts of the sample areas was also drawn for having a comparative view of the state of education.

Besides these two types of samples, a sample of teachers and drop out students had been conveniently selected for interview.

4.8 Sample Characteristics

For administering Family Data a sample of 350 families have been selected.

So far as the primary education is concerned a sample of all the 22 Slum CMC schools of the Wards of Survey and 10 non-slum CMC schools have been taken for the survey.

4.9 Administering the Tools & Collection of Data

The tools were administered on the samples selected to collect data and information for the study.

In present study, for administering Family Data, the
investigator had to approach, the slum families of the areas in order to establish a rapport with them at first and to elicit normal and spontaneous responses from them. Here, she had to face great difficulties sometimes. Some of the localities are known to be the inhabitants of anti-social elements. Slum dwellers are not always cooperative and are hostile. So to avoid any awkward circumstances the investigator had to seek cooperation of the Councillors of the Wards, local political party leaders, other important persons and her local college students. All of them earnestly helped her. Administering the Family Data called for great patience on the part of the investigator as the work was with the ignorant, hostile slum-dwellers and sometimes in the filthy atmosphere with unbearable stench of raw leather, in muddy slippery pathways, specially in Tangra Tiljala slum tannery areas.

After establishing rapport with them, Family Data had been administered on them successfully. All the items on the Family Data had been filled up by the investigator herself on the basis of the answers given by the heads of the families.

On the other hand, for the state of primary education, appointments had been arranged for administering Data Blank and Information Blank on the sample CMC schools during their school hours. Prior intimation and order had been sent by the Department of Education (CMC) to those sample schools and as such there was no problem of administering these tools.
For the Data Blank, the School Register and Record books had been consulted.

At the time of administering Information Blank the investigator put tick (✓) marks to Yes/No against each item with the help of the teachers.

In this way, all the three tools had been administered properly and data had been collected.

Some teachers of the areas and dropouts of the CMC schools were later interviewed on:

a) Causes of dropout
b) Attitude towards dropout
c) Interest or urge to join the school again on the part of the dropouts.
d) Teacher's suggestion for improvement of the conditions.