CHAPTER 3

RESEARCH METHODOLOGY

3.0. Introduction

The chapter I and II were devoted to present the significance of the problem under investigation and reviewing the related literature. This chapter describes and explains the methodology deployed in this study. Research in common parlance refers to a search for knowledge. We can also define research as a scientific and systematic search for pertinent information on specific topic.

“The manipulation of things, concepts or symbols for the purpose of generalize to extend, correct or verify knowledge, whether that knowledge aids in the construction of theory as in the practice of an art.”

Research methodology is a plan of action for a research project and explains in detail how data is collected, analysed and presented, so that it will provide meaningful information. This reveals the technical aspects of the study to allow the reader to appraise the quality of the information obtained.

3.1. Research Design

The research was intentionally undertaken to discover answers to questions through the application of specific procedures. Research design is the basic framework, which provides guidelines for the research process. It is a map or blueprint according to which the research is to be conducted. “A research design is the arrangement of conditions for the collection and analysis of data in a manner that aims to combine relevance to the research purpose with economy in procedure. Research design is needed because it facilitates the smooth sailing of various research operations.”

The study attempts to describe the collection development of public libraries in the Chennai District. The proposed study tries to analyse the problems in knowing libraries and implementing the collection development and to develop the promotion of the public libraries in Tamilnadu. Hence, the study is descriptive and diagnostic in nature.
3.2. Research Instrument

The data for this study were collected from primary sources through a questionnaire. Initially, secondary sources of data were collected from books, journals, and websites for identifying the population and sample. The unit of analysis in this research study is Branch, Circle and Full Time Branch Public Libraries in Chennai Region and who has been using these libraries in the Chennai Region.

**TABLE 3.1. : CATEGORY OF PUBLIC LIBRARIES IN CHENNAI**

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Category of Public Libraries</th>
<th>Number of Respondents</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Branch Libraries</td>
<td>124</td>
</tr>
<tr>
<td>2</td>
<td>Circle Libraries</td>
<td>5</td>
</tr>
<tr>
<td>3</td>
<td>Full Time Branch Libraries</td>
<td>7</td>
</tr>
</tbody>
</table>

**FIGURE 3.1. : CATEGORY OF PUBLIC LIBRARIES IN CHENNAI**

- Branch Libraries: 124 (91%)
- Full Time Branch Libraries: 7 (5%)
- Circle Libraries: 5 (4%)
3.3. Need for the study

Effective public library system is a basic input for the social, political, cultural, economical and technological development of the country. More number of studies are conducted in the area of application of user studies in the libraries. Since, there has been no exhaustive study conducted on collection development in the Public Libraries, so there was a need to conduct a study on “An Evaluative Study of Collection Development, Organization and Management among the Public Libraries in Chennai”.

3.4. Objectives of the study

The aim of the study is to survey the collection development, organization and management among the Public Libraries in Chennai and to offer recommendations based on the outcome of the survey.

The study is designed and carried out with the following objectives:

- To analyse the collection development growth ratio in the Public Libraries in Chennai region.

- To study the knowledge level of the Public Library staff in RRRLF guidelines.

- To survey the Branch, Circle and Full Time Branch Libraries in Chennai with respect to the collection, membership, circulation and the user statistics of the Public Libraries in Chennai region.

- To study the promotional activities for the development of the Public Libraries by Public Library staff members.

- To study the purpose of the users visiting the Public Libraries.

- To analyse the users perception on Public Library infrastructures and its facilities.

- To study the satisfaction level of the users of Public Library collection and its library services.

- To analyse the barriers in using the Public Libraries in Chennai.
3.5. Hypotheses

The following hypotheses are developed for testing the above framed objectives:

1. There is no relationship between educational qualifications of the Public Library staff members and their knowledge level of technical skills and the Public Library guidelines.

2. The Professional learned society is not helping to develop the computer related knowledge level of the Library professional.

3. There is no association between the Public Libraries establishment year and their size of the resource collection.

4. There is no association between the Public Libraries establishment year and circulation and the user statistics.

5. Public Library does not help to update the knowledge of the readers.

6. Public Libraries do not concentrate on the competitive examinations purpose of the readers.

7. Public Library does not develop research innovations of the readers.

8. Public Library does not develop the reading habits of the readers.

3.6. Scope of the study

As the first step, the researcher explored the history of the Public Library movement and the library legislation. The study describes the role of RRRLF in the promotion of the Public Library activities in various dimensions. Based on the study, the researcher would examine the collection development process of the Public Libraries in Chennai region. A particular emphasis has been made in the past five years from 2007 to 2012.

The study would offer recommendations for effective collection development, organisation and management of the Public Libraries and satisfying the users' requirements in a meaningful and purposeful manner.
3.7. Sample of the study

The simple random sampling technique was adapted to collect samples from the population. Totally 136 Public Libraries selected for collection details of above mentioned Libraries. The total numbers of 680 questionnaires were distributed to Public Libraries’ users and out of which 650 fully completed questionnaires were received, indicating a return rate of 95.6%. (See: Table 3.2.: Universe of the study).

3.7.1. Pilot study

The pilot study was carried out among Public librarians and its users and the responses were analyzed. Based on the results got from the above, the main study was carried out.

3.7.2. Sampling Plan

The sampling plan is the one in which they have specified the different ways in which the research work should be done. An integral component of a research design is the sampling plan, specifically, as it addresses three questions – whom to survey (the sampling unit), how many to survey (the sample size) and how to select them (the sampling procedure).

3.7.2.1. Field of study

The study was conducted among the Branch, Circle and Full Time Branch Libraries belonging to Chennai Region, Tamil Nadu. The list of libraries in Chennai in Tamil Nadu is given in the Annexure.

3.7.2.2. Universe of the study

The population under study is comprised of Public Libraries in Chennai District. Branch Libraries 124, Circle Libraries 5 and Full Time Branch Libraries 7.
### TABLE 3.2: UNIVERSE OF THE STUDY

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Types of Library</th>
<th>Librarian Study</th>
<th>User Study</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>No. of Respondents</td>
<td>Percentage</td>
</tr>
<tr>
<td>1</td>
<td>Branch Library</td>
<td>124</td>
<td>91.2%</td>
</tr>
<tr>
<td>2</td>
<td>Circle Library</td>
<td>5</td>
<td>3.7%</td>
</tr>
<tr>
<td>3</td>
<td>Full Time Library</td>
<td>7</td>
<td>5.1%</td>
</tr>
<tr>
<td></td>
<td><strong>Total</strong></td>
<td><strong>136</strong></td>
<td><strong>100%</strong></td>
</tr>
</tbody>
</table>

#### 3.8. Data Collection

Data collection for this study was carried out between June 2012 and December 2012.

#### 3.8.1. Tools of data collection

A separate sheet used to collect the five years of book collection details of the Public Libraries in Chennai from the District Central Library, Chennai.

Two types of Questionnaires used to collect the data. One questionnaire designed to collect the data from the Public Librarians. That questionnaire contains seven parts. The questionnaire is divided into two parts. In the first part, personal details such as name (optional), age, sex, marital status, academic and professional qualifications, experience, and designation are to be furnished.

The second part contains six divisions which focus general information about the Public Library, knowledge of computer application and the RRRLF guidelines, library collection details, library membership, circulation, user statistics details, library building and its infrastructures and promotional activities for Public Library development. A total of 97 items was included in the Librarian’s questionnaire.

The Second questionnaire is prepared exclusively for the public library users. The questionnaire divided into two parts. The first part of the questionnaire has
personal details such as gender, age, educational qualification, occupation and library membership details. The second part of the user’s questionnaire divided into seven parts such as the purpose of the library visit, opinion about the public library collections and its library services, satisfaction level about the library collections and its usage, support of the public library staff in using the libraries and barriers in accessing the public libraries.

Five point Likert’s scales such as:

a. Always, Often, Sometimes, Rarely
b. Excellent, Good, Fair, Moderate, Poor
c. Good, Average, Poor
d. High, Average, Low
e. Very much satisfied, Satisfied, Neutral, Dissatisfied, Very much dissatisfied and
f. Strongly Agree, Agree, Neutral, Disagree, Strongly disagree

were used to elicit the responses of the Librarians and Public Library Users. A total of 92 items was included in the user’s questionnaire.

3.8.2. Components of data collection tools

A questionnaire was standardized on the actual data collection comments. The questionnaire was distributed personally and the objectives of the study to the prospective respondent were highlighted. Each respondent was given assurance about confidentiality of responses and respondents.

Data Sheet and record abstractions used to collect the book collection details of the various public libraries in the Chennai district. The questionnaire had closed-ended questions and statement type they were Likert type scales.

3.8.3 Reliability and validity of the tools

Reliability comes to the forefront when variables developed from summated scales are used as predictor components in objective models. Since summed scales are
an assembly of interrelated items designed to measure underlying constructs, it is very important to know whether the same set of items would elicit the same responses if the same questions are recast and re-administered to the same respondents. Variables derived from test instruments are declared to be reliable only when they provide stable and reliable responses over a repeated administration of the test.

**TABLE 3.3. : CRONBACH'S ALPHA RELIABILITY TEST ANALYSIS**

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Descriptions</th>
<th>Cronbach's Alpha Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Knowledge on Computers and Public Library Guidelines</td>
<td>0.953</td>
</tr>
<tr>
<td>2</td>
<td>Public Library Services</td>
<td>0.648</td>
</tr>
<tr>
<td>3</td>
<td>Promotion of the Public libraries</td>
<td>0.655</td>
</tr>
<tr>
<td>4</td>
<td>Barriers for the growth of the public libraries</td>
<td>0.568</td>
</tr>
</tbody>
</table>

**Library Users Questionnaire**

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Descriptions</th>
<th>Cronbach's Alpha Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Purpose of the Library Visit</td>
<td>0.770</td>
</tr>
<tr>
<td>2</td>
<td>Opinion about the library Collection</td>
<td>0.854</td>
</tr>
<tr>
<td>3</td>
<td>Usage of the Library collection</td>
<td>0.741</td>
</tr>
<tr>
<td>4</td>
<td>Opinion about the Library Services</td>
<td>0.900</td>
</tr>
<tr>
<td>5</td>
<td>Support of the library staff</td>
<td>0.872</td>
</tr>
<tr>
<td>6</td>
<td>Satisfaction on library facilities and infrastructure</td>
<td>0.928</td>
</tr>
<tr>
<td>7</td>
<td>Reasons for not visiting the public libraries</td>
<td>0.880</td>
</tr>
</tbody>
</table>
Cronbach’s alpha analysis has been administered to eleven major groups where the value was 0.81 and it was above 0.5, which shows that the variables taken up for the study and grouping of variables are reliable in nature.

3.8.4. Data analysis and Interpretation

The data, after collection, had to be processed and analysed in accordance with the outline laid down for the purpose at the time of developing the research plan. This is essential for a scientific study and for ensuring that we have all relevant data for making contemplated comparisons and analysis. Technically speaking, processing implies editing, coding, classification and tabulation of collecting data so that they are amenable to analysis.

The term analysis refers to the computation of certain measures along with searching for patterns of relationship that exist between data-groups. Thus, “in the process of analysis, relationships or differences supporting or conflicting with original or new hypotheses should be subjected to statistical tests of significance to determine to what validity data can be said to indicate any conclusions.”

Therefore the collected data were analysed using Statistical Package for Social Sciences (SPSS) Version 16. Descriptive and inferential statistics have been applied to the data. While the descriptive statistics describe and summarize search of data, inferential statistics help generalized from a sample to whole population and in testing hypothesis. The used statistical techniques applied include: Reliability Analysis, Weighted Arithmetic Mean, ANOVA, Chi-Square test and Percentile.

3.9. Limitations of the study

The study has the following few limitations:

1. Even though there is a scope for covering all the Public Libraries of Tamil Nadu, for want of time, the study is confined only to the Chennai. First, The study has been limited to the opinions of Branch, Circle and Full Time Branch Libraries in Chennai. It does not cover Connemara Public Library, District Central Library, Mobile Libraries, Part time Libraries and village libraries in Chennai.
2. Secondly the study includes the data from certain categories of available respondents and applicability of result to other categories cannot be established.

3. Thirdly the study may suffer from inherent demerits of the sampling technique employed.

4. The study relies on data obtain from self – report measures only; hence, the responses may suffer from biased and prejudice.

5. The key difficulties encountered at the time of data collection were (i) Logistics (ii) Protocols and (iii) Time constraints.

3.10. Chapterisation

Chapter 1: Introduction

Chapter 2: Review of Related Literature

Chapter 3: Research Methodology

Chapter 4: Data Analysis and Interpretations

Chapter 5: Findings and Suggestions.

3.11. Conclusion

This chapter explains about the research design and tools for the data collection. The limitation of the study is furnished. As such, an understanding of methodology will facilitate our understanding of basic research questions. The next chapter deals with the interpretation of the collected data using with the various statistical tools which mentioned above. After describing the methodology adopted for carrying out the study, the following chapter provides insights into the findings of the data collected.