

**THE ROLE OF THE TEACHER IN THE EDUCATION OF THE LEARNING  
DISABLED CHILD IN THE PREPRIMARY SCHOOL**

by

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# THE ROLE OF THE TEACHER IN THE EDUCATION OF THE LEARNING DISABLED CHILD IN THE PREPRIMARY SCHOOL

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## SUMMARY

This dissertation was initiated to investigate the preprimary teacher's role in identifying and assisting learning disabled preprimars. The literature section consists of a study of the normal process of child development and the phenomenon of learning disability and its manifestation in preprimars. The philosophy of inclusion and a number of existing programmes for learners with learning disabilities were examined.

The empirical research assessed the responses of preprimary teachers from the Eastern Cape to a questionnaire, their experiences in dealing with preprimars with learning disabilities in a typical preprimary group were analyzed and a summary of the findings was made. Recommendations have been given to teachers regarding the identification of learning disabilities in preprimars, the assistance and support needed to enable the teacher to assist the learning disabled preprimar and the need for additional training to equip her to do so.

## KEYWORDS

Learning disability  
Preprimary  
Inclusion

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## **CHAPTER ONE**

### **Defining concepts and outlining the area of research**

#### **1.1 INTRODUCTION**

The problem most frequently expressed by teachers<sup>1</sup> in respect of learners who experience special educational needs (including learning disabilities) is their concern about their own limitations. Their most pressing question is what they can do to help these learners.

Encompassed in this question are aspects such as the identification of the characteristics and needs of the learners; the possibility of planning and carrying out a support programme; the availability of support services in the school and community; problems involving the interaction between disabled and non-disabled learners, and the teachers' ability to meet learning needs within the school curriculum.

Similar queries are put at every teachers' meeting regarding learners who experience problems at preprimary school: teachers want practical advice on how best to educate these children in their care.

<sup>1</sup> Personal communication with the writer

The question "What can I do?" is not as simple as it appears. Implicit in the question are many assumptions, for example, that it is:

- important to identify and assist learning disabled children at an early age
- possible to identify learning disabled children at preprimary level
- possible to assist these children in a informal environment, and
- that the preprimary teacher is, in fact, equipped to deal with these children

These questions will all need to be dealt with fully before the role of the teacher can be examined.

## **1.2 DEFINING CONCEPTS**

### **1.2.1 Preprimar**

According to the NCSNET/NCESS Report (Department of National Education, SA 1997:vii) the term, learner, denotes all learners, from early childhood education through to adult education. Therefore, throughout this dissertation the term preprimar will refer to the preprimary child aged between five and six years who is being taught in a preprimary school or classroom. This term is more concise and less unwieldy than the more commonly used "preprimary school child". In the interests of simplicity, the pronoun he/him will be used to refer to a preprimar and, unless otherwise indicated, the opposite sex will be presumed to be included.

### **1.2.2 Preprimary teacher**

A teacher with a recognised formal qualification in preprimary education who is engaged in the education of preprimars will be referred to as a preprimary teacher. This definition excludes teachers holding nonformal qualifications in this field, nursery school teachers and kindergarten/junior primary teachers, unless the latter hold a level 2 certificate qualifying them to teach a reception year group.

The reason that the focus is on preprimary education specifically and not early childhood development as a whole is that, pending decision from the National Qualifications Forum, there exist large discrepancies in qualifications among early childhood practitioners, some of whom have opened day-care centres with little or no qualification or experience.

The pronoun she/her will be used to refer to a preprimary teacher and, unless otherwise indicated, the opposite sex will be presumed to be included.

### **1.2.3 Special educational needs**

Learners with special educational needs are those who experience barriers to learning and development, that is, learners who, in one form or another, experience difficulty in engaging in the learning process. These include learners with disabilities who require specialised equipment or devices to assist them in accessing the curriculum; learners

whose learning style or pace differ from that of their peers; and learners who, for personal or social reasons such as illness or abuse, are unable to participate fully in the learning process (Department of National Education, SA 1997:2). As a result these learners require "care or intervention beyond that normally required to assure the best possible developmental outcome in young children" (Thurman & Widerstrom 1990:5).

In this dissertation the focus will be on preprimars who have experienced a breakdown in learning and development as a result of learning disabilities.

#### **1.2.4 Learning disabilities**

Although the various definitions which have been formulated to describe the phenomena of learning disabilities will be compared and discussed in Chapter 3, and accepting that the final word on this subject has yet to be written, for the sake of clarity the 1968 National Advisory Committee's definition of learning disabilities - Public Law 94-142, passed by the U.S.A. Congress in 1975 and re-authorised in 1986 will be adhered to in this dissertation:

The term "children with specific learning disabilities" means those learners who have a disorder in one or more of the basic psychological processes involved in understanding or in using language, spoken or written, which disorder may manifest itself in imperfect ability to listen, think, speak, read, write, spell or do mathematical calculations. Such disorders include such conditions as

perceptual handicaps, brain injury, minimal brain dysfunction, dyslexia, and developmental aphasia. Such term does not include learners who have learning problems which are primarily the result of visual, hearing, or other handicaps, of mental retardation, or emotional disturbance, or environmental, cultural, or economic disadvantage.

The term "learning disabled" will be used to describe preprimars who experience a breakdown in learning and development for the following reasons:

Firstly, although reading, writing and spelling cannot be assessed in the preprimary school, the same is not true of listening, speaking, reasoning and, to a degree, mathematical skills. Therefore the above definition of learning disabilities can equally be applied to preprimars.

Secondly, many of the following ten characteristics cited by Bryan and Bryan (1978:34) as the most frequently noted in learning disabled learners, are as easily detected in preprimars as in primary school children:

hyperactivity; perceptual-motor impairments; emotional lability; clumsiness; attention disorders; impulsivity; memory or thinking disorders; specific learning disabilities (these include reading, writing and spelling skills which are not applicable at preprimary level); disorders in comprehending spoken language; soft neurological signs.



These characteristics will be discussed in Chapter 3, together with other manifestations of learning disabilities in the preprimar.

Thirdly, the expression "at risk", which is more usually used to describe preprimars who are "likely to encounter difficulty in academic learning" (Lerner 1993:247), is too generalised for the purpose of this dissertation, and, while most of them favour the description "at risk", authors such as Lerner (1993:250), Kirk and Gallagher (1989:202), Smith, Neisworth and Hunt (1983:340) and Wallace and McLoughlin (1988:277) have all used the term "learning disabled" in connection with preschool children.

### **1.2.5 Inclusion**

Inclusion is based on the philosophy that everyone, regardless of race, gender, language, culture, socio-economic status or disabilities, should be accepted as part of a "normal" society. As such, it challenges the traditional criteria used by society to classify human beings (Burden 1995:45,46).

Since 1990 the international trend towards an inclusive society has encompassed education, with the emphasis on restructuring the school system to remove any barriers to the education of learners with disabilities, thus assuring equal access for all

to a single, inclusive education system (Department of National Education, SA 1997:48).

"The underlying supposition in inclusive programs is that all children will be based in the classrooms they would attend if they did not have a disability" (Salisbury 1991:147).

The concept of inclusion will be discussed in greater detail in Chapter 4.

### **1.3 GENERAL DISCUSSION ON THE PROBLEM**

The problem centred on the role of the preprimary teacher in identifying and assisting the learning disabled preprimars in her care, the availability of support systems for the teacher to aid her in this task, and the effectiveness of her training.

In the following paragraphs these questions will be explored in greater detail.

#### **1.3.1 The role of the teacher in identifying learning disabled preprimars**

##### ***1.3.1.1 The importance of early identification of learning disabilities***

Although there is opposition to early identification of learning disabilities, this is primarily due to the fact that some of the characteristics of learning disabled learners in primary school are part of the normal process of development in preprimars

(Gearheart 1985:347), and, to a lesser degree because of the perceived dangers of labelling learners (Bryan & Bryan 1978:276).

Reynolds (1979:175), however, contends that many researchers and authors see early identification as "a potentially strong tool of primary prevention of learning and behaviour problems throughout the school years." This contention is borne out by Lerner (1993:247), who states that "early intervention makes a significant difference in child growth and development." Authors such as Brown and Zinkus (Gottlieb et al 1979:322) agree, pointing out that early intervention for learning problems "could prevent many of the frustrations and emotional disabilities that the child will eventually encounter in a school setting".

Conversely, the problems of late identification have been clearly indicated in the work of developmental psychologists such as Bloom (1964) who found that "50 percent of the child's cognitive growth is completed by age four", and that therefore, if the learner has to wait until he has failed a standard at school before being identified as learning disabled "precious learning time has elapsed, and the opportunities for providing vital early intervention are lost" (Lerner 1993:246).

On the whole, then, there appears to be a strong argument in favour of the early identification of learning disabilities in preprimars, particularly as far as the prevention of secondary problems is concerned.

### *1.3.1.2 The possibility of identifying children at preprimary level*

Because "preschoolers may demonstrate differences or lags in development that represent extremes within the normal range of variations, ... some experts find it inaccurate to diagnose a child as learning disabled during the preschool years" (Hayden et al 1978:10).

However, the various behaviour patterns which characterise learning disabled children, which will be discussed in detail in Chapter 3, are as clearly manifested in preprimars as they are in school going children.

In addition, the following perceptual deficits, which have been detected in learning disabled learners, may easily be identified in preprimary school:

deficits in visual perception, including spatial orientation, laterality orientation, visual motor co-ordination and figure-ground perception, and deficits in auditory perception, including auditory sequential memory, auditory discrimination and auditory analysis and synthesis (Gottlieb et al 1979:323)

Assessment of the above perceptual skills is already carried out as a matter of course during the normal preprimary programme.

Lerner (1993:250) states unequivocally that "preschool children with learning disabilities can be identified"; that a learning disability is not solely a phenomenon of

academic failure; and that some preschoolers "exhibit the characteristics and behaviours of learning disabilities."

In keeping with the new trends the NCSNET/NCESS Report (Department of National Education, SA 1997:83) recommends that assessment be part of the teaching and learning process, aimed at providing the learner with maximum access to the curriculum as a whole. This means that the educator will be central to the process of assessment.

### **1.3.2 The role of the teacher in assisting the learning disabled preprimary in an informal environment**

#### ***1.3.2.1 Traditional approaches***

The individualistic-medical approach to the diagnosis and treatment of learners with learning disabilities has "resulted in particularly negative stereotyping and marginalisation" insofar as it focuses on the perceived weaknesses or deficits of the learners as medical problems, which need curing. "The medical model has shaped and contributed to exclusionary practices towards learners with 'special needs' in the field of education" (Department of National Education, SA 1997:23).

In this traditional approach locating and screening learners in order to identify those with learning disabilities is followed by diagnoses by a multidisciplinary team in order to

"determine the extent of impairment", the severity of the problem and the intervention necessary (Lerner 1993:259,260).

Traditionally intervention would consist of placing the learner in a special educational programme where he would be evaluated to determine the length of time he remained in the programme, the skills he acquired in it and what new placement would be necessary (Lerner 1993:259,260).

The emphasis was on "diagnostic and remedial services" where educational intervention was considered "the responsibility of professionals ... the skills, knowledge, and techniques of psychologists, neurologists, ophthalmologists, pediatricians, psychiatrists, otolaryngologists and electroencephalographers, plus all members of the educational staff" being seen as necessary for the provision of an adequate programme (Johnson & Myklebust 1967:48ff).

Traditional diagnostic assessments provided scores and clinical labels but seldom gave practical recommendations for programme planning (Bagnato et al 1989:2).

Remediation was considered "a highly specialised subject area which demand(ed) specific knowledge and skills from practitioners" (Derbyshire 1991:400), skills which the ordinary preprimary teacher did not possess.

### *1.3.2.2 New trends*

The philosophy of inclusion has led to a paradigm shift in the field of specialised education. The trend at present is an ecological approach which is predominantly systemic-preventive in that it examines learning problems against the background of the social system as a whole and the education system in particular. The emphasis is on prevention which includes "developing personal competencies in addition to dealing with environmental stresses" by the provision of "an optimal teaching and learning environment for all" (Du Toit 1996:15).

### *1.3.2.3 The role of the teacher in the classroom*

As young learners with learning disabilities "are more like young normal children than they are unlike them" (Saracho 1984:19), both preprimars with learning disabilities and typically developing preprimars need "opportunities to learn through exploring an environment which is rich in stimulating activities, rich in carefully arranged play experiences, rich in social responsiveness from peers and affectionate adults, and rich in recognition for their efforts as well as their achievements" (Saracho 1984:19).

In the preprimary school the materials and activities offered to the normal preprimar can equally be made available to a preprimar with learning disabilities, modified only to the extent necessary to cater for his particular strengths and weaknesses. The strategies employed by the preprimary teacher to meet the needs of all the children in

her class will be discussed in detail in chapter 4. However, the teacher cannot teach in isolation. In order to provide the best possible education for her young learners she needs the support and guidance of specialists as well as the co-operation of parents, colleagues and community.

#### *1.3.2.4 The role of the teacher in collaboration with the parents*

With the ecological approach (section 1.3.2.2.), recognition has been given increasingly to the importance of parental involvement in the assessment and education of their children. Research has shown that parents are a "key factor in children's growth, cognitive development, literacy development and general school learning" (Kriegler 1996:46) and that when a positive and supportive partnership is formed between home and school "all three parties - teachers, parents and pupils - stand to benefit" (Booyesen 1996:415).

#### *1.3.2.5 The role of the teacher in collaboration with specialists*

In order to provide strategies designed specifically for the learning disabled preprimary's needs a teacher requires not only the ability to utilise "alternative learning strategies" and a "knowledge of the nature of ...(learning disabilities)" but she needs regular access to specialists who will share their knowledge", by supporting her as she assists her pupils. Specialist assistance can be invaluable in helping "the teacher (to modify)



the curriculum for the particular exceptional child without imposing a handicap on the rest of the class" (Saracho 1984:19).

#### *1.3.2.6 The role of the teacher in collaboration with colleagues*

Equally invaluable is the contribution of colleagues who, for example, can share experiences or suggest "interventions they have found effective for similar problems" (Lewis & Doorlag 1995:41).

#### *1.3.2.7 The role of the teacher in collaboration with the community*

The child cannot be seen in isolation. He is part of an ecosystem which includes his home, his peer group, and community organisations such as the church, all of which have an influence on his growth and development (Donald et al. 1997:251).

Therefore, the teacher has to take into account the community norms and values and, wherever possible, work together with the community in providing a stable and unified environment in which the child can grow.

### **1.3.3 Teacher training**

In addition to their initial training, "ongoing training will be essential" to prepare educators to take on the central role in assessing and assisting preprimars with learning disabilities, and "one of the primary functions of education support personnel

will in future be to support educators and to assist with educator development programmes" (Department of National Education, SA 1997:84).

## **1.4 THE PROBLEM**

### **1.4.1 Setting the problem**

The purpose of this dissertation is to determine:

- what role preprimary teachers can play in identifying a preprimar with learning disabilities
- what role preprimary teachers can play in assisting learning disabled preprimars within the boundaries of an integrated preprimary group, and what support is available to the teacher in the classroom , and
- whether the teachers' training is sufficient to equip them for this role

### **1.4.2 Setting the boundaries**

This dissertation will focus on children in the preschool year, who are attending a recognised preprimary school or a preprimary class attached to a primary school. This is not to negate the importance of intervention at an earlier age, in fact studies have shown that the earlier the intervention, the better (Lerner 1993:247). This study,

however, will be aimed at examining the role of the preprimary teacher whom, as a rule deals only with preprimars in the age group five to six years.

In addition, below the age of four the developmental argument gains more weight as, at three years or younger, the difference between developmental lag and learning disabilities are increasingly difficult to discern.

### **1.4.3 Research methods**

#### ***1.4.3.1 Literature survey***

A study of the literature on inter alia the definition and identification of learning disabilities, and their causes and manifestations in preprimars will be employed.

This literature research will be undertaken in order to identify current ideas and trends in the field of specialised education as a whole and learning disabilities in particular. It will provide a frame of reference to which findings arising from the empirical survey may be related, and should afford substantiated support for recommendations following the research.

#### *1.4.3.2 Empirical survey*

Based on the findings of the literature study, a questionnaire will be sent to preprimary teachers and principals teaching in Departmental registered preprimary schools in rural areas and smaller centres of the Eastern Cape as well as in East London and Port Elizabeth. The main objective of the questionnaire will be to establish the number of preprimars with learning disabilities who have been identified by the teachers, the support services available and the problems experienced in working with these children in the preprimary setting, and the effectiveness of teacher training in preparing teachers to assist preprimars with learning disabilities. Similar questionnaires will also be sent to special schools such as the Arcadia school in East London and Cape Receife in Port Elizabeth in order to determine the opinion of specialists in this field on the preprimary teachers' role in assisting learning disabled learners.

The study has been restricted to the Eastern Cape for practical reasons only: this researcher has, over the years, built up a number of contacts in the preprimary field throughout the Eastern Cape and this personal knowledge will facilitate communication.

#### **1.4.4 Programme of the research**

The developmental aspects of the preprimary will be examined in chapter 2.

In chapter 3 the phenomena of learning disabilities including the terminology and definitions used to describe the learning disabled learner, the causes of learning disabilities, the viability of early identification of learning disabilities, and methods of identification will be discussed.

Chapter 4 will deal with the philosophy of inclusion, the role of the preprimary teacher, preprimary programmes for inclusive education and teacher training.

Chapter 5 will cover the results of the empirical study.

In chapter 6 the findings of both the literature study and the empirical research will be outlined.

A summary of the findings of the research and recommendations based thereon will be given in chapter 7.

## **CHAPTER TWO**

### **Child Development**

#### **2.1 INTRODUCTION**

A study of child development provides the teacher with an understanding of the process of growth and maturity which, in turn, helps her to assess a child's developmental level. It also helps her to understand the "basic psychological processes like learning, motivation, maturation, and socialisation" (Burns 1986:9) and so enables her to critically evaluate her own teaching methods and modify them to provide the best possible assistance to the preprimars in her care.

Childhood is a "highly eventful and unique period of life that lays an important foundation for the adult years and is highly differentiated from them" (Santrock 1995:8). It is a time characterised by growth and change. During the preschool years in particular this growth and adaptation is evident in all aspects of the preprimar's development: social, emotional, physical and motor, cognitive and language.

In considering the learning disabled preprimar it is important to remember that he is first and foremost a child, undergoing his own unique experience of growth, change and adaptation as do all children. For this child, however, the path through childhood

is more difficult and far less predictable. In order to understand and assist him in his development it is necessary to have a sound knowledge of the normal process of child development. This knowledge will provide the teacher with a framework of reference against which to assess deviations from the developmental process and therefore assist her in identifying a preprimar with a learning disability.

## **2.2 THE CONCEPT OF DEVELOPMENT**

Development implies change, or a series of changes, taking place over a period of time. Most developmental theorists see these changes as "subject to definite sequences, each new skill developed out of or dependent on a previous one" and as being both qualitative and quantitative in nature (Burns 1986:12,13). Where theorists differ, however, is in their attempts "to explain how and why developmental changes come about" (Fein 1978:4).

### **2.2.1 Models of child development**

All research is subjective in that it is influenced to a greater or lesser degree by the belief or world view of the researcher. "Beliefs might determine which hypotheses scientists choose to investigate", what questions they ask and "how they go about finding answers" (Fein 1978:3). These beliefs or world views are called models.

The two models of development which have had a profound influence on the study of

child development are the mechanistic and the organismic models.

Proponents of the mechanistic model consider social and environmental factors as having more influence on development than biological factors and see a child as one whose personality is "mechanically determined by learning experiences and environmental conditions" (Louw & Edwards 1997:256). Researchers who adhere to the organismic or structural model, on the other hand, see the child as a biological system "characterised by activity and change ... that come from within rather than as a result of external forces" (Fein 1978:12). Although based on apparently conflicting beliefs each model has served as a framework for study which has brought us closer to an understanding of child development.

Most developmental theories coincide with one or the other of these world views.

## **2.2.2 Theories of development**

Two theories which have had the greatest impact on scientific research into child development have been those of developmental stages and the question of nature versus nurture.

### ***2.2.2.1 The nature versus nurture controversy***

The relative importance of the roles played by heredity and environment has been



debated for centuries. John Locke (1632-1704) stressed the importance of environment to the extent that he rejected any thought of innate ideas, stating that all knowledge is gained from experience and that the mind is like a sheet of blank paper at birth to be inscribed as the educator pleased (Graves 1971:59). Rousseau (1712-1778), on the other hand, viewed the child as a self-motivating, self-regulating organism (Fein 1978:12). Proponents of both environmental or mechanistic determinism and genetic or organismic determinism have produced empirical data to support their viewpoints, and this data has, in turn, been questioned by their opponents.

One of the reasons why it is difficult to isolate the influence of heredity from that of environment is that environment is not easily defined. It consists of innumerable elements which are experienced subjectively, making it unique to each individual (Burns 1986:23). Therefore, two children, exposed to the same learning opportunities can experience different rates or levels of development.

The child's ability to respond to his environment is also determined by his maturational readiness - no amount of stimulation can teach a child something he is not developmentally ready to learn. "The necessary physical and mental foundations must be present before new abilities can be built on them" (Hurlock 1978:29).

Although the child's capacity to respond to the environment is genetically determined, environmental deprivation can equally limit the child's ability to reach his inherited

potential. Even when development is a result of maturation, such as crawling, sitting and walking, these functions can be delayed or retarded if the environment does not provide opportunities for practice (Hurlock 1978:28).

It is obvious then, that development is not influenced by two independent factors, heredity and environment, but that an interaction of both genetic inheritance and an environment are necessary for a child to develop (Santrock 1995:90).

Today, most researchers accept that environmental and genetic factors each play an important part in development and that "the critical question concerning development is not which factor ... is responsible for our behaviour, but how these two factors interact so as to propel us along our unique developmental paths" (Gormly & Brodzinsky in Louw 1991:19).

#### *2.2.2.2 Developmental stages*

The concept of stages is another controversial issue in developmental psychology. "Theories holding that development passes through stages, each with predictable characteristics that are normal for that stage, have been numerous and have inspired extensive research" (Hurlock 1978:5).

Proponents of the mechanist model and the organismic model differ considerably in their views on developmental stages.

For those who adhere to the mechanistic viewpoint, stage is merely a descriptive concept and the transition from one stage to another is seen as quantitative and continuous (Fein 1978:4).

For the stage theorists, however, who exemplify the organismic world view, the existence of a sequence of stages involving reorganisation of the entire biological structure is fundamental to their theory.

Three criteria underlie their concept of stages:

- changes should be qualitative and not just quantitative
- there should be a fixed sequence, with each stage built upon the preceding one
- each stage should be identifiable by specific characteristics (Burns 1986:13)

#### *2.2.2.3 Stage theorists*

Stage theorists include the cognitive developmental theorists, of which Jean Piaget is a leading proponent, the psychoanalytic theorists such as Sigmund Freud and Erik Erikson, and the social learning theorists such as Bandura and others.

### *a Cognitive developmental theorists*

Cognitive developmental theory focuses on the importance of the child's conscious thought (Santrock 1995:39).

Piaget studied cognitive development in children and concluded that it was determined by the interaction of genetic, psychological and environmental factors (Louw 1991:72), with the emphasis on biological adaptation.

He propounded a system of schematic learning through adaptation based on two processes which he called assimilation - identifying concepts using previously formed schema - and accommodation - restructuring or modifying the existing conceptual framework to accommodate new concepts, thus achieving a state of equilibrium.

In addition he identified four stages in the development of thinking:

- sensori-motor                      birth - 2 years
- pre-operational                      2 - 7 years
- concrete operational              7 - 12 years
- formal operational                12 years upwards.

A detailed discussion on these stages follows in section 2.3.3.2. Each of these stages represents a qualitatively different way of thinking. The ages stated are neither

rigid nor absolute nor are there "sharp, distinct stages in processing information" (Santrock 1995:43) and the time periods given are less important than the fact that each child inevitably moves through the stages in the established sequence.

#### *b Psychoanalytic theorists*

Although biological factors and thought processes are considered important, psychoanalytic theories differ from cognitive developmental theories in that the emphasis is on "individual personality structure rather than on the universal structure of mind" (Fein 1978:19), and the importance of unconscious thought is stressed.

The founder of psychoanalytic theory, Sigmund Freud (1856-1939), "developed his ideas about psychoanalytic theory from work with mental patients" (Santrock 1995:34).

According to him, the human psyche consisted of three subsections - the id, which was present at birth and was the source of all the necessary drives and psychic energy; the ego, which developed during the first year and continued to change throughout the individual's life, and which functioned on a conscious level, satisfying the drives of the id; and the super ego, or the conscience, which began to develop during the first year and reached its final form at between four and five years of age (Louw 1991:51,52).

Freud considered the first five years of life as crucial in the development of the personality and his first three stages - the oral stage, the anal stage and the phallic

stage - cover this period, during which "the child identifies with the same-sex parent, striving to be like him or her" (Santrock 1994:38).

The latency stage, which covered the period of middle childhood from six to twelve years, Freud saw as less emotionally stressful and devoted to exploring the environment and mastering intellectual skills while the genital stage, which coincided with the onset of puberty, was characterised by a "sexual awakening" and culminated in the development of a mature love relationship and the ability to function independently as an adult (Santrock 1994:38).

Erik Erikson used Freud's stage concepts as a basis for his theory of psychosocial development, increasing them both in complexity and in number. He viewed the personal growth of the child as the result of an interaction between family members against the background of a particular culture.

Erikson outlined eight stages, each of which represented "a critical period for solving a certain type of problem" (Smart & Smart 1982:57) which, in turn, affected the ability to handle subsequent problems:

- infancy                      trust vs. mistrust
- 1 1/2 - 3 years              autonomy vs. shame and doubt
- 3 - 6 years                  initiative vs. guilt
- 6 - 12 years                mastery vs. inferiority

- adolescence                      ego identity vs. identity confusion
- young adulthood                intimacy vs. isolation
- mid-adulthood                  productivity vs. self-absorption
- maturity                          ego integrity vs. despair

Each stage involved an encounter which was both biologically and socially based and a crisis or turning point which had the potential for either a positive or a negative outcome (Fein 1978:21).

#### *2.2.2.4 Behavioural and social learning theorists*

Behaviourism is the theoretical approach favoured by those who subscribe to the mechanistic point of view, with their penchant for using scientific, experimental methods to measure quantitative changes during development. Learning theorists see behaviour as being shaped as a consequence of a response to external stimuli.

##### *a Classical conditioning*

J B Watson, the founder of behaviourism, postulated three basic emotions which were present at birth: love, fear and anger, which were responses to the unconditioned stimuli: stroking, loud noise and restraint respectively (Smart & Smart 1982:9). If an unconditioned stimulus was repeatedly paired with a conditioned stimulus, such as in

Watson's famous experiment with baby Albert (Louw & Edwards:1997:230)<sup>2</sup>, an association was set up between the conditioned stimulus and the response and the unconditioned stimulus was no longer necessary.

#### *b Operant conditioning theory*

Operant conditioning also involved associative learning but theorists who used this method of shaping or modifying behaviour, saw the behaviour, or operant, as being produced spontaneously by the child, after which stimuli, called reinforcers, were used to increase the frequency of the behaviour. Skinner, the best known proponent of operant conditioning, stated that it was important to "take into account what the environment does to an organism not only before but after it responds. Behaviour is shaped and maintained by its consequences" (Skinner in Fein 1978:7).

The extreme environmentalist outlook was moderated to an extent by behaviour theorists such as Dollard and Miller who saw a response as satisfying a need originating in the organism (Louw 1991:69).

#### *c Social learning theory*

Unlike the proponents of the previous two learning theories, social learning theorists,

<sup>2</sup> Watson made a loud noise every time he presented a white rat to Albert. The fear of the noise was soon transferred to fear of the rat then to other white, furry objects.



of whom Albert Bandura is the best known, did not view behaviour as being influenced solely by external stimuli. Instead they saw it as integrating "behaviourist processes of reinforcement with cognitive processes of observing others' behaviour and identifying with it, of self-evaluation, and of understanding what constitutes 'meaning' for different individuals" (Burns 1986:77). This means that their worldview is not as clearly delimited as the others, but is an overlapping of both the mechanistic and the organismic viewpoints.

As the name implies, children were seen to acquire behaviour through watching other people. The degree to which the observed behaviour would be imitated would be determined by motivation, by the importance of the person in the child's life, and by what Bandura referred to as vicarious reinforcement, that is, "the influence of seeing the consequences of another person's action" (Smart & Smart 1982:11).

#### *2.2.2.5 The ecosystemic model of development*

##### *a Vygotsky's Theory of Development*

Lev Vygotsky (1896-1934), a Russian psychologist, developed the concept of, what he termed, the zone of proximal development (ZPD). This is the difference between the level at which a child functions on his own and the level at which he is able to function under the guidance of a competent instructor (Gage & Berliner 1992:122). As the

child becomes more proficient at performing the required skill the instructor gradually reduces her input. Once the child has learnt to perform independently on the upper level of the ZPD this level becomes the foundation for the development of a new ZPD. In this way the child moves "from a social to a personal psychological form of knowledge" (Gage & Berliner 1992:122).

This intervention must be a conscious and deliberate act, with the instructor attempting to connect meaningfully with the child's level of potential. The process is not merely the passing on of information to the child but has to "involve an intentional effort to help learners organise and understand information in progressively more effective ways" (Donald et al 1997:51).

The basis of Vygotsky's theory, then "is the notion that development takes place through social relationships ... children progressively develop new or adapted meanings and knowledge through building up the space between what they currently understand and what confronts them in social interactions" (Donald et al 1997:48).

According to Vygotsky all mental functions originate externally. He hypothesised, for instance, that language preceded thought, being "both a carrier of understanding and a means for its development" (Donald et al 1997:49). The transition from external or social speech to thought only occurs between 3 and 7 years of age, during which time children talk audibly to themselves, internalising their speech.

Vygotsky's theory portrays "human development as being inseparable from social and cultural activities" (Santrock 1995:222) and while he "did not explicitly formulate his ideas ecosystemically, they can readily be accommodated within this broad perspective" (Donald et al 1997:52).

*b Bronfenbrenner's theory of development*

Bronfenbrenner "developed a complex but powerful ecosystemic model of different levels of system involved in the process of child development" (Donald et al 1997:58).

These levels range from:

- the microsystem which includes the family, the peer group, the church and the school
- the mesosystem, which is the interaction of the microsystems and the influence they have on each other, in other words, the local community
- the ecosystem which consists of systems in which the child is not directly involved but which can influence or be influenced by his microsystems, such as his parents' place of employment, his siblings' peer groups and local community organisations
- the macrosystem, which consists of dominant social structures, beliefs and values all of which influence or may be influenced by the other levels of the system, in other words, the social system as a whole (Donald et al 1997:57-59)

The ecosystemic approach recognises that the home, the peer group and the

community, as well as the education system, "all have an influence on the growth and development of children" (Donald et al 1997:251).

### **2.2.3 Summary**

It is important to realise that there is no one all-embracing, generally accepted or "correct" theoretical point of departure or worldview. Each has added significantly to our knowledge of child development but none on its own provides a complete description or explanation (Santrock 1995:49). Therefore a thorough knowledge of all the relevant scientific theories is necessary to help us understand the changes which take place during childhood. In the following section on normal development, "normal" is interpreted as a statistical concept, meaning within the range of common or standard behaviour patterns (Burns 1986:16).

## **2.3 NORMAL DEVELOPMENT IN EARLY CHILDHOOD**

In order to facilitate the study of the various aspects of child development, the areas of development are usually examined separately. It is necessary, however, to bear in mind that the child develops as a whole, with each aspect of his being interacting with and influencing the others.

### **2.3.1 Developmental tasks**

As children of all cultures generally pass through the various stages of development, and therefore learn the same skills at approximately the same ages, the cultural group to which they belong expects them "to perform according to this timetable of development" (Hurlock 1978:38). For preprimars "the strongest influence on their development is their immediate family" (Botha et al 1991:231), and even very young children are quickly made aware of, through the approval or disapproval accorded their behaviour, which tasks are expected of them. These expectations, to a large extent, determine their pattern of learning and development. Tasks related to social expectations are called developmental tasks.

Developmental tasks serve a number of important purposes: firstly, they serve as guidelines indicating to parents and teachers what tasks the child should master at any given age; secondly, they enable them to prepare the child for the tasks he will be expected to perform in the future; and, thirdly, social acceptance depends upon the child's ability to perform the tasks required of him by his peers (Hurlock 1978:39).

"The child's ability to master the developmental tasks of later stages depends to a large extent on how successfully he develops during the early childhood years" (Botha et al 1991:232).

## **2.3.2 Physical development**

Physical development encompasses both physical and physiological development, which involve the growth of and changes in the internal structure and functioning of the body and its organs; and motor development which involves the control of the body and the body movements. It influences the child's total development directly - by determining the degree to which he is able to interact with his environment - and indirectly - as his self-esteem is affected by the response of others to his physical abilities and appearance.

### ***2.3.2.1 Physical and physiological development***

After the rapid growth in both weight and height during infancy - 80% increase in height and 300% increase in mass in the first two and a half years - the rate decelerates and becomes more stable during early childhood. The average increase during the preschool years is 1,8kg to 2,6kg and 7cm to 9cm per year (Botha et al 1991:233), while the bodily proportions change as the ratio of body fat declines and the legs and trunk lengthen. "The centre of gravity ... begins to move lower, allowing children to become steadier on their feet and capable of movements that were impossible when they were top-heavy infants and toddlers" (Schickedanz et al in Slavin 1981:61).

The skeletal system of the preprimar is still immature, the bones have more cartilage

and less density of minerals, "the joints are more flexible (and) the ligaments and muscles are attached more tenuously than in an older child" (Smart & Smart 1982:201). This means that the bones, joints and muscles are more susceptible to injury during the preprimary years.

During the preprimary years gender plays only a small role in physical differences, with girls being slightly smaller and lighter than boys and having more fatty tissue in contrast with the boys' higher level of muscle tissue.

"During early childhood the brain and the nervous system develop faster than most other physical systems" (Lubar in Botha et al 1991:234), and the preprimary's brain, by the age of six years, is already 90% of its adult weight. Burns (1986:45) states, however, that neural development is not as advanced and is probably not wholly completed before adolescence. This is because "the relationship between brain development and the abilities of the individual is not one way, but interactive. Experience facilitates neural development, and neural development facilitates higher levels of learning and behaviour" (Burns 1986:45).

As far as the other organs are concerned, the preprimary's heart rate is slower and more stable than that of the infant, the respiratory system, although maturing, is still very vulnerable to infection, and although his stomach is still less than half the adult's capacity his kilojoule needs in relation to his body weight is almost twice that of an adult.

### *2.3.2.2 Motor development*

Gross motor development involves the movement of the large muscles of the body in activities such as crawling, walking, running, jumping and climbing and includes co-ordination, balance and fluidity of movement, whilst fine motor development involves the use of the small muscles of the hand and fingers and "refers to movements requiring precision and dexterity, such as tying a shoe ..." (Slavin 1981:61).

While fine motor skills are being developed and honed during the period four to six years it is in the area of gross motor co-ordination that the greatest increase in development is being experienced. Preprimars are unable to sit still for long periods of time and, in order to accommodate their "natural enthusiasm and love of gross motor activities" (Slavin 1981:61), physical activity must take precedence over sedentary tasks during the preprimary years.

By the time the child is five years old he has attained a large measure of control over his bodily activity and is very agile. He has a keen sense of balance, being able to stand for lengthy periods on one foot, walk on tip-toe, hop and skip on alternate feet, and balance with confidence on a raised apparatus. He is able to swing by himself and ride a scooter and a bicycle. He walks, runs, jumps and climbs smoothly and with an economy of movement.



Gesell (1976:69ff) includes the following developmental tasks in the fine motor skills expected of a five year old:

He is able to use his hands rather than his arms in catching a ball and assumes an adult stance when throwing, at which boys are more adept than girls. He is able to copy a square and a circle, cut out accurately and tie a bow. His pencil grip closely resembles an adult's writing hold and he is able to confine his pencil marks to a small area of paper.

Motor skills do not develop through maturation alone but have to be learnt through, inter alia, trial and error, observing and imitating, and specific training (Hurlock 1978: 145).

Malina (Slavin 1981:61) states that "after six or seven years of age children gain few completely new basic skills; rather, the quality and complexity of their movements improve".

### **2.3.3 Perceptual development**

Perception is the brain's ability to interpret and process information transmitted to it by the sensory receptors in the eyes, ears, nose, tongue and skin, muscles, tendons and internal organs. One aspect of this process is to integrate the stimuli received via the senses so that the world is perceived as a composite whole. Perceptual development

is a complex process dependent upon many factors, including the child's genetic makeup, the maturation of the sensory system, the kind of sensory experiences to which the child has been exposed, the social context in which he functions and the development of his cognitive abilities (Botha et al 1991: 238). A brief discussion of the five areas of sensory perception follows.

#### *2.3.3.1 Visual perception*

The preprimar is able to distinguish or discriminate between two similar objects, to sort and classify according to either shape, colour, size or type; to recognise an object when seen from a different perspective or among other objects; and, through the process of association, closure and part/whole perception, to identify an object which is only partially seen.

#### *2.3.3.2 Auditory perception*

This is the ability of the child to differentiate or discriminate between different types of sound as well as differences in pitch and volume; to identify everyday sounds; and to recognise a particular sound against a background of other noises (figure/ground).

#### *2.3.3.3 Smell and taste perception*

These two aspects of perception are closely linked. They involve the brain's ability to

interpret the stimuli transmitted to it through the nose and tongue. The preprimar is able to identify and differentiate between familiar smells and tastes.

#### *2.3.3.4 Tactile and kinesthetic perception*

"Tactile and kinesthetic perception are two perceptual systems for receiving information. The term *haptic* is sometimes used to refer to both systems" (Lerner 1993:327).

Tactile perception is the ability to recognise and name familiar, everyday objects through the sense of touch alone. The preprimar should be able "to observe different textures, sizes, lengths, thicknesses, temperatures, weights, shapes, etc., through the skin or fingertips" (Deetlefs & Kemp 1988:25). Kinesthetic perception, on the other hand, is obtained through the movements of the body as a whole, for instance, the awareness of different bodily positions, and the awareness of muscular contraction and relaxation (Lerner 1993:328).

#### *2.3.3.5 Perceptual-motor activities*

In the preprimar especially, perception is closely linked with motor activities, with tasks requiring "the combined input of sensation and the output of motor activity" (Forgus & Melamed in Kirk & Chalfant 1984:110). Good visual-motor co-ordination, for example, is necessary for the successful performance of fine motor tasks such as drawing,

colouring and threading. For this reason the terms perceptual-motor development or sensorimotor development are often utilised.

### **2.3.4 Cognitive and language development**

"Cognitive and language abilities are probably the most outstanding characteristics of human beings" (Meyer 1991:11), and the relationship between the two is a controversial issue, as will become clear in the following discussion.

#### **2.3.4.1 *Language development***

There are three main theories of language development: learning theory, linguistic theory and cognitive theory.

- The learning theorists maintain "that children acquire language in the same way that they learn other behaviour, through systematic reinforcement" (Clarke-Stewart et al 1985:449), and that the parents' delighted response to those sounds made by a baby which approximate speech reinforces the frequency of the approved sounds. As the child grows he imitates adult speech and his ability to communicate and to be understood continues to reinforce the correct usage of language (Fein 1978:172).
- Linguistic theorists postulate an innate speech-processing ability which enables the

child to construct sentences according to the grammatical rule system of his own language. However, as a child cannot be born with an inherent ability to understand only the rules of his native language, this hypothesis presupposes a syntactic basis common to all languages but no universal rule has been found to exist (Fein 1978:173).

- The cognitive theory of language development sees "language competence as a consequence of children's interaction with the world" (Fein 1978:174). Although Piaget, the main proponent of cognitive theory, suggested that early cognitive development could take place without language, his research on sensorimotor intelligence, clearly indicated that "children need a firm mental representation of an object before they can connect a word to it" (Clarke-Stewart et al 1985:446). This theory will be examined further in the following discussion on cognitive development.

There is some indication that the maturation period for the acquisition of language is chiefly during the preschool years, and certainly by the time the child turns six years old, language development is nearly complete. At four years of age the preprimar is already using well-formed sentences and has acquired a complex grammar, having mastered about 90% of phonetics and language syntax. At five to six years of age, although he may still have some difficulty pronouncing *l*, *r* or *sh*, and often misunderstands words, he is very articulate, having a vocabulary in excess of 2500 words, and talks incessantly! (Seefeldt & Barbour 1986:69).

#### 2.3.4.2 *Cognitive development*

Language and thought both begin to develop during the sensor-motor stage of the child's development. "From birth a baby learns from his environment, and how to react with it" (Burns 1986:140). Vygotsky maintained that language and thought originate and develop separately during the first months of a child's life, merging at the age of about two years (Kapp 1991:333). Piaget, however, suggested that thinking precedes language which only later becomes a vehicle for expressing and facilitating thought (Meyer 1991:243,245). Supporting Piaget's theory, research on the development of language and thought "has found that patterns of thinking establish the course of early language development" (Fein 1978:248).

Most preprimars are in Piaget's preoperational stage of cognitive development that is characterised by rapidly developing language and symbolic thinking. By the age of four years, children are using images and symbols, for example, a little boy may use a box to represent a car. By five years of age they understand that the written word has meaning and will often copy letters at random and then ask an adult to read them. By five and six years of age most children are able to write their own names.

An important aspect of symbolic thought is conceptualisation, or the formation of concepts. Concepts are formed as a result of the child's perceptions of and interaction with the physical environment (Lovell 1971:19). They are both abstract, in that they are not direct sensory data, and symbolic, in that they combine common

factors from a variety of situations or objects, both present or remembered. Their formation depends upon the child's ability to "**discriminate** or **differentiate** between the properties of the objects or events before him, and to **generalise** his findings in respect of any common feature he may find" (Lovell 1971:12,13).

The ability to **classify**, that is, to identify common characteristics of objects and to perceive relationships or associations between objects is acquired during the preoperational stage, and appears to depend upon the capacity to "compare two judgements simultaneously" (Lovell 1971:16). "As the child continues to gain experience, new concepts are added, old concepts are enlarged, and the child begins to relate one set of concepts to another to form larger, more abstract concepts" (Maynard 1982:73).

Where, for instance, a two-year-old child may include all four legged animals under the familiar name "dog", from four years the generalised concept "dog" is applied only to this species. In addition, the association between dog and puppy, or dog and kennel may be perceived.

"Concepts of objects - dog, car and tree, for example - are acquired relatively early.

The child's progress toward more abstract concepts, such as number and age, is slower" (Clarke-Stewart et al 1985:316).

Although most children are able to count to ten or beyond by the age of four, counting, for young children, is usually only a verbal activity and they are far more likely to be influenced, for example, by the length of the row than by the number of objects in it (Burns 1986:88,89). The concept of number, as it pertains to a one-to-one correspondence of objects is the next step in the formulation of mathematical concepts, and from this level the child makes "an intellectual jump to the idea of an abstract 'twoness ' and 'threeness'" (Lovell 1971:27). Here again the sequence is from perception through discrimination to generalisation. The speed at which the child develops mathematical concepts "depends on the quality of the real experience (he) receives", "until he has seen and handled and played with four buttons, four seeds, four sticks and so on, he cannot develop an adequate idea of 'fourness'" (Maynard 1982:74).

However, mathematics include both numerical and spatial concepts and as preprimars begin to acquire mathematical concepts, words describing length, size, shape, mass, and volume, need to be added to their vocabularies in order to allow them "to formulate a clear definition of the concept in verbal terms" (Lovell 1971:21).

One of the most important developments of Piaget's stage of concrete operations "is the foundation of the concepts of **conservation** and **reversibility**" (Maynard 1982:74). Piaget found that young children had difficulty in grasping **conservation**, that is, that certain attributes of an object always remain the same. A preprimar may, for example, cut a slice of bread into a number of pieces under the impression that he



then has more bread. This, according to Piaget, is a result of **centration**, or the focusing or centring of the attention on only one aspect, such as the number of pieces of bread; and the lack of **reversibility**, or the inability to reverse the performance of a mental operation to the starting point - seeing the small pieces of bread as part of the original sandwich. Nevertheless, Seefeldt and Barbour (1986:69) include the "beginning of conservation of amount and length" as a characteristic of the cognitive development of five and six year olds.

The preprimar also begins to understand the concept of causality or the relationship between cause and effect and will anticipate or attempt to guess the possible result of an action. Although Piaget's research did not focus much on this concept, more recent research has shown "that preschool children understand causality far better than Piaget thought" (Botha et al 1991:248).

Other cognitive skills such as problem solving, evaluating and remembering depend heavily on the child's ability to form clear concepts.

"Memory is an essential part of the learning process" (Kirk & Chalfant 1984:95). A network of concepts is built up in the child's mind as he relates new concepts to already existing knowledge, and these conceptual relationships facilitate the recall of information. "Researchers, such as Sodian, Sneider and Perlmutter (1986), have found that children as young as four years, organise and categorise different kinds of

toys ... on the basis of conceptual rather than perceptual criteria in order to remember them more easily" (Botha et al 1991:262).

Research has, however, also shown that, although preprimars have an excellent recognition memory, the ability to recall information no longer present is less effective. The processing of information for short term memory storage is also slower in preprimars than in older children (Botha et al 1991:262), possibly because they lack the existing knowledge to assist them in identifying and analysing the information, or they do not yet use strategies like rehearsal or repetition to conserve short-term memory content.

"Preschool children need cognitive skills for learning in every phase of the early childhood curriculum - self-help, motor, language, perceptual, pre-academic, social, and reasoning activities" (Lerner et al 1987:219).

### **2.3.5 Social and affective development**

The child's affective development involves his emotions, his social skills and his behaviour and these three aspects are closely interlinked, with the child's emotional responses affecting both his personal and his social adjustments (Hurlock 1978:193).

Children between the ages of three and six years are in the third stage of Erickson's stages of personal and social development where their most significant relationships

are those of their basic family units. This close relationship with their parents "provides skills that optimise children's peer contacts" (Fein 1978:298). In addition, their maturing motor and language abilities, and their growing sense of initiative, foster an increasingly active and vigorous exploration of their physical and social environment (Slavin 1981:39).

From the age of four peer contact becomes increasingly important as children become more involved in associative and co-operative play. When they join a peer group, when they start preprimary school, for example, many acquire new behaviour patterns. Some of these may be undesirable, such as bad language or aggression, but they also learn "to formulate and assert their own opinions, appreciate the perspective of peers, co-operatively negotiate solutions to disagreements, and evolve standards of conduct that are mutually acceptable (Santrock 1995:250). In accordance with Bandura's social learning theory children may be seen to influence each other's behaviour through modelling, or imitating observed behaviour; and through direct reinforcement: aggressive children, for example are usually rejected by their peers while the desire for social acceptance generally leads to improved behaviour patterns.

## **2.4 FACTORS INFLUENCING DEVELOPMENT**

"Each child has his or her own unique way of developing and growing" (Seefeldt & Barbour 1986:76). Once again, heredity and environment combine to affect individual development.

## **2.4.1 Physical development**

Factors affecting physical growth and development, for example, include both genetic inheritance, which determines characteristics such as height and susceptibility to certain diseases (Fein 1978:35), and environmental factors.

### **2.4.1.1 Genetic factors**

Genetic factors include chromosomal defects that are the main causes of intellectual disabilities.

### **2.4.1.2 Environmental factors**

Nutrition is seen as "the major means by which the surroundings affect individual growth" (Clarke-Stewart et al 1985:235). Good nutrition and a healthy, balanced diet have a positive effect on the child's growth, strength and energy levels, all of which influence his mastery of developmental tasks (Hurlock 1978:40).

Poor physical growth, on the other hand, can be linked, inter alia, to severe psychological stress caused by factors such as parental alcohol abuse, child abuse, marital and/or financial problems in the home, social isolation or any other form of emotional deprivation (Louw 1991:235).

## **2.4.2 Emotional development**

### ***2.4.2.1 Physical factors***

Physical defects, whether hereditary or accidental, including milder restraining conditions such as obesity, influence both the child's physical and emotional development. Many of these children tend to become either withdrawn or aggressive and suffer from feelings of inferiority and inadequacy (Hurlock 1978:125). Their inability to keep up with their peers results in a negative self-image.

### ***2.4.2.2 Environmental factors***

Children who grow up in an environment which is characterised by poverty and deprivation and who experience severe overcrowding, and a lack of adequate food, shelter and sanitation are usually insecure, unmotivated and often develop a poor self-concept. (Le Roux 1993:92,93)

The crime and violence which go hand in hand with a deprived environment also have a profoundly negative affect on a child's emotional development. Black children from lower income groups, in particular, who are often left alone in the townships during the day, are frequently "eye-witnesses to violence and are often its victims as well" (Le Roux 1993: 122). Farm children have become accustomed to seeing their parents carrying firearms and most know family members, friends or neighbours who have

been attacked, maimed or killed. Constant exposure to violence on this level can result in "severe emotional trauma" (Le Roux 1993:158).

Excessive noise has also been implicated as detrimental to emotional development, as a child exposed to high levels of noise may suffer from stress, experience feelings of helplessness, and be easily distracted (Clarke-Stewart et al 1985:80).

Positive factors affecting the emotions include good general health, a happy and relaxed home environment and good relationships with family and peers. As far as the home environment is concerned the child's basic need is for a secure home and family base, no one type of family unit necessarily works better than another. "It is not the organisation of the family, but the disorganisation of the family that produces problems" (Maynard 1982:145). Conversely, over-protective, authoritarian, or neglectful parents, rejection by peers, and an environment which provides "an abundance of unpleasant emotional experiences - anger, fear, jealousy, and envy" (Hurlock 1978:214), all interfere with the child's emotional development and the effect this has on his personal and social adjustments, could last through to adulthood (Hurlock 1978:213).

### **2.4.3 Intellectual Development**

#### ***2.4.3.1 Environmental factors***

Intellectual development has been found to be adversely affected by an excessively noisy or chaotic environment, particularly in children up to the age of five years. Research has shown that the impaired mental functioning caused by continual noise and confusion tends to last even if noise levels are later diminished. The longer the child remains in noisy surroundings, the more severely his performance appears to be affected (Veitch & Arkkelin 1995:221).

The link between nutrition and intellectual growth has also been firmly established (Seefeldt & Barbour 1986:426), with malnutrition being particularly serious during infancy, when the brain cells are developing. Researchers such as Eichenwald and Fry (1969) and Baraitser and Evans (1969) "have all noted functional impairments of the human brain following early malnutrition" (Burns 1986:36).

Other environmental factors affecting intellectual development include parental behaviours and attitudes and the home environment, with "the overwhelming majority of studies show(ing) that parental behaviours such as being accepting, encouraging independence, and valuing and rewarding achievement are positively correlated with their children's intellectual growth" (Fein 1978:380). In the NCSNET/NCESS Report parental involvement is stressed as a vital component in the education of their

children, particularly where learners experience a barrier to learning (Department of National Education, SA 1997:102).

Studies have also shown that a child's "early cognitive growth depends on the availability of stimulating objects" (Clarke-Stewart et al 1985:80). Research indicates that "early intellectual stimulation could have a most dramatic effect on a child's later intelligence", and, in fact, many authors believe that "high quality early intellectual stimulation" is a prerequisite for superior intelligence and achievement in later life. This being so, the greatest impediment to a child's intellectual development is ignorant or uninvolved parents or care-givers (Wiechers 1996 :176,177).

## **2.5 CONCLUSION**

The importance of the knowledge of child development for any teacher and, in particular, for a teacher whose pupils include preprimars with learning disabilities, cannot be over emphasised. Although there are many different theories of child development most of them agree with the concept of development as one of change. This change is not random but follows a predictable pattern and involves every aspect of the child's growth: physical, perceptual, cognitive, social and emotional.

Therefore, within the framework of their individual abilities and surroundings, there is a general pattern of development that is common to most children. It is their awareness of this pattern that makes it possible for an adult to identify, and recognise the



significance of, any deviation from it. One of the bases on which Van't Westende (1981:189) contends that preprimary teachers can act as screening agents for learning disabilities in preprimars is their knowledge of developmental norms, and this knowledge must, obviously, be coupled with an awareness of the nature of learning disabilities.

In the following chapter the phenomena of learning disabilities will be discussed. This will include the terminology, definition and causes of learning disabilities, the manifestations of learning disabilities and the problems associated with identifying learning disabilities in preprimars.

## **CHAPTER THREE**

### **The Phenomena of Learning Disabilities in Preprimars**

#### **3.1 INTRODUCTION**

Although a thorough knowledge of child development is essential for the identification of learning disabilities in a young child, it is obviously equally important to have a firm understanding of the essential nature of learning disabilities.

#### **3.2 TERMINOLOGY**

In order to identify a problem area in any field of study it is necessary that the problem be clearly defined. In addition, in order to discuss the problem with colleagues in the field it is important that the terminology used means the same to both participants. This is particularly true where learning disabilities are concerned.

The etiology of learning disabilities is equally important for clarifying understanding. Firstly, it serves as a basis for distinguishing children with learning disabilities from children with other disabilities, and secondly it provides teachers of learning disabled children with a "point of departure for .... assessment of and assistance to these children" (Derbyshire 1991:382,383).

### 3.2.1 History of terminology

Although learning disability is an educational term, researchers from a number of disciplines have been involved in the attempt to identify the causes of the learning disabilities. For this reason, many of the terms originally used to describe learning disabilities - and Cruickshank (1977:3,4) noted more than 40 in English alone - can be traced back to disciplines such as medicine, psychology and language pathology. In 1947, in their publication titled *Psychopathology and education of the brain injured child*, Strauss and Lehtinen identified a group of children of normal intelligence whom they termed brain-injured in so far as difficulties "in perception, concept formation and mental organisation interfered with learning" (Mercer 1991:8). Other terms relating to brain injury and used to describe children experiencing the above difficulties, included *brain damage*, *organic disorders*, *aphasia* and *perceptually handicapped*, whilst researchers who believed that the problem was "genetically or developmentally based, used terms such as congenital word blindness, lack of neurological maturation or differentiation, mixed dominance and so on" (Houck 1984:4).

Samuel Kirk who suggested its use as a categorical indication in 1963 (Houck 1984:2) first mooted the term learning disability. In doing so he attempted to "pin down" a phenomenon which had, due to its heterogeneous nature, eluded numerous attempts at classification. The group of parents and professionals, who were at the meeting Kirk addressed, found the term acceptable and organised themselves into the Association for Children with Learning Disabilities (ACLD).

In 1966, despite the ACLD's acceptance of the term learning disability, another term, minimal brain dysfunction, was proposed by Dr Samuel Clements, linking the concept of brain injury to learning problems (Mercer 1991:36). However, "many professionals and parents wanted to move away from medically based terminology to a more educationally meaningful term", (Houck 1984:6) and, with pressure from the ACLD, which had become an influential organisation, the term learning disability was entrenched with the passing of the Children with Specific Learning Disabilities Act in the U.S.A. in 1969.

### **3.2.2 The South African Context**

According to Robinson (Derbyshire 1991:380) a number of different terms have been used by South African writers to identify a child with learning disabilities. These include:

- Psychoneurological dysfunction (Logue 1970)
- Psychoneurological disability (Van der Mescht 1976)
- Psychological learning disability (Strydom 1977; Hicks 1978)
- Specific learning problems (Muller 1970; Bonninelli 1981)
- Specific learning disability (Du Preez & Steenkamp 1980)
- Learning disabilities (Gerber 1985)
- Learning restraints (Van Niekerk 1979)

In 1968, two years after Clement's proposal, a committee of enquiry under the chairmanship of Dr CH de C Murray published the MBD Report which, according to Derbyshire (1991:380), contended that the term minimal brain dysfunction was the one

which most accurately described children with learning disabilities. As in the USA, criticism was levelled inter alia at the over-emphasis on the medical aspect rather than the educational.

In keeping with international use, the terms most often, although not exclusively, used in South Africa today are learning disabilities and specific learning disabilities, although, "according to Murray (1980:12) and Gerber (1985:7) all learning disabilities are specific by nature and therefore it is unnecessary to speak of specific learning disabilities. Learning disabilities will suffice" (Derbyshire 1991:381).

### **3.3 DEFINITION OF LEARNING DISABILITIES**

Mercer (1991:33) states that "in no other area of special education has so much effort been expended to develop a definition", in fact, the general lack of consensus in reaching an acceptable definition has led to some questioning as to whether or not learning disabilities actually exist! (Adelman & Taylor 1986:12). Hammill et al (1981:337) points out that this lack of consensus has been "one of the most frequently and consistently cited criticisms levelled against the L.D. field." The importance of arriving at a universally acceptable definition is therefore indisputable.

#### **3.3.1 Definitional Criteria**

Despite the lack of unanimity, Siegel and Gold (1982:11ff), in a comparison of definitions ranging from that of Strauss & Lehtinen in 1947 to that of Hammill et al in 1981, found

"considerable consensus ... regarding four basic definitional aspects of learning disabilities": 1. underachievement; 2. process deficit; 3. neurological basis; 4. the exclusionary factor.

### *3.3.1.1 Underachievement*

Of the four aspects, educators appear to perceive underachievement as the "chief criterion for learning disabilities" (Siegel & Gold 1982:11). In 1965 Bateman introduced a definition of learning disorders which included a discrepancy clause, (Mercer 1991:37), but this clause had been implicit in previous definitions and is present in various forms in every one of the nine definitions Siegel and Gold compared.<sup>3</sup>

Underachievement refers to a serious discrepancy between a child's intellectual ability, or his potential, and his actual achievement in one or more areas of learning.

Siegel and Gold (1982:15) warn, however, that this aspect should not be based solely on underachievement in school subjects and "mandate a designated degree of underachievement (in terms of years "behind")" as this would mean that children with learning disabilities in kindergarten and first grade could never be identified. This observation is, of course, equally pertinent in the case of preprimars.

<sup>3</sup> Siegel and Gold compared the following major definitions of Learning Disabilities: Strauss (Strauss & Lehtinen 1947); Kirk (1962); Bateman (1965); Hew-Phase (Clements 1966); National Advisory Committee on Handicapped Children (U.S. Office of Education 1968); Johnson & Myklebust (1967); Council for Exceptional Children (1971); Federal Register (1977) and Hammill (1981).

### *3.3.1.2 The neurological basis*

A neurological basis for learning disabilities accepts that all learning is neurologically based and that, therefore, a deficit in learning must be a result of a neurological deficit, whether or not this is revealed by means of a neurological examination. A neurological dysfunctioning, however, does not necessary imply structural abnormalities in the brain but rather a disturbance in the way the brain functions. "Most L.D. children are not brain damaged, but if they have persistent difficulties in academic learning it is likely that some area or areas of the brain are not functioning quite as well as they might" (Gaddes & Edgell 1994:45).

The neurological basis is not as universally accepted as the criterion of underachievement, with Kirk and Bateman both listing it as a possibility and the Council for Exceptional Children rejecting it outright (Siegel & Gold 1982:11ff). It is, however, included in most of the major and later definitions.

### *3.3.1.3 The exclusionary factor*

This refers to definition by exclusion, that is, learning disabled children are not only categorised by what they are but also by what they are not. The exclusions in the various definitions include physical disabilities, intellectual disabilities, and learning problems due to emotional, cultural, environmental or economic factors. This clause "has its origin in the need to establish learning disabilities on a separate and discrete category"

(Lerner 1993:15). The exclusionary factor is found in all but two of the definitions compared, those of Strauss and Lehtinen and Hammill (Siegel & Gold 1982:11ff).

#### *3.3.1.4 The process deficit*

The process deficit refers to a dysfunction in the psychological processes or mental activities which include attention, memory, association, evaluation, classification, reception and perception. It is included in all the definitions but that of Hammill et al (1981).

In leaving out the Process Deficit, the NJCLD stated that the phrase "basic psychological processes" was "too closely associated with "mentalistic process" and "perceptual-motor ability training programs" (Adelman & Taylor 1986:9). Wallace and McLoughlin (1988:28) also claim that "the usefulness of the perceptual approach is limited".

Of the four definitional aspects, however, the one most pertinent to the preprimary situation is that of the underlying process deficit. Not only does the inclusion of this deficit in the definition enhance "the likelihood of early identification" (Siegel and Gold 1982:16), but these authors caution *inter alia* that process training should be used "to a large extent with those students who are in the readiness stage and are not yet prepared to acquire academics.", i.e. the preprimar.



### 3.3.2 The NJCLD definition

All four of the definitional criteria identified by Siegel and Gold (1982:11ff) are contained, or implied, in the definition formulated in 1969 by the National Advisory Committee and which was incorporated in USA legislation in Public Law 94-142 of 1969.

The term "children with specific learning disabilities" means those children who have a disorder in one or more of the basic psychological processes involved in understanding or in using language, spoken or written, which disorder may manifest itself in imperfect ability to listen, think, speak, read, write, spell or do mathematical calculations. Such disorders include such conditions as perceptual handicaps, brain injury, minimal brain dysfunction, dyslexia, and developmental aphasia. Such term does not include children who have learning problems which are primarily the result of visual, hearing, or other handicaps, of mental retardation, or emotional disturbance, or environmental, cultural, or economic disadvantage.

In the USA in 1981, however, the **National Joint Committee for Learning Disabilities (NJCLD)**, which comprised of six organisations: the American Speech, Language and Hearing Association, the Association for Children and Adults with Learning Disabilities, the Council for Learning Disabilities, the Division for Children with Communication Disorders, the International Reading Association and the Orton Dyslexia Society, proposed a new definition for learning disabilities in response to "inherent weaknesses that made (the definition which appeared in PL 94-142) unacceptable as a definition that could be used to delimit a field as broad and complex as that of learning disabilities"

(Hammill et al 1981:337). The following five weaknesses were identified:

- The term "children" was too restrictive in the light of the development of secondary level and adult programmes for the learning disabled.
- Spelling should not be included as a category on its own as it falls under writing abilities.
- The "imprecise" labels listed as inclusive disorders were confusing and ill-defined.
- The exclusion clause did not make it clear that although learning disabilities are not the result of external factors, they can be, and often are, found in conjunction with them.
- The phrase "basic psychological processes", while underlining the inherent nature of learning disabilities, had led to "a polarisation of professionals" into two opposed groups - "those who advocated direct instruction of reading, writing, talking etc.," and those who advocated the training of the underlying processing abilities such as memory, perception, sequencing etc (Hammill et al 1981:338).

The NJCLD's definition, which has enjoyed wide acceptance, reads as follows:

Learning disabilities is a generic term that refers to a heterogeneous group of disorders manifested by significant difficulties in the acquisition and use of listening, speaking, reading, writing, reasoning or mathematical abilities. These disorders are intrinsic to the individual and presumed to be due to central nervous system dysfunction. Even though a learning disability may occur concomitantly with other handicapping conditions (e.g., sensory impairment, mental retardation,

social and emotional disturbance) or environmental influences (e.g., cultural differences, insufficient/inappropriate instruction, psychogenic factors), it is not the direct result of those conditions or influences.

The changes in this definition that countered the perceived weaknesses in the official definition included:

- the removal of the word "children", implying that a learning disability may be manifested at any age
- the removal of the word "spelling" as a separate category
- the removal of the "imprecise labels" previously used to describe learning disabilities
- clarifying the exclusion clause by indicating that, although learning disabilities are not the result of other handicapping factors, they may coexist with them
- replacing the phrase "basic psychological process" with disorders "intrinsic to the individual and presumed to be due to central nervous system dysfunction" (Houck 1984:17)

Even so, the NJCLD'S definition did not escape criticism. The leaders of the Association for Children with Learning Disabilities (ACLD), now known as Learning Disabilities Association of America, rejected the NJCLD's definition and wrote their own, stressing the lifelong nature of a learning disability and emphasising socialisation and self-esteem (Mercer 1991:43).

Further definitions have been proposed and Lerner (1993:11,12) contends that "the goal

of finding a single definition of learning disabilities acceptable to all may be unfeasible", both because of the individual nature of the disability and because "different definitions are required by various professionals, populations, age levels, and degrees of severity and for different purposes, including identification, diagnosis, instruction, and research".

### **3.3.3 South African definitions**

"As the field has gained recognition, many countries have developed their own definitions of learning disabilities" (Lerner 1993:11). South Africa is no exception, and the confusion engendered by the continuing debate concerning an acceptable definition has been apparent in this country, where Gerber (1989:470) stated that "in die Republiek van Suid-Afrika heers daar tans nog groot onduidelikheid en verwarring oor die begrip 'learning disabilities'".

The MBD Report, which "formed the basis of the subsequent education policy with regard to learning disabilities in South Africa" (Derbyshire 1991:380), was issued in 1969 by a committee of enquiry under the chairmanship of CH de C Murray. Their definition read as follows:

Children with minimal brain dysfunction have average or above-average intellectual ability, and the motor function, vision, hearing, and emotional adjustment are adequate, but they manifest specific learning disabilities or behavioural disabilities which are associated with deviations of the function of the central nervous system. Dysfunction of the central nervous system manifests itself

in different ways and leads to various combinations of deficiencies or impairments in perception, conceptualisation, language, memory, control of attention, impulse, and motor function.

Despite the fact that the MBD committee rejected the term 'learning disability' in favour of minimal brain dysfunction (South Africa 1969:10) "het die term leergestremdheid of spesifieke leergestremdheid ("learning disabilities") tog algemeen in gebruik raak in Suid Afrika" (Gerber 1985:11).

In South Africa today, however, in keeping with international trends, there has been a move away from terminology which has "the effect of labelling learners, discriminating against them, neglecting them, and ultimately creating a culture of non-acceptance of diversity." Instead, the development of a terminology that reflects the vision of an inclusive society and the acceptance of diversity is being sought (Department of National Education, SA 1997:iv).

#### *3.3.3.1 Categories of learning disabilities*

Because of the diversity, not only in the manifestation of, but also in the severity of learning disabilities, the MBD Report (Department of National Education, SA 1969:25) originally divided learning disabled children in South Africa into three groups:

- Group A: Pupils in normal schools who are identified as learning disabled but whose disabilities can be alleviated with additional assistance, given timeously and "within the

framework of their class activities".

- Group B: Pupils who have "learning difficulties of a more serious nature", who need full-time but temporary assistance in "specialised schools for children with learning disabilities" but who would later be expected to return to an "ordinary school". The duration of the period of full-time remedial assistance would vary from one term to as long as two years, depending on the complexity of the disability.
- Group C: Pupils with serious learning disabilities who "will never be able to benefit sufficiently by the specialised programme", who would need to attend a special school designed to cater for their specific needs and who would be expected to remain in this school for the duration of their school career.

Grover (Department of National Education, SA 1969:26) suggested the following criteria for the inclusion of pupils in each category:

- Group A: "The criteria will be impairment in some specific learning ability, particularly in some school subject ... together with satisfactory performance in other school subjects and freedom from severe or disrupting behaviour disturbances".
- Group B: In this group the learning impairments will be more wide-spread as a result of which the child will be "unable to progress in the ordinary classes of the school" and will probably manifest "at least some behavioural anomalies in the classroom".
- Group C: The criteria for this group "will be severe and widespread learning impairments together with marked behavioural anomalies which cannot be modified by ordinary classroom procedures". Home circumstances for the children in this

group should also be such as to necessitate the child's removal to a special residential school.

However these categories have now been abandoned and, again in keeping with international trends, the concept of categories in general is no longer considered acceptable. The new education policy is that "all learners have access to a single education system that is responsive to diversity" (Department of National Education, SA 1997:54).

### **3.4 CAUSES OF LEARNING DISABILITIES**

The major causes of learning disabilities are either physiological or environmental.

#### **3.4.1 Physiological factors**

Physiological aspects include neurological dysfunction, genetic factors, biochemical factors and malnutrition.

##### ***3.4.1.1 Neurological dysfunction***

Although there is some argument to the contrary - Ross (1977:50), for instance, states unequivocally that "minimal brain dysfunction is neither a syndrome nor an explanation of

learning disability" - most researchers accept a neurological basis for learning disabilities.<sup>4</sup> However, as Mercer (1991:84) points out, "in spite of many years of research and practice, it remains difficult to diagnose learning disabled children as neurologically impaired."

One of the reasons for this is that a neurological examination often fails to reveal any positive neurological signs of abnormality and even when evidence of brain dysfunction in a learning disabled child is revealed by means of an EEG this can be so subtle that it is difficult for the neurologist to make a definite diagnosis. In addition, "a wide range of soft signs exist in some students who have no learning problems" (Mercer 1991:84). As a result the reliability of both the electroencephalogram (EEG) and the computerized axial tomography (CAT scan) has been questioned and neurological dysfunction is usually inferred from the child's developmental history and observation of his behaviour in conjunction with the neurological examination (Bryan & Bryan 1978:260).

There are two categories of signs which indicate a neurological dysfunction: soft neurological signs which are "subtle rather than obvious or severe evidence of neurological abnormalities" (Lerner 1993:39) and which include mild co-ordination problems (clumsiness), visual-motor disturbance and language and speech problems, tremors, nystagmus and strabismus, perceptual-motor disorders, and confused laterality; and hard signs such as abnormal reflexes, cerebral palsy, epilepsy, visual and auditory disabilities due to brain damage (Botha 1991:285).

<sup>4</sup> cf 2.3.1. Siegel and Gold's four fundamental points in the definition of learning disabilities.



### *a Factors causing neurological dysfunction*

There are a number of factors that could be implicated in the dysfunctioning of the central nervous system.

#### *i Prenatal factors*

These are factors present during pregnancy that may affect the unborn child. A number of studies such as those of Pasamanick and Knoblock and Niswander and Gordon (Wallace & McLoughlin 1988:43), indicate that prenatal factors "must be considered as potential causes of learning disabilities". The following factors have been associated with prenatal neurological damage leading later to learning disabilities:

- maternal-fetal blood-type incompatibility, eg. the Rh factor
- maternal conditions or diseases such as bronchial asthma, kidney and bladder infections, rubella, mental retardation, hypothyroidism, diabetes and neurologic or neuromuscular diseases
- prenatal exposure to toxic substances due to maternal alcohol, drug and medication consumption and cigarette smoking
- maternal age - extreme youth or mature age may result in a lack of readiness or efficiency of the reproductive organs (Wallace & McLoughlin 1988:43, Mercer 1991:69,70)

"Fortunately, of all suspected physiological causes of learning problems, those associated with acquired prenatal trauma are the most amenable to prevention", particular with regard to the ingestion of toxic substances, where greater awareness and control by both doctors and parents could "decrease the incidence of disability related to their consumption" (Mercer 1991:70).

## *ii Perinatal factors*

These are complications during the actual birth process which have been associated with neurological damage causing later learning disabilities. They include:

- anoxia, or an insufficient supply of oxygen to the unborn child
- labour and delivery abnormalities such as prolonged and difficult labour, induced labour, breech delivery, placenta praevia, abnormally short labour and premature rupture of the membranes leading to a "dry" birth
- injuries due to mechanical intervention such as the use of forceps during delivery  
(Wallace & McLoughlin 1988:43, Mercer 1991:70)

In a study involving fifty learning disabled subjects, Colletti (1979) reported that "only 4 percent had avoided pregnancy and birth complications" (Houck 1984:58) which suggests that circumstances before and during birth have a profound effect on the child's learning ability.

#### 3.4.1.2 *Genetic factors*

"The specific attributes of an individual are determined by genetic information normally carried in the forty-six chromosomes. Since abnormal chromosome patterns are responsible for several congenital abnormalities, the occurrence of several cases of specific learning disabilities within a family has led some researchers to posit a genetic basis" (Houck 1984:62).

Kirk & Gallagher (1989: 195) refer to studies by, inter alia, Hallgren, Hermann and De Vries and Decker that have indicated a strong possibility that learning disabilities are hereditary. Wallace & McLoughlin (1988:42), too, state that there is considerable evidence that learning disabilities occur within families.

However, "familial occurrence alone does not prove heritability; learning disabilities can also be due to environmental factors" (Wallace & McLoughlin 1988:42) such as home circumstances and family support, school, and adequacy of teaching.

#### 3.4.1.3 *Biochemical factors*

In the absence of any apparent neurological or genetic factors, a biochemical imbalance has been postulated as the cause of some cases of learning disabilities.

Impulses move from one neuron to another by passing across the synaptic space which is the gap between the axon terminal of one neuron and the dendritic zone of the next

(Krech et al. 1982:94). The transmission of impulses across a synapse is assisted by certain transmitter substances, called neurotransmitters of which the better known are acetylcholine, noradrenaline, dopamine and serotonin. "These chemical substances play a vital role in the transmission of information signals from one neuron to other neurons" (Jordaan & Jordaan 1989:138). Therefore, an imbalance in these chemicals is "assumed to cause difficulties in neural impulse transmission and consequent learning and behavior problems" (Mercer 1991:73).

A number of research methods have been used to test these hypotheses, including analysing the concentration levels of the relevant chemicals in urine, plasma and cerebrospinal fluid. Shaywitz et al (Houck 1984:64) state that although differences in concentration levels of dopamine in the cerebrospinal fluid were detected in children labelled MBD, "the basis of these observed biochemical differences remains obscure."

Other imbalances in chemical secretions, which may lead to learning disabilities, include endocrine gland imbalances. A dysfunction of the pancreas, for example, where too little sugar occurs in the blood, can cause language difficulties; an underproduction of thyroxine has been associated with poor memory and a low IQ; while an overproduction may produce "hyperactivity, irritability, ... and difficulty in concentrating" (Gaddes & Edgell 1994:22).

Studies of the effects of stimulants such as Ritalin and Dexedrine, have indicated that these drugs may improve the motor, emotional and academic performance of children who have been identified as "hyperactive", although, due perhaps to the heterogeneity of this sub-group of learning disabled children, "to date there is no clearcut pattern of

behaviors for which drug treatment outcomes can be predicted", nevertheless, "despite the continuing uncertainties associated with biochemical differences ... the use of stimulant drugs continues to be recommended" (Houck 1984:67).

#### **3.4.1.4 Malnutrition**

Studies have shown that malnutrition, occurring at "critical periods of early growth in children may result in reduced brain size and impaired intellectual development" (Stoch & Smythe in Gaddes & Edgell 1994:21). When damage to the central nervous system due to malnutrition occurs during the last three months of pregnancy or the first year of the child's life, this damage is usually permanent.

#### **3.4.2 Environmental factors**

Children living under poor socio-economic conditions may be said to have learning problems rather than learning disabilities where these problems are attributed to an emotional or physical deprivation rather than physiological damage (see section 3.3.1.3). However, research on animals has shown that "prolonged environmental deprivation can modify and reduce cerebral growth" (Gaddes & Edgell 1994:141). If the same results occur in children this would produce a physiological cause for a learning disability.

A number of environmental factors other than deprivations have also been linked to learning disabilities. These include:

- sensitivity to food, food additives, such as artificial colourants and flavours, and preservatives
- anoxia, due, for example, to prolonged submersion
- viral infections such as encephalitis and meningitis
- illnesses accompanied by extremely high fevers
- accidents resulting in head injuries or severe concussion
- exposure to toxic substances such as lead
- radiation stress, or the effects on children's learning of harmful fluorescent lighting and unshielded TV tubes

(Botha 1991:233; Siegel & Gold 1982:65ff, 9; Mercer 1991:72; Wallace & McLoughlin 1988:43,48,54; Houck 1984:69; Gaddes & Edgell 1994:25,26)

### **3.4.3 Maturational lag**

Another alternative to a neurological basis for learning disabilities is put forward by proponents of the maturational lag theory who suggest that learning problems occur when a child's lower level brain functions are slower to mature than that of his peers. "Since higher-level functions depend on the integrity of lower functions, this results in a lag or retardation in the entire hierarchy (Kolb & Wishaw in Jansen 1996:151). In other words, they hypothesise that these children "lag behind their normally-achieving peers because of different timing, not ability" (Mercer 1991:290).

Hurlock (1978:376) cites a lack of opportunity to gain the experiences upon which understanding is based, due to environmental factors such as poverty, as another

cause of developmental lag.

Bender (Houck 1984:60) identified a number of symptoms which she believed indicated a maturational lag due to "delayed differentiation of the central nervous system" as opposed to a structural defect, these included:

- a slower maturation of language skills
- delayed development of motor skills
- uneven performance patterns on measures of intellectual development
- visual-motor problems
- incomplete or mixed dominance
- right-left confusion
- immaturity
- similar problems frequently reported in other family members

The prognosis for overcoming a learning disability, which is a product of maturational delay, is far more optimistic than for one related to a neurological dysfunction.

Maturational theorists stress the necessity to match cognitive abilities with tasks since, they claim, "asking students to perform skills for which they are not ready creates learning problems" (Mercer 1991:291).

"However, the implication is that if such a lag exists, then a child would be expected to 'catch up' eventually with his or her peers, or at least to narrow the gap in the ability-achievement discrepancies over time. Research findings show that this does not

happen" (Jansen 1996:151). There is a danger that, in attributing learning problems to immaturity, "special intervention may be delayed on the assumption the child will outgrow the problem" (Mercer 1991:291).

#### **3.4.4 Conclusion**

It should be noted that none of the above factors has been proven conclusively to result in learning disabilities. Due to the heterogeneous nature of the category of children who are learning disabled, and due to the fact that the causes of learning disabilities are intrinsic to each individual child, "it is unreasonable to assume that one model or one concept can encompass all the various forms that this condition can take" (Wallace & McLoughlin 1988:22).

### **3.5 MANIFESTATIONS OF LEARNING DISABILITIES IN THE PREPRIMAR**

The complexity of causal factors implicated in the learning disability of each individual child is echoed in the variety of characteristics exhibited by learning disabled children.

Lerner (1993:20,21) points out that there is a cluster of general learning and behaviour disorders which characterise learning disabilities and that each individual will present only some of these characteristics. Therefore the combination of characteristics experienced will be unique to each child. In addition, "certain kinds of characteristics are more likely to be exhibited at certain age levels" (Lerner 1993:21), for example, hyperactivity is more likely to be identified in a preprimar than in an adolescent.



Mercer (1991:50) tabled the areas in which the characteristics of learning disabilities are found in preschool children as follows:

- delay in developmental milestones
- problems with receptive and expressive language
- problems with visual and auditory perception
- short attention span
- hyperactivity
- self-regulation
- social skills
- concept formation

To these can be added the following aspects tabled by Mercer under Grades K - I but equally applicable to preprimars:

- a lack of academic readiness skills (e.g. alphabet knowledge, quantitative concepts, directional concepts, etc)
- problems with gross and fine motor skills

Kirk and Gallagher (1989:187) divided the characteristics of learning disabilities into two main categories: developmental and academic. Academic learning disabilities can only be identified once a child has started formal schooling. They include disorders in reading, spelling, writing and arithmetic. Developmental disabilities, on the other hand,

become apparent at a much younger age and, although they are not as readily identified as academic disabilities, they are of particular concern to the preprimary teacher. Van't Westende (1981:112) refers to these developmental disabilities as deficiencies in prerequisite learning skills or "disorders in the basic learning processes".

In the Federal definition developmental disabilities are referred to as "basic psychological processes" (Kirk & Chalfant 1984:8). Developmental disabilities may be divided into primary and secondary disabilities. Primary disabilities include attention, visual and auditory memory and perception disabilities which "include impairments in visual motor co-ordination, visual, auditory and haptic discrimination; and spatial relations" (Kirk & Chalfant 1984:9).

Secondary disabilities consist of disorders in thinking and reasoning skills such as judgement, evaluation, problem solving and decision making and disorders both in the understanding and use of oral language. The secondary disabilities are so classified because they are seen to be considerably influenced by primary disabilities.

The above characteristics echo those of Mercer (1991), with the omission only of gross and fine motor co-ordination and social skills.

These categories, under which the manifestations of learning disabilities may be grouped, together with the aspect of the child's emotionality which, although not included by these authors is nevertheless an important area for consideration, will be discussed in detail in the following paragraphs.

### **3.5.1 Motor disorders**

Johnson and Myklebust (1967:14) point out that minor inco-ordination is one of the characteristics of children with learning disabilities, while Cruickshank (1977:56) states that "faulty motor ability is so much a part of the picture of the learning disabled child that teachers and clinicians have come to expect it as a typical part of the total syndrome."

The "clumsy child syndrome" as manifested in the preprimar is characterised by falling, bumping into or dropping things and a general awkwardness of movement. Poor gross motor co-ordination is evidenced in difficulties in climbing, jumping, hopping, skipping and balancing, whilst poor fine motor control leads to problems in throwing or catching a ball, in handling pencils, crayons or brushes while drawing or painting and in cutting out, especially if the child is required to cut out marked shapes or along lines.

Uncontrolled motor activity such as hyperactivity (section 3.5.5) also interferes with the learning of fine motor skills as the hyperactive child has difficulty sitting still long enough to carry out tasks such as cutting out and drawing.

Manipulative skills required for buttoning, tying laces and closing zips, as well as games involving manipulative toys, are also affected, with the learning disabled preprimar often avoiding those activities which require "skilled precise movements" (Van't Westende 1981:124).

Poor body image - an incomplete grasp of the location and function of the different parts

of the body individually and of the body as a whole; lack of directionality - the lack of understanding of the course of movement the child must take to change his present position in space to that of his destination; and confused laterality - the lack of an inner awareness of the left and right sides of the body; are also typically found in learning disabled children (Lerner 1993:308,332; Deetlefs & Kemp 1988:11,12).

In addition, "some children exhibit motor behaviours that are typical of much younger children" (Lerner 1993:308), such as overflow movements - where, for example, the left arm involuntarily mirrors the movements of the right.

### **3.5.2 Perceptual disorders**

"Perception is the process of recognising and interpreting sensory information" (Lerner 1993:318), therefore it includes the ability to discriminate and organise perceived stimuli. Perceptual disorders include deficiencies in auditory, visual and haptic perception.

Preprimars with an auditory deficiency may have difficulty, for example, in discriminating between words that sound similar or identifying rhyming words, in recalling a story or in carrying out instructions in sequence.

A disorder in visual perception could result in an inability to recognise similarities and differences between objects; difficulty in distinguishing an object from its background or in identifying a partially obscured object; or even an inability to recognise letters, numbers, shapes and everyday objects. This disability could eventually affect the child's ability to

read, as, although most children with reading problems have language disabilities, "some groups of poor readers have been found to have problems in the visual-perceptual areas" (Carrow-Woolfolk & Lynch 1982:321).

A deficient haptic perception, that is, a problem in the tactile or kinesthetic systems, could result in the child being unable to differentiate between textures, shapes, weight or temperature through the medium of touch, or lack an awareness of bodily positions and muscular movements.

Carrow-Woolfolk (1988:142) states that there are "strong positions explaining the role of the entire perceptual system on the development of the cognitive system", while other writers concur that the child's motor ability, language and social and emotional development may be impeded by perceptual deficiencies (Derbyshire 1991:388). Smart & Smart (1982:232) state that "a wide range of sensory experiences probably contributes to brain development, particularly during the preschool period..." In fact, according to Johnson and Myklebust (1967:33), "a perceptual disorder by reciprocity disturbs all of the levels of experience that fall above it".

While Mercer (1991:274) cites a lack of empirical support for perceptual and perceptual-motor training he concedes that perceptual disorders or specific abilities, could "play a significant role in the overall development of the individual". Lerner (1993:121) sees the cognitive processing approach, which includes the process of perception, as "an important part of the thinking of teachers of students with learning disabilities" and states that "it remains a cornerstone of the field of learning disabilities".

### 3.5.3 Cognitive disorders

As discussed in section 3.3.3.2, many of the cognitive skills of the preprimar overlap with other areas of his development, in particular those of language and memory. In addition, cognitive disorders, like language disorders, can have a marked affect on the learning disabled child's social and emotional development.

The young learning disabled child's cognitive functioning is characterised inter alia by an inability to see the relationship between cause and effect, and as a result he is unable to anticipate the result of an action. This not only has a profound affect on his ability to solve problems but also means that he has difficulty in foreseeing the consequences of an antisocial or disobedient act.

Researchers have reported a link between cognitive style and the child's ability to learn. Many learning disabled children have an **impulsive cognitive style** which "is characterised by quick, incorrect responses (Mercer 1991:289). These children have difficulty classifying and categorising information and in relating new information to that which they already know, all of which are important preprimary cognitive skills.

Because of this impulsivity and lack of internal organisation, the learning disabled preprimar is often unable to plan his activities or to work independently and purposefully. He is generally unable to learn by imitation and therefore has difficulty modelling his behaviour on that of his peers, parents or teachers, and he does not always understand

instructions, particularly when these are given in a group situation (Derbyshire 1991:389,390).

These disorders in the learning disabled child's cognitive functioning are closely linked to his ability to process information. In other words, he has difficulty with the processes (for example: attention, perception, memory) used for the recognition and organisation of information (Mercer 1991:289).

#### **3.5.4 Language disorders**

According to Kirk and Gallagher (1989:190) "language disorders are the most common learning disability noted at the preschool level". In fact, ever since learning disabilities have been defined, "note has been made that many of the children having difficulty in school had histories of being late to talk or had difficulty with language as preschoolers" (Aram & Nation 1982:52).

For the preprimar language disorders involve the acquisition of oral language, or developmental aphasia, and include deficiencies in both auditory-expressive and auditory-receptive language skills.

A child with an auditory-expressive language disorder has difficulty in verbalising ideas and feelings. This preprimar may attempt to communicate by using gestures or substituting single words for sentences (Lerner 1993:361; Johnson & Myklebust 1967:116). He is often frustrated by his inability to make himself understood and this

frustration can lead to aggressive and anti-social behaviour.

The term, auditory-receptive language disorder refers to difficulties in the understanding of oral language. This may manifest itself, for example, in the preprimar's inability to carry out simple instructions or even to respond when his name is called, despite the fact that he has no hearing impairment.

Some children are able to understand single words but cannot comprehend a full sentence, or are able to understand a word in one context but not in another. **Echolalia** or the habit of repeating a word in parrot-fashion and uncomprehendingly, is also an example of a receptive language disorder (Lerner 1993:360).

One of the reasons that the learning-disabled child has difficulty understanding oral language is that he is unable to discriminate between the spoken word and background noises, that is his auditory figure-ground differentiation is defective. In tests done by Keir (Carrow-Woolfolk & Lynch 1982:288), he discovered that language-learning-disabled children were able to understand the same number of words as normal children "only when the background noise was 10 to 15dB below the level of the words".

Not only do language disorders affect the young child's ability to understand concepts and his ability to communicate, therefore interfering with his social development, but research indicates that there is a crucial link between language deficiencies and later reading disabilities (Mann & Brady 1988:811).



Studies (Carrow-Woolfolk & Lynch 1982:321) have revealed the following language disorders in children with reading disabilities:

- They have smaller speaking vocabularies (Fry, Johnson & Muehl, 1970).
- They use grammar and syntax less appropriately (Calvert, 1973; Vogel, 1975).
- They have poorer verbal fluency and organisation of verbal concepts (Vellutino, 1978).
- Their word retrieval is poorer (Denckla & Rudel, 1976).
- They have a history of oral language problems (Ingram, Mason & Blackburn, 1970; Lyle, 1970).
- They differ to competent readers in their morphological usage (Vogel, 1975; Wiig, Semel & Crouse, 1973).
- They have a slower response time in vocalisation (Eakin & Douglas, 1971; Spring, 1976).
- Their listening comprehension is poorer (Wiig & Semel, 1976).

### **3.5.5 Attention disorders**

Attention is the ability to be selective in processing stimuli and is essential to the learning process. The ability to block out the unessential is "a significant characteristic of normal human beings" (Cruikshank 1977:35).

For example, a child who reacts indiscriminately to the multitude of external stimuli which surround us is "always on the move, is distractible, cannot sustain attention long enough to learn, and cannot direct attention purposefully." (Kirk & Gallagher 1989:189).

An attention disorder presents itself as "a persistent pattern of inattention and/or hyperactivity-impulsivity that is more frequent and severe than is typically observed in individuals at a comparable level of development" (DSM-IV 1994:78).

**Hyperactive**, or **hyperkinetic** children may continually fidget or squirm in their seats or not even remain seated when expected to do so. They may run or climb excessively in situations where it is inappropriate to do so and "have difficulty participating in sedentary group activities in preschool classes (e.g., listening to a story)" (DSM-IV 1994:79). Bryan and Bryan (1978:136) point out that hyperactivity is not necessarily noticeable during normal play but manifests itself as an inability to modify this behaviour in terms of the situation and/or social demands.

Another aspect of an attention deficit is **impulsivity**, or an inability to reflect before reacting to verbal or physical stimuli (see section 3.5.3.). Impulsivity may be manifested as impatience, difficulty in taking turns and frequent interruptions. A child with this disorder may make inappropriate or irrelevant comments fail to listen to instructions, grab objects or touch things he should not touch and clown around (DSM-IV 1994:79).

**Perseveration** may be another feature of an attention disorder. This is "the tendency to continue with an activity long after there is any logical need to do so" (Siegel & Gold 1982:49), such as excessive repetition of sentences or phrases or continuing to draw and colour long after the picture has been completed.

### **3.5.6 Memory disorders**

Houck (1984:35-37) cites a number of studies involving memory tasks and concludes that researchers' findings show that "deficits within the memory system are distinguishing characteristics of many individuals exhibiting specific learning disabilities." These memory deficiencies involve an inability to recall that which has been seen, heard or experienced and have a profound effect on a child's language development. In the preprimar, particularly, an auditory memory disorder may affect the development of oral language whilst a visual memory disorder can lead to later problems in learning to read (Kirk & Gallagher 1989:189). Many researchers attribute the memory problems of learning disabled children to their limited use of cognitive strategies such as organisation in the storing and retrieving of information (Mercer 1991:279).

### **3.5.7 Social and emotional disorders**

Emotions are neurochemical in origin, elicited by both internal and external stimuli that trigger emotional receptors (Westman 1990:206). The receipt of a stimulus is followed by both a **physiological** arousal such as a quickened heartbeat or raised blood-pressure, and a **cognitive appraisal**, that is, the perception and categorisation of the stimulus situation (Jordaan & Jordaan 1989:583,588).

Similarly, the social development of the child cannot be seen as independent of neurological processes. According to Talcott Parsons' general theory of action, the "output of the central nervous system" occurs through the behaviour of the individual in

dealing with the environment as well as through his personality (Westman 1990:187).

However, while it has been suggested that a deficit in social skills might be seen as a primary deficit, resulting from a neurological dysfunction, there is, as yet, very little evidence in support of this argument (Wicks-Nelson & Israel 1991:252). Therefore disorders in the child's social and emotional development may be seen as secondary psychological factors, directly related to his learning disability and sometimes leading to more severe consequences in behaviour than the disability itself (Siegel & Gold 1982:42). The ecological system, that is, the home, social, cultural and school environments in which the child lives, plays an important role in his social and emotional development (Lerner 1993:115,116). The home is the first and most important aspect of the young child's life. A dysfunctional home life, where parents are non-supportive or non-accepting and provide poor role models, invariably leads to a lack of self-esteem and a poor self-concept.

In the social realm, a lack of perception or discernment when it comes to interpreting the subtleties of daily social interactions (Lerner 1993:117) can result in the child with learning disabilities using inappropriate behaviour or language in his attempts to communicate with his peers. This inability to respond appropriately in various social situations leads to poor social experiences that reinforce the child's negative self-concept. The child may then begin to avoid peer interaction, regarding himself as undesirable and finding few opportunities to present himself as competent (Westman 1990:37). This effect can be exacerbated if he finds himself in an unfamiliar cultural or linguistic environment when he attends preprimary school.

Lack of self-esteem engendered by negative experiences in the home, social and cultural environment impacts on the child's experiences at school and often leads to unsatisfactory relationships with teachers and peers. Many children with learning disabilities are seen by teachers to be less co-operative, less tactful, less responsible and less able to cope than their peers. Research indicates that they are often "rated less popular than nondisabled peers, and ... frequently rejected or neglected" (Wicks-Nelson & Israel 1991:251).

This social rejection reinforces the child's poor self-concept and his feelings of inferiority and his lack of success in social experiences can, in turn, affect the his ability to achieve in other areas.

### **3.6 IDENTIFICATION OF LEARNING DISABILITIES**

Despite the diversity of characteristics associated with learning disabilities, it is important that the teacher be fully conversant with and understand the significance of these learning and behaviour patterns in order to identify a learning disabled child.

Assessment is the first step in assisting a learning disabled preprimar. Not only is it important to identify a child with learning disabilities, but it is necessary to "define precisely the specific feature of the disability so that appropriate interventions may occur" (Houck 1984:76).

The teacher plays a vital role in the identification of a learning disabled preprimar. Her

understanding of child development enables her to recognise developmental or learning problems and thereby initiate the identification process (Derbyshire 1991:404).

The early identification of learning disabled preprimars "has received substantial support from legislators, parents and professionals in medicine, psychology, language and education. ... They believe that many learning, social-emotional, and educational problems can be prevented or corrected if identification and intervention are provided in preschool or kindergarten" (Mercer 1991:311).

However, many researchers question the possibility of identifying learning disabilities in a preprimar. Some of these problems were mentioned in section 1.3.1, and will be dealt with in more detail here.

### **3.6.1 Problems of early identification**

There is no doubt that accurate early identification can be difficult, particularly as "the early warning signals of specific learning disabilities may be very subtle, vary in degree, and occur within a wide range of behaviors" (Mercer 1991:315). Nevertheless, as Nunn and Crase (1979:305) pointed out, due to the research and information available in the field of learning disabilities, "differential diagnoses are now possible for less obvious learning disabilities and at increasingly earlier ages" and continuing research during the intervening years has made this statement even more valid.

The most frequently cited problems with regard to identifying learning disabilities in young

children are those of developmental lag and labelling.

#### *3.6.1.1 Developmental lag*

One of the methods of identifying a learning disability is to compare the learner's development with the average developmental level of his age group. Preschoolers, however, "may demonstrate differences or lags in development that represent extremes within the normal range of variations. ... For this reason, some experts find it inaccurate to diagnose a child as learning disabled during the preschool years" (Gearheart 1985:347).

In addition, the pattern of development is unique to each individual preprimar. In some, the central nervous system "may develop in a differential manner, causing the child to demonstrate high ability in one area ... but very limited skills in another area" (Mercer 1991:315). Thus the typical discrepancy in developmental skills, characteristic of a learning disabled preprimar, could, in fact, be due to an immature central nervous system.

While these problems do exist, an experienced teacher, with a thorough knowledge of the developmental process, and who "is sensitive to the whole child as he interacts with the significant people in his life" and with his environment, is able to understand and take into consideration in her assessment, the "unique variations in his development" (Nunn & Crase 1979:302).

### **3.6.1.2 Labelling**

Whether or not a preprimar is correctly identified, there is always a danger that the teacher's expectations will have a negative effect on his education in that she will both expect and accept less from the labelled preprimar (Mercer 1991:316). These low expectations could then lead to a situation of self-fulfilling prophecy where the learner performs according to the expectations of his teacher.

While these views are undoubtedly true, improved teacher training would surely be preferable to avoiding early identification on the grounds that labelling a preprimar could be harmful, particularly as the advantages of early identification, (see section 3.6.2), far outweigh any disadvantages which may arise due to the possibility of reaching the wrong conclusion during assessment.

### **3.6.2 Importance of early identification**

"A large number of authors and researchers ... contend that early identification is a valuable asset in remediation and a potentially strong tool of primary prevention of learning and behavior problems throughout the school years" (Reynolds 1979:175).

Brown and Zinkus (Gottlieb et al 1979:315) also identify the preschool years as the "time when intervention can be optimally effective", as many of the frustrations and emotional problems which the learner will encounter at school could be prevented with a programme of early identification and intervention, thus averting the "occurrence of secondary



problems that compound the original difficulty" (Lerner 1993:247). Experience and research show that intervention for young learning disabled preprimars is very effective in "accelerating cognitive and social development and reducing behavioral problems" while by the time these preprimars reach school-going age, "precious learning time has elapsed" (Lerner 1993:246,247).

### **3.6.3 Identification methods**

In order to design an appropriate intervention programme, the teacher needs to assess each preprimar "to determine the skills (he) needs to master and the sequence in which those skills should be taught" (Bailey & Wolery 1984:25).

In a paper presented at the 11th National Congress of the Psychological Association of South Africa in Stellenbosch, Foxcroft and Shillington (1992) stated that although there were tests such as the Aptitude Test for School readiness, the Beery Visual-motor Integration test, and the Draw-a-Person test available for testing preprimars, there are very few such group screening tests and very little research related to them in South Africa. In addition there is little in the teacher training programmes to prepare preprimary teachers to administer formal screening tests.

The NCSNET/NCESS Report (Department of National Education, SA 1997:85) comes out strongly against the routine administration of standardised group tests which do not guarantee "that the results will contribute to a better understanding of the learner and/or the manner in which the learner accesses the general curriculum".

As opposed to direct testing, observation, parent interviews and the use of rating scales, are the methods most frequently used in preprimary schools and, indeed, many authors are of the opinion that "direct and continuous observation ... has proven highly predictive of later learning status" (Wallace & McLoughlin 1988:280).

### 3.6.3.1 Observation

There are a number of advantages in using observation as a means of assessment. Firstly, it gives an overview of the preprimary's typical behaviour over a period of time; secondly, "it allows for the assessment of many important skills (peer interaction, inappropriate behavior, communication, independence) not covered in a testing situation", and, thirdly, it focuses not only on the behaviour itself, but on the context in which it occurs (Bailey & Wolery 1984:27).

Bailey & Wolery (1984:27,28) suggest three forms of observation: running records, event sampling and category sampling.

*Running records* This method would be difficult to implement without a person watching and recording everything a preprimary does over a period of time. The information gathered in this way would be used in order to discern patterns of behaviour. *Event sampling* is more focused than the previous one and is used to record the frequency or duration of specific behaviour.

- *Category sampling.* Using this method the teacher may record a variety of behaviours which relate to a specific category such as aggressiveness, timidity or task avoidance.

In the preprimary school, in particular, "the teacher's observational skills are invaluable to the identification and remediation process as her knowledge of developmental norms can help to identify discrepancies in learning skills which the SLD preprimary child may reveal while he is performing tasks" (Van't Westende 1981:102). In fact, a number of studies of the predictive accuracy of teacher observations in identifying learning disabled preprimars have indicated "that teacher observations are a key factor in the early identification of learning disabilities" (Mercer 1991:321).

#### 3.6.3.2 *Parental Interviews*

Parental observations are also extremely important. The parents are the child's primary educators and their intimate knowledge of their own child is of vital importance in gaining an overall picture of his developmental pattern. Interviews with parents enable the teacher to gain an insight into the background and early development of the preprimar.

Most preprimary schools require the parents to fill in a questionnaire dealing with their child's early development. A comprehensive questionnaire of this sort should include questions relating to:

- the prenatal, perinatal and postnatal experiences of the preprimar and the mother

- the preprimar's unique position in his family, for example whether first or last born, whether one of twins or adopted
- the occupational status of the family
- the educational history of the family members
- the medical history of the preprimar and family, including his present state of health
- the preprimar's physical development, for instance, when he sat, crawled, walked and started speaking
- the preprimar's ability to socialise

"A questionnaire dealing with such areas as those described above can be an invaluable predictive instrument" (Van't Westende 1981:166).

Armed with the background knowledge that such a questionnaire provides on the preprimar's developmental patterns, an experienced teacher is able to take into account environmental, cultural and social influences when assessing his progress.

These observations may be recorded informally in the preprimar's file or more formally by using a rating scale to assess his abilities.

### 3.6.3.3 *Rating Scales*

"Educational assessment refers to the use of tests for instructional planning and represents the kind of assessment in which the teacher is most typically involved ... (it) also requires the collection of a considerable amount of information about the child" (Bailey & Wolery 1984:26), and so fulfils the requirement for continuous daily

assessment.

The two types of tests generally used by teachers are norm referenced tests and criterion referenced tests.

Norm referenced tests such as the Denver Developmental Screening Test indicate "the child's development level in relation to that of other children" (Bailey & Wolery 1984:26). Although this particular test is relatively short, economical and easy to use, and accurate in screening children for problems it was not designed to be used to help plan for educational strategies and instead indicates general areas requiring individualised instruction (Bailey & Wolery 1984:26). The validity of the routine administration of this type of standardised test is being challenged both nationally and internationally as these tests may disadvantage some of the learners in a diverse learner population (Department of National Education, SA 1997:85). The NCSNET/NCESS Report (Department of National Education, SA 1997:85) recommends that the routine use of standardised tests be discontinued.

Criterion referenced tests or measures, on the other hand, "are typically more informal assessments intended to measure the specific degree of knowledge a child has attained and has not attained in a particular area of learning" (Suran & Rizzo 1983:387). In these measuring instruments the preprimar's performance in a specific skill is compared to a standard of mastery and not with other children.

These skills are usually grouped under the following developmental headings: cognitive,

language, gross and fine motor, social development and self-help (Bailey & Wolery 1984:27).

A handbook developed by Greta Deetlefs and Johanna Kemp giving guidelines for integrating a structured method of assessment into the daily programme of the preprimary school (Deetlefs & Kemp 1988:2) is widely used in the Eastern Cape. The developmental areas covered are perceptual-motor, language development, cognitive development, concentration and attention span, creative activities, emotional and social development. An area of development which is not covered by them and which needs equal consideration is that of adaptive development, which refers to self-help skills such as toileting, dressing and eating, and the preprimary's ability to separate from his parents (Lerner 1993:261).

Deetlefs and Kemp's method is restrictive, in that the teacher is encouraged to focus her attention only on the specific skills scheduled for that particular week, and care has to be taken to avoid falling into the trap of "testing" preprimaries in order to keep up to date with the programme. However, the authors do emphasise ongoing assessment through observation, and, here too, recording is done according to a point scale.

This writer contends that continuous observation on a daily basis in a non-threatening environment is the most effective method of successfully assessing a young preprimary.

### **3.7 CONCLUSION**

A common terminology and a generally accepted definition provide all stakeholders with a point of departure for understanding of learning disabilities. The more conversant the preprimary teacher is with the causes and manifestations of learning disabilities the more capable she will be both in identifying them and in assisting learning disabled preprimars in her group.

Observation, together with the use of rating scales, during the course of the normal preprimary programme is a method of screening preprimars and is, in conjunction with the information obtained by parent interviews, the first step in the process of identifying a learning disabled preprimar.

However, "if screening is to become part of an integrated programme, then the information must be used to the benefit of the child" (Van't Westende 1981:170). As the policy of inclusion becomes a reality in our schools (see section 5.6), the responsibility for intervention will fall on the preprimary teacher who made the initial identification.

This pre-supposes that the teacher has the ability and training to devise a programme to meet the needs of her pupil and the access to multi-disciplinary support systems necessary to guide her in this venture.

The teacher's task in educating the young learning disabled preprimar is discussed in the next chapter.

## **CHAPTER FOUR**

### **The role of the teacher in the education of the learning disabled child in the preprimary school**

#### **4.1 INTRODUCTION**

In the previous chapter the manifestations of learning disabilities and the methods used by the preprimary teacher to identify learning disabled preprimars were discussed. But identification without intervention is futile and amounts to labelling a child instead of assisting him.

The philosophy of inclusion has become an issue in many aspects of society worldwide and is particularly relevant to education. The approach has shifted from an isolated focus on the child with disabilities, with the intention of changing him, to a focus on the system as a whole, with the intention of transforming it so that "it can accommodate individual differences among learners" (Department of National Education, SA 1997:54).

As a result the responsibility for support for a preprimar with learning disabilities, as with any other learner with a disability, falls squarely on the class teacher. With this in mind, the philosophy of inclusion, and the role of the teacher in the classroom will be considered and programmes suitable for both typically developing and learning disabled preprimars will be examined. The teachers' role in collaboration with parents, specialists, colleagues



and the community will also be considered in this chapter, as will the effectiveness with which existing training programmes prepare teachers for their task.

## **4.2 INCLUSION**

Inclusion is, first and foremost, a human rights issue. Its underlying philosophy "claims that all people, including those with disabilities, form part of 'normal' society" and that, therefore, any society which excludes them is itself disabled "because it does not use correct criteria to acknowledge and accommodate the wide variety of abilities amongst its members" (Burden 1995:46). It is a philosophy that emphasises the value of all human beings and acknowledges their right to be treated with respect and dignity (Burden 1995:53).

The proponents of full inclusion in education, or inclusive education, base their argument on "the premise that all students have the right to be members of the school community and that no student should be excluded" (Lewis & Doorlag 1995:543). In an inclusive programme all children would attend the school and classroom they would be expected to attend if they did not have a disability. Therefore, although inclusive education obviously encompasses educational placement, it is far more than just this and should instead be viewed as an entirely new approach to education as a whole.

Powers (1996:68) suggests that inclusion should embrace an attitude which:

- "promotes a whole society approach" to disability/difference

- assumes that "all pupils have the right to be educated in the ordinary school", but also views inclusion as more than just a matter of placement
- "seeks to maximise opportunity, independence and participation for all pupils according to individual need and wishes" but accepts that these aims may not always be mutually compatible
- "includes parents and pupils in decision making", supports their right to state their preferences and to have them seriously considered
- takes an approach which is "flexible to individual pupil's needs"
- recognises that the needs of some children may include the need to socialise with others who have the same disability

According to this position, inclusion in education implies unconditional acceptance of the child and a restructuring of the education system to accommodate all children regardless of their disabilities, but does not necessarily mean that all children be accommodated in 'regular schools' regardless of their needs.

In fact, despite the virtual universal acceptance of inclusion as the ultimate goal in education, "the attempts to realise more inclusive education have resulted in very different educational arrangements in different countries" (Pijl et al 1997:2), with many educators feeling that more research needs to be done to substantiate the educational viability of these claims (Powers 1996:65). In the United States of America, for example, the majority of learners with learning disabilities are "resource room pupils", that is, at least 21% and not more than 60% of their school day is spent in the resource room

receiving special educational programmes and services from a special education teacher (Zigmond & Baker 1997:100).

As far as preprimars are concerned, the situation is very similar. "Although providing early intervention to children with disabilities in an inclusive or integrated environment designed to meet the needs of all children is commonly regarded as best practice, concerns are sometimes raised about the ability of preschool programs to meet the needs of children developing normally as well as those with developmental delays" (Diamond et al 1994:1).

In South Africa, the Curriculum Framework for Early Childhood Development (Eastern Cape Province 1996:17) makes it clear that "inclusion of children with disabilities and other special educational needs should always be in the best interest of the child."

It appears, then, that there are both advantages and disadvantages to implementing the philosophy of inclusion in an educational setting.

#### **4.2.1 Advantages and disadvantages of an inclusive educational environment**

##### **4.2.1.1 Advantages**

An inclusive education policy eliminates the stigma often attached to special schools and classes and consequently, to a large degree, eliminates labelling and provides the opportunity for children without disabilities to gain an understanding of the problems of the

learning disabled child, therefore promoting greater social acceptance for the child (Du Toit 1991:73; Wallace & Kauffman 1986:13).

In an investigation of the experiences of normally developing children in an integrated programme (Peck et al 1992:54,56) the majority of parents and teachers included in the survey agreed that inclusion:

- increased comfort with human differences
- increased acceptance of people as individuals, that is, reduced prejudice
- taught children to respond to the needs of others
- engendered an awareness and sensitivity to the needs of others

In other words, both teachers and parents of children involved in inclusive programmes cited the "social-cognitive, affective, and moral developmental outcomes" as the areas in which normally developing children benefit most from integration (Peck et al 1992:54,56).

In addition, research, such as the study on integrated programmes by Lamorey and Bricker (Peck et al.1993: 249) suggest that children with disabilities in an inclusive preschool programme demonstrate higher levels of social play, more appropriate social interactions, and are more likely to initiate interactions with their peers than are children in a special education classroom. In this way, isolation and alienation from the community is avoided, and children with disabilities are able to acquire the social skills that will help them to integrate more fully into society.

#### 4.2.1.2 *Disadvantages*

Unfortunately, acceptance is not always a natural or spontaneous result to integration and teachers have to be alert to the possibility of rejection by peers who find the behaviour of a learning disabled preprimary unacceptable. Odom and Brown (Peck et al 1993:39) noted that, even in an inclusive setting, learners with learning disabilities are less likely to participate and are chosen as playmates less frequently than their typically developing peers.

Another disadvantage is that an integrated classroom with a higher teacher-child ratio than most segregated programmes offer, may not be able to provide "the individual attention that children have traditionally enjoyed in segregated settings" (Thurman & Widerstrom 1990:40). Conversely, parents with typically developing children argue that their children may enjoy less attention because children with disabilities will require more of the teacher's time and energies. This view, however, is at odds with the findings in section 4.2.1.1.

Finally, there is a very real fear that, as the teacher is not qualified to deal with specific problems which may arise as a result of the child's specific disability, his individual needs may not be met and that inclusion may, therefore, actually be detrimental to his well-being and educational progress (Du Toit 1991:73).

### **4.3 THE ROLE OF THE TEACHER IN ASSISTING THE PREPRIMAR WITH LEARNING DISABILITIES**

The teachers' role in respect of the learning disabled preprimar incorporates both her direct intervention in the classroom situation and her collaboration with parents, specialists, colleagues and community organisations in order to obtain support for her intervention.

#### **4.3.1 The role of the teacher in the classroom**

The role of the teacher in a class combining, in this instance, both typically developing children and learners with learning disabilities is a complex one.

She has to remember that "a child's emotional, social, and academic needs must be considered in combination" as "problems that interfere with fundamental learning and skills acquisition often compromise emotional well-being and social acceptance" and this, in turn, can further impede learning (Feigin & Meisgeier 1987:259).

In an inclusive classroom, a learner with learning disabilities is placed in a normal environment, but the child's individual needs have to be catered for. The teacher has to modify the environment and curriculum in such a way as to meet these needs without compromising the needs of the rest of the group.

This involves:

- planning the environment, i.e. the organisation of the playroom, the placing of the various activity centres, such as the book corner, the music corner, the math's table and the discovery table, ensuring that areas are provided where children who have difficulty concentrating can work with the minimum of distraction
- selecting educational material and apparatus appropriate to the various levels of skill the children have attained, and providing the educational stimulus needed to meet the educational outcomes the teacher desires - toys and games will have to be provided which the learning disabled preprimar will be able to utilise successfully
- organising the school day so that periods of planned activities are interspersed with periods of free play, allowing the child a choice of activities and ensuring that the learning disabled child is able to work at a level at which he is able to achieve success and preferably with children who are not too far removed from his level of development - in a school that operates on an open system, for example, the learning disabled child would be able to work on those activities provided for a younger group without attracting any attention

In order to carry out her role, the teacher needs a programme that is flexible enough to adapt to the needs of all the learners.

#### 4.3.1.1 *Establishing a programme*

A number of programmes have been developed to assist preschool children with developmental learning disabilities. In America, many of the programmes for young children with disabilities "are based on demonstration models developed through a program known as EEPCD - Early Education Program for Children with Disabilities" which has been operating for over twenty-five years, establishing state-of-the-art model projects with a "wide variety of curriculum approaches for many different types of disabilities..." (Lerner 1993:256) These include the High/Scope Perry Preschool Program and Project Head Start.

##### *a Project Head Start*

Head Start is probably one of the best known of the American programmes for early childhood education. Initiated in 1964, it was originally planned to "overcome the handicaps of disadvantaged preschool children" (Decker & Decker 1984:8), and was conceptualised "as an ecological model of program design in which parent and community involvement, health care, education and social service all served as critical components" (Peck et al 1993:86).

Head Start programmes use a direct teaching method, emphasising the teaching of the pre-academic skills required for reading and arithmetic (Lerner 1993:267). There is, however, no standard curriculum, as the programme includes "a broad range of curricula



that reflect the diversity of cultural, social, and ethnic contexts in which it operates" (Peck et al: 1993:86).

The classes tend to be small and the emphasis is on meeting the special needs of each child in the programme. The teacher's role is to:

- develop a programme which would meet the needs of the disabled child
- help parents implement the programme at home
- utilise support services to aid in diagnosis, planning and implementation of programmes (Thurman & Widerstrom 1990:41)

One of the biggest advantages of the Head Start programme is that it created the "opportunity to investigate the impact of early intervention" (Lerner 1993:257). In a longitudinal study by Lazar & Darlington (1982) the Head Start programme was found to be extremely successful in that "participants were less likely to be placed in special education classes, less likely to be retained and required to repeat a grade, consistently scored higher on intelligence tests, and were more likely to finish high school by the age of 18" (Lerner 1993:257,258).

#### *b High/Scope Perry Preschool Programme*

The Ypsilanti High/Scope programme or the Perry Preschool programme was originally designed for low-income, "at-risk" children but is now being successfully implemented for

"the full range of children" worldwide. (High/Scope Educational Research Foundation: Internet).

The emphasis is on building thinking skills and is based on Piaget's theory of cognitive development (Lerner 1993:267), while the "approach emphasise(s) developmentally appropriate activities and stress(es) the role of students' planning and initiation in their own learning" (Slavin et al 1989:85). This cognitive-developmental perspective is considered to be child-focused, that is, the child is seen to construct knowledge by interacting with people and materials in his environment (Peck et al 1993:89).

The school day comprises of a planning session during which each child is able to select the activities he plans to do during work time; a work session during which these activities are carried out with the support of teachers and peers; a snack time and small group activity; an outdoor activity which usually includes large motor activities and a circle time which includes songs and musical games. This is a programme which can be adapted with equal success to children with or without disabilities (Thurman & Widerstrom 1990:294).

For children with special needs the programme emphasises "the broad cognitive, social, and physical abilities that are important for all children" rather than focusing on the child's deficits. The High/Scope teachers identify where the child is developmentally and "then provide a rich range of experiences that would be appropriate for a normally developing child at that level" (High/Scope Educational Research Foundation: Internet).

Dr Maria Montessori opened her first school in 1907 and published her first book on education, "The Montessori Method" in 1909. Although she originally trained as a doctor of medicine she was ahead of her time in viewing learning problems as pedagogical rather than medical, and was the first to "attempt to equate normally developing intelligence with subnormally developing intelligence" (Curtis & Boultonwood 1975:496,497).

The Montessori method emphasises a carefully organised environment and the teacher's first duty is to provide this. Although its influence is indirect, without it there will be no "effective and permanent results of any kind, physical, intellectual or spiritual" (Montessori 1997:253). An integral part of the environment is the provision of special material designed to give the child practice in a variety of activities. "Through regular, graded use of this didactic material, children are to gain skills of manipulation and judgement through the senses, physical and intellectual development thus being associated throughout" (Curtis & Boultonwood 1975:498).

The classroom is laid out in distinct areas of learning, for example, a practical life area, a sensorial area, and a language area<sup>5</sup> and the teacher's role is seen firstly as that of an observer and then as a guide. She responds to the needs of each child only when asked and demonstrates the correct use of new materials only "when she knows that a child has exhausted all the possibilities of those he was using before" (Montessori 1997:256).

<sup>5</sup> The writer's own observation of a Montessori classroom.

Despite the policy of non-interference, use of apparatus is orderly and structured, the child may only use that material which is designated for free choice and must replace it in the same place and in the same condition in which he found it. Once he has chosen a piece of apparatus to use he "must be willing to continue his work to the end out of respect for the environment and the rules that govern it", he may not hand his material to another child, nor may he take what another is using (Montessori 1996:153).

#### *d Waldorf Preschools*

The first Waldorf school was established in 1919 when Rudolf Steiner, an Austrian philosopher, scientist and artist was asked to start a school for the children of the Waldorf-Astoria cigarette factory in Stuttgart, Germany.

There are now more than 600 independent, private Waldorf schools in over 32 countries throughout the world, South Africa included. Although each school is completely autonomous there are a number of established associations that provide resources and materials and which promote the distinctive Waldorf approach to education by means of, inter alia, conferences and publications.

The stated aim of Waldorf schooling is to educate the whole child and the curriculum was designed by Steiner to be responsive to the developmental phases in childhood and to nurture children's imaginations. As such, the curriculum is broad, balancing academic subjects with practical activities. In the preschool there is no academic content, although pre-academic skills are fostered, and the use of television or computers is actively

discouraged as being detrimental to the child's imagination.

As far as children with learning disabilities are concerned, Waldorf schools hesitate to categorise children but consider that a weakness in one area will be balanced by strengths in another, and that it is "the teacher's job to try to bring the child's whole being into balance." Where necessary the teacher will provide extra assistance to a child who has difficulties in any specific area, or parents may be asked to help (Waldorf Education mailing list:Internet).

#### *e The enrichment curriculum*

The enrichment curriculum has a holistic approach based on the theories of developmental psychology and covers all aspects of child development - physical, emotional, social and cognitive. This curriculum is less formal than many of the programmes designed for use in a preprimary school and relies mainly on the provision of a stimulating environment that encourages exploration and self-discovery. Although a flexible daily programme is prepared, teachers use the children's interests as a basis for informal and incidental learning (Lerner 1993:265,266).

In South Africa, the new Curriculum Framework for Early Childhood Development (Eastern Cape Province 1996) provides for a child-centred and outcomes-based curriculum, where the child is the focus of the learning process and the objectives of the learning process determine the curriculum. Learning should occur informally through the child's own exploration of a structured environment. There is also an emphasis on holistic

development, where all facets of the child's development are catered for. In general then, the guidelines laid down for the drawing up of a preprimary programme in this country are in line with those of the enrichment curriculum described above.

Peck et al (1993:187-205) list the characteristics of a successful integrated programme as an acceptance of diversity, the participation of the community, (and in particular, the parents), and the use of specialised interventions within the normal early childhood classroom situation without disrupting the regular curriculum and routines. Accepting this, and given the support of specialists and the community, and the teacher's understanding of the problem, the needs of preprimars with learning disabilities can be met by the curriculum already in use in most preprimary classrooms with specific, individual intervention given as and when required.

#### *f Audiblox*

Although not an educational programme in the broader sense, a school readiness programme that is rapidly becoming popular in the Eastern Cape Province and which may be incorporated into an existing curriculum, is Audiblox. Developed by Dr Jan Strydom in 1979 initially as a school readiness programme for preprimars, Strydom (1989:4) claims that audiblox have been used successfully to develop learning skills in people of all ages, including those who have learning problems. Although no independent research is available at present, there are a number of case studies which are indicative of the effectiveness of the programme (du Plessis 1994:105-130) and

results of studies which are underway at the Harvest school in Port Elizabeth should soon be available.

The programme which, at preprimary level, involves memorising and building sequences and patterns using coloured blocks, is easy to present to a fairly large group of children at one time and requires only four days of training, covering the theory behind the programme and the technique of presenting it. Audiblox has already been incorporated into a few schools in this Province, while many teachers offer it as an extra mural course. Should research prove it to be effective, it would be an option for preprimary teachers to use as a part of their daily programmes. It should be noted, however, that, while audiblox may be incorporated into an existing curriculum, it should not be seen as an alternative programme.

#### **4.3.2 The role of the teacher in collaboration with parents**

"Parental involvement is essential for any child who is having significant learning problems" (Serfontein 1990:100). This is particularly vital where a learning disabled preprimary is concerned. Where parents are able to be part of the intervention process they gain a greater understanding of the problem and how to handle it and, as a result, family stress is reduced (Lerner 1993:248).

Parents are the primary educators of their children. They know their own children better than anyone else does and can be invaluable in providing information to assist the teacher in understanding the child and assessing his learning problem.

Whereas originally the concept of parental involvement in a child's education programme focused on the educational needs of the child, this focus has now broadened to encompass family support as the primary goal of early intervention; and families' values, interests and priorities as the guiding principle of intervention (Peck et al 1993:65).

This being the case, parents need to be equipped to:

- facilitate learning in the home from infancy
- make informed decisions about early intervention and placement
- participate actively in their children's education by, inter alia, participating in school governance
- set goals for their children despite limitations due to disabilities
- become agents for change in meeting the needs of all children
- participate in teacher development programmes
- organise informal day care centres which provide learning within a safe environment
- gain access to resources
- utilise their knowledge by becoming counsellors to other parents who have children with similar disabilities
- participate in policy development in education (Department of National Education, SA 1997:102)

To achieve this teachers need to include parents in all aspects of the support programme, from the planning process, to involvement in the classroom, to implementing aspects of



the programme in the home situation.

Unfortunately, not all parents are able or willing to involve themselves to this extent and very often their perception of their child's problem differs from that of the teacher. "The teacher's perception of the child emerges from experience with similar and different children, her orientation toward learning disabilities, and observations of the child in the school environment. The parents' perception derives from experiences with the child from infancy across various environmental situations, their orientation toward learning disabilities, experience with the child's siblings, and their stage of adjustment to the child's disability" (Mercer 1991:117). Therefore often "the first step in establishing the foundation for treatment based upon a working parent-professional alliance is reframing parental attitudes" towards their child's problem and the teaching staff (Westman 1990:714).

#### **4.3.3 The role of the teacher in collaboration with specialists**

It is unlikely that teachers would favour a policy of inclusion "which does not focus on their need for support and assistance in the classroom" (Stangvik 1997:4). Related services are essential in assisting the teacher with the education of young disabled learners. In the case of learning disabled preprimars, these include the services of specialists such as occupational and speech therapists, remedial teachers, and school psychologists.

There are a number of factors that hinder the inclusion of learning disabled preprimars into a regular classroom without the support of specialists in the field:

- Often the discrepancy in the skill levels of disabled and typically developing children makes planning meaningful activities for all children difficult (Bailey & Wolery 1984:110).
- Ordinary class teachers are not specifically trained to handle the problems that might arise from having learners with disabilities in their groups and incorrect instruction procedures could compound learning problems.
- Where the class population is too large, it may not be possible to give the learning disabled child the individual attention he needs (Wallace & Kauffman 1986:13).

For these reasons, it is crucial that support personnel be available to assist teachers in planning and developing "strategies and activities to support the inclusion of exceptional students in the regular class (Porter 1997:74). This supportive role should, wherever possible, replace the traditional direct involvement in the routine assessment of individual learners (Department of National Education, SA 1997:97).

Ideally, then, the approach should be interdisciplinary, as close co-operation between the members of the team is essential for the benefit of the child. The teacher, who is in close contact with the child, and who "is in the best position to observe him in a variety of situations.... should....be a valuable member of the team. It is also his responsibility to implement the contributions of the other members in his teaching and to guide the parents so that they are not overwhelmed by the information from the different specialist disciplines" (Du Toit 1991:61). District and community centres, suitably located so that a number of schools would have access to them, could serve as sites for support services. Here the teacher could have access to specialised personnel and facilities. These

support service personnel would work as a team "in the planning and, where appropriate, the practice of services" (Lazarus & Donald 1995:49,50).

Where this type of support system operates there is no doubt that both teacher and child benefit enormously.

#### **4.3.4 The role of the teacher in collaboration with colleagues**

Even where the teacher is fortunate enough to have the full support of a group of specialists, the opportunity to discuss problems with a colleague who knows and understands both the child and the circumstances is invaluable. Where the preprimary has moved from another preprimary school his "former teachers may be able to describe interventions that they have found effective for similar problems" (Lewis & Doorlag 1995:41). Other teachers at the same school, on the other hand, are able to share their experiences and their observations of the learner and work together to devise strategies to assist him to cope in the preprimary school environment.

In the model for service delivery recommended in the NCSNET/NCESS Report (Department of National Education, SA 1997:v,67) colleagues form the basis of a Centre-of-learning based team which also draws on community resources and specialists to provide a support structure to meet the needs of both the learners and the teachers.

In a survey by Ammer (Mercer 1991:190) teachers reported that a lack of communication among teachers is a "serious hindrance" to successfully including children with disabilities in a regular classroom.

#### **4.3.5 The role of the teacher in collaboration with the community**

"Provision of support for class teachers engaged in inclusive education is not exclusively the province of professions" (Labon 1997:92). "Any form of intervention that excludes members of a family and the community at large seems to be ineffective in the rural areas of South Africa" (Sibaya 1996:88). Although the close community ties of the rural areas are not as evident in the towns and cities, even in urban areas the child must be seen as a product of his environment (section 1.3.2.7).

Community centres housing "general curriculum resources, personnel and functions where the practicality of sharing might equally operate", such as library facilities and in-service training centres could serve as "a logical and practical site for community involvement" (Lazarus & Donald 1995:49). In addition, various organisations, particularly service organisations such as Rotary, special schools, NGO's, the private sector and communities can together form an effective support base for the teacher and provide opportunities for the sharing of resources and skills (Eastern Cape Province 1996:18).

#### **4.4 TEACHER TRAINING**

In the preceding chapters a thorough knowledge of child development was seen as

crucial to the understanding of the development and needs of the learning disabled child (section 2.5). The study of child development should, and usually does, form a large section of any education diploma course. Anastasiouw (Mercer 1991:342) gives the following recommendation regarding training teachers to work with children with disabilities: "place a stronger emphasis on normal child growth and development, including a perspective on how the environment influences growth".

The teacher's training should, however, also include an understanding of the importance of early identification and intervention; the most important causes and manifestations of learning disabilities; methods of identification, including screening tests and informal observation and information gathering; and "the basic principles and possible forms of assistance." (Du Toit 1991:76).

Knowledge of the characteristics of a learning disabled preprimar does not, in itself, "provide the teacher with the tools needed to effectively teach children who do not learn typically" (Rose & Smith 1993:60). In order to utilise the knowledge the teacher's training should equip her with the following skills:

- the ability to formulate objectives and devise strategies for intervention
- the ability to intervene effectively and evaluate the effects of the intervention (Du Toit 1991:76)

In addition, teacher training should not only "include direct work with a wide range of professionals (i.e. more multidisciplinary training experiences)" but should also prepare

teachers to communicate effectively with parents. (Mercer 1991:342).

Researchers found that teachers with integrated groups who had access to inservice workshops were far more confident of their ability to manage disabled children. (Siegel & Gold 1982:329). In fact, Burden, (1995: 20,27) emphasises that both inservice training and ongoing retraining is of paramount importance where children with disabilities are included in regular schools.

The Curriculum Framework for Early Childhood Development (Eastern Cape Province 1996:16,18) acknowledges this need, stating that "courses should equip teachers to teach in a variety of circumstances, for example, children with disabilities...." and that "training providers should develop courses to equip teacher/practitioners with information and skills required to manage an effective programme of inclusion".

#### **4.5 CONCLUSION**

An international trend towards the appreciation of and respect for diversification in society, which became apparent during the World Conference on Education for All in Thailand in 1990, has brought about a major paradigm shift in education as a whole (Department of National Education, SA 1997:48). The logical foundation for a truly inclusive society, must be unfettered access to education for all its children.

This chapter has looked at the philosophy of inclusion with particular reference to the way in which it will impact on the teacher's role in the classroom. A number of programmes

which have been successfully used in the education of both typically developing and learning disabled preprimars have been examined and in the light of research on these programmes it has become clear that, while no major restructuring of the preprimary curriculum would be necessary to accommodate all children in a regular preprimary classroom, the existing curriculum can be adapted to the needs of each preprimar.

In addition, the need for adequate support in the form of collaboration with specialists, parents, colleagues and the community was considered, particularly as teacher training programmes have proved to be inadequate in providing teachers with the knowledge required to meet the needs of learners with disabilities in their classrooms.

This chapter concludes the literature study. In the next chapter the results of the questionnaire will be analysed.

## **CHAPTER FIVE**

### **Empirical Study**

#### **5.1 INTRODUCTION**

The research methods adopted for the purpose of this dissertation consist of a literature study and an empirical survey. Chapters 2 to 4 cover the results of the literature study. In this chapter the response to the questionnaire will be analysed in order to ascertain the preprimary teachers' perceptions of their role in educating learners with learning disabilities.

#### **5.2 GENERAL AIM OF THE STUDY**

From the results of the literature study the following general aim of the dissertation was formulated:

to identify the role which preprimary teachers can play in recognising and assisting young children with learning disabilities and to indicate the areas where assistance and support are required, both in teacher training and in the preprimary classroom.

Through the literature survey and the questionnaire that was based on it, it also became clear that there were five main areas of concern regarding the teachers' role in educating



learners with learning disabilities:

- whether it is possible for a preprimary teacher to identify the characteristics and needs of a child with learning disabilities
- whether it is possible to plan and carry out specialised strategies within the school curriculum to meet the learning needs of these children
- whether support services are available both to teacher and child
- what problems may be encountered in the interaction of learners with learning disabilities and those without
- whether the teachers' training is adequate to equip her for the task of educating learners with learning disabilities in the preprimary school

From these five general areas of concern the following aspects were then formulated as the objectives of the questionnaire:

- identification
- support/assistance
- training

### **5.3 RESEARCH METHOD**

Although, wherever possible, South African sources were used, most of the information acquired from the literature study was, of necessity, based on overseas research.

Therefore, in order to assess the situation in preprimary schools in South Africa, and, in particular, in the Eastern Cape, seventy questionnaires were sent out to preprimary schools and primary schools with preprimary classes in Port Elizabeth, Grahamstown, Port Alfred, East London, and a number of the smaller inland towns such as Barkley East, Elliot and Adelaide. In many cases these were followed up by means of telephone calls. In addition discussions were held with a number of officials from the Eastern Cape Education Department, particularly those involved in education for Children with Special Needs; and with preprimary principals and teachers from the East London district.

The criteria used in selecting teachers for this study were a professional qualification in preprimary education, that is, at least a three-year teachers' diploma, experience teaching a preprimary class and the school's situation in the Eastern Cape.

As stated in section 1.4.3.2, the Eastern Cape was chosen for purely practical reasons, as this researcher has many contacts in the preprimary field in this area and was therefore able to communicate personally with many of the respondents to the questionnaire. In addition, the Eastern Cape is acknowledged as one of the most deprived provinces in the country and therefore the teachers face problems in overcoming previous disadvantages as well as existing conditions peculiar to this area. These include the isolation some of the schools experience and the subsequent lack of support systems.

## **5.4 ADMINISTERING THE QUESTIONNAIRE**

Sixty percent of the questionnaires were completed and returned and the results were summarised according to the objectives of the exercise as stated in section 5.2, under the headings identification, support and training. As a number of the questions allowed for multiple answers, the figures, given as a percentage of the respondents, rounded off to 0.5%, do not necessarily total one hundred percent.

### **5.4.1 Identification**

Questions 1 to 5 cover the aspect of early identification: whether it is possible to reliably identify a learning disabled child at preprimary level; whether the teachers concerned had, in fact, had preprimars with learning disabilities in their group over the past five years; who had initially identified the children as learning disabled; how the learning disability was identified; and what characteristics were manifested.

*Question 1: Is it possible to reliably identify a learning disabled child at preprimary level?*

- Seventy eight point five percent of the respondents replied that it is possible to reliably identify a learning disabled child at preprimary level.
- Twenty one point five percent felt it was not possible.

*Question 2: Have you had any learning disabled children in your group over the past one to five years?*

- Ninety eight percent stated that they had had children with learning disabilities in their groups over the past one to five years.
- Two percent had never had a child assessed as learning disabled.

*Question 3: In most cases who initially identified the child(ren) as learning disabled?*

- Seventy eight percent of the respondents replied that they had initially identified most of the children as learning disabled themselves.
- Twenty four percent replied that other teachers had initially identified most of the children.
- Twelve percent said that parents had initially identified their own children.
- Two percent replied that a medical doctor had initially identified most of the children as learning disabled.
- Seventeen percent replied that a psychologist had initially identified most of the children.
- Other therapists or groups of therapists specified as having initially identified a child as learning disabled were:
  - Occupational therapist (14%)
  - Speech therapist (7%)
  - Remedial teacher (5%)
  - School clinic (2%)

*Question 4: In most cases how was the learning disability identified?*

- Eighty percent replied that the learning disability was initially identified through routine observation by the teacher.
- Seventy three percent replied that the learning disability was initially identified through assessment technique by the teacher.
- Fifteen percent replied that the learning disability was initially identified through a doctor's examination.
- Seven percent cited clinical testing, parent's observation or experience i.e. "gut feeling".

*Question 5: The following are some of the most frequently cited characteristics of learning disabled children. Please indicate, from your own experience, the occurrence of each manifestation.*

This question covered the most frequently cited characteristics of learners with learning disabilities. The replies indicated the occurrence of each manifestation under the headings, often, sometimes, and never.

	<u>Often</u>	<u>sometimes</u>	<u>never</u>
• Hyperactivity	32%	59%	5%
• Perceptual-motor impairments	61%	37%	

• Emotional lability	29%	56%	
• Clumsiness	32%	46%	7%
• Attention disorders	78%	17%	
• Impulsivity	39%	49%	5%
• Memory or thinking disorders	37%	51%	2%
• Disorders in comprehending spoken language	32%	46%	15%

Teachers were also asked to specify additional characteristics that, according to their own experience, were an indication of possible learning disabilities. They cited the following:

Loudness, aggressiveness, slowness, lack of communication, abnormal behaviour, inability to express themselves, persistent inability or unwillingness to conform within the group context, lack of co-ordination, lack of muscle control and muscle tone, language disability, poor social development, general immaturity, non-participation (refusal to do certain activities), poor auditory sequential memory, poor auditory-perceptual skills, and inconsistent performance.

### **Summary**

From the responses to the first five questions it became clear that the majority of teachers agreed that it was possible to identify a child as learning disabled in preprimary school. It is interesting to note that even those teachers who responded negatively to the first question affirmed that they had had children with learning disabilities in their groups. Only one teacher had never had to deal with a learner with a learning disability and she had

stated that it was possible to identify such a child.

The majority of children were identified in the first instance by a teacher during the course of a routine assessment, and many of the teachers indicated that their knowledge of developmental norms enabled them to recognise the significance of deviations from the pattern of development (see section 2.5). Two of the motivations for a positive reply to question 1 were: "We know what the 'normal' (age appropriate) level should be at his/her age and can, therefore, see that full development has not taken place." And "There are specific symptoms and behaviour patterns which are not part of the usual developmental profile...". However, despite the fact that most of the children were identified by their teachers, twenty two percent of the respondents expressed a need for more scientific testing and/or specialist confirmation.

While hyperactivity, which is a typical manifestation of learning disabilities at preprimary level, was said to occur often by thirty percent of the respondents, the manifestations that were cited as occurring most frequently were perceptual-motor impairments and attention disorders. The frequency of perceptual-motor problems could explain why the occupational therapist is referred to so often (see Questions 6 & 8).

#### **5.4.2 Support and assistance**

Questions 6 to 10 covered the aspect of educational support for the teachers that would equip them to assist the learners in their care. This included the need for and availability of support systems and specific problems that the teachers encountered in their groups

for which they would require assistance. It also included the teachers' collaboration with parents, colleagues and the community as a whole.

*Question 6: If identified by the teacher were these children referred for formal assessment and if so, to whom?*

- Twenty two percent of the respondents replied that most of the children identified were referred to a medical doctor for formal assessment.
- Ten percent replied that most were referred to a university clinic.
- Sixty three percent replied that most were referred to a school clinic.
- Twenty two percent replied that most were referred to a private educational psychologist.
- Fifty six percent replied that most were referred to an occupational therapist.
- Other specialists or groups of specialists specified were:
  - Neurologist (7%)
  - Speech therapist (27%)
  - Remedial teacher (5%)
  - Paediatrician (2%)
  - Physiotherapist (2%)
  - Eye/hearing tests (2%)
  - Cape Receife school (2%)



Where children were not referred the following reasons were given:

- Parents uncooperative.
- Too expensive for some income groups.
- Child already undergoing treatment.

*Question 7: Did you carry out any specific strategies during school hours to assist the child? If you did, describe briefly the strategies you used, if not explain why not. Did you devise the strategies yourself and if not, who assisted you?*

- Fifty one percent of the respondents had carried out specific strategies during the school day to assist the child.

Those who answered yes included the following:

- Twenty nine percent used programmes supplied by educational psychologists or occupational therapists.
- Nine percent used specific strategies such as perceptual training, gross motor exercises, and language development.
- Fourteen percent made use of specific games and activities on a one to one basis.
- Twenty nine percent adapted the daily programme.
- Nineteen percent said their intervention was informal, unstructured and consisted mainly of extra attention paid to the child with the learning disability.

Those teachers who did not use any specific strategies gave their reasons as

- lack of support or training (30%)
- lack of time or groups too large (55%)
- daily programme sufficient to assist these children (15%)
- child only initially identified at the end of the school year (10%)

*Question 8: Did you collaborate with a specialist support group such as occupational therapists, psychologists, school clinic, or doctors?*

*If so, please indicate who provided support and what form it took.*

- Eighty eight percent of the respondents had received some form of specialist support.
- Twelve percent received no support at all.

Those teachers who had collaborated with a specialist support group indicated who provided support and what form the support took.

- Thirty nine percent of the teachers who responded to the questionnaire received most of their support from the school clinic.
- Twelve percent of the respondents received most of their support from medical doctors.
- Twenty percent received most of their support from a psychologist.
- Sixty one percent received most of their support from an occupational therapist.

- Other specialists specified by the respondents were speech therapists (19%), remedial teachers (7%), and a remedial clinic (2%).

The type of support given varied according to the specialist or group of specialists. The figures given are a percentage of the respondents who received assistance from the specialists indicated. As more than one form of support may have been given, these figures, too, need not necessarily total one hundred percent.

The school clinic provided assistance in the form of:

- testing, evaluation and assessment (53%)
- report back (6%)
- advice or information (12.5%)
- programmes provided (3%)
- deferment of compulsory schooling (3%)
- once a week therapy (3%)

One teacher was told that the clinic would only provide support after the child entered formal schooling and another found the clinic "very unhelpful".

Doctors provided assistance in the form of:

- physical examination (18%)
- report back (36%)

- advice or information (3%)
- referrals to other specialists (1%)
- medication (18%)

One teacher referred the child to the doctor for medical aid purposes and another was told that the doctor was unable to ascertain the problem.

Psychologists provided support in the following ways:

- testing, evaluation and assessment (23%)
- report back (32%)
- advice or information (23%)
- advice or counselling for the parents (1%)
- referral to other specialists (.5%)

One teacher was advised that the child was uneducable.

Occupational therapists provided support in the following ways:

- testing, evaluation and assessment (36%)
- report back (21%)
- advice or information (32%)
- therapy (39%)
- classroom visit (0.5%)

One teacher replied that she seldom received a good follow-up.

Where no support was given the following reasons were cited:

- Parents have no medical aid and cannot afford specialists.
- The assessment by the teacher was often queried.
- The school clinic was too busy to handle preprimars.
- There was no support system in the area.
- Specialists gave no feed back.

*Question 9: Did you collaborate with parents, other teachers or the community?*

*If so, please indicate what form the collaboration took. If not, please give reasons.*

#### **(1) Collaborating with parents**

- Sixty four percent of the teachers who responded to the questionnaire replied that they had collaborated with the parents of preprimars with learning disabilities.
- Thirty six percent had not collaborated with the parents.

Of those who stated that they had collaborated with the parents, thirty three percent had actually interacted closely with the parents, sharing ideas for handling problems, encouraging parents to help in the classroom and making home visits to help parents implement problem solving techniques at home.

Sixty six percent stated that they collaborated with parents but their interaction took the form of informing parents of the possibility of a learning disability and advising them to consult a specialist.

Those who did not collaborate with parents gave the following reasons, (as more than one reason was given, percentages will not total one hundred percent):

- parents working (45%)
- parents would not accept that there was a problem (27%)
- parents often do not attend meetings (42%)
- parents would not divulge the specialists report to the teacher (6%).

## **(2) Collaborating with colleagues**

- Seventy eight point five percent of teachers collaborated with colleagues.
- Twenty one point five percent did not collaborate with colleagues.

All those who collaborated taught at schools with more than one preprimary class. The collaboration took the form of weekly meetings, informal discussions, sharing of ideas, joint decision making and practical assistance, particularly with a learning disabled child who also manifested severe emotional problems. One teacher stated that everyone in the school became involved in assisting the child, even the domestic staff.

Those who did not collaborate with colleagues cited as their reason that they taught in a single class preprimary school or in a single preprimary class in a primary school.

### **(3) Collaboration with the community**

In answer to the question on collaboration with the community, general community involvement was high – eighty percent - and included taking part in community festivals, visiting senior citizens and inviting them to functions at the school and receiving assistance from service organisations.

As far as collaboration with the community specifically for the assistance of preprimars with learning disabilities was concerned, however, no involvement was cited.

Twenty percent of the teachers who answered this section of the question claimed no community involvement of any description.

*Question 10: Please indicate any specific problems you have experienced with learning disabled children in your group.*

The following specific problems were experienced by teachers with learners with learning disabilities in their groups:

- rejection by peers – often: twenty four percent, sometimes: fifty one percent, never: twenty five percent

- aggression – often: forty nine percent, sometimes: thirty nine percent, never: twelve percent
- disruption – often: sixty three point five percent, sometimes: twenty two percent, never: fourteen point five percent
- disobedience – often: forty six point five percent, sometimes: thirty six point five percent, never: seventeen percent

Other problems experienced by teachers included:

Withdrawal (7%), reluctance to attend school/avoidance of activities (7%), poor self-image (12%), and slowness, loudness, sulking, frustration, insecurity, clowning, destructiveness, dislike for changes in routine, mothering by peers, attention seeking, wandering away from the group, poor socialisation skills, strong reliance on one friend, (all 2%).

### ***Summary***

It is interesting to note that the occupational therapist is the specialist to whom the children are most often referred. This is very likely due to the high percentage of learners who displayed perceptual motor disorders, one of the characteristics of children with learning disabilities that is easily identifiable in preprimars (section 4.2.1).

Less than half of any of the specialists to whom the children were referred reported back to the teachers or provided any form of advice or information. Also noteworthy is the fact that only one specialist made a classroom visit. The emphasis in each case was on



assessing the child rather than assisting the teacher.

The list of specific problems encountered by the teachers as a direct result of introducing a learner with learning disabilities into their classrooms indicate very clearly the need for specialist support and assistance in dealing with difficult situations.

#### **5.4.3 Teacher training**

*Question 11: Do you regard it as necessary for preprimary teachers to be trained to equip them to assist a child with learning disabilities; has your training, in fact, equipped you to do so; and what aspects of your training has been most beneficial?*

- Ninety five percent of the teachers responding to the questionnaire regarded it as necessary for preprimary training to equip teachers to assist a child with learning disabilities.

Of those who regarded training necessary:

- Thirty three percent felt that their training had equipped them sufficiently to assist a child with learning disabilities.

Those who felt that their training had been adequate cited the following as particularly beneficial in equipping them for the task of assisting a child with learning disabilities:

- training and experience (31%)
- orthodidactics (31%)
- pedagogics (15%)
- psychology (15%)
- musiekbeluistering (7.5%)
- fourth year - learning disabilities (7.5%)
- remedial teaching (additional diploma) - (23%)
- special class training (additional) - (7.5%)

Those teachers who responded negatively indicated the following gaps in their training:

- inability to assist the child or draw up strategies for assisting him (38.5%)
- inability to identify the problem accurately, need more comprehensive evaluation methods (50%)
- lack of depth in training on disabilities (11.5%)

*Question 12: Should learners with learning disabilities be included in a regular preprimary group?*

This final question was asked in the light of the teachers' response to the aspects of identification, support and training. Seventy nine percent of the respondents answered yes, for the following reasons:

- The child with learning disabilities is "normal" in most aspects and benefits from the

stimulation of a regular preprimary.

- He learns from other children.
- Other children learn from him.
- He needs the acceptance of his peers.
- There are few special schools for learning disabled children.

Those who gave a qualified assent gave their reasons as:

- It would depend on the severity of the disability.
- There is a need for properly trained and experienced teachers.

The teachers who were against inclusion gave the following reasons:

- the learning disabled child needs individual attention - not enough time
- he is disruptive, needs a specialised environment
- negative influence on other children
- wasting their time, as they cannot achieve success

### ***Summary***

Although almost all of the teachers agreed on the necessity for preprimary training to equip them for assisting children with learning disabilities, only thirty three percent felt that their training had been effective in this area.

Thirty one percent of those who responded positively to this question mentioned additional remedial diplomas and training in special class teaching as the aspects of their training which were particularly beneficial in equipping them to assist a child with learning disabilities. Unfortunately, this specialised training is not part of the normal preprimary training programme.

Twenty six percent of those who responded to this question, whether positively or negatively, noted that, although they felt their training enabled them to identify a problem, professional assistance in dealing with the problem was still required.

The response to this section of the questionnaire indicates that, although many teachers are confident that they are able to recognise a problem, there is a definite need for more in-depth training to enable them to implement successful strategies in order to assist the preprimar with a learning disability.

Despite this, the majority of teachers responding to the questionnaire are in favour of including learning disabled preprimars in a regular preprimary classroom.

#### **5.4 CONCLUSION**

The results of the empirical study reveal that the majority of the preprimary teachers who responded to the questionnaire were confident that they were able to recognise, and to a large extent, identify a learning problem in a preprimar. However, they were far less sure

of their ability to carry out specialised strategies to assist the preprimar with a learning disability.

In addition to the learning disabilities themselves, they had also encountered many of the problems associated with integrating children with learning disabilities and those without. They plainly felt a need for the support of specialists but, with few exceptions, this was not forthcoming. Many of the specialists consulted dealt with the child's needs but not in the context of the classroom situation and did not offer any practical help to the teacher. The tendency in almost all of the situations enumerated was to send the child to a specialist for a formal assessment in which case the specialist dealt directly with the child and the teacher was left out of the equation. There was little or no collaboration between teacher and specialist.

Collaboration with colleagues appeared to take place on an informal basis in most of the schools, but there was little evidence of a collaborative partnership between teacher and parents. In most cases communication consisted of an exchange of information only.

Although many of the teachers initially claimed that there was little community involvement in the schools, in fact a number of local organisations, both municipal and private had some input into the schools in their areas. Although this input was not necessarily directed at the needs of preprimars with learning disabilities, it nevertheless benefited all the children at the school.

It is also evident that the teachers felt strongly that their training had not been sufficient to

enable them to offer any sort of meaningful support to the learning disabled preprimars in their care.

However, despite obvious feelings of inadequacy the majority of the respondents viewed inclusion in a positive light.

In the next chapter the results of both the literature and the empirical studies will be examined and in the light of these results the role of the preprimary teacher in the education of the learning disabled preprimar will be considered.

## CHAPTER SIX

### Summary of Findings

#### 6.1 INTRODUCTION

There is a general consensus amongst educational researchers that early intervention yields results (section 1.3.1.1). Accepting this, the question, stated in Chapter 1 of this dissertation, put by most teachers faced with learning disabled preprimars in their preprimary group still stands - teachers need to know how to assist these children.

Most of the respondents to the questionnaire, while feeling it necessary to include learning disabled children in a regular preprimary environment were very aware of their limitations (section 5.4.3.1). One teacher who has worked with these children in her group stated that she felt that "the child did not benefit through my inability to provide the correct stimulus and programme."<sup>6</sup>

The questions on which this dissertation was based, and which formed the framework for the study were:

- whether a preprimary teacher could identify a preprimar as learning disabled
- whether she was able to assist a learning disabled preprimar in the classroom and what support was available to her

<sup>6</sup> Comment on the questionnaire

- whether her training was sufficient to enable her to do so (section 1.4.1)

In the following paragraphs, in the light of both the literature study and the empirical research, the role of the teacher in identifying preprimars with learning disabilities will be discussed, the availability of support systems and the teachers' role in providing a learning environment which would benefit both learning disabled and "normal" preprimars will be examined, and the existing training offered to preprimary teachers will be critically assessed.

## **6.2 THE ROLE OF THE TEACHER IN THE IDENTIFICATION OF LEARNING DISABILITIES IN PREPRIMARS**

### **6.2.1 The literature study**

Despite the problems inherent in early identification (section 3.6.1), most researchers concede that not only is it possible to identify learning disabilities in preprimars, but that the earlier identification and intervention take place, the better (section 3.6.2).

The importance of a thorough knowledge of the typical development of a child in order to recognise deviations from the norm was also clearly indicated in the literature study (section 2.1). Equally important for identification is the teacher's familiarity with the manifestations of learning disabilities (section 3.6).



In order to carry out their roles, teachers need to be able to assess the capabilities of the children in their group and to use the information acquired to provide strategies that meet the needs of every child.

The methods of assessment most frequently used by preprimary teachers are informal identification procedures such as observation, parent interviews and the use of rating scales. These methods have been shown to be very effective in identifying a child with a learning disability (section 3.6.3).

### **6.2.2 The empirical study**

The method of identification used by the teachers who responded to the questionnaire (question 4) consisted of "evaluation and constant assessment of children daily in all areas of development."<sup>7</sup> Most of the teachers in the Eastern Cape, especially those whose schools fell under the old Cape Education Department, use *Know Your Child* (Deetlefs & Kemp 1988) as the basis for their assessment programme.

Seven percent cited experience, or a "gut" feeling as an important aspect of their assessment - "the experienced, qualified teacher is able to diagnose problem areas", and "teaching experience plays a large part in identifying the problem".<sup>7</sup>

However, despite the fact that the majority of the preprimars with learning disabilities in

<sup>7</sup> Comment on the questionnaire

their groups were initially identified by the teacher (80%), either during routine observations or by directed assessment, many teachers (22%) expressed a need for more scientific methods of testing the children.

### **6.2.3 Conclusion**

The effectiveness of teacher observation and assessment is evident in both the literature and the empirical studies. However, teachers lack confidence in their ability to accurately assess the presence of a learning disability. The perceived need for more comprehensive and scientific testing and the assumption that they lack "efficient observation and evaluation methods"<sup>8</sup> reflects more on the influence of the traditional medical approach to learning disabilities (section 1.3.3.1) than on a lack of training in this area.

## **6.3 THE ROLE OF THE TEACHER IN ASSISTING THE PREPRIMAR WITH LEARNING DISABILITIES**

### **6.3.1 The role of the teacher in the classroom**

#### **6.3.1.1 *The literature study***

The teacher's attitude towards and her acceptance of the philosophy of inclusion will to a large extent affect her perception of her role in an integrated classroom. The literature

<sup>8</sup> Comment on questionnaire

study shows that, although inclusive education has gained worldwide acceptance, the practical implementation varies considerably (section 4.2).

Ironically, both the benefits and the drawbacks of integrated classrooms are most evident in the social and emotional development of the learning disabled preprimar, with the acquisition of social skills being one of the main advantages (section 4.2.1.1), and rejection by peers, due, in part, to unacceptable behaviour (section 4.2.1.2) being a serious disadvantage. This has important implications for a teacher who is attempting to provide a fully integrated educational environment.

As far as the organisation of her classroom is concerned, the literature study indicates that the teacher's role is twofold. Firstly it entails careful planning of the environment, providing areas of learning covering all aspects of the child's development. This includes the choice of appropriate material.

Secondly her role requires the planning of activities which will be appropriate for both the learning disabled and the typically developing preprimars in her group. An integral part of this planning is devising strategies for intervention which will meet the needs of the learning disabled preprimars without compromising the needs of the rest of the group (section 4.3.1).

It is noteworthy that most of the programmes examined in the literature study (section 4.3.1.1) have a low teacher/pupil ratio which makes it possible for the teacher to devote more of her time to dealing with the individual needs of her pupils.

### 6.3.1.2 *The empirical study*

Many of the teachers (79%) who responded positively to the question on inclusion in the questionnaire (question 12) agreed that the preprimar with learning disabilities is "normal except that he is under-achieving in one or more areas"<sup>9</sup> and benefits from the stimulation of a regular preprimary school. One teacher stated that "they are 'normal' happy children who have a disability and should not be made to feel different from the other children".<sup>9</sup>

As in the literature study, there was also a strong feeling that these children need to experience the acceptance of their peers and should not be made to feel "isolated from 'normal' society". "The learning disabled child often knows that he is different and needs the acceptance of his peers to make him feel secure and loved".<sup>9</sup>

Teachers felt, too, that "children learn a great deal from each other". For preprimars with learning disabilities, seeing 'normal' children working and playing together "help them to a greater awareness of acceptable behaviour", and for the other children, "they take their cue from their teacher and learn how to accept and assist those who have difficulty in one or more areas".<sup>9</sup>

One teacher stated that, as "there is no pressure or competition at this level.. the child benefits from contact with others and the stimulation on the social and cognitive levels

<sup>9</sup> Comment on the questionnaire

which they offer"<sup>10</sup>.

The findings of the empirical survey concurred with that of the literature study in that some teachers found that peer acceptance did not always occur spontaneously. One teacher remarked about a child with a learning problem in her group that "omdat kleuters hom anders ervaar en anders behandel, ontdek hy gou dat hy anders is en beleef dit as 'n negatiewe selfbeeld".<sup>10</sup>

Teachers also found that many of the manifestations of learning disabled children, in particular those related to their behaviour, hindered the integration of learning disabled preprimars into a regular preprimary group.

Those teachers who felt that learning disabled children should not be included in a regular preprimary group (21%) cited disruptiveness and the negative influence on other children in the group among their reasons. They also felt that the learning disabled child needed individual attention which they were not able to provide in the time available to them.

Approximately half of the teachers answering the questionnaire (51%) carry out specific strategies to assist the learning disabled preprimars in their classrooms. These include programmes supplied by educational psychologists or occupational therapists and specific games or activities initiated by the teacher carried out with the child on a one to one basis. However, many take the form of activity-based intervention during the school

<sup>10</sup> Comment on the questionnaire

day and an adaptation of the normal daily programme to include the needs of all the children.

Most of the respondents (85%) who made no alteration to their programme cited lack of support, lack of time, or too large a group as their reasons, but some (15%) felt that the daily programme was, in itself, sufficient to assist the learning disabled children.

#### **6.3.1.3 Conclusion**

In the literature and the empirical study the social development was cited as the area in which most benefit is attained both by typically developing children and by their learning disabled peers. However, there is a danger that the reverse could also hold true. The teacher's attitude towards an inclusive education environment in general and the learning disabled preprimary in particular is crucial in this regard as children frequently take their cue from their teacher.

In the empirical study the teachers saw the biggest disadvantage of integration as being disorders in the child's social and emotional development leading to inappropriate behaviour which could have a disruptive effect on the group and/or a negative influence on the other members of the group. However, many of these social and behavioural problems can be overcome by early identification and intervention (section 1.3.1.1).

Most studies of inclusive programmes have focused on the needs of children with disabilities and have indicated that, given an appropriately structured educational

programme, these children do benefit from being included with their normally developing peers (section 4.2.1.1). While these findings do not nullify the very real problems faced by teachers attempting to teach an inclusive group of preprimars, they do suggest that the benefits to all children outweigh the disadvantages.

In attempting to include children with learning disabilities fully into the preprimary environment it is important to provide specialised assistance and a structured programme to meet their specific needs (section 4.3.1).

### **6.3.2 The teachers' role in collaboration with parents**

#### **6.3.2.1 *The literature study***

The importance of parental involvement in their children's education has been emphasised in the literature study, in particular with regard to the new trend towards a holistic approach to education as a whole and towards the education of children with disabilities in particular. The link between home and school has always been a focus of preprimary teaching and research has shown that when a preprimar has a disability parents should be involved in every aspect of early intervention. The parent's resultant understanding of the problems involved and knowledge of how best to handle them not only benefits the preprimar but also reduces the stress experienced by the whole family (section 4.3.1).

The teacher plays a vital role in this process by building a relationship with the parents,

helping them to come to terms with their child's problem, to understand the implications and to learn how to handle it.

She does this by involving parents in the assessment process, mediating between parents and specialists, and helping them to implement intervention strategies at home, where necessary making home visits to assist them (section 4.3.2).

#### 6.3.2.2 *The empirical study*

Although most of the teachers in the empirical study (64%) agreed that it was important to involve parents in their children's education and considered that they had done so, few (36%) had, in fact, made any real attempt to encourage this involvement (question 9(1)).

Parents were often involved at the outset, a number of teachers (12%) saying that parents had already suspected a problem with their child before the teacher discussed her observations with them. One teacher stated "every time I approach parents they express that they are worried and have suspected shortcomings"<sup>11</sup> (question 9(1)). However, some (27%) were reluctant to accept the existence of a learning disability.

Many teachers found that "parents were uncooperative and (did) not believe that the child (had) a problem", that they were "unwilling to co-operate" and assumed an attitude of "denial",<sup>11</sup> and that they did not follow up advice given by the school clinic (5.4.2.4).

<sup>11</sup> Comment on the questionnaire



Only two teachers spoke specifically of working with parents, having designed specific strategies to guide parents and suggested activities to be used at home to develop fine-motor co-ordination and language and to improve parent/child bonding.

One teacher stated that "ouers moet ook meer ingelig word om sulke gestremhede te kan ondersteun in samewerking met die onderwyser"<sup>12</sup>.

### *6.3.2.3 Conclusion*

The importance of parental involvement, which emerged from the literature study, was not echoed in the empirical survey. Although most of the teachers (64%) claimed to collaborate with the parents, few (6%) did more than inform the parents of the learning problem and refer them to specialists.

## **6.3.3 The teachers' role in collaboration with specialists**

### *6.3.3.1 The literature study*

The literature study shows that it is not only advisable but also crucial that teachers have access to support personnel to enable them to teach effectively in an integrated classroom. The emphasis is no longer on specialists diagnosing and treating learning disabled preprimars (section 1.3.2.2), instead the support provided should include assisting the teacher in planning intervention strategies and in handling problems which

<sup>12</sup> Comment on the questionnaire

might arise from the inclusion of learning disabled preprimars in a regular preprimary group (section 4.3.3).

#### 6.3.3.2 *The empirical study*

Unfortunately support is not always available to the teacher, especially in the rural areas where there is little access to any support systems.

Although many of the teachers answering the questionnaire (88%) reported feedback and a certain amount of assistance from specialists, typical comments from those who felt that such support was lacking were that:

- parents have no medical aid and therefore cannot afford specialists
- support was not given directly to the school but through the parents: "if we needed support the parents had to make special appointments to visit the specific groups"<sup>13</sup>
- assessment by the teacher was often queried or disregarded
- the school clinic was too busy to handle preprimary children
- there were no support systems in the area
- no feed back was given by specialists

The teachers felt that "preprimaries should have easier access to O.T.'s or psychologists"<sup>13</sup>.

<sup>13</sup> Comment on the questionnaire

#### **6.3.3.3 Conclusion**

Both the literature and the empirical studies emphasised the need for specialised support for teachers in an inclusive educational setting. However, where support was available this appeared to be of the "top-down" variety. Instead of being part of a support team teachers, at best, received a report back from specialists and, at worst, had no feed back at all. Specialist intervention took place between specialist and child instead of offering support and guidance to enhance the teacher's intervention strategies.

#### **6.3.4 The role of the preprimary teacher in collaboration with other teachers**

##### **6.3.4.1 *The literature study***

The literature study indicates that colleagues are able to offer support, encouragement and practical assistance in planning and carrying out intervention strategies for learning disabled preprimars (section 4.3.4).

##### **6.3.4.2 *The empirical study***

Without exception, those teachers who taught in a school with more than one preprimary class (78.5%), collaborated with their colleagues at school in planning strategies to assist the learning disabled preprimars in their groups. Those teachers who did not collaborate

with colleagues stated that they felt "isolated" and that it was "very difficult" <sup>14</sup> to cope on their own (question 9(2)).

#### **6.3.4.3 Conclusion**

Both the literature and the empirical studies revealed the importance of the support and assistance of colleagues in successfully integrating learning disabled preprimars in a regular preprimary group.

### **6.3.5 The role of the preprimary teacher in collaboration with the community**

#### **6.3.5.1 The literature study**

In keeping with the ecological approach to education (section 1.3.2.2) the child has to be seen in the context of his environment. On this basis the literature study emphasises the importance of community support and involvement (section 4.3.5). Various organisations, both religious and secular, municipal establishments such as libraries and museums and the private sector could together form a support base and provide the teacher with the necessary resources to enable her to assist the learning disabled child.

#### **6.3.5.2 The empirical study**

Although the empirical study indicated a large amount of community involvement in

<sup>14</sup> Communicated directly to the writer

general (80%), for example, music teachers drawn from the community, visits to the museum, zoo and various businesses or farms in the particular school's environment, visits from the school nurse, organisations such as the Round Table putting up fences and equipment, and adopting "grannies" from old age homes, there appears to be little or no support available to teachers to aid them in the specific task of assisting learning disabled preprimars.

#### **6.3.5.3 Conclusion**

The need for community involvement, which is indicated in the literature study, is met in a large majority of the schools polled. However, the involvement is non-specific and generally initiated by the schools themselves. There is a very real need for the community to actively support the schools in their areas and to make resources and expertise available to the teachers.

### **6.4 TEACHER TRAINING**

#### **6.4.1 The literature study**

The literature study pointed to the need for teacher training to include both a strong emphasis on the study of typical child development as well as on an understanding of learning disabilities, including causes, manifestations and methods of identification and intervention. The importance of inservice training was stressed, as was the necessity for

teachers to be trained to work with other professionals and to communicate effectively with parents (section 4.4).

#### **6.4.2 The empirical study**

A number of the teachers answering the questionnaire (33%) acknowledged the understanding of learning disabilities acquired through their training. However, although more than ninety five percent regarded it necessary for preprimary training to equip teachers to assist a child with learning disabilities, fully sixty seven percent felt that their training did not equip them sufficiently to do so. In fact, three of the teachers responding had studied for a remedial diploma to improve their understanding of the nature of learning disabilities.

#### **6.4.3 Conclusion**

Although most teachers receive a certain amount of training in the identification and understanding of learning disabilities, both the literature and the empirical studies clearly show that much more needs to be covered, both in depth and in scope.

### **6.5 SUMMARY**

The study of the teacher's role in the education of the preprimary in both the literature and the empirical studies indicated that:

- The teacher is able to identify the learning disabled preprimar drawing on her knowledge of child development and of the manifestations of learning disabilities.
- The teacher is able to assist the learning disabled preprimar in a regular classroom provided she has the support of parents, specialists, other teachers and the community.
- The teacher's training is insufficient to fully equip her for her role.

From the above discussion it is clear that the two aspects which have the greatest influence on the teachers' role in successfully integrating learning disabled preprimars into a regular preprimary classroom are the lack of consistent support for teachers by a team of experts, and a lack of training.

In the following chapter some recommendations will be given as to how this could be achieved.

## **CHAPTER SEVEN**

### **Summary and Recommendations**

#### **7.1 INTRODUCTION**

This research was started as a response to queries and comments from teachers who had daily contact with preprimars in their preprimary groups who obviously had learning problems in one area or another. Despite their training, teachers felt inadequate in responding to these children's needs.

Children identified as requiring specialised assistance are referred to specialists but the teachers seldom receive feedback or support in planning strategies for assisting the children. In some rural areas there is no support system at all.

#### **7.2 THE AIM OF THE RESEARCH**

The aim of the research was to answer the following questions:

- what role preprimary teachers can play in identifying preprimars with learning disabilities
- what the teacher's role is in assisting preprimars with learning disabilities within the



boundaries of a integrated preprimary group and what support systems are available to assist the teacher in this role

- whether the teachers' training is sufficient to equip them for this role (section 1.4.1)

### **7.3 RESEARCH METHOD**

The research was twofold, consisting of a literature study and an empirical study in the form of a questionnaire and informal interviews.

#### **7.3.1 Literature survey**

The literature study focused on the definition and identification of learning disabilities and their causes and manifestations in preprimars, and was aimed at identifying current trends in the field of learning disabilities. It also served to provide both a frame of reference to which findings arising from the empirical survey may be related, and substantiated support for recommendations following the research (section 1.4.3.1).

#### **7.3.2 Empirical survey**

The empirical survey took the form of a questionnaire that was sent to preprimary teachers and principals teaching in Departmental registered preprimary schools and in special schools in the Eastern Cape, and informal discussions with teachers, principals and departmental officials (section 1.4.3.2).

## **7.4 RESEARCH FINDINGS**

### **7.4.1 Findings for Literature Study**

#### **7.4.1.1 *Identification***

The results of the literature indicate that the methods of identification commonly used by preprimary teachers are very effective in identifying a child with a learning disability.

#### **7.4.1.2 *Support and assistance***

The teachers' role in assisting preprimars with learning disabilities consists of planning the classroom environment and developing support strategies (section 6.3.1.1). The literature study clearly shows the importance of collaboration with parents (section 6.3.2.1), specialist support groups (section 6.3.3.1), colleagues (section 6.3.4.1) and the community as a whole (section 6.3.5.1) in supporting the teacher in her role.

#### **7.4.1.3 *Teacher training***

The literature study stresses the necessity of an in depth training both in typical child development and in the phenomena of learning disabilities in particular to prepare

teachers for their role in assisting the preprimar with learning disabilities (section 6.4.1).

## **7.4.2 Findings for Empirical Study**

### **7.4.2.1 Identification**

The empirical study indicated that most preprimars with learning disabilities are identified by their teachers, using routine assessment techniques such as observation, interviews with parents and rating scales (section 6.2.2).

### **7.4.2.2 Support and assistance**

Most of the teachers responding to the questionnaire (79%) agreed that learning disabled preprimars should be included in a regular preprimary group and approximately half of them (51%) carried out specific strategies to assist the children in their groups. Nevertheless, for some (21%), the behaviour of the learning disabled preprimars and the lack of time during normal school hours to spend in assisting them were severe drawbacks to integration (section 6.3.1.2). Collaboration with parents, specialists and the community, although accepted as important is not evident in most cases. Collaboration with colleagues, however, is the norm with all teachers in schools with more than one classroom (section 6.3.4.2).

#### **7.4.2.3 Teacher training**

The empirical study shows that the majority of teachers (67%) feel that their training was not sufficient to equip them to assist preprimars with learning disabilities (section 6.4.2).

#### **7.4.3 Conclusion**

Both the literature and the empirical studies concur that teachers are effective in identifying learning disabilities in preprimars. However, as far as support and training is concerned, it is evident that there is a discrepancy between the perceived requirements and what is actually happening in the classroom.

### **7.5 SHORTCOMINGS OF RESEARCH**

#### **7.5.1 Area**

It is possible that the results of the research could be skewed by the decision to restrict the empirical research to the Eastern Cape. This province is one of the most disadvantaged in the country and it is probable that similar research done in a more affluent province would produce very different results, particularly as far as specialist support is concerned. In addition, by targeting only qualified preprimary teachers a

large number of educate centres were excluded, many of which operate in impoverished rural areas.

### **7.5.2 Questionnaires versus interviews**

The empirical research relied heavily on the results of the questionnaire. More informal interviews with both teachers and departmental officials would have widened the boundaries of the research and allowed for a greater range of input.

### **7.5.3 Percentage of replies**

The sixty percent of questionnaires returned was a fairly low return rate for the empirical study. It is possible that those who responded either held positive views or had very strong feelings about the issues involved and could therefore be considered a biased sample.

## **7.6 RECOMMENDATIONS FOR TEACHERS**

### **7.6.1 Identification**

This is the area in which teachers cope best at present. There appears to be sufficient training to alert teachers to deviations from the typical developmental norms. The more experienced the teacher the more confident she is in her identification. The

support and confirmation she receives from colleagues assist her in identifying specific learning disabilities.

In order to enhance her ability to identify a preprimary as disabled the teacher should:

- Keep up to date with modern methods of assessment and identification both through literature and by attending workshops, in-service training courses and professional growth seminars.
- Acknowledge the parents' knowledge of their own children as their primary educators, involve them in the assessment of their children, listen to their concerns and take time to discuss strategies with them.
- Organise inter- or intra- school discussion groups where problems concerning identification can be shared with colleagues.

#### **7.6.2 Assistance and support**

Most preprimary schools provide an informal but structured environment, and as all young children benefit from routine and repetition these are an integral part of any good preprimary programme. Although to date preprimary classes have remained smaller than those in most primary schools, pupil-teacher ratios, at present standing at between 25 and 30 to 1, are relatively high in comparison with most of the programmes examined in this research (section 4.3.1.1).

In order to deal with the problem of larger classes, which are inevitable given the economic situation, preprimary schools could:

- Employ a teacher-assistant, which would allow the teacher time to provide the individualised attention needed by both typically developing preprimars and learning-disabled children.
- Encourage parents or volunteers from the community to assist in the playground thus freeing teachers to work with smaller groups and thereby giving preprimars with learning disabilities the additional assistance they need.

Teachers need empowerment - many lack confidence and are therefore diffident about attempting intervention on their own. There is still too great a reliance on the old medical model of specialist diagnosis and treatment of what should be an educational problem (section 1.3.2.1). There needs to be a paradigm shift in attitude to counter this, not only teachers' attitudes but also those of the parents, specialists and the community. There also needs to be far more emphasis on teacher support by professionals in the medical and educational fields. This could be achieved as follows:

- Establish a centre-of-learning-based support structure, comprised mainly of teachers but able to draw on the resources of the community and on specialist services. Where a preprimary school consists of only one or two groups a number of schools could combine and set up such a structure in one of the schools, which would be available to all.

- Establish community centres (section 4.3.5) where specialist support and resources would be easily and relatively cheaply available. Specialists such as physiotherapists, occupational therapists and speech therapists could either work from or be in contact with such a centre and resources could include both literature and equipment which individual schools might not be able to afford. These centres could be established in community halls, clinics, or even parent's homes, and could also accommodate itinerant specialists employed by the department.
- A resource centre of this kind could provide "help-lines" manned by retired teachers or specialists to support teachers when dealing with problems arising during classes. This would be particularly valuable for teachers at isolated schools who are not fortunate enough to have the support of colleagues.
- These centres could also provide a base for teacher study groups, organised and run by the teachers themselves, either using the expertise of individual teachers or bringing in outside speakers where necessary. The study groups could deal with issues which concern teachers, such as strategies for assisting children with learning disabilities and dealing with the behaviour problems which are often a characteristic of these children (section 5.4.2).

The financing of the community centres would require the combined ingenuity of teachers and parents, but it should be possible to find funders in the business community and, as parents and schools will be the main stakeholders, school fees could include a subsidy towards maintaining the centre.

This presupposes close collaboration with parents and so the problem of the lack of



parental support needs to be dealt with. With many parents working full time teachers seldom find time to talk to them. Parent-teacher workshops at school, while necessary and valuable, often do not attract those parents the teachers most need to see (section 5.4.2.4(i)). The support and collaboration of parents could be fostered by

- recognising and acknowledging the parents' position as their children's primary caregivers by involving them in all aspects of the teaching and learning process
- the resumption of home visits, which used to be an integral part of preprimary education and which were seldom alluded to in the response to the questionnaire
- instituting an "open house" policy where parents are welcome to visit the school at any time
- organising parent-teacher meetings at times which are convenient to all, even if this means holding meetings over the weekends
- arranging social gatherings at the school where parents can get to know each other and the teachers in an informal atmosphere

### **7.6.3 Training**

Formal training should include more in depth training in dealing with disabilities.

Although it is impossible to train teachers to take the place of specialists in all fields of disabilities - perceptual, physical, mental and educational, there are, nevertheless, general principles that apply in all situations. This training could take the following forms:

- More specific training in learning disabilities could be offered as in-service training by the education department or relevant Non Government Organisations (NGO's).
- Seminars could be organised by teacher-study groups where specialists as well as teachers with additional diplomas or experience in this field could share their knowledge with their colleagues.

## **7.7 RECOMMENDATIONS FOR FURTHER RESEARCH**

Although this study was fairly limited in its scope (section 7.5.1) the responses to the questionnaires indicated a considerable disparity in the availability of support services between the urban and the rural communities. A comparative study, especially one that included all early childhood development centres, could investigate the implications of these disparities and look at ways of overcoming them.

## **7.8 CONCLUSION**

The research has indicated that preprimary teachers already play a major role in identifying learning disabilities in preprimars. The role that they can play in assisting learning disabled preprimars within the boundaries of an integrated preprimary group depends largely on the quality of the support available to them in the classroom, whether the support is received from the parents, specialists, colleagues or the community.

On the whole it has been shown that the training teachers receive does equip them to assess preprimars for learning disabilities but does not provide them with sufficient insight into the problem to enable them to provide the necessary assistance to these children.

The Curriculum Framework for Early Childhood Development (Eastern Cape Province 1996) and the NCSNET/NCESS Report (Department of National Education, SA 1997) repeatedly emphasise the necessity for training and support, but in practice the ideal situation, where every school has access to specialised personnel to assist and support teachers, still lies somewhere in the future. At present it is up to teachers, parents and communities to work together to provide a support base, share their respective skills and resources, and promote a positive attitude towards inclusion.

## **ANNEXURE 1**

Dear Colleague

**M.Ed. DISSERTATION ENTITLED: THE ROLE OF THE TEACHER IN THE EDUCATION OF THE LEARNING DISABLED CHILD IN THE PREPRIMARY SCHOOL .**

The aim of this research is to answer the following questions:

1. Whether it is possible for a preprimary teacher to identify the characteristics and needs of a learning disabled child
2. Whether it is possible to plan and carry out a specialised programme within the school curriculum to meet the learning needs of these children
3. Whether support services are available both to teacher and child
4. What problems may be encountered in the interaction of learning disabled and non-handicapped children
5. Whether the teachers' training is adequate to equip her/him for the task of educating learning disabled children in the preprimary school

In order to enable me to answer these questions and so to proceed with the research, kindly complete the questionnaire handed to you. On completion of the questionnaire, please place it in the envelope provided and hand it back to the person from whom you obtained it, who will return it to me.

All information will be kept strictly confidential and it is therefore not necessary to write your name on the questionnaire.

Thank you for your co-operation and participation in this research.

Yours faithfully

Mrs Dawn Kumm

## QUESTIONNAIRE

### SECTION 1: PERSONAL DATA:

1. Training: Academic .....
- Professional .....
- Number of years training .....
2. Experience: Preprimary:  
Number of years .....
- Other (Please specify): .....
- Number of years .....
3. Average size of group taught: .....

### SECTION 2:

Learning disabilities is a generic term that refers to a **heterogeneous group of disorders** manifested by:

**significant difficulties** in the acquisition and use of listening, speaking, reading, writing, reasoning or mathematical abilities. Applied to the pre-primar, one may refer to problems or difficulties in preparatory learning skills (including perceptual and motor skills) instead of reading, writing, or mathematical abilities (number concept).

These disorders are **intrinsic to the individual** and presumed to be due to central nervous system dysfunction.

Even though a learning disability may occur concomitantly with other disabilities (e.g. sensory impairment, mental retardation, social and emotional disturbances) or environmental influences (e.g. cultural differences, insufficient/inappropriate instructions, psychogenetic factors) **it is not the direct result** of these conditions or influences (Hammill et al. 1981: 339-340).

Before a child is diagnosed learning disabled, a severe discrepancy between achievement in one or more of the areas in preparatory learning skills and intellectual ability or potential must be present.

Based on the above description of the definition of learning disabilities, please answer the following questions:

1. Is it possible to reliably identify a learning disabled child at preprimary level?

yes	no
-----	----

Please motivate your answer.

2. Have you had any learning disabled children in your group over the past one to five years?

yes	no
-----	----

If yes, how many?

3. In most cases who initially identified the child(ren) as learning disabled?

	mostly	sometimes	never
self			
other teachers			
medical doctor			
parents			
psychologist			
others, please specify.			

4. In most cases how was the learning disability identified?

	mostly	sometimes	never
routine observation by teacher			
evaluation technique by teacher			
doctor's examination			
other: please specify			

5. The following are some of the most frequently cited characteristics of learning disabled children. Please indicate, from your own experience, the occurrence of each manifestation.

	often	sometimes	never
hyperactivity			
perceptual-motor impairments			
emotional lability			
clumsiness			
attention disorders			
impulsivity			
memory or thinking disorders			
disorders in comprehending spoken language			
others, please specify			

6. If identified by the teacher were these children referred for formal assessment and if so, to whom?

	mostly	sometimes	never
medical doctor			
university clinic			
school clinic			
private educational psychologist			
occupational therapist			
other, please specify.			

If not referred, please give reasons.

7. Did you carry out any specific strategies during school hours to assist the child?

yes	no
-----	----

If yes, describe briefly the strategies you used.

If not, why not?

Did you devise the strategies yourself?

yes	no
-----	----

If not, who assisted you?



8. Did you collaborate with a specialist support group such as occupational therapists, psychologists, school clinic, or doctors?  
 If so, please indicate who provided support and what form it took.

specialist support	type of support given	mostly	sometimes	never
school clinic				
doctor				
psychologist				
occupational therapist				
other, please specify				

If no support was given, please state reasons.

9. Did you collaborate with parents, other teachers or the community?  
 If so, please indicate what form the collaboration took.

	type of collaboration	yes	no
parents			
other teachers			
community			

Comments:

If not, please give reasons.

10. Please indicate any specific problems you have experienced with learning disabled children in your group.

	often	sometimes	never
rejection by peers			
aggression			
disruption			
disobedience			
others, please specify			

11. Do you regard it as necessary for preprimary training to equip teachers to assist a child with learning disabilities?

yes	no
-----	----

Has your training equipped you sufficiently to assist a child with learning disabilities?

yes	no
-----	----

If yes, please mention those aspects of your training that you have found to be particularly beneficial in equipping you for this task.

If no, please explain where you have found gaps in your training.

12. Should learning disabled children be integrated into a regular preprimary group?

yes	no
-----	----

Please motivate your answer.

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