INTRODUCTION
CHAPTER - I

INTRODUCTION

1.1. Preamble
1.2. Concept and Meaning of learning difficulties
1.3. Causes of learning Difficulties
1.4. Characteristics of learning Difficulties
1.5. Different types of learning Difficulties
1.6. Learning difficulties in English
1.7. Need of the Multi-sensory Instructional strategies for children with learning difficulties
1.8. Statement of the problem
1.9. Need for the study
1.10. Definitions of the terms used in the study
1.11. Objectives of the study
1.12. Hypotheses of the study
1.13. Scope of the study
1.14. Delimitations of the study
1.15. Organization of the Thesis
CHAPTER – I

INTRODUCTION

1.1. Preamble

Education is considered as a fundamental right of every child. But a large number of children have problems in learning, preventing them from taking full advantage of Education and reaching their full educational and productive potential. Among them children with learning disabilities find difficulties in acquiring basic academic skills from school educational system. Children with learning disabilities may have problems in reading, writing, spelling and doing mathematics. These children are endowed but ignored by the personnel involved in the educational system. Unfortunately enough awareness has not been generated among the teachers and parents and the absence of adequate educational programme has long deprived the nation of latent potential in their children. Science and technology have advanced to a point where a number of instructional strategies are available and found to be effective in overcoming learning difficulties among children. In this context, the investigator felt greater need for research in this area and has taken up the research topic related to find out appropriate instructional strategy to overcome learning difficulties in language (English) skills among children.
Language teaching and learning need sustained “practice and drill”. According to H.E. Palmer “Language learning is essentially a habit forming process, a process during which we acquire new habits. The study of language can be divided into four aspects viz. the semantic aspect, the phonetic aspect, the graphic aspect, and the phonetic-cum-graphic aspect. The task of the teacher of English is to train listening, reading, speaking and writing abilities of his pupils with understanding as the main ingredient in each. In short, to understand the spoken and written language and to speak and write, it may be the general aims of English teaching.

The infrastructure of education of LD in India is highly inadequate when compared with other countries. Though field of learning difficulty was recognized in 1963, in India no significant achievement has been made in this field. The greater need for research in this area was felt by National Policy on Education (1986) which emphasized appropriate education to cater to the educational needs of exceptional children.

Specific learning difficulty means a disorder in one or more of the basic psychological process involved in understanding or in using language, spoken or written, that may manifest in imperfect ability to listen, think, speak, read, write, and spell or to do mathematical calculations. The term includes such conditions as perceptual
disabilities, brain injury, minimal brain dysfunction, dyslexia, dysgraphia and aphasia.

It is found that in U.S. more than 3 million (i.e. 15% of the population) school students receive special education services because of learning disabilities. A good insight into various aspects of learning difficulties will ensure better preparedness on the part of education.

A learning disability is found across all ages in all socioeconomic classes. It is not a type of mental retardation as mistaken by many people because IQ scores can be in the very high range.

The children with specific learning difficulties exhibit a disorder in one or more of the basic processes involved in the understanding or in the use of spoken or written language. This may be manifested in the disorders of listening, talking, reading, spelling, writing and arithmetic. Such a difficulty does not include learning problems due primarily to visual, hearing or motor handicap, mental retardation, emotional disturbance, or to environmental disadvantages.

To remove the cause of backwardness, early identification should be made. Effective educational methods should be used. Feeling of success should be given, and this ‘success-feeling’ will motivate them to learn further. Children with learning difficulties are neglected and ignored in the school system partly because the teachers lack the skills to handle these children and partly because of the time taken for the
nature of problem to be diagnosed. Hence the teachers and researchers felt the necessity to discuss the ongoing research aspects of learning difficulties.

1.2. Concept and meaning of learning difficulties

Learning disabilities defined in the Disabilities Education Act, is a severe discrepancy between intellectual ability and achievement in listening, thinking, speaking, reading, writing or mathematics. Learning disabilities are presumably caused by central nervous system dysfunction, with or without sensory loss such as blindness or deafness.

The learning disabilities act of 1969 (U.S.) defines, “Children with special learning disabilities exhibit a disorder in one or more of the basic psychological processes involved in understanding or in using spoken or written language. There may be manifested in disorders of listening, thinking, talking, reaching, writing, spelling or arithmetic.

The National Advisory Committee on Handicapped children passed an act in 1968, which defined learning problems in this way, “children with specific learning disabilities exhibit a disorder in one or more of the basic psychological process involved in understanding or in using spoken or written language. These may be manifested in disorders of listening, thinking, reading, writing, spelling or arithmetic. They include conditions which have been referred to as perceptual handicaps, brain injury, minimal brain dysfunction, dyslexia,
developmental aphasia, etc. They do not include learning problems which are primarily due to visual, hearing or motor handicaps to mental retardation, emotional disturbance, or due to environmental disadvantage.

This definition contains three important factors which apart from generating controversy and debate, highlights significant dimensions of the disability.

1. The child with learning difficulties shows discrepancy between achievement and intelligence.
2. Handicaps such as mental retardation, visual and hearing impairment and emotional/behavioral disorders must be ruled out.
3. A learning difficulty is a psychological processing disorder and presumes a central nervous dysfunction.

The Federal Definition

In 1977, the U.S. office of Education brought out the final definition which is currently in operation in the United States. It is as follows — "Specific learning difficulty means a disorder in one or more of the basic psychological process involved in understanding or in using language, spoken or written which may manifest itself in an imperfect ability to listen, think, read, write, spell or to do mathematical calculations as perceptual handicaps, brain injury, minimal brain
dysfunction, dyslexia and developmental aphasia”. The term does not include children who have learning problems which are primarily due to the result of visual, hearing or motor handicaps of mental retardation, of emotional disturbance or of environmental, cultural or economic disadvantages.

The NJCLD Definition

The National Joint Committee for Learning Disabilities (NJCLD), made up to representatives of American Speech Language Hearing Association, the association for children and adults with learning disabilities, the council for learning disabilities, the International Reading Association and the Orton Dyslexia Society, issued an alternative definition.

“Learning disability is a general term that refers to a heterogeneous group of disorders manifested by significant difficulties in the acquisition and use of listening, speaking, reading, writing, reasoning and mathematical abilities”. These orders are intrinsic to individuals presumed to be due to central nervous dysfunction and may occur across the lifespan.

1.3 Causes of learning difficulties

The research reports show that the following are the important causes for learning difficulties.
i. Neurological damages

Children with learning difficulties share several characteristics found in persons with brain damage caused by injury or infection. Neurological damage can also occur during prenatal and postnatal periods. Other factors like prolonged labour (Collen 1979), premature birth, use of drugs, and alcohol are some of the variables associated with it.

ii. Maturational Delay

This occurs because there is a maturational delay rather than a permanent dysfunction within the neurological system. Bender (1973) observed that if different stages on the development of the brain are delayed, there occur a maturational lag, some symptoms mentioned by Bender are.

1. Slow maturation of language skills
2. Delay development of motor skills
3. Visual motor problems
4. Right-left confusion
5. De-Hirsch and Langford (1966) described language deficits of reading, writing and spelling as developmental disturbances, reflecting an immature nervous system.

iii. Genetic factors
Research studies conducted by Childs and Finnicci (1983), Eldridge, Denckla, Biew et al., (1989) and Reiss and Freud (1990) proved that genetic is one of the causative factors of learning disability, Hallgren (1950) found that 88% of females of dyslexic children showed similar learning problems. Herman (1959) examined dyslexia in twins and reported that of the twelve sets of identical twins (mono-zygotic) all members were dyslexic. When the study was conducted with 33 pairs of fraternal (dizygotic twins) only one third showed both members as being dyslexic and two third has only one dyslexic member. Therefore more research is needed in this area to prove a definite relationship between learning disability and family genetic patterns.

iv. Bio-chemical factors

Chemicals play an important role in brain activity. Research studies by Rumsey, Berman, Denikla et al (1987), Duffy Denckla Mc. Anuty and Holmes (1998), Livingstone, Rosen, Drislane et al (1991) reported that organic is one of the causative factors of learning disabilities. Absence or even excessive amount of biochemical substances causes biological imbalance. There appears to be some relationship between these chemicals and hyperactivity, which is associated with learning disability.
v. Nutritional Deficiency

Growing child requires adequate nutrition. Poor diet and severe malnutrition can reduce the child’s ability to read, write, learn or think by damaging intersensory abilities and delayed development. Cott (1972) linked nutritional deprivation to poor biochemical functioning in a brain and suggested a form of treatment called megavitamin or orthomolecular therapy. Fiengold (1976) suggested that some individuals may react to the presence of synthetic colors, preservatives or other additives in foods. He claimed that such foods increase hyperactive behaviors. Through teachers cannot be responsible for their student’s diet, they can orient the parents to improve the children’s nutritional needs.

vi. Environmental factors

There are several factors in the child’s environment, which may lead to learning disability. It can be categorized in two aspects, which significantly contribute,

a. Economically, socially and culturally deprived homes

In economically, deprived homes, the child may not be exposed to adequate sensory, imaginative and cognitive activities. An emotionally unstable home life may deprive the child of any motivation to learn, social, cultural environment are also the causes for learning disability (Kusuma Harinath, 2001 and Sivakami 2000).
When there is no possible interaction with peers, friends or relatives the child may not be able to develop his language which in turn affects his reading, writing or spoken language. In the case of tribals, or minorities, the student does not have an exposure to the outer world as a result of their cultural deprivation they may experience learning difficulties in language acquisition.

b. School environment

Some researchers Bruner (1971), Coles (1987) and Durkin (1980) believe that the poor quality teaching in schools can also cause a learning disability. Very often teachers themselves are not equipped to teach a particular subject. A poor teaching style—not giving time to the learner to acquire basic skills, moving too fast and failure to understand how in what level a child learns can result in learning difficulties. Usage of appropriate materials and curriculum are other factors one must be sensitive to.

1.4 Characteristics of learning difficulties

Based on the frequency of occurrence, the following ten characteristics have been identified as widely prevalent in individuals with learning disability (Clements, 1966).

1. Hyperactivity
2. Perceptual impairment
3. Emotional lability
4. General co-ordination deficits
5. Disorders of attention
6. Impulsivity
7. Disorders of memory and thinking
8. Specific learning disabilities in the areas of reading, writing, spelling and arithmetic.
9. Disorders of speech and learning
10. Equivocal neurological signs and electro encephalographic irregularities.

CLD exhibit a variety of learning and behavioral traits, and no two individual will display all of them. Deficits are manifested in different ways of different age levels. The following are some of the most important and well-researched characteristics of the learning disabled.

a. Disorders of attention

Short attention span and lack of concentration have been found to be the most obvious qualities in learning disabled individuals. A child may have an attention disorder for many reasons. Depression, anxiety, emotional problems or stress can lead to problems of concentration. Studies confirm that learning disabled persons are considerably inferior
in selective attention and that they cannot sustain attention or maintain attention till the task is completed.

b. **Hyperactivity and Impulsivity**

The frequently associated term with learning disabilities is hyperactivity. Psychiatrists refer to hyperactivity as “attention-deficit hyperactivity disorder” (ADHD). A child may have a short attention span, and may also be easily distracted and have poor concentration ability, Houck (1984), Blackman and Goldstein (1982) suggested that when the learner does not know how to respond to the incoming stimuli, he produces an incorrect response by either ignoring the relevant feature of the task (impulsivity) or responds with excessive activity (hyperactivity) Ross (1977) states, “Many children are hyperactive without being learning disabled. Some learning disabled children are also hyperactive”.

c. **Memory disorders**

Persons with learning disabilities are generally characterized by efficient memory that they are unable to spontaneously use rehearsal strategies, record information in a meaningful way, or recognize information. The following characteristics are clearly observed in majority of children with learning difficulties.

1. CLD find it difficult to recall visual material, specially the written word
2. CLD are unable to use strategies for verbal rehearsal

3. CLD are poor on tasks requiring auditory discrimination

4. CLD have difficulty with gross motor abilities and fine motor coordination and they exhibit general awkwardness and clumsiness and have spatial problems

5. CLD often have problems in processing auditory or visual information

6. CLD do not know how to go about learning and studying. They lack organization skills, have not developed an active learning style and do not direct their own learning.

7. CLD have not learned how to act and fall in social situations and their social skills deficits make it hard to establish satisfying social relationships and make and keep friends. They lack role taking skills and find it difficult to adopt another's point of view.

1.5 Different types of learning difficulties

Learning difficulties can be broadly classified in various categories depending upon the major/primary problems experimented by learning disabled. Such problems are considered as the associated problem or secondary problem. The most common types of learning difficulties are reading difficulties, writing difficulties, disorders of listening, disorders of spoken language and arithmetic difficulties.
**a. Disorders of Reading (Dyslexia)**

Many people use the term “Dyslexia” to represent all kinds of learning difficulties. A dyslexic child will read slowly, often reversing letters, word or numbers. The child may try to guess while reading, omitting or adding words not in the text. He may have a poor vocabulary and weak comprehension.

**b. Disorders of Writing (Dysgraphia)**

This refers to partial inability to write which is due to visual motor integration disorder that interferes with the memory and execution of the motor patterns needed to write or copy letters, words and numbers. Some typical characteristics are,

1. The total number of words and length of sentences is reduced
2. There are errors in spelling, syntax, tense and punctuation
3. The Child is unable to deal with abstract themes and ideas

**C. Disorders of listening**

Listening is a complex sound, discrimination between sounds, to gather relevant features of what is being said, and storage of what was heard for future retrieval. A learning difficulty in the auditory area shows itself in the following words.

1. The person cannot recognize words having multiple meanings of words used in different contexts.
2. He cannot understand the figurative language, idioms, words with multiple meanings etc.
3. He has difficulty in understanding sarcasm, humor and play on words.

d. Disorders of spoken language

Houck observes that the following characteristics will be found in the speech of most of the children with learning difficulties.

1. Reliance on simple sentence construction
2. Incorrect use of a word given in its context
3. Problems with tense, pronouns, possessives, and negatives
4. Omission of words and word endings
5. Insertion of extra words or word parts in their sentences
6. Fragmentation of thoughts expressed
7. Awkward organization of spoken language
8. Articulation difficulties
9. Difficulty in retrieving words during conversation, often with attempted cover-up through stalling or insertions

e. Disorders of Arithmetical Learning (Dyscalculia)

In the primary classes, the CLD find it difficult to associate number with quantity, or discriminate between right and left. There is tendency to reverse numbers and confuse before and after. These children tend to work on a concrete level and are slow to acquire
abstract reasoning skills, which are very necessary for problem solving in the higher classes. A study by Skrtic indicated that these children are significantly delayed in the areas of formal reasoning and concept development.

1.6 Learning difficulties in English

a. Reading Difficulties

It is a form of specific learning difficulty where reading is the particular learning skill affected. Reading difficulty is also defined as a significant unexplained delay in reading in a child of average or above average intelligence. It is based on the degree of delay in reading, rather than on the particular type of errors the child makes”.

Types of Reading Difficulties

Reading disabilities comprises of Dyslexia and Alexia. Critchley (1971) defined dyslexia in two ways. Dyslexia is a disorder manifested by difficulty in learning to read despite conventional instruction, adequate intelligence and socio-cultural opportunity. It is dependent upon fundamental cognitive disabilities which are frequency of constitutional origin. Another interpretation of dyslexia is disorders in children, who despite conventional class room experience, fail to writing and spelling commensurate with their intellectual abilities. The first definition mentions cognitive processing as the reason for a specific reading deficit and the second speaks of an overall language
processing delay. Alexia is the loss of ability to read, write or printed language. Reading difficulties can be broadly classified into two ways.

a. Dyslexia and

b. Alexia

Dyslexia is a disorder in children, who despite conventional classroom experience fail to attain the language skills of reading, writing and spelling commensurate with their intellectual abilities.

Alexia is the loss of ability to read, write the printed language.

A child who faces a problem in reading disability has the following traits.


2. Reluctance to read aloud

3. A monotonous voice when reading-no rising or falling intonations

4. Do not follow the stress, punctuations, in a sentence, paragraph, passage/a text while reading

5. Tendency to follow the text with finger when reading (retards the speed of reading)

6. Do not focus their attention in the text while reading distracted/diverted by surrounding/thoughts
7. While the eye scans the letters from left to right at the same time they must break up the string of letters into words, words-phrases, phrases-sentences.

8. Children mispronounce the words from the text while reading

9. Lacks confidence and so hesitate to read in class

10. Unable to read the letters or identify the alphabets. As a result cannot read words and sentences

11. In lower classes-unable to discriminate between sounds, words with common beginnings, ending or vowel sounds. E.g. pick the odd one out.
    a. ip, tap, bat, tub
    b. Ten, pen, yet, men
    c. Sam, jam, dam, sun

12. Reading the passage/poetry-lacks in comprehension
    d. The theme of the poem misunderstood
    e. Read without pauses

13. He/she may guess wildly at words-written on the board/text

Dysgraphia is a processing problem which affects an individual’s ability to write, and it is sometimes an accompaniment to ADD/ADHD.
b. Dysgraphia

Disorders of writing are referred to as Dysgraphia and Agraphia. Dysgraphia denotes extremely poor handwriting or the inability to perform the motor movements required for handwriting (Lerner, 1981) and Agraphia denotes the loss of previous ability to write resulting from brain injury or brain disease. Orton (1937) defines this as the unusual difficulty in learning to write, which is out of harmony with the other intellectual accomplishments and manual skill of the individual.

1. It is a processing problem
2. Causes writing fatigue
3. Interferes with communication of ideas in writing
4. Contributes to poor organization on the line and on the page

Dysgraphia can be seen in

1. Letter inconsistencies
2. Mixture of upper/lower case letter or print/cursive letters
3. Irregular letter sizes and shapes
4. Unfinished letters
5. Struggle to use writing as a communication tool

“Dysgraphia” is a learning disability resulting from the difficulty in expressing thoughts in writing and graphing. It generally refers to extremely poor handwriting.
Signs of dysgraphia

1. Generally illegible writing (despite appropriate time and attention given the task)
2. Inconsistencies, mixtures of print and cursive, upper and lower case or irregular sizes, shapes or slant of letters.
3. Unfinished words or letters, omitted words
4. Inconsistent position on page with respect to lines and margins.
5. Inconsistent spaces between words and letters
6. Cramped or unusual grip, especially
   a. Holding the writing instrument very close to the paper or
   b. Holding thumb over two fingers and writing from the wrist
7. Strange wrist, body, or paper position
8. Talking to self while writing, or carefully watching the hand that is writing
9. Slow or labored copying or writing even if it is neat and legible

Handwriting is a very complex skill that requires many of these systems to work well together. Dobbie and Askov (1950) described the processes necessary for good handwriting.

1. Visual auditory and visuomotor perception
2. Gross and fine motor coordination
3. Directionality
4. Sequencing skills
5. Recall
6. Letter knowledge
7. Tool hold
8. Lines
9. Sitting and paper position
10. Cursive script
11. Tracing and copying
12. Joining letters
13. Self-evaluation and
14. Numerals

Occupational therapists found that the students with difficulties in sensory processing, sensory awareness, and/or perceptual skills usually have handwriting problems.

c. Difficulties in spelling

Spelling errors are classified as logical phonetic alternatives, which follow English spelling convention, visual sequential errors which are usually two letters out of order. These errors are due to with visual rather than auditory memory. Rule base errors show lack of awareness of spelling rules on phonetic alternatives found missing, and
motor errors may take the form of handwriting errors, repetition or omission of letters.

Spelling, a tool subject, receives relatively little emphasis in the school. The main teaching method stresses memorization of lists of words. Though frequently viewed as a relatively simple skill, the spelling task is complex, requiring "... more auditory and visual discrimination, memory, sequentialisation, analysis and synthesis and integration simultaneously that perhaps any other skill". Johnson and Myklebust, (1967). It is not surprising then that the majority of learning disabled children have deficiency in spelling.

Spelling errors can be the result of discrimination, revisualization and reauditorization problems or difficulty in establishing grapheme/phoneme correspondence. There is a strong linkage between reading and spelling. Children who have difficulties in the first phase of reading, decoding and word recognition also have problems in learning to spell. Johnson and Mukelbust suggest that the remediation begin with the identification and improvement of the basic deficit, for example, revisualization or reading and that this will develop increased proficiency in spelling, when revisualization problems occur in isolation, all academic areas may be at grade level save written spelling, which is often three or four grades below the expected level.
patterns found in children’s spelling have been identified by Edgington. Some of the error patterns are listed below:

1. Addition of unneeded letters (for example, dresses)
2. Omissions of needed letters (horn for home)
3. Reflection of child’s mispronunciation (pin for pen)
4. Reversals of vowels (braed for bread)
5. Reversals of consonant order (1 back for black).

Some reasons for spelling disability are

1. Poor phonemic awareness
2. Poor knowledge of letter-sound relation
3. Struggle in word decoding
4. Lack of independent reading
5. Lack of exposure of text

1.7 Need of the Multi-sensory Instructional Strategies for children with learning difficulties

Children with learning difficulties have varieties of problems in learning tasks. Their understanding levels vary from child to child. Therefore it is essential to modify teaching strategies in the line of children’s need.

Certain basic academic support skills are necessary for the student to be successful in any subject area. The major skills are taking and organizing class notes, reading and comprehending assignments,
studying for and facing examination. But these skills are very complex in the perception of children with learning difficulties.

Research studies reveal that the best instructional practices with learning disabilities/difficulties include direct instruction of specific skills and learning instruction (Swanson and Floskyn, 1998). Students with learning difficulties should be explicitly taught to complete a variety of academic tasks in a step-by-step approach. When taught correctly, learning strategy intervention and direct instruction provide students with appropriate modelling, practice and feedback to master skills and cognitive strategies for independent use in a variety of situations in and outside the school.

Education has come a long way from the oral tradition of the past to the current focus of education on learning to be, ‘learning to know’ and ‘learning to live’ together. The change started off at a slow and incremental pace and went on to progress by leaps and bounds supported by the material and manpower. Since independence our country has made great strides in the qualitative and quantitative expansion of educational institutions at various levels.

Multimedia is a word that means ‘many media’. The term ‘multimedia instructional system’ refers to the use of appropriate and carefully selected varieties of learning experiences, which are presented to the learner through selected teaching strategies which reinforce and
strengthen on other so that the learner will achieve predetermined and desired behavioral objects. A teacher should be able to select a lesson carefully and plan his instructional design to realize the instructional objectives,

Education Act of 1990 insisted upon the “Remedial Education Programme of Learning” for the child having learning disabilities. But our pedagogical method is largely copying and memorization, enforced with physical punishments. Teaching should be done by using effective instructional strategies. Try to present the information and directions through various modalities. Utilize materials such as charts, maps, tapes, overheads, flannel boards, illustration boards, VCRS, video cameras etc. Color code written material should be provided to them. Also provide directions in both oral and written formats. They should be provided with opportunities for active learning. Reference should be established so that the student can relate the learning to real life experiences. Give students more time and support to process information. Thoughtfully and deliberately select and use specific instructional methods for students needing alternative approaches to develop essential reading, writing and mathematical skills and supportive classroom environments should be established. Try to develop students thinking skills. Specific skills should be taught which is necessary for a successful student and learner should be provided.
chances to use teaching aids and technology. Academic tasks and learning activities should be broken down into smaller parts.

Multi-sensory instructional strategy has been utilized in the schools for decades and this will be everlasting in the forthcoming years too. Two major methods, the Fernold and Orton Gillingham-Stillman have been widely used. Depending upon the nature and extent of disability, one should select appropriate remedial strategies to overcome the particular disability. The only practical and feasible approach is the development of comprehensive remedial instructional programme incorporating all kinds of difficulties. Such an approach will cater to the needs of all children with specific learning difficulties. If the teacher understands its principles, he can devise similar approaches that are appropriate and effective in various settings.

The Orton (1963) and Fernald (1943) Gillingham, A., Stillman, B.W (1950) methods have many similarities and some differences. Both the methods gain acceptance from time to time and many teachers use multi sensory components. This approach is viable and effective with many children with learning difficulties. Multi sensory approaches provide input through each of the major learning modalities. Various approaches are considered without specific reference to whether they are reading approaches, writing approaches, spelling approaches and so on. Depending
upon the nature and extent of disability, one should select appropriate remedial strategies to overcome the particular disability.

The only practical and feasible approach is the development of comprehensive remedial instructional programme incorporating all kinds of difficulties. Such an approach will cater to the needs of all children with specific learning difficulties.

The VAKT (Visual Auditory Kinesthetic and Tactile) approach is structured in such a way to fulfill the need of all the children facing the specific learning difficulties in learning the reading, writing and spelling concepts in English language. It has great advantage in implementing VAKT and it has potential value even in the cases in which we cannot determine with certainty just where the remedial emphasis should be placed. Therefore the teachers have to explore the possibilities of practising different instructional strategies to overcome learning difficulties among children.

The present study is an attempt to develop diagnostic tests to identify the reading, writing and spelling difficulties in children. Based on the identified learning disabilities/difficulties, an attempt is made to develop comprehensive remedial instructional strategies to overcome the difficulties of children in reading, writing and spelling concepts in English language.
1.8 Statement of the problem

The investigator has taken up the problem “Effectiveness of Multi-sensory Instructional strategy on the reading, writing and spelling (English language) abilities of children with learning difficulties at primary level”. This study attempts to compare the performance of achievement among CLD who learned English language through multi-sensory instructional strategies (MSIS) and conventional teaching strategies.

1.9 Need for the study

The person with Disabilities Act, 1995, promises that access to education will be made available to all children with special needs. This act promises to provide education for children with learning disabilities too. Further greater need for conducting research in this area was felt by National Policy on education (1986) which emphasized appropriate education to cater to the educational needs of all type of exceptional children, including children with learning disabilities. But at present, negligible number of studies has been conducted in the area of education of children with learning disabilities in India. A large number of teachers must be trained to use appropriate instructional strategies to teach the students with learning disabilities, who often drop out of school because of lack of such facilities in their schools.
In order to bring out the effective improvement in the quality of education, it is necessary to focus the attention in the classroom. There are number of things to look for in the instructional strategies for children with reading, writing and spelling difficulties and they can be carefully and systematically analyzed. A beginning has just been made in India to investigate the effective instructional strategy for children with language difficulties. Thus there is an urgent need for research in this area. In the classroom, it is the nature and efficiency of teaching that intimately devises the returns on our educational investment. Therefore the investigator felt that the need for conducting the research related to identifying appropriate instructional strategies to enhance the learning outcome of children with learning disabilities. In this context, the investigator has taken up this present research problem and studied the effectiveness of multi-sensory instructional strategies to overcome learning difficulties in reading, writing and spelling. 

1.10 Definitions of the Terms used in the Study

The meaning and definition of the key terms used in the study are given below.

*Effectiveness*

According to Oxford Dictionary (1975) effectiveness is ‘being able to bring about the result intended Chamber’s Twentieth Century
Dictionary(1972) defines effectiveness as being successful in producing a result or effect.

As far as this study is concerned, effectiveness refers to the impressive result produced in the learning of English reading, writing, and spelling concepts in English by the children with learning difficulties, consequent to the operation of instructional strategies. It also refers to the degree of realization of higher-level attainment.

**Instructional Strategy:**

According to Longman’s Dictionary of Contemporary English(1995) Instruction refers to the printed information that tells you how to use a piece of equipment etc and ‘Strategy refers to the process of helping students to become self-regulated learners, individuals who have knowledge of how effectively to use what they have learned.

In this study, institutional strategy refers to the skillful planning, execution and implementation of the comprehensive strategy incorporating the appropriate technology to overcome difficulties in learning English reading, writing and spelling concepts. The investigator applied multi-sensory instructional strategy to overcome difficulties of children with reading, writing and spelling difficulties. The investigator defines Multi-sensory Instructional strategy to use more than one sense to learn concepts of English language. The investigator defines conventional teaching as
traditional chalk and talk method. In this strategy, chalk and black board were used to teach English language reading, Writing and spelling concepts.

**Learning Difficulties**

In Western contexts, particularly in European countries, the term 'Learning Difficulties' is used in the place of 'Learning Disabilities'. In American context, the term Learning Disabilities is used in the place of 'Learning Difficulties'. In this study the term learning difficulties is used synonymously in the place of 'Learning Disabilities'.

The National Joint Committee for Learning Disabilities (1981) defines 'Learning Disabilities is generic term that refers to a group of disorders manifested by significant difficulties in the acquisition and use of listening, speaking, reading, writing, reasoning and mathematical abilities.

A definition was formulated by the National Advisory Committee on Handicapped Children in their Annual report to congress in 1968 states that 'Children with specific learning disabilities exhibit a disorder in one or more of the basic psychological process involved in understanding or using spoken or written languages. These may be manifested in disorders of listening, thinking, talking, reading and writing.

In this study, the children with average and above average intelligence whose academic achievement is not on par with their acquired intelligence and who are free from sensory problems and socio- economical problems are considered as children with learning difficulty. In addition,
parent's and teacher's observations were considered to confirm the children as learning difficulties.

1.11 Objectives of the study

1. To develop tests to identify reading difficulties, writing difficulties and spelling difficulties of children in English at primary level.

2. To identify the children with reading, writing and spelling difficulties in English at primary level.

3. To develop the multisensory instructional strategy to overcome reading difficulties, writing difficulties and spelling difficulties in English language among children with learning difficulties at primary level.

4. To find out the effectiveness of multisensory instructional strategy to overcome reading, writing and spelling difficulties in English of children with learning difficulties.

5. To find out the significant difference, if any in reading abilities of children with learning difficulties who learned English language through multisensory instructional strategy due to variations in the sex, community, locality of residence, family size, family type, parents educational qualification and family income.
6. To find out the significant difference if any in writing abilities of children with learning difficulties who learned English language through multi sensory instructional strategy due to variations in the sex, community, locality of residence, family size, family type, parents educational qualification and family income.

7. To find out the significant difference if any in spelling abilities of children with learning difficulties who learned English language through multi sensory instructional strategy due to variations in the sex, community, locality of residence, family size, family type, parents educational qualification and family income.

1.12 Hypotheses of the Study

1. There will not be significant impact on post test reading ability scores of children who learned English language through multi-sensory instructional strategy and conventional strategy.

2. There will not be significant impact on post test writing ability scores of children who learned English language through multi-sensory instructional strategy and conventional strategy.
3. There will not be significant impact on post test spelling ability scores of children who learned English language through multi-sensory instructional strategy and conventional strategy.

4. There will not be significant impact on retention test reading ability scores of children who learned English language through multi-sensory instructional strategy and conventional strategy.

5. There will not be significant impact on retention test writing ability scores of children who learned English language through multi-sensory instructional strategy and conventional strategy.

6. There will not be significant impact on retention test spelling ability scores of children who learned English language through multi-sensory instructional strategy and conventional strategy.

7. There will not be significant difference on post test reading ability scores of children who learned English language through multi-sensory instructional strategy due to variations in Sex, Community, Locality, Family size, Family type, Parent’s educational qualification and Family income.

8. There will not be significant difference in retention test reading ability scores of children who learned English language through multi-sensory instructional strategy due to variations in Sex, Community, Locality, Family size, Family type, Parent’s educational qualification and Family income.
9. There will not be significant difference in Post test writing ability scores of children who learned English language through multisensory instructional strategy due to variations in Sex, Community, Locality, Family size, Family type, Parent’s educational qualification and Family income.

10. There will not be significant difference in retention test writing ability scores of children who learned English language through multisensory instructional strategy due to variations in Sex, Community, Locality, Family size, Family type, Parent’s educational qualification and Family income.

11. There will not be significant difference in Post test spelling ability scores of children who learned English language through multisensory instructional strategy due to variations in Sex, Community, Locality, Family size, Family type, Parent’s educational qualification and Family income.

12. There will not be significant difference in retention test spelling ability scores of children who learned English language through multisensory instructional strategy due to variations in Sex, Community, Locality, Family size, Family type, Parent’s educational qualification and Family income.
1.13 **Scope of the study**

The scope of the present study is the identification and diagnosis of children with difficulties in learning of English Language in some schools of Coimbatore (Tamil Nadu), with a view to plan out an instructional strategy to overcome their difficulties. Further the researcher aims to enhance the learning outcomes of children with learning difficulties by using the instructional strategy designed.

The research also focuses on various instructional strategies which can be used to increase and enhance the level of learning outcomes amongst children with learning difficulties.

The methodology adopted and the findings of this research are expected to help teachers to practice effectively in the class rooms with learning difficulties. It is also expected that this study would be significant contribution to the field of learning difficulties and special education.

1.14 **Delimitations of the study**

1. The study is confined to the students of IV and V standards only.

2. Since the present study is experimental in nature, the size of the sample selection is limited.

3. The sample consists of only 80 children with language difficulties.

They were selected on the basis of academic performance, mental
ability, socio-economic status, sensory screening, Teacher’s and parents observations.

4. The children with language difficulties in reading, writing and spelling aspects (English Language) of English medium schools in Coimbatore District were considered for the study. Multi sensory instructional remedial package for teaching reading, writing and spelling concepts in English Language has been made use of in the study.

5. It is worth while to repeat the experiment by using other kinds of instructional strategies and verify the results.

6. Children with visual and hearing problems are not considered for the study.

1.15 Organization of the thesis

The dissertation is presented in five chapters.

First chapter deals with introduction, concept and meaning of learning difficulties or disabilities, need for the study, objectives of the study, scope of the study and limitations of the study. The review of related literature is presented in the second chapter. The third chapter deals with methodology adopted for this study, further construction of tools, selection of sample and data gathering procedure are explained in detailed manner. The tabulation, analysis and interpretation of the data collected for this study are given in the fourth chapter. Fifth chapter deals with the findings and conclusion of the study. It also includes suggestions for further research. Bibliography and
Appendices are included as last part of this thesis. The review of literature follows ...