DESIGN
OF THE STUDY
CHAPTER III
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Research methodology is a way to systematically investigate the research problem. It gives the various steps in conducting the research in a systematic and logical way, which is empirical and replaceable. It is essential to define the problems, state objectives and hypotheses clearly, at the onset. The research design provides the details regarding what, where, when, how much and by what means concerning the enquiry.

Carlson (1942) notes several ways in which pattern of leadership differ among local (place bound) and cosmopolitan (career bound) educational leaders. Place bound leaders are ‘insiders’ promoted within the system or in the same organization, the career bound leaders (cosmopolitans) are ‘outsiders’ coming from different organizations who often leave a lasting impression on the institution where they perform their duties. But there was no such study conducted in the light of recruitment and promotion of educational leaders in Indian context.

The present study is basically a comparative study of recruited and promoted principals of Government Senior Secondary Schools of Delhi. This research study assumes school principals as educational leaders who perform the functions of academics and administrative at the apex position at the school level. It was an attempt to investigate the leadership styles, interpersonal relationship and effectiveness of these two groups of principals they exhibit while managing their schools.

The leadership style was studied by administering Leadership Preference Scale (LPS) developed by Bhushan (1970).

The interpersonal relationship was studied by using a tool
"Interpersonal Relationship Description Questionnaire (IRDQ) developed by the investigator. The leadership effectiveness was studied by using "Leadership Behaviour Descriptive Questionnaire developed by Ralph and Alwin adapted by Dr. K.G. Sharma and C.S. Sharma (1986).

The study of interpersonal relationship was done through interpersonal skills of the principals which are essential for sound interpersonal relationship. This investigation was conducted to provide a deeper insight into the leadership styles, interpersonal relationships and effectiveness in the light of recruitment and promotion of the principals. It would give an opportunity to school principals to introspect and make self-analysis of their administrative style and their interpersonal relationships with teachers, parents and students to be effective in their schools. It would also provide them to observe and analyze the situational factors of the school and help them to comprehend the composition of personnels to opt better administrative style to accomplish the goals of schools.

The study was conducted in the Government Senior Secondary Schools of South Delhi. Thus the data collected for the present study was up-to-date and meaningful for understanding the importance and utility of leadership styles, interpersonal relationships and effectiveness of principals who are appointed through recruitment by the Union Public Service Commission (UPSC) and those promoted from the post of vice-principals on the basis of seniority, working in the same schools. The investigator was motivated to conduct this study by the general distinction made by teachers and administrators regarding the two groups of principals existing in the Government Senior Secondary Schools of Delhi. Some administrators and teachers talk highly about the performance, leadership styles, interpersonal relationship and effectiveness of recruited
principals. They assume that recruited principals are quite dynamic, possessing appropriate effective leadership style in comparison to promoted principals. Some administrators and teachers believe that promoted principals score over recruited principals due to their administrative experience as vice-principals and their knowledge and understanding of organizational set up, composition of teachers and social economic conditions of students.

By and large these two groups of principals have to lead a staff who are well-qualified and paid reasonably good salaries which assured them full job security. Their jobs are fully secured and they are paid salaries quite regularly and in time. Most of these schools lack in terms of physical facilities like building, furniture, lab equipments etc. bought and supplied through contractors, is rarely of good qualities. The shortage of teachers and ministerial staff also pose a great problem for these principals in running their schools properly. Due to absolute security of services staff is least motivated. Student's population is by and large from the lower strata of the society, hence they have least family support. In such an environment, these principals are assigned to lead; some do lead successfully to achieve the objectives of their schools but some fail to realize the goals. The results so far are dismal but still some amount of serious efforts on the part of school leaders would certainly improve the school scenario. There are some principals who endeavour to develop mutual trust, trustworthiness and a network of interpersonal relationship adopting propitious style to accomplish the objectives effectively.

**SCOPE OF THE STUDY**

The present research offers an opportunity to all managements like government, government aided, autonomous bodies like K.V.S., Navodaya
Vidyalaya and other educational organizations to analyze and introspect the mode of appointments of principals placed in various schools, awaring them about leadership styles, interpersonal relationship and leadership effectiveness. The two groups of principals will become more aware of their surrounding situations, appropriate leadership styles for their organizations, the interpersonal skills required in cementing interpersonal relationships and leadership effectiveness. Accordingly, they will make efforts for establishing concrete productive relationship with their group members in order to realize the goals of their schools.

It is an endeavour and a sincere effort to study these two groups of principals in reference to their leadership style, interpersonal relationships and effectiveness to find out “the best fit” principals in Government Senior Secondary Schools of Delhi.

HYPOTHESES:

The hypotheses of the study were formulated to arrive at a strategy to compare the two groups of principals. The null hypotheses were formulated, as there were no study conducted earlier to compare these groups of principals (recruited and promoted) in terms of leadership styles, interpersonal relationship and effectiveness. The following were the null hypotheses: -

Hypothesis – I: There is no significant difference between the leadership styles of the recruited and promoted principals of Delhi.

Hypothesis – II: There is no significant difference between the interpersonal relationships of the recruited and promoted principals of Delhi.

Hypothesis – III: There is no significant difference between the
leadership effectiveness of the recruited and promoted principals of Delhi.

POPULATION:

A population is any group of individuals that have one or more characteristics in common that is of interest to the researcher (Best, 1978). This study as mentioned earlier was on the population of promoted and recruited principals working in the Government schools of Delhi. The study was confined to the government schools because these two types of principals are only found in Government and Central schools in the country.

Sample:

It is not possible to take all the principals for the investigation; a representative sample was drawn from the population on the basis of certain characteristics. The selection of sample was done systematically as described below:

TABLE – 1
Sample Size

<table>
<thead>
<tr>
<th>S.No.</th>
<th>Principals of Government B/G Sr. Secondary Schools (South District), New Delhi</th>
<th>Teachers of Government B/G Sr. Secondary Schools (South District), New Delhi</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M</td>
<td>F</td>
</tr>
<tr>
<td>1.</td>
<td>Recruited Principals</td>
<td>8</td>
</tr>
<tr>
<td>2.</td>
<td>Promoted Principals</td>
<td>7</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td>15</td>
</tr>
<tr>
<td>Grand Total</td>
<td></td>
<td>30</td>
</tr>
</tbody>
</table>
Total sample for the study constituted 30 principals (15 recruited by Union Public Service Commission and 15 promoted). Three hundred (300) teachers, ten (10) teachers were taken from each government senior secondary school of Delhi.

It covered the Government Senior Secondary Schools headed by recruited and promoted principals having minimum five years of experience.

Ten teachers (5 TGTs and 5 PGTs) from each school with minimum five years of experience were randomly selected through lottery method as sample to study interpersonal relationship. Leadership styles and effectiveness of these principals comprising of two categories.

The sample constituted male and female principals of the two categories. 300 teachers were taken for sample who also belonged to two categories – male and female in equal numbers.

**DESCRIPTION OF TOOLS**

In this study following tools were used:

1. The standardized scale (Leadership Preference Scale) prepared and used by L.I. Bhushan was used to assess the leadership styles.
2. To measure interpersonal relationships, a scale was prepared by the investigator himself.
3. Leadership Behaviour Descriptive Questionnaire (LBDQ) Ralph and Alwin adapted by **Dr. K.G. Sharma** and **S.C. Sharma** was used to ascertain leadership effectiveness.
Leadership Preference Scale (LPS)

The L.P. Scale aims at measuring one’s degree of preference for authoritarian or democratic styles of the various types of leadership described in industrial and social set up, the most common form of leadership classification is on the basis of manner of exerting influence. From this viewpoint the two opposite poles are the authoritarian and democratic leadership styles as initially presented by Lewin, Lippitt and White (1939). Although some objectives have been raised to the use of the value loaded terms authoritarian and democratic, the fact remains, as observed by Krech, Grutchfield and Ballachy (1962) that authoritarian and democratic is “perhaps the most prominent and socially significant typology of leadership.

A large number of studies conducted in different social and industrial set up on varying examples, have shown the authoritarian democratic leadership styles are vitally related to group satisfaction morale and productivity Argyle, Gardner and Coiffi (1953); Berkowitz (1953); Coch and French (1953); Hare (1962); Lickert (1961); Misumi (1959); Morse (1953); Salvin (1960); Shaw (1955). But so far the effectiveness of either authoritarian or democratic leadership is concerned, it is very much related to the members preference. If the members, due to the situational conditions Hamblin (1958), Polis (1964) or their motivational disposition Greer (1961; Prentice (1971) prefer authoritarian leadership, it would be difficult for democratic leader to be successful in that condition. This apparent significance and dearth of suitable test to assess objectivity individual’s leadership choice was realised. The “Leadership Preference Scale” (LPS) aims in identifying the styles of leadership in terms of democratic and authoritarian types.
Dimensions of LPS:

The description given by Krech et al, (1962) served as the basis for the construction of items of the scale. Precisely speaking the following components of democratic and authoritarian types of leadership styles were kept in view in the LPS developed by Bhushan, the scale contains 30 items on various dimensions of leadership.

Democratic Leadership: A democratic leadership seeks to evoke maximum involvement in participation of every member in the group activities and in the determination of group objectives. He obtains sanctions of the members in deciding the policy and future programmes of the group, and is guided by the majority opinion of the members. He reports to the members about the progress made by the group to encourage and reinforce interpersonal relations among the members as the agent of the group and not its dictator. He seeks advice from the experts on the technical issues. He gives freedom to members to choose work companions. He allows the division of task to be made by the group. The leader is fact minded and objective in his praise and criticism. He is considerate, tolerant and ready to accept his mistakes, if any. There are 15 items which are constructed on the dimensions of democratic leadership style.

Authoritarian Leadership: As opposed to the democratic leader authoritarian leaders wields more absolute power. He himself determines policies of the group, makes major plans and dictates the activities of members. He serves as ultimate agent, judge and as a purveyor of rewards and punishment for members. As such, the fate of members is in the hands of a leader. He encourages segregated group structure in which inter-communication between the members is held to a minimum. The
leader develops hierarchical group organization in which he occupies the top position having no direct contact with ordinary members. He believes in his own ability and power in formulation of politics and does not appreciate criticism. He keeps the plan and the policy of the group secret. There are 15 items which are constructed on the dimensions of authoritarian leadership style.

**Scoring:** There are five alternative responses of each statement in Leadership Preference Scale (LPS). For a positive (i.e. an agreement with which indicated reference for democratic leadership) the scoring were done as follows:-

<table>
<thead>
<tr>
<th>Responses --</th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Undecided</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
<td>0</td>
</tr>
</tbody>
</table>

In case of negative items (i.e. an agreement with which, indicated preferences for authoritarian leadership) the scoring was reversed. The total scores which an individual would get was the sum of the scores on all the statements. Higher score indicated greater preference for democratic leadership.

The questionnaire Leadership Preference Scale (LPS) is given in Appendix - XI.

**Reliability:** In order to ascertain the reliability of the scale, both the internal consistency and temporal stability were determined. Using responses from 100 students, the coefficient of inter-consistency as corrected by Spearman Brown formula was found to be .74. The retest was done after four weeks on fifty subjects and the test and retest reliability coefficient was found to be .79.
Validity: To ascertain whether LPS was a valid measurement tool, the content and construct validities were determined. The behavioural dimensions and characteristics on which items were constructed were quite explicitly mentioned. So the entire list of statements along with the dimensions of the scale was given to five university teachers. They read every statement carefully and judge whether it was related to the dimension of authoritarian and democratic forms of leadership. They were also asked to indicate the degree of authoritarian or democratic leadership behaviour expressed by each statement. The judges were also requested to mention such statements as were, in their opinion either not well worked or difficult to understand. On the basis of opinion expressed by them only 123 such items were subjected to item analysis which were according to them definitely related to some specific dimensions of authoritarian-democratic leadership style. Out of them only 30 items which fulfilled the item analysis unit area were finally retained in the scale.

For determining construct validity of the scale, it was hypothesized on the basis of a review of literature made that the LP scores would be negatively correlated with the scores obtained on the F scale of Intolerance and Ambiguity, Extroversion and Neuroticism Scale and positively correlated with the scores obtained on the A.S. Reaction Study. The results obtained Bhushan (1970) show that scale possesses construct validity.

Interpersonal Relations Description Questionnaire (IRDQ)

The scale IRDQ attempts to measure the professional interpersonal relationship of the principals. Since educational administration proceeds smoothly till good human relations are prevailing. This aspect is being
given much importance. It is the quality of interpersonal relationships which exist among its members that has direct relations to the achievements of the organization. This scale aims at measuring the effectiveness of interpersonal relationships which are essential for the effective principals. Leadership success depends on competence in interpersonal skills. In terms of behaviours, using communication channels, developing employees, motivating personnel and practising interpersonal skills, individuals who score high in the use of interpersonal skills, are effective or successful in comparison to those who do not possess such skills.

The IRDQ aims at measuring one’s degree of favourableness or unfavourableness pertaining interpersonal skills, which are essential for establishing interpersonal relationships to achieve leadership goals. This was constructed primarily for the purpose of obtaining scores for individuals and thus being able to order individuals with respect to the degree of favourableness or unfavourableness they associate with a psychological object. The Interpersonal Relationship Description Questionnaire (IRDQ) was constructed by following procedures and techniques of a scale construction.

**Dimensions of IRDO (Interpersonal Skills):**

The description given by Philip Burnard (1995) served as the basis for the construction of items of the scale. The leadership success depends on competence in interpersonal skills. A number of studies have sought to identify interpersonal skills Lewis (1973); Porras and Anderson (1981); Boyatzis (1982); Levine (1982); Whetton and Cameron (1984); AACSB, (1984), (1987) and Clark et al (1985). A careful review of these studies indicates that despite the widely varying terminology, certain skills tend to surface on most lists. For instance, handling conflicts, running group
meetings and being able to delegate effectively seem to be regarded as key interpersonal skills. Communication is also important although it’s dissected differently in different studies. The elements of effective communication that show up in most studies are listening, oral persuasion and feedback. Similarly, motivating employees is included in most lists, although rarely stated as simply “motivation”. Rather broken down into parts, such as goal setting, providing feedback, delegating and appraising performance. The following interpersonal skills that research and practice suggest are important for success in managing people:

**Key Interpersonal Skills:**

1. Listening
2. Goal setting
3. Providing feedback
4. Appraising performance
5. Disciplining
6. Delegating
7. Using oral persuasion
8. Politicking
9. Running a group meeting
10. Resolving conflicts
11. Communication

The details description are given as under:

**Dimensions of Interpersonal Relationship Description Questionnaire (IRDOQ)**

**Behaviour (Components of Interpersonal Skills)**

1. Listening
   i. Exhibit affirmative head nods and appropriate facial expression.
   ii. Ask questions during interactions.
2. Effective Goal Setting
   i. Identify employee's key job tasks
   ii. Establish specific and challenging goal for each key task.
   iii. Specify deadlines for each goal
   iv. Allow subordinates to actively participate
   v. Prioritize goals
   vi. Build feedback mechanism to assess goal progress

3. Providing feedback
   i. Ensure the recipient has a clear feedback and full understanding of the feedback.
   ii. Adjust feedback to reflect recipient's past performance and future potential.

4. Appraising Performance
   i. Putting employees at ease
   ii. Obtaining participation by the employees
   iii. Engage Employees in self-evaluation
   iv. Criticize performance but not the person
   v. Soften the tone but not the message
   vi. Use specific example for support
   vii. Have employee sum up appraisal

5. Disciplining
   i. Confront an employee with calm objective, and serious tone.
   ii. State the problem specifically
   iii. Keep control of discussion
   iv. Obtain agreement how mistakes can be prevented.

6. Delegating
   i. Clarify the assignment to subordinates
   ii. Specify the subordinate's range of discretion
   iii. Allow subordinate participation
   iv. Inform others who may be affected
   v. Establish feedback controls

7. Oral Persuasion
   i. Use a positive, tactful tone
   ii. Present ideas one at a time
   iii. Tailor argument to the listener
   vi. Make logical argument

8. Politicking
   i. Endeavour to develop the right image
   ii. Try to attain control of organizational resources
   iii. Try to be visible in the organization
   iv. Avoid tainted members.

9. Running a Group
   i. Consult the participants before a
Meeting

meeting to ensure they are properly prepared.

ii. Maintain focused discussion

iii. Encourage and support participation of all members

iv. Discourage the clash of personalities

v. Bring closer by summarizing accomplishments and allowing follow up assignments.

10. Resolving Conflicts

i. View the conflicts situation through the eyes of conflicting parties

ii. Assess the sources of conflicts

iii. Adopt accommodation as a tool to resolve the conflict.

11. Effective Communication

i. Use communication as weapon to eliminate hostility.

ii. Try to become ethical, sincere and direct while communicating.

iii. Avoid errors, misconstruction and falsification

iv. Develop an elaborate Communication system in the organization

v. Try to find reflection of trust in recipients while communicating

vi. Use silent language to communicate

However, skills mentioned above alone will not suffice. Behind and along side the practice of interpersonal skills must be set of values, a series of attitudes all of which contribute to the ‘human element of interpersonal behaviour. While the skills are being used, there must be reflection of the human being that lies behind them. In fact it can be stated more strongly that the interpersonally skilled person is one who demonstrates humane, caring qualities. Certain personal qualities are a pre-requisite of effective relationships. A basic cluster of such necessary qualities may be identified as warmth, genuineness, empathy and unconditional positive regard Roger (1967). These personal qualities cannot accurately be described as ‘skills’ but they are necessary if we are
to use interpersonal skills effectively and caringly. They form the bedrock of all effective human relationship.

**Item Writing, Editing and Revision:**

In this study **Likert's** (1932) scaling technique was used, with the specialities of areas, it was easy to select the items. It required a large number of monotone items i.e. items having the characteristics that the more favourable the individual’s attitude towards the attitude objects, the higher his expected score of the item.

Primarily to preparing scale, the investigator reviewed books, periodicals and other descriptive material dealing with the contributions to the interpersonal skills required for interpersonal relationships. These sources were very useful in obtaining statements, which were representative of the area being tested. The class of all the possible statements, which were representative of the area being tested. The class of all the possible statements about the given field of psychological object is called a universe of content. Most of the statements used in the scale were obtained from the works of pioneer contributors regarding interpersonal relationship. They are **Philip, Burnard** (1995); **Harold W. Boles, James DK Beerlo** (1969); **R.L. Birdwhistell** (1968); **A.C. Leyton** (1968) and **L. This** (1972); **Tosi, Rizzo** and **Caroll** (1986) and many others. Some of the statements were written by the investigator. This scale represents a sampling of the universe of interest pertaining to the interpersonal relationship. The criterion for selecting these statements were based upon the philosophy propounded by **Likert**. The suggested criteria by **Edward** (1957) are as follows:

1. Avoid statements that refer to the past rather to the present.
2. Avoid statements that are factual are capable of being interpreted as factual.
3. Avoid statements that may be interpreted in more than one way.
4. Avoid statements that are irrelevant to the psychological object under consideration.
5. Avoid statements that are likely to be endured by almost everyone or by almost no one.
6. Select statements that are believed to cover the entire range of the affective scale of interest
7. Keep the language of the statements simple, clear and direct
8. Statements should be short, rarely exceeding 20 words
9. Each statement should contain only one complete thought
10. Statements containing universals such as all ‘always’, ‘none’, ‘often, introduce ambiguity and should be avoided
11. Words such as ‘only’, ‘just’, ‘merely’ and others of a similar nature should be used with care and moderation in writing statements
12. Whenever possible, statements should be in the form of simple sentences rather than in the forms of compound or complex sentences
13. Avoid the use of words that may not be understood by those who are to be given the completed scale
14. Avoid the use of double negatives

Screening by the Experts:

It was planned to construct the Interpersonal Relationship Descriptions Questionnaire (IRDQ) as a five-point Likert Type Scale to measure interpersonal relationships of the principals. So the test items were constructed in form of statements. Each statement was related to one of the interpersonal skills, which help in cementing interpersonal relationships.
Although 150 statements were constructed in simple English and sufficient care was taken to make the items free as far as possible from the effect of social desirability control, the acquiescence set of subjects items were constructed on interpersonal skills. First the questionnaire developed to measure interpersonal relationships was given to a panel of 10 learned experts (judges) e.g. of National Institute of Educational Planning and Administration (NIEPA), Indian Institute of Technology (IIT) and Jamia Millia Islamia (JMI), New Delhi. They were requested to judge the content validity, appropriateness of statements, relevance to the theme, clarity and the difficulty level of each item.

The questionnaire was reconstructed by rejecting vague and ambiguous statements in the light of valuable suggestions provided by the experts. The statements based on oral and written communications were added according to the suggestions of the experts. On the basis of the responses given by the judges, 75 items were rejected.

The questionnaires containing 75 items are given in Appendix - I and II.

Try out of the Test:

The remaining 75 items were arranged in a Likert Type Scale. All relevant instructions were prepared. This instrument was administered to 10 principals of Government Schools situated in Trans-Yamuna area of Delhi. The group was consisting of five recruited and promoted principals containing equal number of male and female principals of the categories. Five teachers from each school were selected for try-out of the scale.

The objective of the questionnaire was clearly stated to avoid confusion and ambiguity on the basis of individual discussions with teachers.
and principals, the investigator obtained their reactions on the scale. The reaction of these principals and teachers were encouraging.

**Item Analysis:**

In the method of equal appearing intervals there is a basis for the rejection of statements in terms of Q and the criterion of irrelevance. The frequency distribution of scores based upon the responses to all statements was prepared, 25 per cent of the subjects with the highest total scores and 25 per cent of the subjects with the lowest total scores were taken. It was assumed that these two groups provided criterion groups of items of which to evaluate the individual statements. In evaluating the responses of the high and low groups to the individual statement, the ratio was found.

The value of ‘t’ is a measure of the extent to which a given statement differentiates between the high and low groups. As a crude and approximate rule of thumb, one may regard any ‘t’ value equal to or greater than 2.59 as indicated that average response of the high and low groups to a statement differs significantly provided one has 25 or more subjects in the high group and also in the low group, Edward (1957).

In the method of summated ratings what is desired is a set of 25 statements that will differentiate between the high and low groups. These statements were selected by finding the ‘t’ value for each statement and then arranging the statements in rank order to their ‘t’ values. 25 statements were selected with the largest ‘t’ values for the scale. Thus, a scale was prepared which contained 50 statements.

The details of item analysis is given in Appendix - III(A) and (B).
Reliability:

A test is reliable to the extent that it measures accurately and constantly, from one time to another. In tests that have a high coefficient of reliability, errors of measurement have been reduced to a minimum. Reliable tests, whatever they measure, yields comparable score upon repeated administration, Best (1978).

In order to ascertain the reliability of the scale both the internal consistency and temporal stability were determined. Using responses of 30 principals and 300 teachers, the coefficient of internal consistency as corrected by Spearman-Brown Formula – 79 was found to be useful.

Formula: \[ r = \frac{2r}{1+r} \]

The procedure of the split half method was used to determine the reliability of the test. The reliability was found to be .79 regarding principals self-perception. The reliability was found to be .88 in case of teacher’s perception.

The procedure of the split-half reliability - determined the quality and Spearman-Brown Formula was used to calculate the reliability of the whole test.

Reliability Analysis is given in Appendix - IV.

Validity Evidence:

The validity of the test represents the extent to which a test measures what it purports to measure. In simple words, whether the test really measures the characteristics that it is being used to measure.
Content and face validity was obtained by the reactions of the various groups of experts. The opinion of the experts with regard to the original description outline of the attitudes towards interpersonal skills determining interpersonal relationship and appropriateness of the items was considered to infer content validity. The selection of the items from the original sources written by established authorities in the field of educational administration and management establishes the content and face validity of this test.

**Scoring:**

The scale Interpersonal Relationship Description Questionnaire (IRDQ) contains 50 positive items measuring interpersonal relationship of the principals. There are five alternative responses for each positive items. The scoring was done as follows:

<table>
<thead>
<tr>
<th>Responses --</th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Undecided</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
<td>0</td>
</tr>
</tbody>
</table>

The scoring of an individual would fall between 0 - 200. The total score which an individual would get on all statements indicated leader’s interpersonal relationship.

The questionnaires IRDQ (Principals’ Perception) and (Teachers’ Perception) are given in Appendix - VIII(A) and (B).

**Leadership Behaviour Descriptive Questionnaire (LBDQ)**

For measuring leadership effectiveness, ‘Ralph and Alwin’ constructed and standardized a tool but its language is in English. Since the scale was to be applied on Hindi-speaking population, it was decided
to adapt it in Hindi and to substitute such of its items, which are primary western culture based with those, which are based on Indian culture. Certain modification is done to suit the purpose of the study.

**Dimensions of LBDQ**

Leadership effectiveness of these two groups (recruited and promoted) of leaders were determined and identified through Leadership Behaviour Descriptive Questionnaire (LBDQ). The manual of the scale exhibits the following dimensions required for such leaders’ role as:

1. Planner
2. Motivator
3. Group interest enhancer
4. Liaison establisher
5. Initiator
6. Spearer
7. Group structure comprehender
8. Task assigner
9. Goal setter
10. Communicator
11. Cooperation builder
12. Judicious evaluator
13. Suggestion inviter
14. Effective planner
15. Position explainer

The individuals identified as leaders must possess capabilities to assume the above mentioned leader’s roles for effective leadership.

**Validity and Reliability:**
Needless to say, the tool Leadership Behaviour Descriptive Questionnaire (LBDQ) is standardized one, hence it measured the study variable’s validity and reliability.

**Scoring:**

The Leadership Behaviour Descriptive Questionnaire (LBDQ) developed by “Ralph and Alwin” and adapted by Sharma contains 150 items measuring leadership effectiveness of leaders. The scale contains five alternative response, the teachers selected for the study were asked to make only one of the alternative responses.

The scoring was done as under:

<table>
<thead>
<tr>
<th>Responses</th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Undecided</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
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<td>Agree</td>
<td>Undecided</td>
<td>Disagree</td>
<td>Strongly Disagree</td>
</tr>
<tr>
<td></td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
<td>0</td>
</tr>
</tbody>
</table>

If a teacher ‘strongly agreed’ or ‘agreed’ a rating of four or three was assigned by him. However, a rating of two was assigned when he was undecided. In case of ‘disagreed’ or ‘agreed’ a rating of one or zero was assigned. The total score which principals of a group got on all the statements would indicate leadership effectiveness.

The questionnaire LBDQ is given in Appendix - XII.

**PROCEDURE OF DATA COLLECTION:**

The study was conducted in accordance with the steps enumerated as under:

i. **Establishing contact with the principals and teachers:** The investigator, before the actual conduct of the study took permission from the concerned education officers to administer the scale in
schools located in their zones. The principals and teachers were contacted with the view to establish a rapport with them, so that they could offer their cooperation to conduct the study.

ii. **Administration of the Scale:** The first thing to be borne in mind while administering the scales was to see the subject, was taking the test in normal mood. It was taken care that throughout the administration of the test subject must be attentive. It was ensured that the scale was given in a very harmonious and peaceful environment which was free of distraction and disturbance. As the biodata of the principals and teachers were required, it was essential to convince the respondents that their responses would be held in strict confidence and their answers would in no way jeopardize the status and security of their position. The respondents were selected carefully. The questionnaires were only given to those who were selected randomly taking into account their specific experience, age, qualification and designation. All the essential columns were given in the beginning above the instructions to receive all the necessary details required for the study.

As the study was concerned with the principals of two categories - recruited and promoted working in Government S.S. Schools of Delhi, these two categories of principals were selected to administer Interpersonal Relationship Description Questionnaire (Principal's Perception) which contains 50 items. They were requested to fill them in their free time, a request was made to return the questionnaire IRDQ within two weeks.

The leadership styles, interpersonal relationship and effectiveness of principals were studied through teachers, therefore, three scales Leadership Preference Scale (LPS), Interpersonal Relationship Description Questionnaire (IRDQ Teacher's Perception) and Leadership Behaviour
Descriptive Questionnaire (LBDQ) were administered on teachers. The randomly selected teachers were given the questionnaires to respond, a courteous request was made to return them within a month. Sufficient time was given to respond, a vigorous follow-up procedure was followed to get back, the duly filled questionnaires from the teachers within specific time.

**LIMITATION OF THE STUDY:**

The study was limited with regard to its area, method, sampling, tools and statistical techniques as:

i. The study was geographically limited with respect to its sampling. Only the principals of Government G/B Senior Secondary Schools of Delhi District South were selected for the sample subjects.

ii. The Study was confined to a total of 30 principals (15 recruited by UPSC and 15 promoted).

iii. The principals having minimum 5 years of experience were selected for the purpose of the study.

iv. The age effects on various factors have not been investigated.

v. Administrative experience as vice-principals and its effects on leadership style, interpersonal relationship and effectiveness has also not been investigated.

**STATISTICAL TREATMENT:**

To give meaning to the raw scores it is essential that appropriate statistical treatment to be used for detailed analysis and interpretation of different scores. Mean, S.D. and t-test were computed for finding the significance if any among the groups, the analysis and interpretation of the data has been presented in the following chapter.