CHAPTER 3

RESEARCH METHODOLOGY

3.1 Introduction

The review of literature discussed in the previous chapter focused on the situation of adolescent girls in our State, the disadvantages faced by children and adolescents in institutions and need for intervention study among adolescent girls in the children’s home. It revealed that, books, articles and studies with special attention to adolescent girls of Children’s Home are very few in our country.

The present study was undertaken to assess psychosocial well-being of the adolescent girls, design an intervention package based on the assessment and find out the effectiveness of the intervention programme on psychosocial well-being of adolescent girls in the children’s home. This chapter describes the research methodology adopted for the conduct of the study –objectives, hypothesis, definitions, design, sampling, data collection procedures, tools of data collection, statistical techniques used, limitations of the study and ethical considerations.

3.2 Major Objective of the study:

The major objective of the study was to assess the effectiveness of intervention programme for the psychosocial well being of the adolescent girls with special reference to Children’s Homes for girls.
3.2.1 The specific objectives of the study were:

1. To identify the socio demographic profile of the adolescent girls in the Children’s Home
2. To assess the adolescent girls’ awareness on developmental changes in adolescence
3. To assess the Subjective well-being of the adolescent girls in the Children’s Homes
4. To assess the self-esteem of the adolescent girls in the Children’s Homes
5. To assess the adjustment difficulties of the adolescent girls in the Children’s Home
6. To design an intervention package for the psycho social well being of the adolescent girls in children’s home based on the assessment.
7. To assess the effectiveness of the intervention package on the adolescent girl’s awareness on developmental changes, subjective well being, self-esteem, and adolescent adjustments.

3.3 Hypotheses:

1. The adolescent girls who are exposed to the intervention programme will have higher awareness on developmental changes in adolescence when compared to those who are not exposed to the intervention programme.

2. The subjective well being of the adolescent girls who are exposed to the intervention programme is higher than the subjective well being of those who are not exposed to the intervention programme.
3. The self-esteem of the adolescent girls who are exposed to the intervention programme is significantly higher than those adolescent girls who are not exposed to the intervention programme.

4. The adolescent girls who are exposed to the intervention programme will show significantly well adjustments compared to those adolescent girls who are not exposed to the intervention programme.

3.4. Definition of terms

3.4.1. Adolescent girls

A person in the stage of adolescence which is the developmental stage that occurs from puberty to maturity lasting from ages of 12 to 18 years (Hurlock, 2002).

For the present study, adolescent girls are the residents of non – government children’s homes for girls in Thrissur District, Kerala, who belong to the age group of 13-16 years.

3.4.2. Children’s Home

According to Juvenile Justice (Care and Protection of Children) Act, 2000"Children’s home" means an institution established by a State Government or by voluntary organization and certified by that Government under section 34. (1) i.e. for the reception of child in need of care and protection during the pendency of any inquiry and subsequently for their care, treatment, education, training, development and rehabilitation.

In this study Children’s Home means, a non – governmental institution recognized by Government of Kerala, established in Thrissur district for the care and protection of girl children below 18 years, whose parents are deceased or unable to care and protect them due to various emotional, social and economic causes such as the absence of one or both
parents, separation or divorce, chronic or contagious illness, broken family and extreme poverty.

3.4.3. Psychosocial wellbeing

According to Psychosocial well-being working group,(2003) the term “Psychosocial well-being” of individuals and communities explained with respect to three core domains. Psychosocial wellbeing principally reflects adjustment across following three core domains - Human Capacity, Social ecology and Culture and Values

Woodhead, (2004) notes “Psycho social -well being” is a term frequently used to catch all aspects of children’s psychological development and social adjustment. The five proposed main domains of psychosocial well being are Cognitive abilities and cultural competencies, Personal security, social integration and social competence, Personal identity and valuation, Sense of personal agency and the emotional and somatic expressions of well being.

In this study, **psychosocial well-being** is defined with respect to the following domains:

- **Subjective well-being**: refers to the independent feelings and evaluation about a variety of life concerns in addition to an overall feeling about life in both positive and negative terms which is experienced by the adolescent girls as measured by Nagpal and Sells’ (1992) Subjective well-being inventory.

- **Self – esteem**: refers to the adolescent girl’s self evaluation about their capacity – the strength and weakness and efforts to improve their confidence in relation to the general, personal and social self esteem measured by Battle’s (1981) Culture free self – esteem inventory.
• **Adolescent adjustment:** refers to efforts of the adolescent girls to change their behavior to achieve a harmonious relation between ones and their environment in relation to feelings of guilt, personal worth, attitude towards future, home, school as well as sexual maturity as measured by Reddy (1964) on personal and social adjustment.

• **Awareness on developmental changes in adolescence:** refers to adolescent girl’s understanding on growth, puberty, menstruation, hygiene, marriage, pregnancy, abortion, family planning, human sexuality, STDs, HIV/AIDS, general health, premarital sex, teenage pregnancy, exploitation, violence, sex rackets, and its management measured by the modified survey questionnaire of awareness on developmental changes in adolescence.

3.4.4. Intervention

Intervention is defined as an influencing force or act that occurs in order to modify a given state of affairs. In the context of behavioural health, an intervention may be any outside process that has the effect of modifying an individual’s behavior, cognition, or emotional state (Encyclopedia of Mental Disorders).

In the present study, **Intervention** refers to an intervention package for adolescent girls devised on the basis of pre – test assessment data collected by the researcher for the purpose of the study. This intervention delivered in the form of a programme to the selected group of adolescent girls in the children’s homes with an aim of assessing the effectiveness of the intervention programme on psychosocial well-being of adolescent girls in the children’s Home. The twelve sessions of the intervention was encompassed to develop the qualities and capacities in their personality towards a better womanhood.
3.4.5. Socio-demographic profile

Profile is the outline or contour of the human face viewed from one side or a vivid and concisely written sketch of the life and characteristics of a person (Webster’s Dictionary). In the present study, socio-demographic profile includes the personal profile of the adolescent girls such as their name, age, religion, reason for admission to the children’s home (orphan/broken family/economically poor), educational background and health conditions.

3.5. Research design

The design of the present study is Quasi - Experimental research design, with pre-test post-test, non-equivalent comparison group. When it is not possible to divide the respondents into experimental and comparison groups by random assignments in the same sample, selects an existing control group (comparison group) that appears to be similar to experimental group. This research design is commonly called as pre-test post-test non-equivalent comparison group design (Laldas, 2005; Cargan, 2008).

The adolescent girls from both the experimental and control groups were compared in a pre-test to make sure that they were equivalent on the dependent variable at its pre – test measurement (the difference was statistically insignificant). And it was reasonable to support that, the variation at the post-test represented the effectiveness of the intervention. Thus the intervention programme was the independent variable and the psychosocial well being measured in terms of awareness on developmental changes, subjective well – being, self- esteem and adjustment were the dependent variables.
The study design can be symbolized as follows.

\[ \text{E} \rightarrow Y1 \rightarrow X \rightarrow Y2 \]

\[ C \rightarrow Y1 \rightarrow \text{Non –X} \rightarrow Y2 \]

Where:

\( X \) = Independent variable (Intervention programme)

\( Y1 \) = Dependent variable before introduction of X (Pre-test)(Psychosocial well – being measured in terms of Awareness on developmental changes in adolescence, subjective well-being, self –esteem and adolescent adjustment)

\( Y2 \) = Dependent variable after introduction of X (Post – test)

\( E \) = Experimental group

\( C \) = Control group (Comparison group)

**3.6. Pilot study**

The pilot study undertaken by the researcher among a sample of Government and Non – government children’s home authorities and their residents revealed that the study would be more appropriate to be conducted among adolescent girls of the non –government children’s home and the intervention programme would be of significant contribution for this group.

In Government children’s home, the residents have had training programmes related to Art forms and skill development with the involvement of Government as well as local NGOs. The time frame of the study was also not matching with the long procedure to get the permission from Government to conduct the study.
Hence the researcher decided to focus only on the adolescent girls from the non-government children’s homes as they were the ones who were not exposed to any training programmes. According to Department of Social welfare, Government of Kerala (2008) the number of Children’s Homes for girls are high in Thrissur District. The researcher contacted the District Social welfare officer, Thrissur and briefed him on the nature and significance of the study. He gave the list of children’s homes in Thrissur and directed the researcher to contact President and Secretary of All Kerala Orphanages and Charitable Organization Association. They provided assistance in identifying 15 children’s homes similar in many respects from existing 48 children’s home for girls. Also gave instructions to these 15 children’s homes to co-operate with the researcher. Later the researcher approached the 15 children’s homes and addressed the Heads and the adolescent girls and only eight children’s home authorities agreed to involve the complete study. The authorities and adolescent girls of the experimental group were specially contacted for deciding upon the venue, dates duration of the sessions and understanding of tools of data collection designed for the study also checked during pilot study.

The pilot study helped the researcher in the following

1. Delimiting the scope of the study in terms of time, place, universe and subjects to be observed.
2. Understanding the need for changes in the Malayalam versions of the tools for data collection.
3. Getting introduction to the prospective respondents and eliciting their corporation and readiness to respond.
3.7. Universe of the study

Universe of the study consists of all adolescent girls in the age group of 13-16 years who were residing in non-government children’s home in Thrissur District, Kerala.

There were 48 Non-government children’s homes in Thrissur District. Out of them only 15 were comparable in all aspects. Being an experimental design which involves intervention, only eight non-government children’s home authorities agreed for the study.

3.8. Unit of the study

Unit of the study was an adolescent girl in the age group of 13–16 years who is residing in one of the eight non-government children’s Home for girls in Thrissur district, Kerala.

3.9. Inclusion and exclusion criteria

3.9.1. The inclusion criteria

The inclusion criteria includes

- Adolescent girls who had attained menarche
- Adolescent girls aged between 13 – 16 years
- Adolescent girls studying in the high school classes i.e., 8th, 9th, and 10th standards
- Adolescent girls who are willing to participate in all intervention sessions, and
- Adolescent girls who are staying in the children’s home since last 10 years.
3.9.2. The exclusion criteria

The exclusion criteria includes

- Adolescent girls who are not willing to participate in the intervention sessions
- Adolescent girls who have history of any current psychiatric illness and
- The adolescent girls who are staying in Children’s Home less than 10 years

3.10. Sampling:

Out of eight children’s home agreed for the study, four children’s homes each randomly selected for experimental and control group. All adolescent girls from eight children’s home, fulfilling the inclusion criteria were selected for study group through census method. To maintain uniformity in number, 60 adolescent girls in experimental group (out of 67) and 60 adolescent girls in the control group (out of 71) were selected for final analysis of data.

The eight children’s home for girls are the following: St. Mary’s Orphanage, Mukkattukkara, Thrissur, St. Annes Orphanage, West Fort, Thrissur, St. Josephs’ Convent Orphanage, Thrissur, St. Vincent Orphanage, Mundathikode, Thrissur, St. Vincent Orphanage, Ramavarmapuram, Thrissur, Lourde Nilayam orphanage, West fort, Thrissur, V.M.V. orphanage, Kalathode, Thrissur, and Shahid Faizal Orphanage, Vadanapally, Thrissur.

Details of the sampling process as mentioned in the table 3.1
Table 3.1 the sampling process of the study

<table>
<thead>
<tr>
<th>Stages</th>
<th>Details of the sampling process</th>
<th>Sampling technique</th>
</tr>
</thead>
<tbody>
<tr>
<td>Distribution of the children's homes from 8 children’s homes in to four experimental and Four control group</td>
<td>From the eight children’s home, four each were randomly selected for two groups- experimental and control group.</td>
<td>Simple random sampling</td>
</tr>
<tr>
<td>Distribution of adolescent girls in each of the two groups</td>
<td>From each of the eight children's homes, all adolescent girls fulfilling the inclusion criteria were selected for experimental group and control group</td>
<td>Census method</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Name of the Children's home</th>
<th>Total No</th>
<th>Selected No</th>
<th>Name of the Children's home</th>
<th>Total No</th>
<th>Selected No</th>
</tr>
</thead>
<tbody>
<tr>
<td>St. Mary’s Orphanage, Mukkatukara</td>
<td>18</td>
<td>16</td>
<td>St. Vincent Orphanage, Mundathikode</td>
<td>23</td>
<td>18</td>
</tr>
<tr>
<td>St. Josephs’ orphanage, Thrissur</td>
<td>17</td>
<td>14</td>
<td>St. Vincent Orphanage, Ramvampuram</td>
<td>12</td>
<td>12</td>
</tr>
<tr>
<td>V.M.V. orphanage, Kalathode</td>
<td>14</td>
<td>12</td>
<td>Lourde Nilayam orphanage, W. fort</td>
<td>22</td>
<td>20</td>
</tr>
<tr>
<td>St. Anne’s Orphanage, West Fort</td>
<td>28</td>
<td>25</td>
<td>Shahid Faizal Orphanage, Vadananpally</td>
<td>23</td>
<td>21</td>
</tr>
</tbody>
</table>

Note: To maintain the uniformity in number, 60 adolescent girls in experimental group and 60 adolescent girls in the control group were selected for final analysis, whose data were complete in all aspects.
3.11. Tools for data collection:

There were a total of five tools were used for the present study.

3.11.1. Questionnaire on Socio-demographic profile was applied to assess the intervening variables.

The following tools were used to assess the dependent variable psychosocial well-being of adolescent girls. These tools were administered twice (at the pre and post-test) for both the groups (experimental and control).

3.11.2. Awareness on developmental changes in adolescence
3.11.3. Subjective well-being inventory
3.11.4. Self – Esteem inventory and
3.11.5. Adolescent Adjustment inventory

3.11.1. Questionnaire on Socio-demographic profile

This semi-structured questionnaire consists of 16 items pertaining to relevant personal profile, educational background and health condition of the adolescent girls in the children’s homes. This tool was used to measure the socio demographic (intervening) variables of the adolescent girls of both the groups and was intended for one time measurement at pre-test level.

3.11.2. Awareness on developmental changes in adolescence

This is a modified version of the survey questionnaire developed by Department of Psychiatry, Thrissur Medical College, Kerala in 2003. This consists of open ended as well as close ended questions to elicit awareness on developmental changes in adolescence - physical and psychological changes, sexuality, STDs, and HIV/AIDS,
teenage issues and general health. The questionnaire consisted of 80 items with a scoring pattern to the open ended correct and closed positive answer, 2 for True, 0 for False and 1 for don’t know. Scoring pattern is reverse for the negative answers. Higher score denotes higher awareness. The reliability was found to be 0.89 and the validity was 0.93. The researcher has considered the survey questionnaire for the sake of this study due to the fact that it has been tested and retested for the local population of Thrissur city High school and higher secondary students by various independent researchers as well as group of researchers from schools of social work in Kerala.

3.11.3. Subjective well–being inventory

Nagpal and Sell (1992) developed the Subjective well being Inventory which has attempted to measure the feelings of well being or ill being as experienced by an individual or a group of individuals in various day today life concerns. The test – retest reliability of the Inventory was measured using contingency co – efficient method and was found to be significant below 0.002 level indicating high reliability and stability. The inventory is a self report or an interviewer administered questionnaire consisting of forty items which study eleven aspects of subjective well being namely:

1. General well being positive affects: This factor reflects the feelings of well being arising out of an overall perception of life as functioning smoothly and joyfully.

2. Expectation-achievement congruence: The items in this factor refers to feelings of well being generated by achieving success and the standard of living as per one’s expectation, or what may be called satisfaction.

3. Confidence in coping: This factor relates to perceived personality strength, the ability to master critical or unexpected situations. It reflects what is sometimes
called positive mental health in an ‘ecological’ sense, i.e. the ability to adapt to change and to face adversities without breakdown.

4. Transcendence: The items in this factor relate to life experiences that are beyond the ordinary day-to-day material and rational existence. They reflect feelings of subjective well being derived from values of a spiritual quality. The factor confirms rootedness and belongingness.

5. Family group support: This factor reflects positive feelings derived from the percentage of the wider family (beyond the primary group of spouse and children) as supportive, cohesive and emotionally attached.

6. Social Support: This factor contains items describing the social environment beyond the family as supportive in general and in times of crisis.

7. Primary group concern: This factor covers feelings about the overall well being of family life.

8. Inadequate mental mastery: All items with significant loadings on this factor imply a sense of insufficient comparison over, or inability to deal efficiently with, certain aspects of everyday life that are capable of disturbing the mental equilibrium. This inadequate mastery is perceived as disturbing or reducing subjective well being.

9. Perceived ill-health: This is a one-dimensional factor since happiness and worries over health and physical fitness are highly correlated, and both load significantly here.

10. Deficiency in social contacts: The common features of the items constituting this factor are worries about being disliked and feelings of missing friends.
11. General well being-negative affect: This factor reflects a generally depressed outlook on life.

Question-wise Scoring: According to the manual of the inventory, the scoring is as under:
In 19 out of the 40 questions (questions 1-15, 21-23 and 28), Value 3 was given if the respondent has selected the category 1 (very much), Value 2 was given if the respondent has selected the category 2 (to some extent); and Value 1 was given to category 3 (not so much). In the remaining 21 questions (questions 16-20, 24-27 and 29-40) Value 1 was given if the respondent has selected the category 1 (very much), Value 2 was given if the respondent has selected the category 2 (to some extent); and Value 3 was given to category 3 (not so much).

However, for questions 14, 27 and 29 if the respondent has selected category 4, value 0 (zero) was given. The questionnaire contains 40 items few items (questions) from the original scale are not applicable to adolescent girls. Through proper analysis those questions which are not suitable to adolescent girls life (Primary group concern) are selectively removed from the original list.

Scoring method: 1. The range of total score is 40 – 120 with the cut off score of 81 for the respondent. The total score can be interpreted in the light of three board ranges 40-60, 61 – 80, 81 – 120 to have an overall picture of the well being status and normal Indian sample is 90.8 with a SD of 9.2.

Scoring method: 2. The second method of interpreting the score is in terms of sub scores on the two sets of positive and negative items. The minimum and maximum scores on the positive items are 19 and 57 respectively. The mean score of normal adult Indian sample
positive items is 42.9 with a standard deviation of 4.6. The minimum and maximum score on negative items are 21 and 63 respectively. The mean score on normal Indian samples on negative items is 47.9 and with a standard deviation of 5.1.

Scoring method: 3. The third method of interpreting the scores is in terms of working out scores for each factorial dimensions and drawing a profile of these factorial scores in each case. It is possible to interpret the profile by comparing it with the middle values of the scores in each factor. If most of the scores fall above the middle values, the probability is that, the person enjoys a good sense of well being. If most scores are below the inferred that, the individual is experiencing difficulties in terms of happy living. The minimum and maximum scores of are given in the below table 3.2.

<table>
<thead>
<tr>
<th>Sl. No</th>
<th>Domains</th>
<th>No. of items</th>
<th>Mini. Score</th>
<th>Max. Score</th>
<th>Mid value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Subjective well being – positive affect</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>2</td>
<td>Expectation achievement congruence</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>3</td>
<td>Confidence in coping</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>4</td>
<td>Transcendence</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>5</td>
<td>Family group support</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>6</td>
<td>Social support</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>7</td>
<td>Primary group concern</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>8</td>
<td>Inadequate mental mastery</td>
<td>7</td>
<td>7</td>
<td>21</td>
<td>14</td>
</tr>
<tr>
<td>9</td>
<td>Perceived ill health</td>
<td>6</td>
<td>6</td>
<td>18</td>
<td>12</td>
</tr>
<tr>
<td>10</td>
<td>Deficiency in social contacts</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>11</td>
<td>General well being – negative affect</td>
<td>3</td>
<td>3</td>
<td>9</td>
<td>6</td>
</tr>
<tr>
<td>12</td>
<td>Overall score</td>
<td>40</td>
<td>40</td>
<td>120</td>
<td>80</td>
</tr>
</tbody>
</table>

For the present study, third method of interpreting the scores has been adopted. Past research using subjective well being inventory on adolescents and elderly have confirmed the factorial structure in these participants (Sell and Nagpal, 1985). The
subjective well being inventory has been used in Indian study with adolescent sample with the age range 12 – 20.

3.11.4. Self – Esteem inventory (Battle, 1981)

Self – Esteem assessment was done for both experimental and control groups before and after intervention by using self esteem inventory developed by Battle, 1981. Self-esteem inventory for children and adults refers to the perception the individual possess of his own worth. It is used as a screening tool to identify individuals who may need psychological help, to plan academic, personal, or affective interventions, for the identification of specific areas of self esteem difficulties, and as a measurement instrument in academic research involving self esteem. The factor analysis indicates that the items in this scale possess acceptable internal consistency.

The 40 items of the Cultural Free Self Esteem Inventory for adults are the most discriminating ones from the pool of 85. An alpha analysis of internal consistency reveals the following four sub scales.

General Alpha Items $= .78\ (2,3,6,8,11,13,18,20,23,25,26,28,30,32,37,39)$

Social Alpha items $= .72\ (1, 5, 7, 10, 16,21,31,35)$

Personal Alpha items $= .72\ (12, 15, 17, 22, 27, 34, 36, 40)$

Lie Scale (Defensiveness) Alpha items $= .54\ (4, 9, 14, 19, 24, 29, 33, 38)$
Concurrent Validity: correlates for the total samples ranged from .71 to 80. The cultural free self esteem inventory also correlates favorably with other measures of personality including A.T. Beck depression Inventory and Minnesota Personality Inventory.

Thus scoring for the different dimensions of self-esteem are classified into different ranges Very high, High, Intermediate, Low, and very low Self Esteem and the range of scores for the classification are given in Table 3.2

<table>
<thead>
<tr>
<th>Items</th>
<th>Very high</th>
<th>High</th>
<th>Intermediate</th>
<th>Low</th>
<th>Very low</th>
</tr>
</thead>
<tbody>
<tr>
<td>General self-esteem</td>
<td>15+</td>
<td>12-14</td>
<td>8-11</td>
<td>5-7</td>
<td>4</td>
</tr>
<tr>
<td>Social Self esteem</td>
<td>8</td>
<td>6-7</td>
<td>4-5</td>
<td>2-3</td>
<td>1</td>
</tr>
<tr>
<td>Personal Self -esteem</td>
<td>8</td>
<td>6-7</td>
<td>4-5</td>
<td>2-3</td>
<td>1</td>
</tr>
</tbody>
</table>

Scores corresponding to each sub dimensions are obtained by adding the scores of corresponding statements to each dimension. These total scores of each dimension were used for further analysis.

3.11.5. Adolescent adjustment inventory (Reddy 1964)

Adolescent adjustment inventory measures items on personal adjustment measure neurotic tendencies, feelings of inferiority, guilt, personal worth and attitude towards future, social adjustment items measure the adjustment towards home, and school as well as sex adjustment. It has 90 items with expected responses always, sometimes, never. Among the 90 items, 44 items are related to personal adjustment and 46 items are related to social adjustment. Scoring is done by attributing the value 0 to Never (well adjusted), 1 to Sometimes (moderately adjusted) and 2 to Always (Ill adjusted). So that higher
scores indicate higher maladjustments. The total score is the sum total of the score on each item. Higher total score rated as greater maladjustments. These total scores of each dimension were used for further analysis.

The Adolescent adjustment Inventory was found to have odd-even reliability co-efficient of 0.84 and 0.95 for personal and social adjustment respectively after applying Spearman Brown Correlation. Scores on both the parts were also found to be correlated significantly. The inventory has been validated against teacher’s ratings. Bell’s adjustment inventory, California personal and social adjustment inventory, parents ratings and by comparing adjustment scores of delinquent and non – delinquent groups.

This measure was chosen for the present study in view of its specificity for adolescent adjustment, its coverage of areas of adjustment, the adequacy of its reliability and validity, its length, and finally the fact that it has been developed for, and validated in Indian samples.

The tools used for the study are given in the Appendix-1

3.11.1.1. Translation of the tools of data collection

All the respondents were comfortable with Malayalam language only so the entire set of tools inclusive of socio-demographic profile had to be translated. Individuals, who were blind to the original English version of the tools, back translated the translated tools to English. A few changes were incorporated and its versions were given to three Mental Health Professionals, who are experts in the respective vernacular language in order to check for the appropriateness of the translated materials. When these tools were subjected
to a pilot study with 10 adolescent girls in one children’s home, it proved to be difficulty in understanding the contents and mode of questions included in the tools.

3.12. Process of data collection:

The process of data collection of the study was completed through following five phases:

First phase : Pre -intervention assessment (Pre – test),
Second phase : Preparation of the Intervention package,
Third phase : Intervention,
Fourth phase : Post – intervention assessment (Post-test), and
Fifth phase : Follow up

3.12.1. First phase: Pre -intervention assessment (Pre – test)

The tools identified for the data collection which mainly focus on the domains of psychosocial well being of the adolescent girls in the children’s homes were used for the pre -intervention assessment data collection (pre-test) from both in experimental and control group.

3.12.2. Second phase –Preparation of the Intervention package

The content of the Intervention package was consolidated based on the pre- intervention assessment findings, the review of published literature, discussion with the research guide, discussion with children’s home authorities, and the materials already standardized and implemented by national and international organizations - UNESCO, NCERT, SCERT, CDC and WHO.

The major objective of the intervention package was to strengthen adolescent girl’s personality to deal effectively with the demands and challenges of everyday life.
Contents of the package were Meditation, Developmental changes in adolescence and its management, Life Skill education, Legal Awareness and Gender sensitivity, Career and Vocational Guidance, General Health Check up and awareness class on health, Plan for the future: Better women hood, and peer group training. The detailed description of the package is given in Appendix-II.

3.12.3. Third phase: Intervention

After the preparation of the intervention package, the intervention programme for the psychosocial well being of adolescent girls was organized for the experimental group. There were total of 12 sessions exclusive of pre and post measurements. Each session was for duration of two to three hours. The intervention programme was conducted for the experimental group for duration of total 30 hours of intervention. The number of days varied from 12 to 20 days. All adolescent girls in the experimental group were brought together in one children’s home - St. Anne’s orphanage, West fort, Thrissur in order to deliver the intervention programme. Sessions were conducted during summer holidays, Saturdays and Sundays.

The package was delivered by a team consisting of mental health professionals, medical professional, counselors, advocate and the researcher who is a professional social worker.

The major part of the methodology employed for the intervention programme includes, informal, interactive participatory approach, activities with audio and visual aids.
A training kit (material) containing a note book, pen and reading material on the contents of each session printed in 20 pages book in Malayalam prepared by the researcher was distributed to each participant on the first day of the intervention.


After the Intervention programme, the post measurement with the same tools previously used on dependent variable was administered to both experimental and control group to compare the results to know the effectiveness of the intervention in experimental group. After the post assessment of the intervention, the same programme had given to the control group with the distribution of the reading material.

3.12.5. Fifth phase: **Follow up**

As part of follow up, a second post assessment test was done after six months with the experimental group only to know the maintenance of sustainability of the intervention programme through peer group education.

The intervention programme was done from 15th May 2008 to 15th August 2008, which lasted for about three months. The first post test was conducted soon after the intervention. After six months in February 2009, to know the sustainability of the effectiveness of intervention programme a second post test was done with the adolescent girls in the experimental group.

A flow chart of the study is represented in the Fig.3.1.
3.13. Data analysis

The data collected have been edited, coded and analyzed using through computer applications using Statistical package for social sciences (SPSS). Statistical techniques such as descriptive and inferential statistics -‘t’- test, ANOVA were applied for the statistical analysis of the findings of the experimental and control group.

- Descriptive data was used to determine Mean and SD.
• Independent sample t-test was done to confirm randomization of subjects in experimental group and control group.

• The t-test was calculated for the two groups at the pre test and post test to find out the statistically significant difference between the two groups at these two levels of measurements.

• ANOVA was used for testing the efficacy of the intervention programme on experimental group in three phases of intervention

• Cohen’s D for effect size calculation - was used for continuous data when different scales (e.g. for measuring pain) are used to measure an outcome and is usually defined as the difference in means between the intervention and control groups divided by the standard deviation of the control or both groups.

3.14. Limitations of the study

1. The study has catered only to adolescent girls; the boys of these age groups are not included.

2. Being an experimental study the number of respondents were large.

3. Government Children’s Home was not included

4. Peer group educators performance was not assessed separately

5. Children’s homes restricted to Thrissur district only
3.15. Ethical considerations

According to NASW Code of Ethics, (1996) section 5 Social workers ethical responsibilities to the social work profession, under subsection 5.02(Evaluation and Research) researcher,

- Carefully considered possible consequences, consulted concerned authorities and followed guidelines for the protection of the respondents (5.02 d)

- Respondents were well informed in detail regarding the purpose of the study and written consent was obtained before the study. (5.02 e)

- Informed their rights to withdraw from research at any time without penalty

(5.02 h)

- Protected all respondents from unwarranted physical or mental distress, harm, danger, or deprivation.(5.02 j)

- Ensured the anonymity and confidentiality of the respondents, information collected was used only for research purpose and reported accurate findings only (5.02 l)

- According to the Declaration of Ethics for Professional Social Workers TISS, researcher considered respondents as co-partner in understanding the research study and shared interpretation of the findings with the. The control group was also provided the intervention programme once the study was completed. (Desai, 2004)