

Narrative Comprehension in Kindergarten:
an analysis of talk about narratives by children
differing in early literacy development

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Author's Declaration

This is to certify that:

1. this thesis comprises only my original work towards the Master of Philosophy in Education Degree
2. due acknowledgement has been made in the text to all other material used
3. the thesis is less than 40 000 words in length, exclusive of tables, excerpts and bibliographies.
4. no part of this work has been used for the award of another degree
5. this thesis meets the *University of Sydney's Human Research Ethics Committee (HREC) requirements for the conduct of research.*

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Abstract

Literacy skills include expressive language, oral and written, and receptive language, comprehension. This study explores both aspects of language in six Kindergarten children differing in early literacy development – three judged by teacher assessment to be ‘at risk’, and three acquiring Kindergarten literacy skills as expected. Oral retellings of a familiar narrative and an unfamiliar story just heard, and a personal recount were taped and analysed using Halliday’s Systemic Functional Grammar. Comprehension responses to individually shared narratives were also collected and analysed.

The children’s use of language and comprehension responses varied significantly. Those ‘at risk’ were unable to retell narratives, needed high levels of support to comprehend texts and produced less cohesive personal recounts. The linguistic analysis revealed vocabulary and rhetorical organization affected the reconstruction of oral narratives. These children also seemed to find comprehending difficult when questions or recall involved following reference, negotiating marked Theme or drawing inferences.

The study was designed as a series of one to one literacy experiences. A listening comprehension test showed that all children except one benefited from the experience. The findings underline the importance of oral language development and the value of interactive teaching experiences to the attainment of sophisticated literacy skills.

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Chapter One

Introduction

One of the major tasks of an education system is the teaching of literacy. In the first years of schooling the emphasis is generally placed on the teaching of reading and the early writing skills of letter formation and composing simple narrative. However, literacy is a great deal more than the ability to read a text aloud or write simple narratives. It includes comprehension of a range of different types of written and oral discourse, writing skills related to different types of text, and appreciation of the subtleties of style encoded in word choice, syntax and text form. Literacy begins in the course of normal development through exposure to informal, contextualised language used in dialogue, narrative experiences encapsulated in oral discourse and book reading, as well as the sharing of notes and letters. However, a further dimension of literacy is the understanding and use of language that is more formal than the contextualised discourse and commonsense knowledge that infants are exposed to from birth and from which most children initially develop their mother tongue (Halliday, 1975/1993; Nelson, 1989; Painter, 1999). The knowledge children encounter at school is highly systematic and theoretically based. In Vygotsky's (1978) terms it is scientific rather than perceptual in nature. The mediation of this knowledge is explicit, sequentially organised, logical and predominantly language based.

This study is an exploration and comparison of the language use and comprehension of children who are achieving as expected and those who,

for unexplained reasons, are not. Children falling into the latter group have been described as Learning Disabled (LD).

Children entering school are assumed, in both a social sense and a developmental sense, to have a working model of language that facilitates learning skills and content (Halliday, 1978; Painter, 1999). Generally most Kindergarten children, in my experience, can attend to and follow quite complex stories, as well as directions and procedures given orally in a classroom situation, that is, to a group of children in which feedback and interaction are limited due to numbers. This is crucial as the major part of their social participation in learning occurs through language. As Painter so aptly argues, “learning cannot fruitfully be considered apart from languaging” (Painter, 1999, p.vi).

However, some children without obvious or measurable language delay or social, cultural or class difference, experience difficulty in understanding teachers’ discourse and instructions. In my observation these children demonstrate difficulties in meeting school demands such as the formulation of an oral recount, telling an imaginary story, and following a story presented orally. When demands are made upon them to listen they may remember elements of the discourse but not the connections between them. Hence an incomplete idea of the gist of the story, procedure or instruction is formed.

These same children may experience difficulty in moving from the early stages of emergent literacy involving memorising of rhythmic, patterned predictable texts to automatic decoding processes of word reading supporting both independent reading and comprehension. This may relate to a connection between language and learning disability.

Painter (1999) maintains that, “developments in learning, whether conceived of in terms of cognitive skills or knowledge acquisition, will also constitute developments in language” (ibid, p.vi). If we reverse this proposition, then developments in language should reflect developments in learning. But what happens to a child who can’t manage the use of language sufficiently to enable learning through language, and consequently does not develop the conceptual understandings encoded in language but also doesn’t fall into the definable categories of speech/language disability? These children do not qualify for, or have access to, specialized help but still experience failure in a school sense.

Language, thought and learning are closely related. In order to establish, explore and extend meaning, events, ideas and objects are encoded linguistically. That is, the raw experiential data of life can be expressed linguistically allowing the words themselves to represent reality which then allows decontextualisation and manipulation (Painter, 1999). Learning informs language use and comprehension, but learning is also dependent on language use and comprehension. There comes a point in the child’s life when learning through language supercedes learning through experience. This is, in our society, the main purpose and pedagogic basis of school education, and begins, in a formal manner, as soon as the child enters Kindergarten. Mental processes that are linguistically mediated come to largely replace perception and activity as the major form of learning and communication.

As Halliday explains,

“the construal of reality is inseparable from the construal of the semantic system in which the reality is encoded. In this sense,

language is a shared meaning potential, at once both a part of experience and an intersubjective interpretation of experience” (Halliday, 1978, p. 1-2).

Language is a complex semiotic system. Functionally it has to interpret all experience. It has to express logical relationships between events, ideas and objects. It also has to provide personal information about attitudes and relationships (Halliday, 1978). This functional variation means that there is no one-to-one matching between the world and language. Hence unspoken, unexplained, untaught processes of language are very important to the successful competent use of language. Facial expression, postures, inflexions, intonation and so on add to the meaning of what is being said. Words are signs that indicate the meaning but do not mirror it exactly (Halliday, 1985).

If Halliday’s hypothesis (1975, p.36) that language is the most important of all the semantic systems is correct and that it becomes a tool for learning, then an examination of language use by children who are commonly described as experiencing a learning disability should reveal variations in their development of this resource for meaning, which may have implications regarding an understanding of how to support them in the composition and comprehension of narrative material. This, in turn, should support their overall school-based learning and achievement.

Narrative appears to be the dominant mode in which information is presented to infants and children by carers and is thought to play a role in the development of conceptual thought (Bruner, 1997; Engel 1995). At the Kindergarten level knowledge is often embedded in narrative form.

Narrative also provides the format for the children's initial exploration of written language and so has been adopted as the focus for this study.

In this study I am using story comprehension and the oral expression of personal experience to investigate language use among a diverse group of children. A detailed exploration allowing a rich description of their language use and comprehension may reveal under-developed areas of linguistic competency and highlight individual differences in learning that can be addressed through classroom teaching.

Scope and Purpose

The aim of this study is to explicate the difficulties experienced by some Kindergarten children in using language to comprehend and compose common forms of narrative which routinely form part of their classroom experience in the first year of school. To pursue this aim I investigated how a diverse group of Kindergarten children comprehended stories just read to them through an examination of their retellings; how these same children used language as a resource for meaning in constructing a recount of personal experience; and how they comprehended a series of texts presented orally to them on a one-to-one basis. The children, in the process of talking about texts being read to them, often gave spontaneous recounts which were also recorded. The investigation and analysis was undertaken using Halliday's (1985, 1994) Systemic Functional Linguistics (SFL).

Previous studies examining story construction such as those by Stein and Glen (1979) generally considered only aspects of story structure. Studies of story construction and comprehension in children with LD (Worden, 1986; Carlisle, 1999; Oakhill and Cain, 1999; Roth, Spekman and Fye,

1995; Curran, Kintsch and Hedberg, 1996) have also tended to consider only genre aspects such as overall structure, inclusion of main idea relative to minor details and vocabulary. Although some of these studies (Perfetti and Britt, 1995; Carlisle, 1999; Roth, Spekman and Fye, 1995) have suggested grammatical factors emerging as significant, none have specifically investigated these LD children's use of grammatical resources in text production. In this study the children's deployment of grammatical resources is closely examined.

Formal grammars are organised around syntactical, that is sentence-structure based, notions of correct usage whereas functional grammars, such as that described - SFL, are socially based and describe language as a resource for meaning. This is a highly significant difference as language is a tool whereby experience can be represented symbolically, expressed and shared. Language is not only a system of rules but a system for meaning. "If we consider language as a meaning potential, (it has) an open-ended and theoretically infinite range of options in meaning" (Halliday, 1975, p. 16).

Halliday's functional grammar (SFL) provided a means to describe and evaluate the language the children were using. This theory has not been used in the description of the language of children with LD before and may reveal how their language use differs functionally from that of other children.

Clare Painter (1999) used Halliday's functional grammar to describe one child's language development from the ages of two to five years. She was able to use the grammar to draw implications about the relationship between language and learning. It is implications of this kind that can be

drawn from the application of Halliday's functional grammar that make it such a powerful tool in formulating a description that may reveal the differences between normally achieving children and those described as learning disabled.

Halliday posits that children's earliest speech contains no grammatical structure – it is an attempt to unambiguously communicate representational or interpersonal information and so is simply content and expression. As children develop their speech becomes more complex due to the use of a three level system composed of meanings, sounds and an intermediate level of words and structure called lexicogrammar. A grammatical system allows experience and reflection to be expressed simultaneously; "Grammatical structure is a device which enables the speaker to be both observer and intruder at the same time" (Halliday, 1975, p.30).

The grammatical level of spoken language is largely unconscious (Hall, 1994, p. xxiii). Although written speech is not simply spoken language written down, the grammatical resources that enable meaning remain unchanged. However, they must be available to conscious manipulation by the speaker/writer. Hence the individual, in order to be regarded as literate, needs to know about language. As Painter expresses it,

"The point here is that while the grammar constitutes an unconscious and implicit theory of experience, it is also the resource for consciously building designed, explicit theories – about language (grammatics, linguistics) and about anything at all" (1999, p. 65).

Consciously designed theories are the content and form of educational discourse. Hence the ability to manage the grammatical resources of the

language for expressing meaning is essential. Previous studies of individuals with LD have clearly shown problems in both receptive and expressive language use but a detailed examination of developing language in a small number of children demonstrating a range of individual differences may reveal more about the exact nature of the problems demonstrated.

Context of the Study

The participants in the study were six Kindergarten children demonstrating diverse literacy behaviours. These ranged from expected behaviours to demonstrated difficulty with the following of orally presented stories, composing stories for dictation and the acquisition of early reading skills.

To explore the hypothesis that receptive language is implicated in the learning problems exhibited by the children not achieving as expected through the application of SFL requires appropriate language to be analysed. The ideal model would be the collection of data in situ as employed by Halliday, (1975; 1993), Painter, (1999) and Torr (1990) (nee Oldenburg) in their single case studies of language development. A multiple case study allows comparison between children but necessitates a more focused method of language collection. A study of narrative production and comprehension will satisfy these requirements. It is also hoped that a wide selection of narratives will elicit a useful volume and range of responses for analysis. It is important to collect language for analysis – narrative provides a means to this end.

Each child was seen individually over a period of ten weeks for three sessions a week. These literacy experiences, described in Chapter Three,

were not designed to enhance the children's development of literacy skills but to elicit language for analysis and to probe their comprehension processes. Responses to fairly typical school tasks were collected and analysed using SFL to see what the children could and couldn't do in comprehending stories read to them, relating personal experiences and retelling a known story. These sessions were conducted at school by me. As I was also their classroom teacher the context was as close to a real situation as possible.

This is an exploratory study designed to investigate the language use in a diverse group of Kindergarten children. A case study approach allows depth of data collection and analysis but does not allow generalization to either all children or to children demonstrating a range of non-expected behaviours. But it may reveal particular areas of individual difference which, in turn, may suggest further research and the refinement of theory.

1.1 Research Questions

- 1) How do Kindergarten children use the cohesive and grammatical resources of English to give an individual, oral retelling of:
 - a narrative which has just been read to them?
 - a previously heard, familiar story genre (represented in this instance by "The Three Billy Goats Gruff")?
- 2) How do Kindergarten children use the cohesive and grammatical resources of English in recounting narratives of their personal experience?
- 3) What is the same or different about the language use in such contexts between the children with LD and those achieving within normal parameters?

- 4) How did these Kindergarten children use language to respond to comprehension questions interpolated in a text being read to them?
- 5) Were there observable differences between the children with learning disabilities and the other children in the way spoken language, orally presented written texts and pictorial texts were interpreted?

1.2 Overview of the Thesis Presentation

Chapter 2 defines what is commonly referred to as a Learning Disability and presents LD research relevant to this study in the area of comprehension, story composition and language development. It also contextualises this study within the literature on young children's language development and use, and their story comprehension and production.

Chapter 3 describes the study method and procedures. This includes the selection of participants, tasks given to the children, a description of the texts presented to the children and an outline of the systemic functional linguistic (SFL) concepts used to analyse the data (Halliday, 1994)

Chapter 4 presents the SFL analysis of the narrative task, the recounts and incidental texts that were considered relevant. This chapter seeks to answer research questions 1, 2 and 3.

Chapter 5 discusses how these children comprehended written material presented orally to them. Research questions 4 and 5 are dealt with in this chapter.

Chapter 6 draws together the different strands of the investigation and formulates an account of the results. Implications for teaching and future research directions are discussed.

Chapter Two

This chapter reviews research on the performance of individuals with LD in reading, comprehension, and story production followed by a review of research into children's language development and the development of their comprehension of story structure.

2.1 Learning Disability

Individual difference in general educational attainment can arise through cultural (Luria, 1976; Michaels and Cazden, 1986; Rogoff, Mistry, Goncu and Mosier, 1993) and social variation (Heath and Branscombe, 1986; Cazden, 1997; Gee, 1997). However, for those individuals who fail to achieve as expected, and are generally assigned the label Learning Disabled, the origin of the difference is seen as intrinsic to the individual. The term Learning Disability (LD) covers a diverse range of academic difficulties. It has been described as a developmental delay, deficit, varying learning styles, minimal brain damage and inappropriate behaviours caused by diet, environmental conditioning, emotional stress, and physical deprivation.

2.1.1 Definition

The word "disability" implies a constitutional origin or physical handicap and hence further implies that, if absent, the individual would be "normal" (Kolb and Wishaw, 1990). Consequently LD has been investigated as a unitary disorder of a medical nature that can be identified and treated. Other researchers disagree due to the heterogeneity apparent across LD subjects and have looked for particular characteristics forming sub-types (eg. Bakker and Light, 1986; Rourke, 1989).

The traditional defining characteristic of LD has been a discrepancy between potential and attainment that is not explained by environmental, biological or medical conditions.

Learning Disabilities is a diverse area encompassing behaviours such as hyperactivity in Attention Deficit Hyperactivity Disorder (ADHD), attentional deficits as in Attention Deficit Disorder (ADD), clumsiness as in poor body/kinesthetic integration, psychological factors effecting social and emotional adjustment, and school attainment.

2.1.2 Reading Acquisition

To narrow the field and make it more, “amenable to scientific test” (Stanovich, 1993/94, p.287) research focused on reading attainment and concentrated on cognitive processes such as metalinguistic ability and phonemic awareness (Tunmer, Herriman and Nesdale, 1988; Stanovich, 1990; Yopp, 1988). This research added useful knowledge regarding reading behaviours and teaching techniques and indicated underlying, causal factors such as cognitive development and verbal deficits: “the deficits of disabled readers are verbal rather than non-verbal and cognitive rather than perceptual in nature” (Spear and Sternberg, 1987,p. 21).

As indicated in the first chapter, knowledge about language is crucial to the development of skills necessary to access educationally based knowledge (Halliday, 1993; Painter, 1999). Phonemic and linguistic awareness are both aspects of language development, yet research tended to conceptualise these skills in relation to reading acquisition rather than language development.

2.1.3 Perceptual Processes in Reading Acquisition

A young child's knowledge about language is largely implicit (Painter, 1999). The process of schooling requires that the child render this knowledge explicitly. Kindergarten children are asked to conceptualise the speech stream into words, and words into sounds or phonemes in a particular sequence, initial, medial or final. This requires metalinguistic abilities to reflect on language as a sound symbol system. If neurological mechanisms of perception of auditory signals are compromised then the ability to perceive the speech stream as separate sounds would be very difficult. This would also impact on the ability to memorise rhymes and generally play with language as pre-school children frequently do (McTear, 1985).

Although research was focused on reading sub-skills such as phonic analysis this research can inform language research as it is relevant to all auditory based learning.

Stein (1991) hypothesised that phonological and visual skills may share a common neurological mechanism and provided evidence that dyslexic subjects have an impairment in rapid signal processing in the auditory, somaesthetic and motor systems. Auditory perception and discrimination are also dependent on the ability to process and "integrate sensory information that converges in rapid succession in the central nervous system" (Tallal Miller, and Fitch 1996, p. 159). A basic temporal processing deficit would be "pansensory, that is, affect(ing) motor output" (Ibid, p 159).

Neurological mechanisms of timing and sequencing are crucial to speech production and other behaviours that are both regulated and sequenced

(MacKay, 1987, p.413). The importance of timing can be easily overlooked because it is so ubiquitous. MacKay (1987) points out that many daily activities such as handwriting, typing, and talking show near perfect periodicity.

Language ability was used as a crucial dimension in a study investigating dyslexia by Tallal, Miller and Fitch (1996). They suggested that temporal integration deficits underlie phonological analysis and investigated one group of dyslexic children who demonstrated language problems and a second group with only reading problems. The group with oral language problems had deficits on non-verbal auditory temporal processing, while the other group had no phonological coding or temporal processing deficits in any sensory modality.

Dyslexic individuals compensate for these neurological deficits by working harder, engaging in “conscious compensation” (Fawcett and Nicholson, 1992, p.162). This, in turn, impacts on their comprehension, ability to maintain tasks, and their tendency for task proficiency to breakdown under stress. Stress can be as simple as performing two tasks at the same time such as counting and balancing on one foot.

2.1.4 Environmental Factors

Research examining environmental factors included language related factors relevant to this study, such as memorising nursery rhymes. In a long term investigation of familial factors relating to the development of literacy Scarborough (1991) found that the group of children with no familial incidence of dyslexia were attracted to books, memorised nursery rhymes and consistently produced longer utterances with more syntactic constructions than a comparison group in which one member of the

family, either sibling or parent, had dyslexia. The children in the second group who demonstrated deficiencies in syntactic and phonological skill, but not lexical skill, were identified as dyslexic by the second grade in school.

Scarborough (1991) hypothesised that:

“the fundamental processing problem associated with dyslexia may not be confined to the phonological domain... but rather involve broader structural language impairments or even more general symbolic rule learning difficulties” (Ibid, p.226).

Weinberger (1996) also found that early literary experiences significantly impacted on later reading attainment. Factors emerging as significant in predicting differences in reading attainment were the number of nursery rhymes the child memorised as a pre-schooler, whether or not they had a favourite book, the child’s tendency to choose book-reading as an activity at pre-school, and, at age 5, their vocabulary score, how well they could write their name, copy a phrase and their letter knowledge.

Both these studies indicate a relationship between language development and dyslexia.

2.1.5 Learning Disability and Reading Disability

Reading acquisition has been the main channel through which learning disabilities has been explored. This has the tendency to confound reading disability and learning disability. When all children with reading problems are researched as an homogenous group many factors emerge as significant and there is much individual variation. For instance not all dyslexics experience problems with comprehension. Indeed their

comprehension is often better than their decoding skill would suggest (Connors, and Olson, 1990; Balota, 1990; Seymour, 1990).

Reading as decoding is only one aspect of literacy. Comprehension ability has been largely ignored by research to date or only formed a small part of a larger study. When only reading acquisition is considered in children with and without an IQ/reading attainment discrepancy, progress in reading is found to be the same (Francis, Shaywitz, Stuebing, Shaywitz, and Fletcher, 1996). There is:

“a wide consensus that for many children learning disabilities are a continuation of earlier language impairments, and that a specific reading disability can often be characterised as a developmental language disorder” (Poikkeus, Ahonen, Narhi, Lyytinen, and Rasku-Puttonen, 1999, p.23).

The need to separate a difficulty with learning to read, which may be a simple auditory perception problem, and a more pervasive difficulty with all academic learning, such as learning disability is obvious.

The research reported above indicates a connection between language functioning and learning disability. Learning language is highly related to learning how to mean (Halliday, 1975; 1993). Hence considering comprehension may be salient in separating the child with a reading disability from the child with a more pervasive learning disability.

2.2 Comprehension

One of the major problems for individuals with LD is comprehension - their difficulty in acquiring knowledge from written material (Worden, 1986). In spoken language the context is shared, the necessary mutual knowledge is established with feedback providing opportunities to correct errors in understanding. Information is far less densely packed than in written language resulting in less syntactic complexity (Graesser, Golding and Long 1991). However, even in a dialogic context problems with language can lead to communication breakdown (Poikkeus, Ahonen, Narhi, Lyytinen and Rasku-Puttonen 1999). Both individuals need to know how to ask relevant questions and provide appropriate information (Painter, 1999).

Didactic discourse in which very little or no interaction is possible between speaker and listener should be regarded as more similar to written text than spoken language. As in written language more formal language is usually decontextualised relying on the text alone as cues to meaning. In reading, one is required to follow sustained discourse with texts that become longer and more complex throughout schooling (Copeland, Winsor, and Osborn, 1994).

2.2.1 Comprehension Theory

Kintsch (1998) equates the terms comprehension and understanding, but to explicate the interpretation of these words contrasts them with perception. Perception simply involves the observance of something by the organism using any appropriate sense. Kintsch explains that, “Understand is used when the relationship between some object and its context is at issue or when action is required” (Kintsch, 1998, p. 2).

Both perception and understanding tend to proceed automatically with little or no conscious effort. However, if understanding breaks down then conscious problem-solving processes begin in order to re-establish understanding. These processes of mental representation generally involve verbalisation either at the ‘working out’ stage as in internalised egocentric speech (Vygotsky, 1978) or at the production stage whether oral or written. Certain knowledge constructs such as numerical arrays and diagrams circumvent the need for language.

2.2.2 Mental Representation – Imaginal and Propositional

Processes of comprehension of a situation, object or discourse, both oral and written, result in a mental representation of what has been understood by the receiver (Trabasso and Magliano, 1996). Mental representations may be imaginal or propositional if not at the deepest level then at higher more ‘global’ levels of analysis (Halford, 1993). Mental representation of a propositional nature is analogous to schema in that the propositions form a mental map. Propositions are, “units of information that can have a “truth” value” (ibid, p.27). Propositions are not concepts of a particular thing. They state connections or factors that may be true or false, eg. “Days are light”.

Schema theory is a description of mental organisational structures. It posits that people acquire schemas for a range of activities including types of discourse and that this allows the understander to make inferences, both forwards and backwards from the point at which they engage with the discourse (Warren, Nicholas and Trabasso, 1979). These forms of data representation are learnt through interaction (Nelson, 1996; Karmiloff and Karmiloff-Smith, 2001) and experience in structured situations such as

school learning and unstructured situations such as family exchanges and experiences. If an individual has a poor schema or no schema for a certain type of discourse their comprehension of that discourse will be limited (Freedle and Hale, 1979; Scribner, 1979). Halliday aligns this type of familiarity to aspects of field. That is, the words and phrases used indicate the general topic and context. He refers to this as ‘register’ (Halliday, 1985).

2.2.3 Propositionally based Research

Perfetti and Britt (1995) posit that comprehension of language, that is sentences, is the analysing of propositions in relation to the syntax, not the analysis of nouns and verbs. Whether these are then visualised or verbalised internally is irrelevant.

“The general point is that it does make a difference how you say things. The Baron freed the serfs and the serfs were freed by the Baron may be propositionally identical, but it has long been clear that the expression of the proposition one way rather than the other is motivated by discourse features assumed by the speaker/writer” (Perfetti and Britt, 1995, p. 17).

To express what is understood often requires language as much information can only be expressed linguistically. Two forms of language functioning is required, receptive, the ability to take in knowledge linguistically, and expressive, the ability to express knowledge linguistically.

2.3 Production Processes

Production processes require selection and co-ordination of ideas and the formulation and sequencing of remembered information. Hence production

processes are different from comprehension processes. The following study highlights the role language plays in performance. That is, it shows that the children with learning disabilities understood more conceptually than indicated by their expression of ideas.

Carlisle, (1999) separated recall and productive processes to ascertain if students with LD experienced problems with recall (receptive comprehension) or production (expression) of ideas. The study was conducted with sixth- and eighth-grade students with and without LD and tested their recall of science passages using sentence verification (no production required) and free recall.

The students with LD performed significantly worse on recall than their non-LD peers even when vocabulary and science concepts were statistically controlled. They included fewer main ideas even though they may have produced as many words as their non-LD peers. However, their understanding of concepts, as shown through the sentence verification tasks, although lower than that of their normally achieving peers, was better than their recall indicated. Hence their problems were more evident when production processes were involved.

2.3.1 Memory

Memory allows the accumulation of knowledge generally referred to as prior knowledge. The ability to access prior knowledge gained through, for example, linguistic, experiential or affective processes, is crucial to comprehension (Kintsch, 1998; Carlisle, 1999). Prior knowledge forms a strong base upon which to interpret, analyse and so comprehend more fully new knowledge. Working memory (WM) then integrates old and new

knowledge. Memory and word retrieval are an integral part of comprehension and discourse.

In an investigation of performance differences between language impaired children and age-control children Kail (1989) found performance differences were not due to specific retrieval deficit problems. Language impaired children learn words more slowly but semantic memory and organisation is qualitatively similar to normally achieving children. However the links and elaborations are less extensive resulting in less elaborate, well-connected inferences which, in turn, would affect the construction of mental models, the ability to resolve ambiguities and move easily between propositions. To follow a conversation in which ideas, procedures or concepts are developed throughout the conversation may well prove difficult for such individuals. The construction of text either oral or written often develops throughout the discourse (Halliday, 1991) requiring the listener to remember and transpose meaning across variations of form.

In a study of adult college students with LD Worden (1986) found that their recall of a story resembled that of normal third grade students. The structure was intact indicating they had an adequate representation of the story schema in Long Term Memory but they did not distinguish levels of importance in story units and were deficient in their awareness of text features. Analysis, as in group discussion about the main ideas of the story, resulted in a degraded recall whereas simple repetition aided recall suggesting that the college students became more confused by attempting to analyse the story.

2.3.2 Story Production

In a study on story production by LD individuals Roth, Spekman, and Fye (1995) found that their subjects produced shorter stories with fewer complete episodes, omitted important information, supplied fewer reference ties, confused cohesive ties and made more errors in the type and use of reference cohesion terms than the controls. The LD individuals used syntax correctly and pronouns appropriately but their stories were confusing to the listener because the reference of articles (a, the) was hard to determine. They did not appreciate or assume the role of the listener to monitor their story-telling clarity: “they had more difficulty than their NA (normally achieving) peers in using language as a tool for organising and unifying narrative text” (ibid, p.38).

Due to the very different demands inherent in spoken and written language the problems in constructing narrative are not readily apparent in normal, conversational discourse.

A similar finding of: “a mental model lacking in depth” was described by Curran, Kintsch, and Hedberg (1996, p.38). Their LD subjects gave far less detail in their recall of a story and distorted the story line to such an extent that it was no longer understandable. They also recalled fewer text based propositions, gave less character information, did not focus on important information or infer information as effectively as the control readers. Curran et al drew the conclusion that LD individuals are inefficient processors.

2.3.3 Oral Language

Research examining language use in a social interactive context reveals to some extent the nature of the dysfunctional language use evident in individuals with learning disabilities. It is through interaction that knowledge can be shared, explored, clarified and enlarged.

The ability to follow directions is directly related to comprehension in that the individual must remember, transfer and apply information from one command to another. If an instruction cannot be followed the individual needs to be able to ask appropriate questions. The following research is particularly relevant to this study because it is based on oral language and demonstrates how communication breaks down between mother and child. The study, based on following directions, is presented in some detail.

Poikkeus, Ahonen, Narhi, Lyytinen and Rasku-Puttonen (1999) examined the nature of exchanges between mothers' and their LD child. They wondered if interactional or family environment factors had any impact on language development and use in children with LD. They also wondered about the origin of the specific language problems often observed in children with LD:

“whether the high occurrence of communication breakdowns in dyads involving children with LD was a function of the type of neurocognitive problems of the child” (ibid, p.24).

The children in the study were a group of LD boys, ages 8 to 11. The children were divided into two sub-groups, one with equal performance and verbal IQ (VIQ=PIQ), the other with a discrepancy between the

performance and verbal IQ with the performance score being greater (VIQ<PIQ).

A card arrangement task was used in which the parent and child could not see each other but in which the mother could speak to the child through a microphone. In the first trial the mother explained to the child how to arrange 5 Rorschach cards in a particular order. The child was unable to communicate with the mother so the task involved the following of verbally presented directions in which the speaker could not see if the instructions were being carried out correctly.

In the second trial the same task was given but the mother and child were able to communicate. Once again the mother could not see the child or the way in which they were arranging the cards.

In the first trial mothers of boys in the VIQ< PIQ group gave:

“less accurate and less informative instructions, were less likely to orientate the child to the task, were less likely to proceed in a coherent manner, and were less likely to assume the child’s frame of reference”.(Poikkeus et al, 1999, p.30).

In the actual arrangement of cards the VIQ=PIQ group performed significantly better than the VIQ<PIQ. Although the boys in the VIQ=PIQ group experienced as strong an impairment in achievement as the other group their greater competency in comprehension skills enabled them to perform much the same as average-achieving children in the card arrangement task.

An interesting finding was that the deficiencies in parental communication between the monologue and dialogue situation increased with the

VIQ<PIQ group rather than decreasing as it did with the VIQ=PIQ. It seems as if; “the child’s questions were confusing to the parent” (ibid, p.31). The frequency of language anomalies, disruptions, referent problems, and failure to commit to a definite idea increased in the dialogue situation with the VIQ<PIQ child.

The researchers concluded that the child’s impairment in understanding and following instructions led to deterioration in communication.

The role of language in LD is critical. In this particular study children with highly visible but undiagnosed language deficits were selected. I suspect that language development and functioning is on a continuum and those children who appear at first to be functioning quite adequately may actually demonstrate subtle language anomalies or poor comprehension if more closely examined.

2.4 Language Development and Comprehension

Bruner (1997) posits that language development is semantically based. We do not approach language grammatically by putting together appropriate clauses, intonation contours, punctuation markers and so on but rather by, “constructing narrative utterances as holistic configurations” (ibid, p. 67). In other words development and learning are meaning based. We acquire and learn what is meaningful. If something is not meaningful or cannot be related to and integrated with existing knowledge we tend to ignore it (Kintsch, 1998).

Socially constructed theories of language (Halliday and Hasan, 1976; Christie, 1990) consider that language development and use is determined by the relationships between language and context. Language is a highly

complex symbol system empowering the individual who can recognise and create different forms, or genres, relevant to different contexts and audiences (Hammond, 1990).

Comprehension of written language is developmentally based and supported by facility with spoken language (Vygotsky, 1978; Halliday, 1993; Painter, 1999). The individual needs to acquire the ability to manipulate words in highly abstract, structured ways. Language is a symbol system that includes a lexical level of words that represent objects, ideas, states and actions and a grammatical level that relies on structural words to logically connect the content words. These words include prepositions, conjunctions and adverbs.

Facility with spoken language supports the construction of mental models needed to interpret texts - a process which is largely automatic. Syntactic parsing is also generally automatic based on experiences of spoken language in which grammatical patterns of active voice are more common than those of passive voice. As we have already seen, many individuals with LD may have impaired automaticity processes (Fawcett and Nicholson, 1992) which may slow down their comprehension of more complex oral language as in didactic discourse or the giving of instructions.

Language is a tool of thought and it is through language as a mediator of experience that we can internalise knowledge and make it our own. Language affords us not only a tool for communication but also a lineal, sequential process to apply to problems or situations. It allows us to move between seemingly unrelated propositions, see connections and share those with others. Language allows us to formalise insight. Yet insight does not necessarily have to be mediated through language. Art, music, dance are

also formalisations of experience and understandings. However our society requires a high level of linguistic functioning and socioemotional competence. These are areas which may be problematic to the LD individual

2.4.1 Language Development

Language development can be viewed as a dynamic interaction between biological endowment and the world (Karmiloff, and Karmiloff-Smith, 2001; Nelson, 1996; Gibson, 1982; Trevarthen, 1987; Halliday, 1975, 1993; McTear, 1985). The biological component enables the infant to:

“pay particular attention to certain parts of the environment like, say, faces and voices...different brain mechanisms will be more attuned to processing one type of input over another”

(Karmiloff and Karmiloff-Smith, 2001, p.7).

The development of language is dependent upon the interaction between the child and others (Trevarthen, 1985). The principles of dialogue must be grasped before the informative function of language can be developed (Nelson and Levy, 1987). This is supported in the infant by protoconversations, which are the precursors to protolanguage. They are dialogic like exchanges in which the infant intently watches the mother as she speaks then responds with; “a wealth of behaviours that contain almost the whole of human expression in embryo” (Trevarthen, 1987, p.187).

Research has shown that early developmental milestones and mother/infant interaction demonstrate considerable difference in children

later identified as LD (Blumsack, Lewandowski, and Waterman, 1997; Kelly, 1998).

Trevarthen (1987) found that infants and toddlers tended to show individual preference for either interpersonal and personal exchanges or exchanges about objects which, “testify to a source of individuality that is in the child’s own constitution” (ibid, p.198). Mothers are responsive to the lead given by their child. This interaction supports language acquisition through socially based learning (Vygotsky, 1978) and supports Halliday’s notion that the child is an active seeker after meanings and the gathering of knowledge about how to mean. These findings also indicate that the children are determining to some extent their social environment. Actively seeking meaning would have a direct impact on the dual aspects of learning, that is, how to learn and what is learnt.

“When children learn language, they are not simply engaging in one kind of learning among many; but rather, they are learning the foundation of learning itself” (Halliday, 1993, p.93).

Underlying these processes of thought and language is a concept of self or the ‘I’. A prelinguistic form of self-awareness along with the notion of non-conceptual mental content allows for the construction of a psychological being that organises and re-represents the information it learns (Bermudez, 1998). Speech becomes a tool of intelligence that was present from birth, if not before, and allows a way to structure the inner and outer world of experience. Language is a product of thought, but thought is given structure and form by language. Thought and sense impressions become part of our consciousness because of language.

I feel that this is what Vygotsky (1978) was referring to when he described the process of replacing direct sensation with language and therefore thought:

“By means of words children single out separate elements, thereby overcoming the natural structure of the sensory field and forming new (artificially introduced and dynamic) structural centres. The child begins to perceive the world not only through his eyes but also through his speech” (Vygotsky, 1978, p.32).

We gain essential impressions through our senses about the world but we very rarely have any conscious awareness of the reception by our organism of these direct observations because the processes of naming them, categorising them or ignoring them if they are not immediately relevant are so automatic.

Attentional processes, often characterised as weak in individuals with LD (Korkman, and Pesonen, 1994; San Miguel, Forness and Kavale, 1996), can be mastered through the reconstructing of perception by mediation processes such as language. Speech and memory allow us to consider the past and future, to single out and attend to selected items of the visual and spatial field. As we mature we can do this in a more abstract way, mentally, or in our mind's eye.

2.4.2 Halliday- Social/Semiotic Perspective on Language Development

Grammar is a natural outcome of the need to communicate on more than one level simultaneously. We not only convey information when we speak but our relationship to that information and to the person with whom we are communicating. In Halliday's (1975; 1993) description of child

language acquisition he explains that adult language usage is multifunctional with each utterance a complex combination of functions while early child language serves only one function at a time. It has no grammar, with meaning being directly expressed in sounds or gestures – a two level system. Grammar and specialised vocabulary to encode it had to be developed as part of the language system to allow functional complexity. Hence grammar and vocabulary mediate between meaning and form making it necessary for children to extend their language understanding from the unmediated application of a word to an event or object to a mediated form of expression.

This is when the two-level system is replaced by a three-level system in which meanings are encoded in grammatical sequences (Halliday, 1994).

“The new words function mainly as a means of categorising observed phenomena... The child is constructing a heuristic hypothesis about the environment, in the form of an experiential semantic system whose meanings are realised through words and structure” (Halliday, 1975, p.251).

The relationship between these words and structures is not arbitrary but reflects real experience:

“When a child of nineteen months saw a complex phenomenon taking place and reported it as “man clean car” ‘a man was cleaning a car’, the fact that this is separated into three segments reflects the interpretation of composite experiences into their component parts; the different grammatical functions assigned to man, clean, car express the different roles of these parts with respect to the whole; the distinction into word classes of verb and noun reflects the

analysis of experience into goings-on, expressed as verbs, and participants in the goings-on, expressed as nouns; and so on” (Halliday, 1994, p.xviii).

Once the informative function emerges the child’s language begins to resemble adult usage. Children’s cognitive ability to grasp concrete and abstract concepts is reflected in their language use so that a child of two can successfully use words such as “ball”, ‘doll’, ‘wash’ and so on while a child of 5 can talk about ‘good’, ‘bad’ ‘being grown-up’ and so on.

2.4.3 Vocabulary Spurt and Individual Difference

The process of acquiring grammar is fuelled by a vocabulary spurt which occurs when children have somewhere between 100 and 200 words (it varies among individuals). Children increase their learning of words from only 3 words per week to eight to ten words per day (Karmiloff and Karmiloff-Smith, 2001). It is at this point that the child begins to acquire the ability to encode both a personal and/or social meaning and an informative message into a single linguistic structure.

Locke (1994) theorises that the child acquires a large number of words and phrases, possibly through mimetic processes and direct perception, that are, “underanalysed prosodic patterns ...(and) Like other frozen forms, this formulaic material is associative and not generative” (Ibid, p.609).

That is, children, in the early stages of language development, learn patterns of words that associate with other patterns and will use these rather than generate their own linguistic structures. This material is then analysed into constituent parts which allows the child to discover

grammatical structure and rules (Locke, 1994 p.609). This phase is entirely contingent upon the child acquiring so much formulaic material that it forces the reorganisation of this knowledge through analytic processes (p.609). Locke explains that developmental language disorders originate at this point:

“when language does not develop at the usual rate, it is frequently because too little utterance material was acquired earlier, secondary to the slow maturation of species-characteristic neural specialisations in social cognition. Where rapid accumulation of prosodically organised utterances normally forces analytic mechanisms to activate, children with lexical delay have too few utterances for such pressures to build up. And a critical period for activation of our species’ neural specialization for grammar comes and goes without optimal result” (Locke, 1994, p.609).

That is the child has developed language that is compromised at the grammatical level. This may not be readily apparent until the grammar they are expected to comprehend and produce assumes more unfamiliar, incongruent forms as in oral and written educational discourse.

2.4.4 Language as Social Learning

The above theories of language development emphasise the social nature of learning; “children acquire language during the course of interaction with other human beings” (McTear, 1985). They also indicate individual difference due to factors intrinsic to the child. Hence language development is socially determined but biologically constrained.

Not only do children learn morphology and syntax through interaction with others they also learn how ideas and concepts are organised. Wolf and Heath (1992) have described this aspect of learning in a study of two children's language and literacy development. They describe how, through literature based experiences, "children see "rule systems" and common structures that enable prediction of outcome" (Wolf and Heath, 1992, p. 20).

The first of these more formal written genres to be acquired is narrative.

2.5 Narrative

Narrative brings together the two main paradigms of human thought, the logico-scientific and the psychic. Narrative discourse is characterised by stance taking. There is always a particular perspective, an "I", or narrator. In early childhood, and indeed throughout life, this narrator or "I" is being formulated and reformulated as experiences are integrated into the persona (Nelson, 1989) and, possibly, shared with others. Hence stories always contain two "landscapes", one relating to the story the other relating to the teller. The circumstances of the telling will greatly influence the teller and hence the story (Edwards, 1997; Schiffrin, 1997).

A narrative combines the real world of objects, truth, events, and physical realities with the inner world of feelings, goals and beliefs (Astington, 1990). Bruner and Lucariello (1989) propose that for the young child thought, action and feeling are very much connected. The child does not distinguish between thought and feeling, thought and action – to think something is tantamount to doing something. Language helps the child to separate these activities from one another so that speech can be independent of current activity. This developmental process allows

decontextualisation as language begins to separate and organise action, cognition and feeling (Bruner and Lucariello, 1989, p.75). Children learn this through interaction with others. They learn what is demonstrated around them (Bandura, 1986; Dore, 1989). Bruner and Lucariello (1989) argue that the separating of action, thought and feeling is inherent in the structure of narrative discourse.

2.5.1 Narrative Analysis

There are many ways to approach an analysis of narrative. Labov and Waletzky (1997) describe narratives as consisting of particular episodes such as setting/orientation, complication, evaluation, resolution and coda centred on a 'highpoint'. Labov (1972) maintains that all narratives include at least two "narrative clauses". A narrative clause cannot be moved without changing the sequence of events. For instance, "He hit me and I hit him" is very different to, "I hit him and he hit me".

Many narratives are, of course, longer than two clauses. In adult narrative there is often an evaluation which indicates what is interesting, unusual or humorous in the story and underscores the reason it was told in the first place. There may be a coda, eg "and that was that", indicating the story is now over and the next conversational turn available.

Labov felt that narrative serves two functions – one referential, the other evaluative. Because Labov's narrative analysis centres around a high point of the story it is often referred to as "high-point" analysis.

Stein and Glenn (1979) conceived narrative as revolving around the setting of goals and the problem solving embarked on that leads to the achievement, change or abandonment of the goals. Stein and Albro (1997)

maintain that the ability to construct a story depends on the development of a concept of story-telling and what is required to tell a story. Human intentionality is crucial to narrative as are the cognitive abilities to organise content and structure.

Through ongoing research the extent and range of narrative forms across cultural and social boundaries (Schiefflin and Gilmore, 1986; Goodwin, 1997) emerged as did the role both listener and speaker plays (Schegloff, 1997).

Narrative in the above formulations has been considered from a formal, constructivist approach in which the formal structure of the narrative is more important than its symbolic content. It can also be considered from an interpretive or sociocultural perspective (Nicoloupou, 1997). Through formulating narratives children are engaged in, “a form of symbolic action linking the construction of reality with the formation of identity” (Nicoloupou, 1997, p. 180).

Children are also deepening their understanding of the integration of formal linguistic structure with meaning, that is, the ability to share information in a decontextualised form.

2.5.2 Narrative Development

Narrative plays an important role in our lives. The majority of our informal discourse with friends and family is the telling and retelling of events in our lives, usually to support our world view or present our perspective, but also to strengthen our sense of self (Nelson, 1996) and make sense of our experiences (Bruner and Lucariello 1989, p. 79).

Karmiloff and Karmiloff-Smith (2001) see narrative as being a principal form of discourse. However narrative is much harder for the child to understand and construct than dialogue. Conversations, particularly with children, usually provides vital clues about reference, such as pronouns, and are generally about the current situation. Narrative requires the listener to build up a representation of the discourse already given and relate new information to it. Linguistic devices such as tense marking, connectives, and pronouns are all used to link together a series of sentences that form a cohesive whole with a beginning, a middle and an end.

Nelson (1996) posits four levels of narrative development. The first level allows the development of the cognitive ability to order events and understand temporal and causal relations. Toddlers rehearse, through monologue, converting familiar events in memory to language. By three years old they have organised these memories into coherent narratives and formulated verbal propositions involving past, present and future. Young children are able to remember and sequence actions, particularly causal components, very accurately.

In the second level of language development most children are able to produce connected discourse but are generally unable to formulate a recount or report of another person's experience. (Nelson, 1996, p.216). The child may, at this stage, use a 'storytelling' voice or even change their voice to indicate another person such as a parent.

Preschool children can construct a story when asked about routine events and will incorporate bits of stories they hear in their play but are unable to produce problem orientated stories or provide resolutions if a problem in a routine event is suggested. As children gain personal experience they

construct representations of these experiences in collaboration with others and begin to move into level three. At this stage the child may retell another's story as their own. The volume and quality of these joint constructions involving recounting past events, narrating ongoing activities and planning future activities varies between and even within families and is partially dependent on factors inherent to the child.

Level four is characterised by the ability to put oneself in another's position, or in another time or place. It also allows processes of reinterpretation based on reanalysis, re-representation and hence decontextualisation. These processes are crucial to comprehension.

Nelson posits that adults use a 'hybrid' or combination of all levels in their own cognitive and language functioning.

2.5.3 Culture and Narrative

Culturally based ideas, conceptions and structures as well as material regarding expectations and norms of behaviour are disseminated to the child through the interactive narrative processes of collaboration in story telling and listening to culturally relevant stories. This impacts on both the content and form of language. Hence the majority of white Western children organise their language topically, narratively or expositively, dependent upon demand or situation, whereas black American children will organise knowledge associatively (Michaels and Cazden, 1986). Minority groups may be racially, economically or culturally different from the mainstream cultural group.

In a study of a mother and son from a minority group Heath and Branscombe (1986) involved the mother in a research project centered on

oral book reading to her pre-school child. They concluded that children's learning of different genres and schema for different types of narratives as well as questioning routines to aid comprehension was dependent upon the language and occasions afforded to the child in their early years. They warn against assuming, "that language development proceeds through an invariant series of stages" (Ibid, p.32).

These fundamental differences in language organisation can lead to educational mismatches between teacher and pupil that impact on the effective communication and dissemination of knowledge to minority groups.

2.6 Conclusion

Language is an extremely complex meaning system. It encodes knowledge but there is not a one-to-one mapping of words to world. The raw experiential data of life is mediated firstly by the parents' use of language, as demonstrated by Nelson's (1989) work in collecting Emily's crib monologues, then by children as they develop their linguistic skills through social interaction. "Parents narrate their children's daily lives" (Engel, 1995, p.33).

Language facilitates the mediation of life experiences by constructing a psychological 'self' (Bandura, 1986; Bermudez, 1998) that redescribes experience (Karmiloff-Smith, 1992), by oneself to oneself, in a process of internalisation (Vygotsky, 1978). The constructed self is based on inherent predispositions and mechanisms in interaction with environmental, ie. social and cultural, influences. Internalisation allows new knowledge to be more readily applied across the spectrum of already acquired experience, knowledge and understandings. Our organism uses 'self' to relate directly

perceived sense data (Gibson, 1979), to acquired content or knowledge about these. We move from external events to an internalised representation of these events (Nelson, 1996). The role of language can be seen as a form of mediation that creates order in the world (Nelson, 1996; Engel, 1995). “Language constructs the experience it describes rather than merely reflecting that experience” (Engel, 1995, p.33).

Language helps us organise experience. Narrative language and narrative thought play a role in integrating affect, cognition and action. If language acquisition is somehow compromised so that it does not develop within conventional parameters it will affect the ability to internally organise, structure and redescribe experience. Consequently the processes of relating new and acquired knowledge will be diminished to a greater or lesser extent. The constructed self may not be as internally cohesive leading to a cascading of educational, psychological, motivational, interactional and emotional problems.

Human beings engage in semiotic processes (Halliday, 1993). We are constantly seeking meaning in all our sense impressions. Language enables us to quantify this meaning. Halliday (1994) talks about the semiotic system of language that seeks to construe reality within its own terms while Nelson (1996) and McCabe (1997) iterate the importance of language in developing autobiographical memory and a sense of self. Painter (1999) argues the crucial role of language in learning to the extent that one cannot be considered without the other. Vygotsky maintains that language is not an “innate, natural form of behaviour” but rather developed and learned through a “historical-cultural” process (1962, p.51).

If these theories relating to development and learning are correct then it is essential that children develop the potential to describe the world of experience using a symbol system such as language. In Karmiloff-Smith's (1992) terminology this is the process of connecting to and redescribing personal and vicarious experiences. In Halliday's theory it is the construal of reality through the linguistic system. Becoming involved with the content of perceptions in a metacognitive sense, that is through the mediation of a psychological self system - "I", is crucial to the development of mental models and the use of a symbol system such as language. In general terminology this is described as comprehension and results in a mental representation of what has been understood by the receiver (Trabasso and Magliano, 1996).

The primary focus of this study was an investigation of individual difference in the use of language in comprehending and composing forms of narrative commonly used in Kindergarten. The analysis of the data collected using SFL should reveal something of the nature and extent of individual differences. By instituting a program in which the child is supported and guided in understanding oral and written narratives and by allowing them to talk about their own experiences within this framework the child should become more consciously aware of and engage in processes of metacognition that support the development of language as a metaphorical system and the concomitant cognitive skills necessary for independent learning. If even only small gains can be made after a period of ten weeks it will indicate the efficacy of this type of instruction.

Chapter Three

The Study – Methodology and Procedure

Introduction

The broad area of inquiry in the study was how language, oral and written, comes to be a meaningful mediator between the individual and the external world. To allow observation and promote understanding of this process the purpose of the study was to observe and describe receptive and expressive language used by children in the narrative and recount genres in their first year at school. That is, how they understood stories, interpreted instructions, and organised and used language to convey meaning in both narrative and recount genres. Since story comprehension and production were shown to be problem areas for children with LD (Worden, 1986; Graesser, Golding and Long, 1991; Roth, Spekman and Fye, 1995; Curran, Kintsch and Hedberg, 1996; Carlisle, 1999) teaching to these areas was deemed to be beneficial. Hence the literacy experiences focused on comprehension, retelling, oral recounts and oral composition.

The study was composed of a series of literary based experiences given individually to each of six children. Two of these children were achieving as expected in the first year at school while the other four experienced varying problems. The children were given a listening comprehension test at the beginning and end of the study. The experiences extended over a ten week period and included retelling stories, personal recounts and shared book reading demonstrating comprehension processes. Each

session was audio-taped allowing the collection of language across genres such as, narrative, conversation, question/answer and discussion.

Each component of the study is described below beginning with a discussion of the case-study approach and ethical considerations. This is followed by a description of the books presented, the data collected, the selection of the participants, the selection criteria - both behavioural and academic, the literacy experiences which constituted the content of the sessions and the initial assessment tasks. The elements of systemic functional linguistic descriptions of language which were used to analyse the data are then briefly outlined.

Case Study Approach

The nature of the planned intervention was such that it was impossible to work with large numbers of children. Although there are limitations to the case-study approach in that it cannot be generalised to the relevant population of children, it is invaluable in exploring detail which may inform additional qualitative and/or quantitative studies and so lead to the formulation of generalisations. Examining a particular instance in detail can illuminate a general problem and illustrate how many factors may be contributing to a particular outcome. If a difficulty can be pin-pointed in the specific instance, studies involving larger numbers of children can be designed to investigate generalizability.

The heuristic nature of a case study also allows different theoretical paradigms to be considered in attempting to explain the reasons for the phenomenon (Merriam, 1998). The single subject or case study design is generally used in psycholinguistic research due to the intensive nature of the analysis techniques.

Ethics

Ethical considerations are paramount in dealing with children. Kooch and Kieth-Spiegel (1994) point out the delicacy needed in working with children as research subjects to ensure they experience minimal stress. The researcher was also the Kindergarten teacher and so well known to the children in the study and to their parents. This also made the context of the study more natural. Much educational research in the area of LD has been conducted in unfamiliar, isolated experiential settings with people who are not normally in the child's life. This can have an effect on the language produced by the child (Nicolopoulou, 1997).

Owing to ethical considerations the child-related activities were conducted in a room located directly opposite a classroom and just a short distance from the children's own classroom. The door was left open. Although it is ideal to have another adult present at all times this can distract the child and was difficult to arrange.

The parents were notified about the times and dates that their child was withdrawn from class. The Principal and Deputy Principal were also notified of all activities conducted on the school premises. At the conclusion of the intervention the researcher arranged an interview with the parents to talk about the results and answer questions.

3.1 Data

3.1.1 Description Of Books

A range and variety of texts were orally presented to the children. Although all of these could be classified as narrative there were significant variations. Three Billy Goats Gruff belongs to a group of fairy tales traditionally told or

read to young children. It follows a simple narrative structure with repeating episodes that allow predictability and ease of memorisation of the main story sections. It is highly likely that the children had been exposed to the story previously. The particular version, (Blair, 1981), I chose to read aloud to the class prior to the recall task used simple vocabulary, was easy to follow but included some unusual syntax. The text was closely supported by the illustrations.

Sam and the Ghost Stories (Mahy, 1984) also follows a clear narrative structure. There are some elements relating to character and mood which are not essential to the narrative structure. The text is simple and the vocabulary controlled as this book was designed for beginning readers. The pictures are secondary to the written text. With this text I was hoping to separate complex language factors from comprehension of the main story elements through text rather than pictures.

Tigger is part of the *House at Pooh Corner* series by A.A. Milne (1932). This is a more complex text with harder vocabulary, difficult syntax and illustrations that are incidental to the text. There is a much greater emphasis on characterization than any other text presented.

Sunshine, (Ormerod, 1981) and *The Gift* (Prater, 1985) are wordless books. The story is told pictorially.

Stones of Plouvenic (Wilson, 1960) and *The Mortal Bride* (ibid) are both more complex fairy tales. They are far more complex in their plot development and the language more decontextualised. Both these stories were very difficult for the children to follow and so were not included in the analysis.

I'm Coming to Get You, (Ross, 1984) *Dragon Quest*, (Baillie, 1996), *Jeremy's Tail* ((Ball, 1990) and *Here Come the Aliens* (McNaughton, 1995)

are all age appropriate picture books. Although the pictures are highly related to the text not all the text is represented pictorially requiring the child to follow the written text to gain full meaning.

3.1.2 Data Collected

Three narrative texts were collected from each child in the study. Two involved the retelling of a story either from memory, the *Three Billy Goats Gruff* (Blair, 1981), or immediately upon hearing a story being read, *Sam and the Ghost Stories* (Mahy, 1984). The third was a personal recount. Other texts collected incidentally included recounts or personal stories.

The purpose in asking the children to retell a story just heard was twofold,

- to probe their comprehension of the story and
- to collect text so that the child's use of language both at a discourse semantic level and at a lexico-grammatical level could be examined.

3.1.3 Narrative

The minimum requirement for a narrative appears to be two or more clauses in a sequential, causal relationship involving an animate being. The inclusion of goals, agency and complications develops over time but may appear as early as pre-school (Nelson, 1996). In my experience Kindergarten children are able to construct a narrative sequence of two clauses in a sequential, causal relationship.

Labov (1997) separates personal narrative from recount by specifying that the event have some significance to the speaker in their conception or construction of 'self'. The stance taken by the teller is referred to as the narrative voice and is perhaps the most fundamental aspect of narrative that separates it from recount and from any other genre type. It allows the

communication of a particular attitude towards the events being recapitulated (Hoff-Ginsberg, 1997, p.223). Most children at the Kindergarten level cannot utilise linguistic resources to indicate their personal stance. In this study I didn't ask for a story or personal narrative but rather a recount. However there were some instances of spontaneously occurring narratives. In the requested narrative instances the children were retelling a known story hence the narrative voice tended to emerge as intrinsic to the story.

3.1.4 Recount

Oral recount is the first genre that children learn to comprehend apart from contextually based oral exchange. It is closely related to narrative which is the first de-contextualised communication that children develop (Nelson, 1989). Martin (1992) defines recount genres as dealing, "unproblematically with activity sequences". They vary from narratives in that there is no complication or problem to be resolved. A recount will generally have an orientation, a record of activity and a reorientation. It is usually an actual instance or episode and will also generally be within the speaker/writer's own personal experience or be a direct retelling of another's experience as related to them.

3.1.5 Comprehension Responses

Ten stories were read to each child individually over the ten week period. The data collected was comprehensively based, that is the children's responses, both spontaneous and in response to questions interpolated while the text was being read were collected. These texts and the questions asked are described in more detail at a later stage.

3.2 Selection of participants for the Study

Six children were selected from one Kindergarten class in an upper to middle class urban area. Research has indicated that if the Kindergarten teacher's assessment is based on current academic performance it is a reliable predictor of future academic attainment (Taylor, Anselmo, Foreman, Schatschneider, and Angelopoulos, 2000). One of the children in my Kindergarten class was reported by the pre-school as having Attention Deficit Disorder, another had an extensive history of familial dyslexia. Both were included in the study.

3.2.1 Selection criteria

Identifying children with LD is not usual in the first year of formal education as LD is demonstrated by a discrepancy between attainment and ability. However certain Kindergarten behaviours, in my experience, have been common in children later identified as Learning Disabled. The checklists which follow are based on those observations and on research. Academic attainment and behaviour formed the basis for selection of the children. Academic skills in Kindergarten that have proved to be reliable predictors of learning disabilities include: letter names and sounds, ability to write one's own name, and letter and word copying (Weinberger, 1996). Hence these formed the basis of the selection criteria. Of the six children selected two demonstrated expected levels of language use and Kindergarten attainment. The other four demonstrated some problems with the educational demands of Kindergarten.

Academic Attainment:

- 1) Inability to read the most highly exposed sight words. That is, “I am a girl/boy”, “I can jump/skip”.
- 2) Difficulty composing a story or recount, ie tendency to label illustration, “This is...”, Or to give only one proposition per story or list events with no causality or sequence.
- 3) Slow grasp of early reading behaviours ie. word pointing, context cues, picture cues, print as meaningful, picture related to text.

Behaviour:

1) Classroom behaviours

- Frequent requests for clarification of directions,
- seeking correct work procedures from classmates
- copying.

2) Poor listening skills demonstrated by:

- failure to apply instructions given orally,
- maintain understanding of class discussions as demonstrated by an inability to answer relevant questions or by the nature of their questions,
- inability to learn games presented orally with demonstrations.

3) Failure to complete tasks such as:

- “cut-n-paste” worksheets
- colouring even one section of a three part colouring task

- complete sections of craft tasks such as covering an area with tissue paper.

4) Poor fine-motor skills such as:

- immature pencil grip
- inability to maintain form or size of a simple writing pattern eg

//////////

- inability to cut on a marked straight line

Permission

The parents of all the selected children were contacted by letter, approved by the University of Sydney Ethics Committee, seeking permission for the researcher to conduct various language tasks, to administer some commercial, standardised tests and to refer to any school assessment procedures that might be completed outside the classroom.

3.3 Literacy Experiences

The sessions were conducted on a one-to-one basis and consisted of the same linguistically based experiences for each child. Due to absences from school and the tight schedule of sessions some children missed some. The sessions and attendance of each child are given in Table 1. Some of the activities required more than one session to complete.

Stories include formal book language employing grammatical and lexical metaphor, simile, indirect cause and effect and other factors common to de-contextualised language. The two videos included were *'I want a Cat'* and *'I'm coming to get you'* by Tony Ross (1989). The videos were viewed in a

whole class setting before the individual lesson. These books were also read to each child in the lesson indicated.

Texts analysed using SFL and included in this study are:

Sam and the Ghost Stories (Mahy, 1984); *Three Billy Goats Gruff* (Blair, 1981), each child's personal recounts.

Texts used for comprehension and included in this study were:

Tigger (Milne,1928); *I'm Coming to get You*; (Ross, 1984) *Here Come the Aliens* (McNaughton,1995); *The Bay* (Bacon,1987); *Dragon Quest* (Baillie, 1996).

The selection of texts was guided by age appropriateness, interest level, relevance and variety of language use. The associated tasks were designed to probe understanding, elicit language and engage the child actively in the process of gathering meaning from text. The *Three Billy Goats Gruff* was read to the whole class a month before the individual lessons began. Most children knew this story from previous experiences at home and at pre-school. The children also learnt a song recounting the story which was sung regularly.

3.3.1 Literacy Experience - Structure

The teaching method employed was interactive and co-operative providing scaffolding as necessary. The lessons were almost exclusively oral and included demonstration or explanation of vocabulary or concepts. Each child participated in two sessions of approximately 20 minutes per week for ten weeks on a one-to-one basis with the researcher. Each session was audio taped and transcribed by the researcher as soon as possible.

Each session followed one of the formats below depending on whether it was a retelling task, recount or a listening/response task:

a) Recount of an event memorable to the child. The prompt was “Tell me about something interesting or exciting that has happened to you.” If there was no response I followed on with, “It might be your birthday or perhaps going on holiday” If this failed to elicit anything I would make it more specific, “Tell me what you did on the weekend”.

I then engaged the child in a conversation about the event to find out, if not clearly indicated, who was involved or did a particular action, what the nature or sequence of events were, where it happened and why, if relevant, when an episode occurred, and their individual feelings and responses as well as other’s involvement and/or reactions.

b) Story Comprehension. The story was read to the child interspersed with questions or spontaneous responses from the child. The questions are detailed in Chapter 5. Some examples are:

Tigger: “Why is Piglet going closer to Pooh?”

Dragon Quest: “What is a quest?”

The Aliens are Coming: “Why are they going?”

I’m Coming to get you: “What happened at the end?”

The Bay: “What’s going in and out?”

c) Child retold a familiar story, *Three Billy Goats Gruff*. This task was to recall a story heard previously in a whole class setting. If the retelling was unclear, lacked sequence, missed an episode, missed cause/effect relationships or other aspects crucial to the meaning I asked questions to

elicit an accurate understanding, eg. “Who crossed the bridge first?” “What did the Troll want to do?”. The child who had been reported as ADD and the youngest child in the study were given nine pictures to sequence after they completed their initial retelling. They then retold the story using the pictures as a guide.

Success at the task level, either comprehension or telling or retelling a story, was important to the child and teacher. The type and level of support each child needed to gain understanding, if possible, of a particular text elicited language that indicated aspects of their language functioning. Strategies to scaffold understanding were sequenced, as applicable, as follows:

- 1) drawing attention to the pictures
- 2) re-reading certain segments
- 3) posing leading questions
- 4) explaining terms or concepts
- 5) demonstrations or analogy

The experiences and attendance by each child are given in Table 3.1.

Table 3.1 – Literacy Experiences and Attendance

A = Absent

1 -3	Testing	Lewis	John	Lucy	Rory	Tim	Mark
4	Sam and the Ghost Stories	Lewis	John	Lucy	Rory	Tim	Mark
5	Personal Recount	Lewis	John	Lucy	Rory	Tim	Mark
6	3 BGG	Lewis	A	Lucy	Rory	Tim	Mark
7- 11	Tigger	Lewis	John	Lucy	Rory	Tim	Mark
12	Sunshine	Lewis	John	Lucy	Rory	Tim	Mark
13 - 15	Stones of Plouvenic	Lewis	John	Lucy	Rory	Tim	Mark
16	I'm coming to Get You	A	John	Lucy	Rory	Tim	Mark
17	Dragon Quest	Lewis	John	Lucy	Rory	Tim	Mark
18	Here Come The Aliens	Lewis	John	Lucy	Rory	Tim	Mark
19	I Want a Cat	Lewis	John	A	Rory	Tim	Mark
20	Lost- Oral Story	Lewis	A	Lucy	Rory	Tim	Mark
21	The Gift	Lewis	John	Lucy	Rory	Tim	Mark
22	The Bay	Lewis	John	Lucy	Rory	Tim	Mark
23	Big Concrete Lorry	Lewis	John	Lucy	Rory	Tim	Mark
24 -26	Mortal Bride	Lewis	John	Lucy	Rory	Tim	Mark
27	Jeremy's Tail	Lewis	John	Lucy	Rory	Tim	Mark
28 - 29	Testing	Lewis	John	Lucy	Rory	Tim	Mark

3.4 Initial Assessment

Standardised testing of children as young as five poses a number of problems. Pen and paper tests are unsuitable so I selected a pre-test, the Peabody Picture Vocabulary Test– Revised (Dunn and Dunn, 1981) to assess general aptitude. I chose this test because it is applicable for young children and uses vocabulary development as its assessment tool. Although this version is old it was readily available through the school and was in current use by the School Counselor.

The Listening Test (Barrett, Huisingsh, Zachman, Blagden, and Orman 1992) is an oral comprehension test that gives a comprehension age from 6 to 13 years. The selection of an American test to assess listening comprehension was unavoidable. We were unable to find any test that included children younger than six and no Australian test was available. It was the only oral test I could find at the time that was standardised, gave a comprehension age and could be given to children as young as 5. I changed some of the more obvious American terms to Australian terminology and accepted some different responses as correct. For instance “janitor” was” changed to “cleaner”, “baseball” to “cricket” and “yard work” to “gardening”.

Although testing of this nature is limited it gives some objectivity to the comparison of the children and confirms that they are of a similar ability.

Results of all testing are given in Table 2 Chapter 4

3.5 Analysis

Language falls into two complementary components labeled receptive language (comprehension) and expressive language (linguistic product

oral or written). Expressive language or content, that is the message encoded in the language, is dependent upon comprehension of the information given. The ability to express understanding is dependent upon one's functional use of language. There is considerable overlap and dependency between the cognitive processes that result in expressive and receptive language use. The analysis covers both expressive and receptive language. The results of the expressive language use are presented in Chapter Four, receptive language use is presented in Chapter Five. The results are organised under the headings, Structure, Content/Field and Cohesion. Stein and Glenn's (1979) story structure was used. All linguistic data was analysed using Halliday's (1994) SFL. An explanation of SFL is given below followed by a brief description of the parameters of the headings - Structure, Content, Cohesion.

3.5.1 Halliday – Systemic-Functional Grammar

In order to explicate the relationship of language as a mediation tool between the individual and the external world Halliday's (1994) Systemic-Functional Linguistics (SFL) theory was used.

Halliday has developed both a sequence of language development and the most comprehensive functional grammar to date. A functional grammar focuses on the purposes and uses of language. Traditional grammars label parts of speech and words in a fixed manner and impose rules about how these are to be used. Functional grammars are more flexible as the labeling of words or parts of speech is determined functionally across texts. Rules, or rather, conventions of usage, are based on what people do with the language to support communication.

A functional grammar through interpretation of linguistic texts, systems and elements allows a thorough examination of both the processes of language and language development to explicate how those elements have been combined to convey meaning. Many researchers (Halliday, 1975, 1985; Painter, 1999; Torr, 1990) studying early language development have used functional grammar to analyse discourse in adult/child dyads and child composed texts both verbal and written.

3.5.2 Context and Functions of Language

There are two inter-twined components to SFL. Register is the ‘context of situation’ which includes field, tenor and mode. The other is ‘functions of language’ and includes the ideational, interpersonal and textual systems. There is a systematic relationship between the two. Field, or content, is reflected in the ideational or experiential meanings of the text, tenor is reflected in the interpersonal meanings, and mode in the textual meanings (Halliday, 1985). The lexico-grammatical level deals with words and structure at a clause level. It includes the three meta-functions, Ideational realised through the system of Transitivity, Inter-personal realised through the system of Mood and Textual realised through the system of Theme. The Textual meta-function goes beyond the clause level to include cohesive devices that allow the organisation of longer pieces of text.

3.5.3 Field - Ideation

In the ideational component the clause has a representational function, what the clause is about. The ideational component can either be experiential or logical. Experiential meaning is how we represent experience in language. It includes participants, processes, and circumstances. Events are either experienced externally, forming the

category of material processes, or internally, forming the category of mental processes. Processes may also be verbal or relational as in identifying and classifying.

The logical component of the clause, “creates extendable, iterative structures, linking clauses or other units of text together in a logical series” (Painter, 1999, p.50). These may be relational as in taxonomies or; ‘generalized logical-semantic relations that are encoded in natural language’ (Halliday, 1994, p. 191). Conjunctions are an important way of expressing logical relationships. For instance young children may simply add clauses together with no logical relationships being expressed except proximity. In the following Kindergarten text texture is being achieved by co-hyponymy and exophoric reference. The words are related through association - “This is the moon and this is an alien and this is a star”. A more developed text might include variable relationships among clauses: “This is Amanda’s house. She has a baby called Jordan *and* I am the baby’s uncle” (Kindergarten child). Here there is pronominal reference and a conjunction.

Projection is another logical relation in which someone is reported as saying or thinking something as in, “She said you’re allowed to use that paper ” (Kindergarten child).

3.5.4 Lexico-grammatical level - Transitivity

Transitivity is the system through which ‘who does what to whom’ is represented. It also includes circumstances, when, where, why and how. Transitive verbs express the presence of a causal agent. For instance transitive case in: “Big Bird is turning Cookie Man” and the intransitive in: “Big Bird is turning with Cookie Man” (Karmiloff-Smith,1992). In the

first instance an agent is doing the action in the second instance there is no agent. Children as young as 27 months were aware of the difference in these two propositions (Karmiloff-Smith, 1992, p. 95).

Halliday provides another way of interpreting process types, ergative/non-ergative. In this interpretation the participant who is mainly involved in the action remains constant whether the cause is external or internal. In “Big Bird is turning Cookie Man” Cookie Man does the action, Big Bird is the agent. In “Big Bird is turning with Cookie Man” both participants are doing the action and there is no agent.

Ergative

Big Bird	is turning	Cookie Man
Agent	Process	Medium

Non-ergative

Big Bird	is turning	with Cookie Man
Medium	Process	Accompaniment

In the transitive/intransitive interpretation Big Bird is the actor in the first instance while Cookie Man is the goal. In the second instance, Big Bird remains the actor even though he is not the cause of the action. This time Cookie Man is a circumstance.

Processes covered by verbs in the Transitivity system also include states of being or having.

“Fergus has a very loud voice” places him in the group of children with loud voices. To say that, “He has the loudest voice I’ve ever heard in a

child” places him in a unique category. Hence there are orders of being or having.

Participants may be either assigned the role actor or goal but are also subject to specific roles in relation to the process. A mental process such as seeing or liking will be performed by a sensor, human or other, while what they experience is assigned the role of phenomenon, such as:

I	don't like	the quiet
Sensor	Process	Participant: phenomenon

There are six processes through which we classify our experiences – material, mental, relational, behavioural, verbal and existential.

Material processes include events such as melting or boiling and actions such as pouring or jumping.

Mental processes include perception, cognition such as forget or think, and affection such as liking or being amused, eg ‘Mary saw the bird’. ‘I forgot’.

Relational processes refer to attributes and identification eg. ‘She is pretty’.

Behavioural and verbal processes are both actions such as ‘cried’ and ‘said’.

Existential processes assert the existence of something eg ‘There is only one thing to do.’

A non-conscious entity can be personified eg. ‘My car hates hills’. ‘That tree likes the rain’.

Circumstances are the conditions associated with the process. They relate to time, place, manner, quality, comparison, cause, accompaniment, matter and role. They tell us when, where, why, how, how many, and as what.

I was locked out,	without my dog, without my brother.
	Circumstance: accompaniment

3.5.5 Tenor - Interpersonal

The clause is used for exchange in the interpersonal metafunction. It may be an exchange of goods and services, a proposal, or an exchange of information, a proposition. Mood structures express interactional meaning, that is, they determine what the clause is doing as an exchange between the speaker and listener. Mood options may be either declarative, interrogative or imperative. They enact social relations often through prosody rather than words or structure. Modality is the system through which these options can be modified. “You *must* come here!” as opposed to, “Jane, *please* come here.” Modality terms allow degrees of probability and usuality. “They *always* have fruit wraps at recess’. “They *may* have fruit wraps today’.

Conversational structure is about the exchange of meaning in dialogues. This is accomplished through a sequence of speech acts which may be characterised as; an offer, a command, a statement, or a question. Responses to these speech acts will either be accepting/declining, complying/non-complying, acknowledging/ignoring, answering or disavowing. Within this structure there may be moves to acquire more information before responding, exchanges of conventional politenesses, challenges or follow up comments. Hence conversation is often negotiated

between the speakers with the outcome unpredictable (Eggins, 1994, p.109).

3.5.6 Lexico-grammatical level – Mood

The Mood function relates to clause as exchange and enables one to examine how the speaker /writer is positioning the audience, that is, the role the audience is to adopt. In a narrative the audience is being asked to accept certain things without evidence and to relate in an emotional way to the content. A story is not simply a list of actions or episodes. It must capture the listener’s attention and elicit an emotional response.

The Mood component consists of two parts, the subject and the finite operator which is part of a verbal group. The lexical verb and the rest of the sentence forms the residue. The information in a clause can be thought of as a proposition. The finite element provides the circumstances for that proposition, eg. time, - past, present or future; judgement - usually, occasionally, never (or truth, untruth, belief and so on). For example:

My old cat	unfortunately	may	never	catch	a mouse
Subject	Modal adjunct	Modal verb	Modal adjunct	Finite	Complement
Mood				Residue	

Predicator, Adjunct and Complement make up the residue. The predicator is the lexical part of the verbal group, ie. “is sewing”, “is” is the finite and part of the Mood function, “sewing” is the predicator.

Adjuncts may make comments or provide circumstances.

Complements usually take the form of a nominal group so may have the potential to become subject. They answer the questions ‘is/had what’, ‘to whom’ ‘did to what’.

Lucy	had	a little wee piggy	at school
Subject	Finite	Complement	Adunct
Mood		Residue	

Lexico-grammatical meaning is achieved when the opposition between the two functions of action and reflection is achieved. That is all utterances construe both a representational meaning and a role for the speaker in relation to that meaning. In the young child this will often be signalled by intonation. In the mature speaker semiotic action, that is the interpersonal aspects of making meaning, are, principally construed through the Mood system or choice of nature of utterance eg. declarative, interrogative or imperative. Semiotic reflection, that is the meaningful representation of events and experiences, is primarily construed through the Transitivity system or the classification of events into material and mental and the use of configurations involving participant, roles, circumstances and actors.

3.5.7 Mode - Texture

The textual component in the grammar allows one part of a text to be related to another part and in English serves both a structural and a cohesive function. It is defined in terms of the language itself. At the cohesive level of texture non-structural resources are; reference, ellipsis and substitution, conjunction and lexical cohesion. These are referred to as non-structural because they do not operate at a clause level but at a text

level, that is, beyond the clause. Each of these resources is described below.

3.5.8 Lexico-grammatical level - Theme

There are many ways in which a sentence or longer text could be organised but within each language there are preferred tendencies. We come to expect certain conventions will be followed through a process of familiarization with the language. In English new information tends to be given at the end of a sentence with the main topic or theme at the beginning:

My house	is being renovated
Topic (Theme)	Comment (Rheme): new information about the house

It	's a real mess
Topic: given information	Comment: new information

The speaker announces what they are going to be talking about and then gives information about it.

This same organisation generally tends to be followed on larger texts with known or familiar information given first followed by new information.

Marked and Unmarked Theme

In English clauses tend to follow the pattern of subject first, process next, followed by circumstance, goal, object and so on. When the subject forms the Theme of the clause, that is, it comes first, the Theme is unmarked. This is characteristic of congruent language. An example would be:

“We (Theme) went fishing in the morning and then we cooked the fish for dinner.”

If the subject is placed in a different part of the clause the Theme is marked and the language form is incongruent:

“In the morning (marked Theme) we went fishing and then, for dinner, we cooked the fish.”

3.6 Non-structural Cohesive Devices

Reference

Cohesive resources of reference allow the speaker/writer to introduce participants and track them throughout the text (Eggins, 1994). These form ties that hold sentences together. A new participant is signalled with a presenting reference while an already existing participant is presumed. Reference is when one word is used to replace or refer to another word, phrase or clause. For example:

‘The cat was sleeping. She was under the bedclothes’.

Here *she* is anaphoric as it refers to ‘the cat’ already mentioned in the text.

Exophoric reference refers to something outside the text but which is known to the listener;

‘KM went to *the* Athletics carnival’.

The is an exophoric and presuming reference as it refers to something outside the text, ‘athletics carnival’, and assumes both reader and listener know which athletics carnival.

Reference may also be homophoric referring to our shared context of culture; ‘The moon is bright tonight’, or exophoric when it can be understood from the immediate context. Endophoric reference is when the referent can be retrieved from within the text.

Substitution.

Another cohesive tie is the use of words or phrases that substitute in the same grammatical slot as another. For example:

“We made jelly yesterday.”

“KV did that too.”

The process is expressed through the verb “did” while “that” is used as a substitution for “made (making) jelly yesterday”. Although there is a similarity between reference, substitution and ellipsis they are quite distinct in both use and meaning.

Ellipsis

Ellipsis is when something is left out that is understood by both speaker and listener. For example,

“Seen Gaz?”

“No, he’s already gone.”

The first speaker leaves out “Have you ..”. The second speaker leaves out, “I haven’t..”.

Ellipsis is a lexico-grammatical relationship rather than a semantic one.

Conjunctions

Conjunctions not only tie two sentences or clauses together they also provide information about the relationship between the propositions given. For example:

We went to the river *and* saw some yabbies.

We went to the river *to* see some yabbies.

The relationship between the two clauses in the first example is quite different to that in the second example. In the first instance we just happened to see some yabbies. The two clauses are coordinate in meaning. In the second example we went specifically to see some yabbies hence the second clause is subordinate in meaning to the first clause.

Interpreting conjunctions is essential to gathering meaning from text.

Lexical cohesion

Lexical cohesion refers to the use of repetition, antonyms, synonyms, meronyms (one word referring to the whole and another to a part, cat – paw) and hyponyms (one word refers to a class and the other to an item in the class, beef – meat).

Often a word with a similar meaning is used to either enhance the text aesthetically, deepen meaning or to introduce or apply terminology. When the new word is familiar to the listener/reader this poses no problems but if the word is not generally used it can confuse the young or those with LD. In the first example the words are quite easy to follow through the text:

My dad was cutting down a *tree* when the *limb* broke off and knocked his ladder down.

Even to a reader who may not know that the word “limb” can refer to any protruding part of an object “limb” in this instance quite clearly refers to a part of the tree being cut down.

In the next example meaning is not quite as clear:

Far ahead was a *pinpoint of light*, perhaps an *opening* to the surface?
As Samantha groped her way through the dark the *aperture* slowly widened.

A lexical chain is formed by “pinpoint of light”, “opening” and “aperture”. The meaning of “aperture” can be inferred from the preceding words if it is recognised as being related to them but it is also quite possible to assume that something new is being introduced.

Lexical relations may be taxonomic as in; co-hyponymy as in members of a superordinate class eg. magpie, curlew (both belong to the class of birds); contrast as in ‘free/loose’; similarity as in ‘house/residence’; meronymy as in a part/whole relationship, ‘face/ mouth’; or co-meronymy where two words relate to a common whole, ‘class/playground’. Words may be related through expectancy, that is, one word is often associated with another, ‘teacher/school’.

3.7 **Rhetorical Structure**

Rhetorical structures are the top-level organisational patterns of text. Halliday and Hasan (1976) describe them as text-forming structures. They are used to shape a discourse and to establish and maintain meaning. If text-forming structures are incomplete the text would be seen as lacking coherence. Coherence is the contextual properties of a text. These include context of culture, which determines accepted generic structure, and content of situation, which determines register. Coherence is the bringing together of all aspects of cohesion in harmony with content, that is, the experiential meaning of the text (Halliday and Hasan, 1985). Content is an important aspect of coherence. A text is coherent when content, that is the meanings or propositions expressed, are realised systematically through

the grammatical resources of lexis, transitivity, clause complex relations and internal dimensions of cohesion (reference, conjunctions, substitution and ellipsis). Hence content needs to be selected for relevance and necessary elaboration, then organised rhetorically and grammatically to allow others access to the meanings.

3.8 Organisation for Reporting

Halliday perceives language as a system in which selections must be made from the possible set of options. At the level of the context of the situation these choices are described under the headings of, Field, Tenor and Mode. Field relates to the subject or activity type. It may be economics, education, mosaic making, or a football-match commentary. Tenor relates to the roles taken by participants in the exchange. It may be between friends, boss to employee, mother to child, teacher to pupil and so on. Mode is the form of the text, spoken/written. It impacts on the structural organisation of the text and includes textual aspects of cohesion. These dimensions are then further refined in the lexico-grammatical choices already described above.

Text type, ie narrative, exposition, conversation, operate at a text level and so sit above the dimensions just described. The diagram below sets out the organisation for reporting in this study.

Structure	Text structure/Genre – narrative, recount.
Field/Content	Lexical relations, Transitivity – clause complex relations, activity sequences
Cohesion	Reference, conjunctions, theme, textual - cohesion

3.8.1 Structure

Genre is the overall organisation of text. A text may be designed to share experience, explain, answer, argue and so on. Narrative is one genre form. In order to use language to inform the child must develop narrative ability.

The first research question related to the ability to reconstruct a narrative. A story, in our culture, requires a beginning, a middle, and an end. Each of these sections is composed of event sequences. In each child's retelling I will be considering the level of abstraction and inclusion of detail. Mode can also influence structure. A spoken text may be a conversational exchange, a story-like narrative or an information exchange. Hence mode as it impacts on story structure will be included.

3.8.2 Content/Field

Field is established through words – participants or noun groups, processes (verbs) and circumstances. The control and use of vocabulary is important in the construction of field. The lexis can either be conventional or idiosyncratic. The use of conventional lexis by children generally indicates their word knowledge, word retrieval ability and effective use of vocabulary.

Relations between words are also important to representational meaning. This is particularly relevant to the expectancy relations between activities in activity sequences. Field is defined by Martin (1992) as sets of activity sequences. This will be further explained in Chapter Five as it applies particularly to the comprehension analysis.

3.8.3 Cohesion

Cohesion refers to the internal properties of the text. Each part of the text needs to relate, that is, make sense in relation to other parts of the text. A cohesive text allows information to be shared linguistically, not limited to experience or shared context. Cohesion is determined by reference, lexical relations, conjunctive relations and relevance of structure (eg. conversational, narrative). Cohesion is realised through the Textual metafunction. It is used to organise the experiential and interpersonal meanings into a linear and coherent whole (Butt, Fahey, Feez, Spinks, and Yallop, 2000, p.39).

Chapter Four

Results

Introduction

This chapter presents the results of the linguistic component of the study addressing Research Questions 1, 2 and 3. Questions 1 and 2 related to the children's use of cohesive and grammatical resources to give an individual oral retelling of; a narrative which had just been read to them and a familiar story, *Three Billy Goats Gruff* (Blair, 1981); as well as a personal recount. While Question 3 compares the language use in such contexts between the children with LD and those achieving within normal parameters.

The data is presented as described in Chapter 3, through the exploration of Structure, Content and Cohesion. The answers to the research questions are complex and diverse. The amount of data collected and analysed was too great to permit comprehensive reporting hence a selection of data exemplifying the findings is presented here. A complete transcript of each text is given at the beginning of the story structure section. If the child's retelling was brief, lacking in detail or not forthcoming, a series of prompts was used. In these cases, only the most relevant sections of text are analysed for story structure.

To aid reporting I have placed the children into three groups – those who performed well (High Performers); those who needed some support (Moderate Risk); and those who needed extensive support (High Risk).

High Performers (H.P.) - Lewis, John and Lucy

Moderate Risk (M.R.) – Tim and Mark

High Risk (H.R.) – Rory

The chapter is structured as follows: the children are introduced and the results of the initial testing tabled (4.1); the children's ability to structure a narrative just read to them is examined in Section 4.2. Section 4.3 examines how they structured a familiar story, *Three Billy Goats Gruff*. Section 4.4 presents their recounts. The last section, 4.5, compares the results for the three groups of children.

4.1 Description of the Children

4.1.1 High Performers

Lewis

Lewis was one of the youngest children in the class and six months younger than the oldest child selected. He was learning to read in the expected manner, was able to follow directions, composed two and three sentence stories from the first term and appeared to be an alert, self-motivated learner. Lewis was 5.7 years at the beginning of the study.

John

John was achieving as expected. His progress in the first two terms of Kindergarten was consistently good. John composed two and three sentence stories about his experiences or imaginary events with cause and effect, commentary and a basic storyline. John was 6.1 years of age at the beginning of the study.

Lucy

Lucy experienced great difficulty in developing the alphabetic principle. She listened well in class and appeared to be an alert, active learner but could not associate sounds with letters. In desk work Lucy generally

required a one-on-one explanation and demonstration before she was able to complete the work sheet. However she dictated quite complex stories from first term and demonstrated good oral language abilities. Lucy appeared to be experiencing some difficulties in understanding what was required of her so she was included as a child who was possibly at risk. Her age at the beginning of the study was 5.7 years.

4.1.2 Students at Moderate Risk

Tim

Tim was selected as there was a family history of Dyslexia. He also demonstrated difficulties with the Kindergarten program often needing help to complete work sheets. Tim had difficulty following directions, found it hard to stay on task, was inattentive and had some social problems. He composed one sentence stories in first term. The only time he used two sentences was when he labelled two different parts of his drawing. Tim was 5.8 at the beginning of the study.

Mark

Mark was reading very well in Kindergarten but experienced social and emotional problems at home and school. Although he was composing two and three sentence stories in first term they were labels rather than connected text. Once again the only exception was when he was drawing on actual experiences or using a known story or rhyme. He was 5.9 years at the beginning of the study.

4.1.3 Student at High Risk

Rory

Rory had been diagnosed with ADD in preschool and was on Ritalin for the first term. He was taken off Ritalin for the rest of the school year but continued to demonstrate attentional and behavioural difficulties. Rory's oral language was babyish and it was clear he often experienced difficulties in following stories and directions. Rory's dictated stories tended to label pictures. He could produce two or three connected clauses when drawing directly from personal experience but gave no causal interrelations. Rory was 6.1 years at the beginning of the study.

4.1.4 Initial Assessment

Each child completed the Peabody Picture Vocabulary Test (Dunn and Dunn, 1981), and the Listening Test (Barrett, Huisingh, Zachman, Blagden, and Orman, 1992). These results are tabulated below:

Table 4.1 Initial Testing Results

	Lewis	John	Lucy	Rory	Tim	Mark
Age	5.4	6.1	5.7	6.1	5.8	5.7
PPVT	96	115	133	112	114	114
Listening Test	6.10	6.7	6.7	6.4	6.4	6.4
Main Idea	6.1	6.5	7.3	6.5	5.10	Below age
Details	7.1	5.6	7.1	6.4	6.0	6.0
Concepts	7.2	6.10	5.11	6.8	7.2	5.11
Reasoning	7.2	6.1	6.3	7.2	5.9	7.10
Comprehension	7.1	8.10	6.5	6.9	7.1	7.7

All scores are age-equivalents except the PPVT which gives an IQ score. There was some variation in IQ scores. The results were similar on the Listening Test indicating that comprehension at this level is not related to IQ. There was quite some spread throughout the individual components of the Listening Test but the test results look much the same and do not reflect the groupings that emerged from the linguistic analysis of the children's retellings perhaps indicating that, in practice, a different kind of evaluation is needed.

John showed the greatest spread of results with a variation of over three years between remembering details (Details, 5.6) and comprehension (Comp. 8.10). Lucy scored the lowest result on comprehension but boosted her overall result with high scores on remembering details (Details, 7.1) and picking up the focus of the passage (Main Idea, 7.3). These results indicated individual strengths and cognitive styles.

4.2 Immediate Retelling of a Story Read to Children

Sam and the Ghost Stories (Mahy, 1984) comes from a first class basal reader of the Endeavour series. The following narrative breakdown is based on Stein and Glenn's (1979) story definition. The full text is not given here.

Table 4.2 Narrative Breakdown of *Sam and the Ghost Stories*

Structural Elements	Text
Setting	Sam had a head full of stories...
Reaction/goal	“Tell me a story about ghosts” said his sister Wilma. Sam opened his mouth but no story came out...Where could Sam find some stories about ghosts?
Attempt	So Sam went to a haunted house. “very spooky” said Sam as he knocked on the door. “Come in” said a spooky voice... Ghosts only tell ghost stories. I want a story about a dragon”
Outcome	Sam opened his mouth. Out came a story about a dragon who liked cake...the ghosts told ghost stories to Sam
Ending	Wilma said, “Have you thought of a good ghost story?” Sam opened his mouth Out came a ghost story. It was the spookiest ghost story in the world
Coda	“Stop!” said Wilma. “Your ghost stories are too spooky. Tell me a dragon story instead.”

The first research question included two parts, ability to re-construct a narrative and the use of grammatical resources in accomplishing the task. The ability to reconstruct a narrative will be dealt with here and the use of grammatical resources in section 4. 2. 2. I read *Sam and the Ghost Stories* to each child in turn and on each occasion asked the child to tell me the story again. The task was designed to probe their narrative retelling skill. If the child did not make an appropriate response I suggested beginning with “Once upon a time” or “One day..”. If this didn’t elicit a narrative response I asked what happened first. If the child began without a setting or reaction/goal element I asked a ‘why’ question to gather more information. The table below gives the total number of ranking clauses in each retelling showing my clauses and the children’s clauses separately. The table also

gives the number of single clause responses and the number of responses of multiple clauses forming longer continuous pieces of child generated text.

Table 4 .3 *Sam and the Ghost Stories* – Ranking Clauses

Total ranking clauses includes researcher’s clauses in this table.

	Lewis	John	Lucy	Rory	Tim	Mark
Total clauses	31	36	31	37	54	35
Researcher clauses	0	4	0	20	17	6
Child clauses	31	32	31	17	37	29
Child, one clause response	0	0	0	17	12	5
Child Clauses in Extended text	31	30	31	0	20	24

Extended discourse is any section of text that is two related clauses or longer.

Lewis, John and Lucy (H.P.) produced the greatest number of clauses in extended text. Tim and Mark (M.R.) produced a similar number of clauses in extended text. Both Rory and Tim relied heavily on my input as indicated by the high number of clauses given by me. Rory (H.R.) only produced 16 out of the 34 clauses in the text. Rory also had a high number of single clauses indicative of answering closed questions rather than producing extended discourse elaborating on open-ended questions.

4.2.1 Analysis - Story Structure

Not all the children were able to re-construct the essential narrative episodes although all were able to recall the main points. The Table below summarizes each text's narrative structure.

Table 4.4 Children's Narrative Structure of *Sam and the Ghost Stories*.

	Original	Lewis	John	Lucy	Rory	Tim	Mark
Setting	Yes	Yes	Yes	Yes	No	No	No
Reaction/ goal	Yes	Yes	Yes	Yes	No	No	No
Attempt	Yes	Yes	Yes	Yes	No	Yes	Yes
Outcome	Yes	Yes	Yes	Yes	No	Yes	Yes
Ending	Yes	Yes	No	Yes	No	Yes	Yes
Coda	Yes	Yes	Yes	Yes	No	No	No
Text structure	Narra- tive	Narra- tive	Narra -tive	Narra -tive	Dialogue	Dialogue	Narra- tive

Lewis, John and Lucy (HP) included all the structural elements in their story and were able to accomplish the task with little or no prompting from me. Tim and Mark (MR) reconstructed an Attempt, Outcome and Ending element. These three elements cover the main action or event sequences of the story, that is, the goings on – Sam going to the haunted house, meeting the ghosts, exchanging stories, and telling a ghost story to his sister. Both Tim and Mark left out motivations and characterisations. Rory (H R) was unable to re-construct a narrative.

4.2.2 High Performers - Lewis, John and Lucy

Lewis, John and Lucy's re-constructed stories will be given in the tables below.

Table 4.5 Narrative Structure - Lewis retelling *Sam and the ghost Stories*

Structural Elements	Text
Setting	Sam told his sis, Sam and the House and the Ghost. His sister said, "Tell me a ghost story"
Reaction/goal	And he said, and he opened his mouth and said, nothing comes out. And so he and so he so he his sister said. No
Attempt	And then he went to the ghost, then he went to a haunted house which had webs around it. And he heard, he heard. A voice said, "Come in". And then he came in and then and then he said, "So much candles on the cake" And then and then he counted 200 and then and then the old ghost started crying. And then he said, "No, no all they the ghosts tell me ghost stories. I wanted to have a dragon story."
Outcome	So he read lots of dragon stories
Ending	Nothing else, oh yeah! And then and then he told a ghost story and his sister said,
Coda	"Stop! I don't like ghost stories"

Table 4.6 Narrative Structure - John retelling *Sam and the Ghost Stories*

Structural Elements	Text
Prompt	<p>John: He knocked on the h (sic) the door of the ghost's house.</p> <p>Teacher: Why is he going to the ghosts' house?</p> <p>John: To tell, um, to go</p> <p>Teacher: What happened at the very beginning?</p>
Setting	Every time he opened his mouth a spooky story came out
Reaction/goal	And his sister wanted to hear a ghost story. He didn't know any ghost stories so he went to a haunted house.
Attempt	Knocked on the door as the ghost said, "Come in" and he went and he said, "There's lots of candles on the cake. "200" And then told ghost stories. 200 looked sad because he didn't know any, he didn't. He knew every story in the world, he thought that. He knew every ghost story in the world. He wanted to have to listen to a dragon story. And um then, what was the boy's name? T: Sam.
Outcome	Sam opened his mouth and he told a dragon story
Coda	That's all I can remember (prompt)...ghost stories and then Sam told a ghost story to his sister and it was too scary.

Table 4.7 Narrative Structure – Lucy retelling *Sam and the Ghost Stories*

Structural Elements	Text
Setting	Once upon a time there was a haunted house full of ghosts and one, an old ghost lived in there.
Reaction/goal	He was upset because he didn't hear any dragons stories
Attempt	So he went. No, the boy
Setting	One day there was a boy who went out
Attempt	He went in and in there were ghosts and he said,"Oh, what's the matter?" "I don't like my birthday party because we only have ghost stories. I want a dragon story."
Outcome	So he opened his mouth and a dragon story came out and another dragon story and it was a happily birthday
Ending	And then when he got home his sister said,"Have you got any dragon, uh no, ghost stories yet?" "Yes, would you like to hear?" "Yes, please!" it there was scary whole wide world
Coda	"Stop! Stop! It's too scary That's all

All the children in the HP group were able to structure a coherent retelling of the story with little or no help from me. They included the main story episodes, and gave motivations and causes for the characters actions. Lewis and Lucy had trouble beginning. Both made a couple of attempts then had to stop and begin again. Lewis initially began by naming the main protagonist, Sam, then attempted a second beginning by naming the story but didn't have the textual resources to continue the narrative from that point, so simply stopped and began again by stating the initiating event, the sister's request for a ghost story. Lewis almost forgot the final episode as indicated by the phrase, "...nothing else" but then quickly added it with the textual device of "Oh, yeah!" to connect it to the foregoing text.

Throughout the text Lewis repeated phrases and made false starts. Slobin (1976) calls false starts and confusions with words “mazes”. He defines a maze as:

“a series of words (or initial parts of words) or unattached fragments which do not constitute a communication unit and are not necessary to the communication unit” (p.10).

If we remove these false starts and confusions from the text the remaining language is both coherent and cohesive.

Lucy had some trouble organising the story as shown by her selection of the ghost as the main protagonist in the Setting and her statement of his problem. Lucy had to stop and begin again with her recall of the story but omitted the reaction/goal element thus not providing a motive for Sam’s actions. The first utterance of “The boy” seemed to be a think aloud strategy. Sam was the constant throughout the story and allowed a continuous thread to be followed from beginning to end. Once Lucy selected Sam as the rhetorical basis she was able to successfully complete her story.

John had no difficulty rhetorically organising his retelling. He included all the main narrative episodes and provided motives. However, he left out all non-essential pieces of information and demonstrated a tendency to confuse details such as substituting “spooky stories” for “dragon stories” in the Setting.

The embedded story about the ghost’s birthday party was almost totally left out except where it impinged on the main story. The old ghost was characterised by the 200 candles and became ‘200’.

All three children left out detail such as the embedded story about the cake and the ghost's colours. Lewis mentioned the cobwebs. Lucy summed up the episode in the haunted house by saying, "It was a happily birthday".

4.2.3 Students at Moderate Risk - Tim and Mark

Table 4.8 Narrative Structure – Tim retelling *Sam and the Ghost Stories*

Structure	Text
Prompt	<p>Tim: Oh no! Why do I have to retell it? T: Because I want you to. Tim: Why? T: How does it start? Tim: I don't know. T: Once upon a time... Tim: What then? T: Did Sam like telling stories? Tim: Umm, yes, what now? T: And what happened? Tim: He told one T: What sort of story did he tell? Tim: He told a ghost story T: Did he tell that right at the beginning? Tim: No T: What did he do right at the beginning?</p>
Attempt	<p>He went to a ghost house. T: "Why?" Well the sister could listen to the ghost story and then he had a good time at the house and</p>
Ending	When he went back he told the story and she said, "Stop!"
Coda	And she said, "I want a dragon story instead"
Prompt	<p>T: Why did she want a dragon story? Cause the ghost story is too scary. T: That's right. What happened at the ghost house?</p>
Embellishment	Ahh there were loads of candles on the cake and the white one was sad and he had a good time and, that's all I can think about.
Prompt	<p>T: Why was the old ghost sad? Because he wanted the dragon story. T: And what did Sam want? A ghost story T: Who knew all the ghost stories? Ahh, Sam T: So what did Sam do?</p>
Embellishment	Ahh, he told them a dragon story and the ghost told dragon stories back and then they told him, I think, they told him a ghost story and he telled it to his sister and then she wanted a dragon story.

Table 4.9 Narrative - Mark retelling *Sam and the Ghost Stories*

Structure	Text
Prompt	<p>M: I need the book.</p> <p>T: No, you tell it without the book</p> <p>M: Can't read it without the book.</p> <p>T: What happened at the beginning?</p> <p>M: Um, he couldn't tell stories about ghosts.</p> <p>T: Who wanted to hear them?</p> <p>M: His sister</p> <p>T: Why couldn't he tell stories about ghosts?</p> <p>M: Cause, he didn't know a story about ghosts.</p> <p>T: What did Sam do?</p>
Attempt	<p>Go to a haunted house. He went there was a party there. The ghosts were having a party and he was sad because it was 200, I don't know why. Then he tried to blow the candles out, but he couldn't and then he told them that he can only tell ghost stories and he wanted to tell a dragon one</p>
Outcome	<p>Then he told a dragon story, and the couldn't he ...The dragon story was a bout a cake dragon, I think. I think that he was made out of cake! And, what was the end again?</p> <p>T: What happened the next day?</p>
Ending	<p>Um He told the ghost story to his sister and um he said, "Boo!" and um there ghost getting really loud in the story cause he was shouting and ...blocking her ears</p>
Coda	<p>And I forget the rest</p>

Tim and Mark had difficulty reconstructing the story and tried to avoid the task. Mark maintained that he had to read the story rather than tell it from memory. He didn't question the request itself but explained that he couldn't complete the task without the book, "I need the book". This was not a position of like or dislike but a fact. When I suggested, "You tell it without the book" Mark changed the process from 'tell' to 'read' so that the

statement, “Can’t read it without the book” was true. When I ignored this and asked a question Mark complied.

Neither Tim nor Mark were able to rhetorically organise their retelling. Tim relied on my questions. His responses were highly literal and confined only to the information requested. For example:

T: Did Sam like telling stories?

Tim: Yes...What now?

T: And what happened?

Tim: He told one

T: What sort of story did he tell?

Tim: He told a ghost story

T: Did he do that right at the beginning?

Tim: No

Tim was still resisting constructing a narrative sequence. A more open ended question, “What did he do right at the beginning?” led to the paraphrased Attempt section of the story given above.

Through questioning I was able to ascertain that Tim remembered the causal links but did not include them in his retelling;

T. Why does she want a dragon story...?

Tim. Cause the ghost story is too scary

T. Why was the old ghost sad?

Tim. Cause he wanted a dragon story.

Tim then provided an Outcome and reiterated the Ending and Coda as given in the Embellishment.

Tim provided some detail when directly asked:

T: What happened at the ghost house?

Tim: Ahh... there were loads of candles on the cake and the white one was sad and he had a good time and ... that's all I can think about.

The above text is a list of recalled events from the story with no logical connections to indicate cause or motivation.

In the extended discourse section Mark gave the Attempt and Outcome but then made up his own ending based on the book illustration.

This showed Sam with a speech bubble in which a ghost is saying 'Boo!' A girl is listening with her eyes closed, hands clasped over her ears.

Mark included a surprising amount of detail but often confused circumstances. For instance he mentioned that the ghosts were having a party and that someone was sad (he did not clearly specify who) because the ghost was 200. In the original text the ghost prefaces his answer to Sam's question about the cause of his sadness with "I am 200 years old". However the text then specifies the ghost's main concern, he has heard all the ghost stories in the world and would like to hear a dragon story. Mark remembered the first proposition, "I am 200 ..." but was unsure how this related to the character's sadness as indicated by his statement, "I don't know why".

Mark then gave the next event, blowing the candles, in the same sequence as the original text. However he didn't remember that ghosts blow on their

candles to light them up, not to blow them out. He has, instead, combined it with his own experience and so changed the action to unsuccessfully trying to blow them out.

The next event given in the original text was that of Sam telling a story about a dragon who likes cake. Mark followed the same pattern but changed the dragon from one who liked cake to one who *is* cake. He qualified this proposition with, “I think” but then strengthened his own invention with “I think he was made out of cake!”. It was at this point that Mark lost the thread of the original story. He faithfully followed the events in sequence but now began to add his own inventions. This trend became stronger with recall of the original ending breaking down and changing completely.

4.3.4 Student at High Risk - Rory

Table 4.10 Narrative Structure – Rory retelling *Sam and the Ghost Stories*

Exchange 1	T: You can start with ‘Once upon a time’ if you want to. Can you remember what happened at the beginning? No?
Exchange 2	T: What did Sam like doing? R: Telling um ghost stories T: Did he know any ghost stories? R: No T: What kind of stories did he know? R: Dragon
Exchange 3	T: What did his sister want? R: Ghost stories T: So what did Sam do? R: He go to spooky house T: What happened there? R: Um they told him two spookies, two spooky T: Two spooky what? R: Two spooky ghost stories

Exchange 4	T: What did Sam do? R: um he tell them dragon stories
Exchange 5	T: He did, then what happened? R: Um they blew out the candles. T: What happened when the ghost blew on the candles? R: Can't, can't T: You can't remember? What happened when Sam went home? R: He told, the next day he told um his sister two spooky stories. T: What did she say? R: Stop T: Why? R: Because it was too spooky. T: What kind of stories did she want? R: Dragon?

I have broken the dialogue into 5 exchanges based on each initiating question and the responses to it. Rory was unable to structure a narrative at all in this situation. However he remembered the gist of the story and was able to answer questions. The structure of the discourse was conversational with no extended discourse sections. The five exchanges in this conversation were initiated and maintained through questions. Open ended prompts such as, “You can start with ...” were unsuccessful in gaining a response whereas precise questions requesting information about the story generally elicited an answer.

T: What did Sam like doing?

R: Telling um ghost stories

T: Did he know any ghost stories?

R: No

Not once did Rory make any comment that encouraged further exchange. This was unlike any other child in the study.

4.3.5 Summary

Although the children in the High Performer's group approached this task in their own individual way and the stories produced differed from the original in both vocabulary and content all essential elements were included. These children were able to use language as a resource to structure a narrative retelling. They had made the content of the story their own and successfully re-represented that knowledge linguistically.

The children in the Moderate Risk group – Tim and Mark- were able to produce some extended discourse that included the main activity sequences but were unable to construct a narrative. Rory was unable to produce a narrative or extended discourse but did follow the main events of the story and was able to give motivations and causes. From his responses it is impossible to tell if he had internalized the information or was relying on memory and matching responses to questions.

4.3 Use of Grammatical Resources in Immediate Narrative Recall

4.3.1 Content/Field

Field is a contextual variable relating to ideational meanings at a semantic level. Ideational meanings are constructed through vocabulary. The choice, depth and range of variation in words utilised, lexis, including processes, emerged as one of two salient lexico-grammatical features that differentiated between the children's texts. The second element was the inter-relationship between clauses, clause complexes. These two elements will be dealt with in this section.

Lexis

An important aspect in the production of any text is the range and complexity of lexical items used to establish field. In this case the children had a model that gave them many lexical items to employ in their own retelling. Table 12 presents the number and range of items in the construction of the main descriptive elements of the story. Repeated items are counted only once. Changes in tense eg. *told*, *tell* are counted once only, as the same item.

Table 4.11 lexical Items related to *Sam and the Ghost Stories*

Lexical Item	Original	Lewis	John	Lucy	Rory	Tim	Mark
Ghosts	7	3	4	3	3	2	3
Old Ghost	3	1	1	2	0	2	1

Table 4.12 Processes in *Sam and the Ghost Stories*

Processes	Original	Lewis	John	Lucy	Rory	Tim	Mark
No. of Processes	24	11	16	12	5	9	11
Material	7	5	5	5	3	1	4
Behavioural	4	1	2	1	0	1	0
Mental	4	2	4	2	0	3	4
Verbal	5	3	2	1	1	2	2
Relational	2	0	3	3	1	2	1
Existential	2	0	0	0	0	0	0

When comparing the number of different processes used by the children Rory (HR) stands out as only using 5 processes. This was partly due to the

nature of the exchange, which was dialogic. Many of Rory's answers ellipsed the process.

John, Lucy and Lewis (HP) used a range of processes as did Tim and Mark (MR).

The original text was dominated by verbs as single words. For example: "...ghosts *having* a birthday party"; "The big, old ghost *blew* on the candles. They all *lit* up"; "I only *want* ghosts". This gives a simple, straight forward exchange of information. The children's texts show a different pattern. Although verbs as single words occur frequently the children tended to use complex verbal groups as in, "wanted to hear", "were having", "tried to blow". The children's verbal groups sometimes included ellipsis such as, "I want (*to hear*) a story about a ghost". The use of verbal groups like these indicates that processes are actions emerging from unreality into reality. Some of the children's examples of modulation are distinctly child-like, for instance, John: "He wanted to have to listen to ...". Lewis also framed the ghost's position using a similar verbal group: Lewis: "I wanted to have a dragon story". Mark attempted to construct the same verbal group but changed the predicate to 'tell': "he wanted to tell a dragon one". Tim produced one verbal group; "the sister could listen to the ghost story" indicating obligation.

4.3.2 High Performer's - Lewis, John and Lucy

Lexis

These children reproduced lexical items directly from the original text such as, “opened his mouth”, “nothing comes out”, “went to a haunted house” and “voice said, ‘Come in’”.

Lewis modified two phrases: “covered in cobwebs” became “which had webs around it”, “what a lot of ...” became, “so much ...”.

The meaning of other propositions both implied and directly stated was maintained but more simply expressed. For example: “the big old ghost looked as sad as ever” was reformulated as, “He started crying”. “Your ghost stories are too spooky” was reformulated as, “I don’t like ghost stories”.

In both instances the broad sense of the proposition remained unchanged.

Lucy’s lexical choices and organisation were quite formal, much more like ‘book language’, than child speech or conversational exchange. She used the particular phrasing given in the original such as “opened his mouth” and “came out” but also added other book like phrases such as “Oh, what’s the matter” and “Would you like to hear?”

Processes

The manner in which the High Performers used processes reflected the different narrative orientations in their retellings. Lewis was primarily concerned with the characters’ overt actions that formed the story sequence. This was indicated by his predominant use of verbal and material processes. He used only two mental processes one of which was “wanted” the other “like”. Both of these processes related directly to the

action events of the story. They are not concerned with inner mental processes in the sense of being reflective of thought or feeling.

However John used as many mental processes, ('thought', 'wanted', 'know', 'to listen', 'to hear'), as the original text, far more than any other child. John tended to use complex verbal groups such as "wanted to hear" and "wanted to have to listen to". The ghost was sad because he knew no stories other than ghost stories now "he wanted to have to listen to" carried a sense of obligation but with no guarantee of success.

Lucy accurately re-represented the story in her own language using a total of fourteen processes to convey action. All utterances used conventional grammatical structures apart from, "happily birthday" and "It there scary whole wide world".

"Happily" is often used with a verb, 'happily skipped', 'happily acceded' and so on. 'Happy' may be used as an attribute as in, 'am happy', or as an adjective in a nominal group, 'happy birthday', 'happy, obedient girl'. Lucy used this same phrase in a personal recount indicating that it was probably habitual.

The other inaccurate clausal structure, "It there was scary whole wide world" is recognisably based on the original text, "It was the spookiest ghost story in the world" (p.8) which echoes the formulaic phrase 'whole wide world', often used in texts designed for children.

The process, "was" and the subject "it" were given but Lucy left out the preposition which would have given a complement, "in the whole..." and instead constructed a circumstance, "whole wide world". The lack of agreement between the adjective 'scary' and the noun 'story' did not allow

the formulation of a nominal group, 'scariest story'. Lucy failed to understand the expression of degree within words acting as adjectives. For instance, 'a pretty girl', 'the prettiest girl'.

4.3.3 Students at Moderate Risk - Tim and Mark

Lexis

Mark and Tim (MR) took no unusual words or phrases directly from the original text. Tim relied on more generic terms. For instance, 'ghost' was used four times both as a noun and as an adjective to describe the house and the story type.

Mark maintained lexical cohesion throughout the text as many of the words were repeated or semantically related. For instance *party, blow, candles, out, cake* form a lexical chain. Other aspects of cohesion such as reference, substitution and ellipsis were lacking. Mark demonstrated variation in lexis eg. 'haunted house'.

Processes

Throughout the text Tim maintained verbal agreement in the past tense. He also demonstrated no confusions between processes. Verbal processes such as 'to listen' and 'to tell' were correctly used as were mental processes such as 'to know' and 'to want'. Although Mark used a wide range of processes such as, 'tried to blow', 'shouting' 'blocking her ears', he confused tense in the last section.

Mark made up a conclusion based on the book illustration. He began in the future tense but left out the relational process 'is' - "There ghost getting really loud", moved into the past tense, "was shouting", then gave no tense marker, "blocking her ears" and gave up, "I forget the rest".

There was also a lexical confusion in the use of the verb ‘to tell’ when the old ghost actually wanted ‘to hear’. Mark used the same process, ‘to tell’ to cover the processes of hearing, telling and knowing.

Tim and Mark’s range of processes was limited to more general actions of going, telling, wanting, having and being rather than specific processes such as, ‘looking sad’ as opposed to ‘was sad’.

There was some use of modal terms to indicate degree such as, “only tell” and “really loud”.

4.3.4 Student at High Risk - Rory

Lexis

Rory remembered the term “spooky” from the original text. He used it to describe the haunted house as well as the stories. Overall his lexicon seemed impoverished with only three descriptive words and four processes used. There was some confusion about how to use the word “spooky”. He used it as a noun in “two spookies” and as an adjective in ‘two spooky ghost stories’.

Processes

Rory had a marked tendency to confuse tense, “He go to a spooky house”, “He tell them dragon stories”. Both these examples are either incorrect forms of the present tense or Rory was unable to recall the non-regular past tense, “went” and “told”. Instances of an incorrect verb form were preceded by a question using the verb “did”. “So what did Sam do?” “He go to a spooky house”, and “What did Sam do?” “He tell them dragon stories”. Whenever a question was couched using a different verb Rory answered correctly. For instance, “What happened there?”, “They told

him two spookies...” and, “Then what happened?”, “They blew out the candles”.

When Rory constructed the past tense there were no errors, “They blew out the candles”, “They told him two spookies”, “He told, the next day, he told his sister two spooky stories”. The correct use of “told” indicates that Rory could recall and effectively use the past tense. As there are a very limited number of examples to draw on from this one text more language data was needed to accurately establish a pattern of usage. Rory’s syntax improved as we talked about the story. “two spookies” transformed into “two spooky stories” during our exchange.

4.4.5 Summary

John, Lewis and Lucy (HP) used a range of vocabulary and processes to convey meaning. There was individual variation regarding the types of processes predominantly used by each child. For instance John used more mental processes, Lucy gave a high number of verbal processes while Lewis tended to predominantly use material processes. These children were able to use the grammatical resources of English to realise what was significant to them and clearly demonstrated that they were making the story their own and re-representing (Karmiloff-Smith) that information.

Tim and Mark (MR) appeared to rely on general knowledge for lexical items rather than memory for words and phrases specific to the original. Their use of processes related more to the outer narrative landscape of doing than the inner psychological landscape of beliefs, motives and feelings. This reveals a greater dependency on memory of the material events, or behaviour, rather than an appreciation or interpretation of the story’s meaning.

Rory demonstrated difficulty lexically. His vocabulary was limited and his use of processes compromised by difficulty in tense agreement.

4.4 Clause Complex Relations

Halliday defines a clause complex as synonymous with a sentence (Halliday, 1994, p.216). An examination of clause complex relations allows the functional organisation of the text to be seen and reveals the logic that underlies the meaning constructed by the clauses.

In analysing the children's texts from this perspective I have only included longer sections of text. As single clause answers to questions are not included Rory's text will not be analysed in this section. In the table below clauses connected by conjunctions are counted as forming a single clause complex or sentence. Therefore a series of propositions connected by 'and' or 'and then' is considered a single sentence.

Table 4.13 Clause Complex Relations in *Sam and the Ghost Stories*

(Total number of clauses excludes researcher's clauses).

	Lewis	John	Lucy	Rory	Tim	Mark
Total clauses	31	32	31	17	37	29
No. of ellipsed clauses	0	2	2	6	8	3
Clause complexes	10	9	11	0	3	7
Incomplete clauses	6	3	2	4	0	2
Clauses as Speech	7	3	10	0	2	1
hypotaxis	1	1	1	0	0	0
Parataxis - elaboration	2	4	0	0	0	1
Parataxis - extension	5	3	7	0	7	8
Parataxis - enhancement	11	5	5	0	4	4

The children in the high performance group produced a similar number of clauses in their retellings. The children in the moderate risk group produced fewer clauses while the child designated as high risk produced the least. The same relationship is evident in the number of clause complexes produced, with the HP group producing more than the MR group. The HR child produced no clause complexes. Rory and Tim had the highest number of ellipsed clauses indicating their texts were more question/answer rather than narrative in form.

A similar pattern is reflected in the children's use of direct speech.

Direct Speech

The original text had a high proportion of verbal processes more indicative of a modern, interactive story than a traditional fairy tale which has little or

no direct speech. Direct speech provided the author with a simple means to present propositions and structure the story. For instance:

“Why are you so sad?” asked Sam.

This verbiage is a highly congruent and direct way to continue the storyline.

Lucy and Lewis used a combination of direct and reported speech while the other children presented the ghost’s problem as a series of propositions;

“The old ghost started crying...all they the ghosts tell me is ghost stories. I wanted to have a dragon story” (Lewis).

“I don’t like my birthday party because we only have ghost stories. I want a dragon story” (Lucy)

“200 looked sad because he didn’t know any ...he knew every story in the world, he thought that.” (John).

“and then he told them that he can only tell ghost stories and he wanted to tell a dragon story” (Mark).

However all the children used some direct speech in their retellings. Lewis and Lucy used it as an aid in structural organisation. Whereas John used it to structure only one section of his story, preferring reporting to quoting:

J: As the ghost said, “Come in” and then um he went and um he said, “There’s lots of candles on the cake”

“200”

Mark only had one instance of direct speech, “Boo!” towards the end.

4.4.1 High Performers - Lewis, John and Lucy

Lewis, John and Lucy produced a series of clause complexes that were grammatically related through extensions of either elaboration, extension or enhancement.

Lewis tended to string clauses together through a system of temporal enhancement.

Then he went to a haunted house (Ext.)

which had webs around it (Elaboration)

and he heard, he heard, (Ext.)

a voice said, “Come in” (Elaboration: projection)

and then he came in (Enhancement)

and then he said, “So much candles on the cake” (Enhancement: projection)

and then he counted 200 (Enhancement)

and then the old ghost started crying (Enhancement)

and then he said, “No, no all they, the ghosts, tell me ghost stories (Enhancement: projection)

The majority of clause complexes were formed by connecting events with ‘and then’ which enhances the meaning of the clauses through temporal sequence. Lewis only used one enhancement of cause,

So he read lots of dragon stories

Lewis used direct speech as a vehicle to tell the story as did the original. This is the simplest form of projection.

John

Once John began his story from the beginning he completed it in a series of eight well connected clause complexes interrupted only once by a request for the boy's name. He encapsulated the three main propositions in three clauses. The second clause, which is embedded, extends on the first. The third clause is also an extension adding new but semantically relevant information:

Every time [[he opened his mouth]] / um a spooky story came out /
um and um his sister wanted to hear a ghost story.

The next series of paratactically linked clauses enhances, elaborates and extends the propositions given so far:

He didn't know any ghost stories

So he went to a haunted house (Enhancement)

Knocked on the door (Elaboration)

As the ghost said, (Enhancement)

“Come in” (Projection)

and then he went (Enhancement)

and um he said, (Ext.)

“There's lots of candles on the cake” (Projection)

I analysed this as three separate clauses although the second and third clauses are dependent upon the first clause. Structuring the clauses like this gives a feeling of one action being contingent upon and even occurring at the same time as another rather than each being a separate part of an action sequence.

In the next clause complex John expressed his own opinion and attempted to express quite complex relations between propositions.

200 looked sad because he didn't know any um he didn't, he knew every story in the world, he thought that, he knew every story in the world.

John wanted to explain that the ghost didn't know any stories 'other than' or 'except' ghost stories but was unable to complete the clause so completely rephrased the idea, "He knew every story in the world ...".

The first two clauses are in a hypotactic relationship while the remaining clauses form a paratactic projection.

Lucy

Lucy's clause complexes were either systems of extension or enhancement.

He went in

And in there were ghosts (Ext.)

And he said, "Oh, what's the matter?" (Ext: projection)

I don't like my birthday party

Because we only have ghost stories. (Enhancement)

I want a dragon story"

So he opened his mouth (Enhancement)

And a dragon story came out (Ext.)

And another dragon story (Ext.)

And it was a happily birthday (Ext.)

And then when he got home (Enhancement)

His sister said,

“Have you any dragon, huh, no, ghost stories yet?” (Projection).

She used direct speech more than any other child often leaving out everything except the content of the speech. This provided a very simple and direct way of retelling the story and simplified the organising of textual and structural systems.

“Have you got any dragon, huh no, ghost stories yet?”

“Yes.

“Would you like to hear?”

“Yes, please!”

Although some of the information was more succinctly given by other children in the study Lucy retained a story like tone. For instance:

One day there was a boy who went out and he saw a haunted house.

He went in and in there were ghosts.

Lewis and John gave this information much more succinctly ; “...he went to a haunted house”. Many phrases that Lucy used appeared to be strongly influenced by the original text. The following, “a haunted house full of ghosts” and “He went in and in there were ghosts” was an attempt to include, “Sam went in. The haunted house was full of ghosts having a birthday party” (p. 5).

4.4.2 Students at Moderate Risk - Tim and Mark

Mark used more causative conjunctions such as ‘but’ and ‘because’ whereas Tim tended to use simple additive conjunctions such as ‘and’ and

‘then’. However the connections between clauses were not well established by either child. In Tim’s first clause complex (given below) there was a logical connection between clauses due to the temporal sequence of events. Hence the clause complexes were either extending or enhancing.

Well the sister could listen to the ghost story
and then he had a good time at the house (Ext.)
and when he went back he told the story (Ext.)
and she said, “Stop” (Ext.)
and she said, (Ext.)

“I want a dragon story instead” (Enhancement: projection).

The only indication that Tim had understood the motives in the story were implied by the verbal group, “could listen” indicating obligation. This piece of text was the most logically connected series of clauses Tim produced. The actions are contingent on each other although the connections between them are not stated.

In the next section of text Tim added ideas together without establishing the relationship between them:

Ahh there were loads of candles on the cake, and the White one was sad and he had a good time and that’s all I can think about

Mark constructed a series of six clause complexes generally connected by ‘then’ and ‘and then’. Even though within these clause complexes there were other relationships given of a causal or dependent nature they are assembled through association. Mark listed what he recalled.

And he was sad (Ext.)

because it was 200 (Enhancement.)
I don't know why (Elab.)
then he tried to blow the candles out (Ext.)
but he couldn't (Enhancement)
And then he told them (Ext.)
that he can only tell ghost stories (Projection)
and he wanted to tell a dragon one (Ext.)

There is a hypotactic relationship between 'he was sad' and 'because it was 200'. The second clause modifies the first by providing a reason. A similar pattern is found in, "he tried to blow them out but he couldn't". This is paratactically connected by "and then" to the next clause complex which includes the projection of an idea, "that he can only tell ghost stories").

John was the only other child in the study to use 'that' as a linguistic device to indicate projection.

In the following extract the repeated use of 'he' without a clear referent undermines the connection and hence logical relations between clauses. I have put the missing referent in brackets.

Then he (old ghost) tried to blow out the candles but he couldn't and then he told them that he can only tell ghost stories and he wanted to tell a dragon one. Then he (Sam) told a dragon story, and the...

4.4.3 Summary

John, Lewis and Lucy were all able to construct logically connected clause complexes. John's more complex relations indicates he was creating the

information linguistically rather than matching memorized information to language.

Tim and Mark were not able to build clause complexes providing logical relationships however the reasons for this varied. Tim tended to associatively list events recalled from the original story. Mark's inadequate referencing undermined logical relations between clauses.

4.5 Cohesion

4.5.1 Reference

The original text (See Table 4.14) had 5 major chains, "Sam", "Wilma", "the haunted house", "the ghosts", and "the old ghost". The two major chains were 'the old ghost' with 14 items and 'the ghosts' with 12 items. This indicates a very strong story focus centred around one major character. Although the children's texts, except Rory's, placed Sam as the major chain they also gave a dominant position to the ghost. John, Lucy (HP) and Mark (MR) gave Sam and the old ghost almost equal representation. This indicates that these children are aware of and expressing the narrative significance of these two characters.

Lewis, John, and Lucy constructed 2 or 3 major chains indicating a well-focussed story. Tim and Mark formed a major chain by reference to themselves. They were the only children to express their own opinion within the story. Tim's story had 6 major chains, one of them being himself, and was the least well-focussed story. Rory couldn't be considered as he produced no major chains. In the table below the children's text does not include the sections of text given as "prompt" in

the transcripts provided. This material was generally unrelated to the story such as, “Why do I have to retell it?” (Tim).

Table 4.14 Reference chains in *Sam and the Ghost Stories*.

	Original	Lewis	John	Lucy	Rory	Tim	Mark
Major chains	5	3	2	3	0	6	4
Head Items	Sam 24 Old ghost 14 Ghosts 12 Wilma 6 Haunted house 4	Sam 12 Old ghost 5 Ghosts 3 Wilma 6 Haunted house 3	Sam 10 Old ghost 7 Ghosts 1 Wilma 2 Haunted house 3	Sam 8 Old ghost 7 Ghosts 3 Wilma 2 Haunted house 3	Sam 4 Old ghost 0 Ghosts 2 Wilma 1 Haunted house 1	Sam 10 Old ghost 2 Ghosts 5 Wilma 6 Haunted house 2	Sam 6 Old ghost 7 Ghosts 5 Wilma 3 Haunted house 2
Homophoric	4	0	1	0	0	0	0
Exophoric	1	1	6	1	3	1	10
Endophoric Cataphoric	4	1	1	4	0	0	0
Endophoric Bridging	0	1	1	3	0	1	0
Endophoric Anaphoric	42	21	22	19	6	19	17

A bridging reference is one in which the referent can be inferred from the text. The reference patterns of anaphora and exophora are very revealing. Anaphoric reference is when the referent has already appeared in the text. Exophoric reference is when the referent can be retrieved from the immediate context but not the actual text. There is a significant difference in the rate of exophoric reference used by Mark. The original text had only

one example of exophoric reference - “The haunted house”. Mark referred to the main character as “he” and the old ghost as ‘he’ relying on shared knowledge of the story and my contribution to identify the referent. John also had a high rate of exophoric reference as he did not identify Sam until he requested his name towards the end of his retelling. However his reference chains were not confused as both Tim and Mark’s were. In Tim’s case I provided the referent ‘Sam’ early in my questioning so its retrieval was possible from the immediate text. Both Tim and Mark’s use of reference revealed they were not retelling a story but recounting what they could remember to a person who shared the same context. In the extract below exophoric reference is in italics.

Mark: *He* couldn’t tell stories about ghosts.

T: What did Sam do?

Mark: Go to a haunted house, he went, there was a party there.

.....

T: So what did Sam do?

Tim: Ahh, *he* told *them* a dragon story and the ghost told dragon stories back and they told *him*, I think, they told *him* ...

Without my identification of ‘he’ as Sam the referent cannot be identified. Rory also had a high rate of exophoric reference.

Lewis, John and Lucy had the lowest ratio of exophoric to anaphoric reference indicating they were most aware of the decontextualised nature of a story.

Individual Analysis of Cohesion in *Sam and the Ghost Stories*

4.5.2 High Performers - Lewis, John and Lucy

Reference

Lewis and Lucy presented each character and correctly tracked them through the text. Lewis clearly indicated a change of subject either lexically, as in;

and then he counted 200 and then the old ghost started crying and he said ...

or textually through the use of direct speech:

“I wanted a dragon story.”

So *he* read lots of dragon stories.

Although “he” in italics could refer to the old ghost the preceding text suggests that the referent is Sam because it has been explicitly stated that the old ghost didn’t know any dragon stories while Sam did.

Lucy gave redundant information (shown in italics) indicating the developing nature of her language,

One day there was a boy who went out and *he* saw... and

He went in and *in* there were ghosts

John’s text is internally cohesive due to referential consistency. Although the majority of reference is endophoric (22) he had 6 exophoric references.

One clause not logically embedded in the text is,

and then um ah, *told ghost stories.*

The section in italics was said in an undertone after a pause of about 6 seconds and seemed to be an example of a ‘think aloud’ strategy. Although it was the next main event reported in the story the motivating factors leading to it hadn’t been given. John provided them in the next section. It was as though he thought out loud about what happened and then worked out how to linguistically present it.

John also used pronouns to refer back to previous sections of text:

He knew every story in the world. He thought *that*.

Ellipsis and Substitution

Both Lewis and Lucy included more information than needed. For example Lewis:

“No, no, all they the ghosts tell me ghost stories. I wanted to have a dragon story”. So he read lots of *dragon stories*.

Here Lewis was working his way to the more sophisticated form, “No, no all they tell me are ghost stories”. In my observations of Kindergarten children both in speaking and writing they will, while working out the more adult form, have a tendency to include redundant information because they don’t know what is essential to maintain meaning. This applies particularly to reference.

Lewis utilised ellipsis only once as a linguistic resource:

So many candles on the cake, and then and then he counted 200

John’s text flowed well because of his use of ellipsis and substitution. For example:

So he went to a haunted house, knocked on the door as the ghost said,

“Come in.”

In this series of clauses John didn't break the stream of propositions with unnecessary conjunctions such as 'and' or superfluous pronouns.

Lucy also utilised both ellipsis and substitution effectively in her retelling, particularly in the sections using direct speech. She substituted pronouns correctly:

Once upon a time there was a haunted house full of ghosts and one, an old ghost lived in *there*

Conjunctions

Lewis, John and Lucy demonstrated different patterns in their use of conjunctions. Lewis used conjunctions to extend the narrative sequence temporally:

and then the old ghost started crying *and then* he said

He also extended the narrative through the use of additive conjunctions:

“Tell me a ghost story”

And he said *and* he opened his mouth.

Lewis used only two conjunctions to establish causal relations. For example:

So he read lots of dragon stories

All conjunctions were used correctly.

John used conjunctions less in this text than any other child in the study. Although “and” was generally used John also indicated temporal relations through “and then” and causal relations through ‘because’ and ‘so’. For example:

He didn’t know any ghost stories *so* he went to a haunted house.

Lucy used conjunctions in this text to elaborate or enhance as well as to extend. Only once did she use “and then” preferring “because” and “so” to extend and enhance the story.

4.5.3 Students at Moderate Risk - Tim and Mark

Reference

Both Tim and Mark had some difficulty with reference. Tim often failed to provide a presenting reference but generally accurately tracked participants with the exception of, “the white one was sad and *he* had a good time”. Tim failed to clearly indicate to whom he was referring when he said, “he had a good time”. If one only drew on the immediate text “he” would be referring to “the white one” but within the context of the entire text it can be assumed that “he” was actually Sam.

Mark’s text demonstrated a disturbing lack of cohesiveness due to referential relations being confused and inaccurate.

“He went there was a party there ... the ghosts were having a party”.

In this excerpt ‘he’ referred to Sam but it was immediately followed by; “And he was sad because it was 200”. The referent for ‘he’ is ambiguous. Was Sam sad because there were 200 candles on the cake, or does ‘he’ refer to the ghost who was sad because he was 200 years old. The use of

'it' was misleading because it was not the expected reference term for an animate being - ghost human or other.

The referent "them" in "he told them that he can ..." must refer to both Sam and the other ghosts. The original story minimised the use of reference by providing nouns except in instances where this would lead to repetition of redundant information. Mark was the only child who assumed the old ghost's position and used 'them' to indicate both Sam and the other ghosts.

Ellipsis and Substitution

In each of Tim's responses to questions ellipsis was easily recovered from the preceding message. However in longer pieces of text only shared information allowed understanding of certain referents. For instance in the following extract Tim gave no presuming referent for 'he' or indicated which house. There was also no referent for the substitution of 'back'. Tim answered the question about why Sam went to a ghost house and then simply summarised the rest of the story rather than presenting it as a decontextualised retelling.

“Well the sister could listen to the ghost story and then **he** had a good time at the **house** and when he went **back** he told the story and she said, “Stop” and she said, “I want a dragon story instead.”

Conjunctions

Tim did not use cohesive resources to build a narrative. All the conjunctive relations were additive, “and”, or temporal “and then”, “and when”. For example:

There were loads of candles on the cake *and* the white one was sad
and he had a good time

‘Because’ was only used as a direct response to a “Why” question.

Mark used a range of conjunctions both additively and to build conjunctive relations of sequence and causality.

The ghosts were having a party *and* he was sad *because* it was 200, I don’t know why *then* he tried to blow the candles out *but* he couldn’t

4.5.4 Student at High Risk - Rory

Reference

Rory used referential terms correctly. That is ‘he’ referred to Sam, “They” referred to the ghosts although in his answer Rory did not specify who ‘they’ were, relying on the shared context to maintain meaning.

Ellipsis and Substitution

Almost all Rory’s contributions to this text were elliptical. I would ask a question, he often gave a one word answer:

Teacher: Did he know any ghost stories?

Rory: No

Teacher: What kind of stories did he know?

Rory: Dragon um ...

Teacher: What did his sister want?

Rory: Ghost stories.

These responses were sufficient to answer the questions. When the answer needed to include a participant and a process Rory provided both.

Teacher: So what did Sam do?

Rory: He go to a spooky house.

Teacher: What happened there?

Rory: They told him two spookies, two spooky...

Hence in this sort of conversational exchange Rory was able to maintain linguistic conventions. He substituted an adjective as a noun, “two spookies” but indicated he was unsure of this by repeating two spooky and was able to rephrase when queried,

Teacher: Two spooky what?

Rory: Two spooky ghost stories.

Conjunctions

The only conjunction Rory produced was ‘because’ (“because it was too scary”) in answer to a question.

4.5.5 Summary

Lewis, John and Lucy constructed internally cohesive texts. Individual differences reflected maturity and style. Lewis and Lucy demonstrated a degree of immaturity through the inclusion of redundant information. However they both constructed narrative texts supported by dialogue and descriptive phrases. John was more succinct in his retelling but accurately re-represented the story with an emphasis on the ghost’s internal beliefs.

Neither Tim nor Mark adequately utilized cohesive resources in their texts. Tim failed to provide logical connections through conjunctions

while Mark’s poor referencing undermined cohesion. Mark’s high use of exophoric reference indicates he is not sharing information in a decontextualised manner. That is, he is not able to linguistically create and so share information.

Rory demonstrated an understanding of all cohesive resources, reference, ellipsis and substitution and conjunctions, but only in a question/answer format. He was unable to use these to construct a coherent text independently.

The table below gives an overview of the children’s use of conjunctions.

Table 4.15 – Conjunctions in *Sam and the Ghost Stories*.

	Lewis	John	Lucy	Rory	Tim	Mark
Additive – ‘and’	7	5	7	0	7	8
Temporal ‘And then’	7	3	1	0	4	3
Causal – ‘so’ ‘because’	2	3	4	1	2	4

4.6 Conclusion

Retelling Sam and the Ghost Stories was both a recall and production task. It required the production of decontextualised discourse to share information. All the children, except Mark, were able to accurately recall the main story propositions. John, Lewis and Lucy independently constructed an oral narrative retelling that include the major episodes and only left out minor or largely irrelevant details. This demonstrated that this task was within the range of children in late Kindergarten.

Although Rory Tim and Mark remembered key points they were unable to share this information through a decontextualised retelling. They appeared

to have more difficulty with word retrieval as their vocabulary was general rather than specific. It related more to the landscape of doing than mental processes of thinking and feeling. They also remembered less detail and didn't provide causal connections unless prompted. Mark remembered unimportant detail but forgot a major episode. Tim and Mark appeared to rely more on direct memory than mediated memory (as described by Vygotsky, 1978).

4.7 Delayed Retelling of a familiar Story read to the children

The above analysis gives a picture of each child in regard to a text which had just been read to them. The demand on the child was to remember the sequence and content of the episodes and their relative importance to the overall meaning or gist of the story. Theoretically this requires a mental model of the story (Kintsch, 1998) which implies a re-representation or internalisation of the information. However, in practice, a simple process of matching or association dependent on memory without the support of internalisation or re-representation processes, could also result in an acceptable retelling.

The second part of this research question examines the children's ability to retell a familiar story, in this instance, Three Billy goats Gruff (Blair, 1981). Unfortunately John was absent for this task and so will not be included in this section. In the previous section (4.2) the structural, grammatical and cohesive analyses were presented separately. In this section each of the group's results is presented across all areas of analysis successively.

4.7.1 Structural Analysis of *Three Billy Goats Gruff*

The Three Billy Goats Gruff is a traditional fairy tale composed of three repeating episodes. The motives are clearly stated – the goats want grass from across the bridge, the troll wants a goat. The troll’s reason for allowing each of the smaller goats to cross is implied, there’s a bigger goat coming. The story was read to the class at least a month before the study began.

The following narrative breakdown is based on Stein and Glenn’s (1979) account of story structure. The version of the story read to the class and used here is published in big book form by Ashton Scholastic (1981). The full text is not given.

Table 4.16 Narrative Structure of *Three Billy Goats Gruff*

Structural Elements	Text
Setting	Once upon a time there were three billy goats gruff,
Reaction/goal	who were to go up to the hillside to make themselves fat. On the way up was a bridge. And under the bridge lived a great ugly troll, with eyes as big as saucers and a nose as long as a poker.
Attempt	So first of all came the youngest billy-goat Gruff to cross the bridge. Trip, trap! Trip, trap! went the bridge. “Who’s that tripping over my bridge?” roared the troll. “Oh, it is only I, the tiniest billy-goat Gruff. I’m going up to the hillside to make myself fat” said the billy-goat. “Now I’m coming to gobble you up”, said the Troll. “Oh no! Please don’t take me. I’m too little, that I am,” said the billy-goat. “Wait for the second billy-goat Gruff. He’s much bigger.” “Well, be off with you!” said the Troll.
Outcome	But just then up came big billy goat Gruff...”Now I’m coming to gobble you up,” roared the Troll. Well, come along! I’ve got two spears, and I’ll poke your eyeballs out at your ears...” That was what the big billy-goat said. And that was what the big billy-goat did. And after that he went up to the hillside. There the billy-goats got so fat they could hardly walk home again. And if the fat hasn’t fallen off them, why, they’re still fat. And so – Snip, snap, snout, This tale’s told out.

Analysis of Children’s Story Structure

All the children tended to organise their retelling as a temporal sequence of events. In both the stories used for the retelling task there was an agent, Sam, or group of agents, the goats, who initiate actions and hence episodes. Selecting the main agent and his role was the first task of the reteller.

Throughout this study the children referred to memory. Lucy, Lewis and Rory quoted from memory. John, Mark and Tim requested information or simply stated that they had forgotten. In both retellings the children drew

on formulaic phrases and exact repetition of words. It seems as though knowing and memorizing at an early age are synonymous. One is able to do something if one remembers what is to be done.

Table 4.17 Children’s Narrative Structure of *Three Billy goats Gruff*

	Original	Lewis no pictures	Lewis with pictures	Lucy	Rory No pictures	Rory with pictures	Tim	Mark
Setting	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes
Goal	Yes	No	No	No	No	Yes	Yes	No
Attempt	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Outcome	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Coda	Yes	Yes	Yes	No	No	Yes	No	Yes

As can be seen the children were able to structure the main elements of this story with the general exception of the goal and, to a lesser extent the coda. There was little variation between Lewis’s retelling with or without pictures. However in Rory’s case there was a marked difference with all elements being included in the retelling when supported by pictures. These differences will be more fully explored below in the individual analyses. Once again the children are grouped with Lewis and Lucy forming the first group, Tim and Mark the second and Rory the final group.

4.7.2 High Performers – Lewis and Lucy

Table 4. 18 *Three Billy Goats Gruff* by Lewis

Setting	Well um what was it again? One day there were three Billy goats gruff. One was, one was little Billy goat gruff, and one was middle Billy goat gruff, and one was big Billy goat gruff.
Reaction/goal	
Attempt	<p>Yes, little Billy goat gruff went across the bridge and the big hungry troll said, “Who’s that going across my bridge?”</p> <p>He said, “Little Billy Goat Gruff” and then he said, “I’m coming to eat you up”</p> <p>“No, no, no” he said. He said, “My big brother’s coming along.”</p> <p>Then he said, “OK”</p> <p>Then the little Billy goat gruff came and he said and the troll said, “Who’s going across my bridge?” And little Billy goat gruff and then then he said, “I’m going to eat you up” and then he said, “Don’t do that, my bigger brother’s coming along” So he said, “OK”</p>
Outcome	Then the big Billy goat gruff came and he said, and the troll said, “Who’s going across my bridge?” He said, “Big Billy goat gruff” and then big Billy goat gruff tossed him into the air
Coda	so he was, so he went up in the mountain and ate some green, juicy grass.

Table 4.19 *Three Billy Goats Gruff* by Lucy

Setting	Um, little Billy goat. Once upon a time there was a bridge and ah
Goal	
Attempt	<p>Billy goat, the middle sized Billy goat crossed the bridge.</p> <p>“Who’s that walking across my bridge?” said a troll. “I must eat you up”</p> <p>“No, I’m just crossing to get to the grassy meadow”</p> <p>“OK”</p> <p>“There’s another there’s a little goat coming by you can eat him up”</p> <p>Along came the little Billy goat.</p> <p>“Who’s that crossing my bridge?”</p> <p>“It’s only me, don’t eat me up”</p> <p>“I will”</p> <p>“I’m only going to the grassy meadow. There’s a bigger going up, a bigger one coming up, you can eat him up”</p> <p>So the bigger one came, a huge one came, um</p> <p>“I’m going to eat you up”</p>
Outcome	<p>“Oh, you want to eat me up, uhh, well I’m going to eat you up. I I mean you look like a tasty bite”</p> <p>So he splashed,</p> <p>Don’t eat me up! Don’t eat me up! Find another troll and let me go”</p> <p>But the Billy goat pushed him into the water and that was the end.</p>

Structure

Both Lewis and Lucy were able to retell *Three Billy Goats Gruff* on demand. The findings of the previous section were evident in this text too. Lewis demonstrated maze behaviour and immaturity through repetition and the inclusion of redundant information while Lucy had difficulty finding her way into the story.

Lewis and Lucy gave an opening sentence that indicated a narrative structure but both left out the goal or motive for wanting to cross the bridge. They then provided the attempts and included some detailed event sequences. Lewis gave a coda while Lucy stopped at the Outcome

After sequencing a series of nine pictures depicting the story Lewis's structuring of the text barely changed. The opening phrase became, "Once upon a time.." The end included all the goats; "So all of those little goats got to eat all that juicy grass".

Just as in *Sam and the ghost Stories* Lucy had difficulty finding her way into the story. Lucy began with "Little Billy Goat" but changed it to "the Bridge". It was as though, in order to organise her retelling, Lucy had a mental picture of the story as a pastoral scene with the bridge as centre stage on which all the action takes place and simply visualised the whole story. The other children organised their retelling around the goats and only had to remember the sequence and one set of actions common to each with the exception of the final twist. Lucy's story was more like a script, set the scene, move the action along through dialogue with the narrator playing a subordinate role. Lucy used the same technique in retelling *Sam and the ghost Stories*. Lucy's ending was an almost direct quote from a popular song taught at school,

"Well I'm feeling kind of peckish myself, you know. You look like a tasty bite. Yes, I think I'll start with you, Mr juicy troll."

"Don't eat me up. Don't eat me up, find another troll and let me go!"

Content - Field

Both children constructed the field using specific words and images. Lewis's descriptive words, 'big', 'hungry troll', 'green, juicy grass,' and evocative processes "tossed him into the air" helped to build a visual image of the action and established this text as an imaginary story. Lewis's lexis reflected traditional story language. This was more evident in the

pictorially scaffolded situation with phrases such as ‘once upon a time..’ and replies such as, “Oh no, you shouldn’t do that my big brother’s coming along”.

Lucy’s lexical choices dramatised the spoken word as though she were imagining herself as a character. Certainly her own involvement was high as indicated by her intonation and the use of modifiers and adjectives.

“ I must eat you up”

“No, I’m just crossing the bridge...

So a bigger one came, a huge one came.

The juxtaposition of ‘must’ with ‘just’ worked beautifully to indicate the strong nature of the troll driven by inner forces and the innocence of the goat. Lucy changed her voice for each speaker to further highlight their different characters.

The lexical choices and syntax combined with her intonation, change in voice and facial expressions, involved the listener. However Lucy confused the sequence. This proved to be a common feature of Lucy’s discourse when telling a story. Lucy drew on her memory of actual experiences of the story as indicated by her reciting of phrases verbatim.

Clause Complex Relations

Logically connected repetitive sequences that spiraled to an expected outcome ensured cohesion in Lewis’s retelling. These were connected with simple additive conjunctions indicating connected causal sequences as they implicitly enhanced the information given as well as extending it.

Not only were Lucy's clauses connected grammatically through hypotaxis but the propositional content between them was interdependent with one clause extending and enhancing the preceding clause.

There's a bigger going up (laughs) a bigger one coming up. You can eat him up"

So the bigger one came, a huge one came um

"I'm going to eat you up"

"Oh, you want to eat me up?"

Cohesion

Lewis's text was highly cohesive due to the accurate tracking of reference, easily filled ellipsis and substitution and thematic structure throughout the text.

Despite leaving out words and entire phrases Lucy's text is internally cohesive. Each character was tracked throughout the text often through locution as in the exchange between the troll and the middle-sized goat:

"Who's that ..." said a troll. "I must eat you up"

"No, I'm just going..."

"OK"

"There's another..."

Comparative reference and collocation - 'bigger one, bigger one' and "a huge one", maintains cohesion across clauses.

However in the Ending section one proposition was not related to the surrounding clauses, "So he splashed". The reference wasn't clear and the

action didn't relate to the following clause, "Don't eat me up..." In the last sentence Lucy clarified the sequence of actions, "But the Billy goat pushed him into the water..." demonstrating that "so he splashed" was probably a misplaced clause. Lucy began with the final event but then stopped and gave the troll's response first.

Lucy was successfully using cohesive strategies encountered in many traditional children's stories. The omissions were easily filled by the listener as the content and form was largely formulaic.

4.7.3 Students at Moderate Risk - Tim and Mark

Table 4.20 *Three Billy Goats Gruff* by Tim

Setting	One day the Billy goats gruff, one of the Billy goats gruff said,
Goal	"I'm getting hungry", I think
Attempt	<p>And I went across the bridge in the, A troll said, ah, What did the troll say again? (You make it up).</p> <p>"Who's that tripping acr over my bridge?"</p> <p>Then the little goat said, "It's me, the littlest goat" and I forgot what he said again, (Prompt) Eat him up. And then the little goat said err, "There's a big and fatter Billy goat than me so "I forgot (Prompt). The big Billy goat the medium Billy goat comes along and ah, the troll goes up and says, "Who's that tripping over my bridge?"</p> <p>And the Billy goat says, "It's only me, the medium sized Billy goat" and the troll says, I forgot (Prompt, "I'm going to eat you up")Yes and then ah the Billy goat said, "There's a bigger and fatter troll coming over soon" Ah and the troll got down the bridge and the goat on the other side and then</p>
Outcome/Ending	<p>The biggest goat came and the troll jumped up and said, "I'm going" he said, "Who's that tripping over my bridge?" And the biggest goat said, "It's me, the biggest goat" Ah and the goat and the troll said, "I'm going to eat you up" And the goat said, "Is that so? I'm feeling kind of peckish myself you know" And gobbled him up</p>

Table 4.21 *Three Billy Goats Gruff* by Mark

Setting	Three Billy goats gruff
Goal	
Attempt	First Billy goat gruff, the biggest one went across the bridge, first I mean last (Prompt) The little one and um the troll didn't let him go across the road, I mean the bridge and the little Billy goat gruff told him there's another Billy goat coming next and the other the Billy goat the went next the troll wouldn't let go through and the last um
Ending	When the big, bi, biggest Billy goat and um the biggest Billy goat and um then the um then the um What are those things? (Horns) Horns, he bulled him he bulled him off the bridge
Coda	and they all went over to eat the grass.

Structure

Both Tim and Mark had difficulty in structuring the story. Tim provided an orientation that gave time, participants, place and a goal, the only child to do so. However, although he could recall all the separate episodes he had difficulty connecting them sequentially into a story.

Mark was able to give some of the actions and provide an Ending and Coda, but was unable to rhetorically structure the events as a narrative sequence. He failed to complete the main event sequence which is composed of five parts;

- the goat attempting to cross the bridge,
- the troll accosting him,
- the goats suggestion
- the troll agreeing to his crossing
- waiting for the next goat to cross.

Mark omitted the troll allowing the goat to cross and moved straight into the next goat's attempt. He also failed to adequately describe each goat so

the sequence of small to large was lost. Mark couldn't control content selection or rhetorical organisation.

He made no attempt to situate this text by providing an orientation or setting. All the other children, with the exception of Rory who only provided a comprehensive setting when he had the pictures as a retelling aid, gave an orientation in which they mentioned that the goats wished to cross the bridge to eat grass.

Content/Field

Both Mark and Tim had some difficulty controlling field through lexis. Mark had difficulty retrieving appropriate words from his lexicon. He also used prepositions and temporal terms inaccurately. Mark used no "book language" or formulaic phrases that had been memorised such as "juicy grass" or "be off with you!"

Tim substituted 'goat' for 'troll', left out words when giving details about where the troll goes "down (under) the bridge" and largely seemed to utilise remembered book phrases associated with the story, eg. "Who's that tripping acr (sic) over my bridge?". He was not constructing his own linguistic form but relied on phrases retrieved from memory. Tim knew the goats crossed the bridge in order of size and that the troll wanted to eat them but he was unable to create language to represent this knowledge. The last statement by the goat, "Is that so? I'm feeling kind of peckish myself you know", was taken directly from a popular song taught at school. He also didn't infer why the troll allowed the smaller one to pass when a bigger one was mentioned. (The bigger one will provide a more substantial meal). When I probed Tim's understanding of the goats actions he had no idea:

T: What does he tell the troll to do?

Tim: I don't know.

Tim required prompts to recall verbal sequences that he had obviously remembered from texts,

Tim: And the billy goat says, "It's only me, the medium sized billy goat and the troll says, I forgot.

T: Did the troll say, "I'm going to eat you up"?

Tim: Yes, and then ah the billy goat said, "There's a bigger and fatter troll coming over soon"

Clause Complex Relations

Tim and Mark strung together a series of propositions with very little relationship between them other than being part of an action sequence. Causal relationships were not given. Both these children paratactically linked the clauses through extension. The only time Tim attempted to use a causal conjunction, 'so' to enhance the information already given he stopped saying, "I forget". Throughout the retelling Tim avoided qualifications and simply gave an outline of the events.

Mark's only conjunction 'and' added actions with only minimal information given so that the listener had to fill in gaps and infer causes.

Mark's text appeared disorganised due to false starts, repetitions and the omission of crucial information. In the following extract unnecessary words are highlighted and omissions marked with a line.

and the **the** troll didn't let him go across the road, I mean bridge and the little billy goat gruff told him there's another billy goat coming

next and the other **the** billy goat **the** went next. The troll wouldn't let.....go through (inaudible) and **the last um** when the **big**, bi biggest billy goat **and um the biggest billy goat and um then um then the um**,What are those things?

T: Horns

M. Horns um He bulled him **he bulled him** off the bridge and they all went over to eat the grass.

Mark gave prominence to actors and processes but only sometimes included goals or circumstances. He gave four circumstantial phrases, “go across the road”, “coming next”, “off the bridge” and “over to eat the grass”. The story that resulted, although accurate as an event sequence, was the bare minimum to convey meaning.

Cohesion

Despite the interruptions to ask for help Tim's text was internally cohesive as he tracked reference correctly and gave all information necessary for the listener to gather meaning. Although he forgot details and needed a number of prompts Tim maintained cohesive relations throughout.

Mark's text was less cohesive due to poor referencing and omissions. For example, “the troll wouldn't let (him) go through” and, “he bulled him, he bulled him off the bridge”. It is only possible to relate ‘him’ to the troll through prior knowledge of the story. It cannot be grasped from the preceding text.

4.7.4 Student at High Risk - Rory

Table 4.22 *Three Billy Goats Gruff* by Rory

	Retelling without pictures	Retelling with pictures
Setting		Once upon a time there was a troll living under a bridge
Goal		And the billy goats wanted to eat the grass on the other side so they decided to cross the bridge but there was a troll there.
Attempt	First the little one went over, and then the middle one. The troll came out,	So first the little one came over and and then the troll said, "Go off with you" Then the middle sized billy goat, and the troll says, "Who's that walking over my bridge?" The little billy goat says, "It's only me, Don't eat me" "Be off with you" Then the bigger billy goat comes along. The billy goat, I mean, the troll hops out and says, "I'm going to eat you up" "No, there's a bigger billy goat coming"
Ending	And then the bigger one um put his horns down and butted him up into the sky and then into the water.	So the bigger billy goat comes um billy big billy goat came up and then he butted him, the troll, with his horns, into the water
Coda		The they could eat the grass, all of them. Bye, bye. Finished.

Structure

Initially Rory was able to remember the main propositions as demonstrated by his ability to answer my questions but gave a synopsis rather than story like discourse.

When given cards that illustrated the story Rory correctly sequenced them and produced a much longer narrative using literary language.

The pictures acted as a memory aid and supported rhetorical organisation. Rory began with a formulaic phrase then constructed a sequence of clauses held together by conjunctions ranging from causal *so* to comparative *but* . Throughout the retelling sequence was maintained even across

interruptions and self-corrections. Unlike Tim, Rory did not rely on remembered phrases or formulaic material to re-construct the story.

In the text produced by Lewis there was very little difference between the retelling from memory and when supported by the picture cards. In Rory's case the cards provided a crucial aid to content organisation.

Content/Field

Rory appeared to have no difficulty recalling appropriate vocabulary such as, 'horns', and 'butted'. He also used a wide range of processes to add depth of meaning, eg. 'living', 'decided to cross', 'go off', 'be off' and 'hops'.

Clause Complex Relations

In the retelling without pictures Rory constructed two clause complexes. Both were paratactically linked with temporal conjunctions, 'and then'. In the retelling with pictures Rory produced a much longer text comprised of three logically connected clause complexes. These gave details of the event sequence using direct speech to structure the text;

“Who's that walking across my bridge?”

The little billy goat says, “It's only me, don't eat me.”

“Be off with you”.

Cohesion

Rory actually clarified reference by providing the referent immediately after using a pronoun, “then he butted him, the troll, with his horns”.

Rather than use a simple additive conjunction, ‘and’ Rory used an adversive conjunction, ‘but’ as well as causal conjunctions: “to cross the bridge **but** (adversive) there was a troll there **so** (cause) first the little ...”

4.7.5 Summary

Lewis and Lucy (HP) were able to complete this task on demand. They demonstrated similar patterns to the previous retelling. Lewis tended to repeat words and phrases and had some minor confusions in labeling the goats. Lucy found it difficult to begin and had some sequencing problems. Both used direct speech to convey information.

Tim and Mark had difficulty building relationships between clauses tending to list events without including motives and causes. Both used very little direct speech. Tim demonstrated some problems with recall. Mark had referencing problems and omitted necessary information.

Rory made an attempt but simply mentioned the main protagonists and event. That is the goats, the troll and the biggest goat tossing the troll into the water. He could not connect the protagonists and the events linguistically to share meaning until supported with pictures. He then produced a cohesive, well-constructed story.

4.8 Response to Research Question 1

This diverse group of Kindergarten children met the task of retelling firstly, a story just read to them and then, a familiar story from memory, in a variety of ways.

The 'high performing' group were able to retell both stories independently. They could share information in a decontextualised manner. Lucy's language was highly congruent and she had some difficulty organizing content.

The 'moderate risk' group were also able to structure a narrative type retelling but their stories lacked cohesion, did not build relationships between events or provide motives. There was some difficulty with the correct use of reference.

The high risk group was unable to construct any form of retelling unless highly scaffolded. When scaffolded with a series of sequenced pictures this child, Rory, was able to rhetorically organise personal knowledge suggesting that the information is present and that the difficulty is linguistic.

The high performing group was composed of children who had no reported or family history of learning disabilities.

The moderate risk group included children who had a family history of learning disabilities and a child with no history or previous indication of a learning disability although there were reported social problems from the home.

4.9 Children's Recounts from Personal Experience

4.9.1 Introduction

This section seeks to answer research question 2 relating to the children's use of the cohesive and grammatical resources of English in recounting narratives of personal experience.

Whereas a narrative is primarily concerned with resolving a problem, a recount is a temporally organised event sequence.

A recount has an orientation to establish a context for what is to follow and a record of events. Optional elements are a reorientation, which brings the listener/reader back to the starting point, and a coda that gives an evaluation of the events.

Although Kindergarten children are quite capable of constructing narratives their general tendency in discourse is recount embedded in conversational exchange. They do not appear to have the cognitive development necessary to separate from personally experienced events and recast them in the largely culturally determined narrative format. In other words narrative is a learned genre based on cultural beliefs and linguistic conventions while recount is a less stylised expression of events. A recount requires the ability to rhetorically organise experience.

In the case of young children the more mature listener usually provides some rhetorical structure by asking questions, or volunteering comments that will elicit more detail, clarify an ambiguity, establish the child's attitude, or place the event in a cultural framework of belief. This was apparent in these recounts which tended to show two different aspects – relatively continuous recount and a series of question/answers. The recount

sections are analysed in accordance with Martin's (1992) definition of recount. Relevant question/answer sections are given in the transcripts at the beginning of each section.

When examining the recount data the children fell into different groupings. Lewis, John and Lucy were still the most proficient. Tim, Mark and Rory demonstrated some serious problems and could all be regarded as 'at risk'. Of these three Tim was the most proficient. In this section the groupings are now –

High Performers - Lewis, John and Lucy

Moderate Risk – Tim and Rory

High Risk – Mark

The data is reported under the headings, Structure, Field, and Cohesion.

Each child was instructed to tell me about something interesting that had happened to him or her, or a special occasion such as a birthday. The recounts varied both in subject matter, length and complexity.

Recount Structure

All the children were able to construct a coherent recount that included the two obligatory sections identified by Martin, (1992) - Orientation and Record.

Individual Structural Analysis - Recount

4.9.2 High Performers - Lewis, John and Lucy

Lewis, John and Lucy's recounts are given in the tables below. This is followed by a discussion on the structure of each recount.

Table 4. 23 Personal Recount by Lewis – *Locked Out*

Structure	Text
Orientation	I was three.
Record	<p>Well I got locked out without my Mum and Daddy only with my little toy, without my dog, without my brother.</p> <p>Teacher: Can you remember what happened?</p> <p>Lewis: Well ... I went around the backyard because I didn't know. Mummy, I was calling Mummy, but she wasn't there</p> <p>then then I had to wait there for a for one hour by myself then I stopped crying cause I heard a car coming. It was my Mum.</p>
Exchange	<p>Teacher: So you were by yourself?</p> <p>Lewis: for about two hours.</p> <p>Teacher: And you were only three?</p> <p>Lewis: Yes.</p> <p>Teacher: What happened? Did Mum just forget you?</p> <p>Lewis: No, I came back from James's house and his Mum went into her house and I wasn't allowed to go across the road cause she wasn't watching me so she went back to her house and now she always watches me.</p> <p>Teacher: She thought your mother was at home?</p> <p>Lewis: and then cause she James lives across the road and up the street and he lives he lives I live at 22 he lives on lives on 19.</p> <p>Teacher: So you couldn't go back to James's Mum and say no-one is at home?</p> <p>Lewis: That's cause there's big traffic down there.</p> <p>Teacher: Very sensible to wait in the backyard.</p> <p>Lewis: I heard a car and I thought it was a robber so I went in the backyard and I hi (sic) and I went on the swings to hide because I thought it was a robber.</p>

Table 4. 24 Personal Recount by John - *My Birthday*

Structure	Text
Orientation	I played soccer at my party
Record	and I played Cops and Robbers at my party and I didn't have it at my house. We had it at Indoor Sports and um
Exchange	Teacher: Did you invite a lot of people? John: Um twenty people came. I invited twenty three and um... Teacher: Were they all boys? John: Yes. Teacher: That means there must have been not just the boys from our class? John: Every boy in class plus another boy.

Table 4. 25 Personal Recount by Lucy - *Grandma's*

Structure	Text
Orientation - 1	Um well we went out with our Grandparents
Record - 1	and I got a little beany piggy and it's at school and it's in my bag and I brought it and then I went home and we were late and we only got home at mid we nearly got home at midnight and I was really tired so I didn't clean my teeth!
Exchange - 1	Lucy: Teacher: You didn't clean your teeth! Lucy: And going to the toilet. Teacher: Was that yesterday or the day before? Lucy: Yesterday. Teacher: So are you tired today? Lucy: But I'm going to go to bed early tonight. Teacher: Good idea. Lucy: I'm going to go at ... 6 o'clock but I normally go at 7 o'clock. Teacher: What else did you do at Grandma's? Lucy: Um well we went shopping before we went out for lunch to get some we had to get some bread and stuff because we needed some cause Grandma didn't have any bread. Teacher: Do you enjoy going to Grandma's? Lucy: (Nods) My brother goes at the same time to his Grandma. Teacher: You go to different Grandma's? Lucy: Yeah, cause we go the same day to same Grandma. I got my own and he goes on his own too.

	<p>Teacher: I see! Do you swap over Grandma's?</p> <p>Lucy: We keep swapping over but on weekdays we go back home. Only on like weekends or the school holidays we stay at our Grandma's.</p> <p>Teacher: Do you go every weekend?</p> <p>Lucy: (Nods)</p> <p>Teacher: Every single weekend!</p> <p>Lucy: And every single holiday, even in the Christmas holiday. We're going to have Christmas at our Granny's house.</p> <p>Teacher: That will be good fun!</p>
Orientation -2	<p>Cause our Mum and Dad want a rest from us cause we keep fighting all the time and we keep screaming at night time.</p> <p>Teacher: Really?</p> <p>Lucy: I've got I got Mum and Dad got cross with me last night cause I keep screaming.</p> <p>Teacher: Why did you start screaming?</p>
Record - 2	<p>Lucy: Because my, Stephen, that's my brother , he kept fighting me outside and it was it was outside daylight saving but I couldn't I like I was tired both my eyes and I couldn't see very well and anyway he came and tackled</p> <p>he runned out and tackled me without knowing because he was behind me</p> <p>Teacher: So he took you by surprise.</p> <p>Yeah and then I started screaming and crying and then um well Dad thought I did something to Stephen and then he said he said he did but he really did it to me. He was only joking. He wanted me to get in trouble.</p>
Exchange - 2	<p>Teacher: Is Stephen older than you are?</p> <p>Lucy: Yeah, he's 12</p> <p>Teacher: Do you ever play happily together?</p>
Record - 3	<p>Oh sometimes when we have chips and we go far away. We always say we're having a party in the car and when we get home then we be nice to each other But when it's ahh when we don't go far away like when it's school days or the weekends cause ... last weekend we went to a nursery um on Saturday and it was a very long way and we got chips and then we started having a party in the car, pretending.</p>

Structure

Although Lewis's text was temporally organised he placed different items in the Theme position providing interest and drama. Thematic position was

shared between 'I', conjunctions forming Textual Themes such as "Well", "Because", "but" "then" and the other major participant, "Mummy".

Lewis positioned the discourse in time by stating, "I was three". He then gave a general précis of the memorable event indicating its dramatic nature with a string of circumstantial phrases: "Well I got locked out without my Mum and Daddy, only with my little toy, without my dog, without my brother."

Lewis also tracked time throughout the discourse from "I was three" to "then I had to wait for ... one hour" (which extended to two hours in an elaboration of the events), to "and now".

John organised his text thematically – his birthday and included details important to him, the activities and place. There was no mention of food or presents both of which figure importantly in our culture. The setting was provided at the end of the list of actions rather than at the beginning.

It was clear from John's language use that he was aware of the decontextualised nature of a recount. The first section was dynamically organised in the sense that his discourse was a series of actions with himself as the actor. This is typical of spoken text (Painter, 1999).

Lucy gave a sequential account of her day out with her Grandparents culminating in the notable feature of a complete disruption to the normal, established regime; "and I was really tired so I didn't clean my teeth". An evaluative culmination and certainly an event worthy of comment. This led into an extended conversation about Grandparents (see Exchange – 1) in which Lucy clearly established her grasp of the features necessary to maintain and extend discourse. These included turn taking, initiating topics,

maintaining and extending topics and combining various discourse genres such as recount narrative, explanation (see Orientation and Record – 2 sections) and dialogue.

Although the record sections of this text were decontextualised the overall discourse was dependent on face to face interaction. This was very much a jointly constructed text. Whereas Lewis, when responding to my questions, tended to give either a decontextualised explanation or elaboration relevant to his story Lucy answered my questions more directly maintaining the organisation I established. Her language was highly congruent in that it followed a simple pattern of Subject, Process, Circumstance, Goal or Object and utilised virtually no ellipsis or substitution. For example, “But I’m (Subject) going to bed (Process) early tonight (circumstance)”. “Cause our mum and dad (Subject) want a rest (Process) from us (Circumstance) cause we (Subject) keep fighting (Process) all the time (Circumstance)”. A more mature form could be, “cause our mum and dad (Subject) want a rest (Process) from our fighting (Circumstance)”.

4.9.3 Students at Moderate Risk - Tim and Rory

Table 4. 26 Personal Recount by Tim - *Shopping*

Structure	Text
Orientation	Yesterday I went to the shops
Record	and my brother brought a new telescope He had a go on that and then I pushed my foot down and hand on the ur push pump but now I call it a hand pump cause I do it with two hands and it blows up the boat and we played in the boat and the fat bit was up so we couldn't dive backwards so then we put that down but kept the boat up and the fat bit was to let us lean backwards and when sh my Mummy putted it down and my brother and we pu me and my brother put our flippers on My brother had his goggles on but I don't have mine and then I flipped over like this like a deep sea diver.
Exchange	Teacher: Were you at the shops or were you at home now? Tim: We were at home in the swimming pool. Teacher: How big's the boat? Tim: Oh it's you can fit two people in it It's got peddles and push the peddles and you've got to move your hands otherwise then you just go round in circles. If you want to turn around you just go like this hold on but I don't hold on and then it goes round and you move your hands like this.

Table 4.27 Personal Recount by Rory - *Shopping*

Structure	Text
Orientation	One day me and my sister and my Mum and my little sister went to a shop
Record 1	to look at lounges where we got new carpet and then after we Alice and me and my sister had had some money I had just one ten dollar but I needed another one because I bought a Teddy Telly.
Exchange 1	<p>Teacher: A what?</p> <p>Rory: A Teddy Tubby</p> <p>Teacher: A Teddy Tubby?</p> <p>Rory: No! a Telly Tubby.</p> <p>Teacher: A Telly Tubby!</p> <p>Rory: and I've got a little wee one just there and um Jamie's got one.</p> <p>Teacher: Can you remember when you went shopping?</p> <p>Rory: ... Sunday</p> <p>Teacher: Just yesterday?</p> <p>Did you go in the morning or in the afternoon?</p> <p>Rory: ... I don't know.</p> <p>Teacher: Did you have anything to eat while you were out?</p> <p>Rory: ...No.</p> <p>Teacher: No?</p> <p>Rory: Not any drinks but I was thirsty</p> <p>Teacher: Did you have to wait until you got home? Were you out a long time?</p> <p>Rory: Yes.</p> <p>Teacher: Did Mum and Dad find a new lounge?</p> <p>Rory: Yeah but they didn't buy it I don't know.</p> <p>Teacher: They just looked at it?</p> <p>Rory: They looked at lots of lounges I mean my sister and I but my Mum said we couldn't to look at things</p> <p>Teacher: Tell me about your sister running away.</p>
Record 2	<p>Because she ran away because um we looked at chairs and there was one really pull the thing back the leg thing came up that you could rest and there was one um there was one chair that could go up and down with remote control.</p> <p>Teacher: Tell me about your sister.</p> <p>Rory: She came with me and sometimes we separated</p>

Exchange - 2	<p>Teacher: So she didn't really run away, you just looked at other chairs. Did you ever lose sight of Mum and Dad?</p> <p>Rory: I thought we did when we sat in that up and down chair but she knew the way back.</p> <p>Teacher: And she's younger than you?</p> <p>Rory: Yes</p> <p>Teacher: But she knew the way back?</p> <p>Rory: Yes. She's about 4 um 6.</p>
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Structure

Tim and Rory's recounts were a temporally organised list of events. Tim began with an orientation introducing a topic – the brother's new telescope, and also provided information about who, what, where and when. The next sentence began by referring back to the telescope and the brother's actions regarding it but then shifted topic without providing any reference about where, when or what, "and then I pushed my foot down..." The remainder of the text described actions relating to playing with the boat in the pool.

Rory provided an orientation that gave time, participants and place. He then described some of the events and elaborated on them when questioned. Although he needed some prompting to explain his initial statement that his sister had run away Rory eventually provided a plausible explanation:

She came with me and sometimes we separated.

This was concise but, most importantly, included all necessary functions to convey meaning, that is, participants involved in clearly stated actions.

4.9.4 Student at High Risk – Mark

Table 4. 28 Recount of Personal Experience by Mark - *Swimming*

Structure	Text
Orientation	<p>Mark: I went into the beach first then I went to swimming.</p> <p>Teacher: At the beach?</p> <p>Mark: No, swimming at the swimming lesson.</p> <p>Teacher: Tell me about both.</p>
Record	<p>Mark: Ahh Mummy found some shells with holes in them and I found some shells to bake a cake and I used the beach and I put and put a candle as a stick as a campfire. I did a three.</p> <p>Teacher: Ahh.</p> <p>Mark: Now can I do about the swimming?</p> <p>Teacher: You sure can.</p> <p>Mark: Um I did ... a three dollar I did torpedo... and ... I did ... ah throwing a bit and swimming under water to get them and I always have the blue because and they're a little bit of the colour of my speedo costume.</p>
Exchange	<p>Teacher: So first you went to the beach. Did you go home then or straight to swimming?</p> <p>Mark: Home first then swimming.</p>

Structure

Mark clearly indicated the topic (see Orientation) by naming the two different water activities he engaged in - the beach and swimming. However he failed to adequately differentiate between the two and so prime the listener regarding context. I asked for clarification; “At the beach?” Only then did Mark provide the crucial word, ‘lesson’. He then gave a series of activities culminating with, “I did a three”. This was followed by a pause. Mark must have realised he had already started on the second topic of his self-organised recount and explicitly asked if he could, “Now do about swimming?”

Once again there was no attempt to orientate the listener, provide details, or explain specific terms. This section was a list of activities including an explanation about the colour of one item. The item was only referred to as “them”. Once the list of activities was over Mark stopped with no linguistic indication that this was the end.

4.9.5 Summary

Lewis, John and Lucy (HP) were able to structure a recount that shared meaning. They didn’t require extensive scaffolding and produced cohesive, rhetorically well constructed extended sections of text.

The children in both the ‘at risk’ groups, Rory, Tim and Mark, technically met the obligatory requirements of a recount, ie. an orientation and record, but only with considerable interactive support. Tim’s text was rhetorically organised as a procedure rather than a record of events. Both Rory (MR) and Mark’s (HR) recounts were undermined by poor clausal structure.

Although Mark indicated, and to a certain degree, demonstrated, rhetorical organisation of his information he failed to provide sufficient explanation or detail for the listener to gather meaning. He left out words in almost every clause making his recount very difficult to follow.

4. 10 Use of Grammatical Resources in Oral Recount

4.10.1 Field

This section includes a) lexis and b) clause complex relations. The table below presents the total number of words in each child’s recount, the number of lexical items and the number of different lexical items. Content words, or lexical items, are words such as nouns, verbs, adjectives and adverbs. Grammatical words such as prepositions, conjunctions, auxiliary

verbs, modal verbs, pronouns and articles are not included (Gerot, and Wignell, 1994)

a) Lexis

Table 4. 29 Lexical Counts in the Children's Personal Recounts

	Lewis	John	Lucy	Rory	Tim	Mark
Total No. of words in text	71	38	282	109	136	103
% of content words	41%	42%	42%	42%	36%	40%
% of different lexical items	34%	37%	28%	38%	26%	30%

As can be seen from Table 4.29 the children produced a similar percentage of content words. Tim produced the fewest content words due to a tendency to rely on pronouns. Tim also produced the lowest percentage of different lexical items. Lucy showed the highest rate of content words but fewer different content words than the other children indicating a high level of repetition. Mark's percentages compare favourably with the other children however the omission of necessary grammatical words gave a reduced total.

Table 4. 30 - Processes utilised in the Children’s Personal Recounts

Process	Lewis	John	Lucy	Rory	Tim	Mark
Material	3 - 37%	2 – 40%	13 – 48%	9 – 69%	14 – 88%	9 – 81%
Behavioural	1- 12%	0	3 – 11%	2 – 15%	0	0
Mental	2 – 25%	0	6 – 22%	1 – 8%	1 – 6%	0
Verbal	1 –12%	1 – 20%	3 –11%	0	1 –6%	0
Relational	1 – 12%	0	1 – 4%	0	0	0
Existential	0	2 – 40%	1 –4%	1 –8%	0	2 – 18%
No. of diff. processes	8	5	27	13	16	11

Although Lewis and Lucy’s recounts were dominated by material processes they included a comprehensive process range. Tim and Mark had the highest level of material processes with very few other processes represented indicating a focus on actions and events.

4.10.2 High Performer’s - Lewis, John and Lucy

Lewis, John and Lucy had no difficulty recalling appropriate words. Forty one percent of the words Lewis produced were content words while Lucy and John both produced forty two percent content words. Lewis and Lucy used modal adjuncts to indicate circumstance and degree, ie. “*only* with my little toy” (Lewis); “I *normally* go at 7 o’clock”.

4.10.3 Students at Moderate Risk - Rory and Tim

Although Rory and Tim used specific terms their lexicon was limited by repetition and substitution. Tim tended to repeat words giving him the lowest percentage (26%) of different lexical items. He also had the lowest

percentage of content words with only 36% but was able to provide specific vocabulary such as ‘hand pump’ and ‘deep sea diver’

Rory was unable to recall or provide an appropriate name for parts of objects such as ‘lever’, or ‘footrest’ but could recall more familiar words such as ‘remote control’. He also used prepositions and conjunctions that didn’t convey his intended meaning.

T: Tell me about your sister running away.

R: Because she ran away because we looked at chairs

Rory wanted to explain that *when* he and his sister looked at chairs they sometimes moved apart and perhaps even lost sight of each other and their parents. The use of the word ‘because’ could be interpreted as meaning that Alice ran away *because* they looked at chairs. He also became sidetracked and talked about one of the chairs. A command finally elicited an appropriate response,

T: Tell me about your sister

R: She came with me and sometimes we separated.

This gave enough information for the listener to work out what happened.

However he was capable of using grammatical terms successfully as demonstrated in this clause complex using temporal (when) and comparative (but) conjunctions (in bold) appropriately:

I thought we did **when** we sat in that up and down chair **but** she knew the way back.

He also classified the reclining chair with an appropriate label “up and down chair”.

In the section of text set in the pool Tim gave a procedural account about the function of one part of the boat. Tim successfully combined the use of different tenses in this section moving from the ongoing infinitive, “to let us lean” to the simple past, “put our flippers on”. He made two errors regarding tense - “putted” and the use of the present tense instead of the past in, “but I don’t have mine”. This last example is appropriate if the mazes are removed and the section about his brother wearing goggles treated as an interrupting clause (given in italics):

We played with the boat and the fat bit was up so we couldn’t dive backwards. When my mummy put it down and me and my brother put our flippers on, *my brother had his goggles on but I don’t have mine*, I flipped over like this

The use of ‘don’t’ in relation to wearing goggles could be logically viable if it was a comment about a continuing state, that is Tim doesn’t have any goggles now but once did.

When I asked a question about the size of the boat Tim’s response was again very detailed and specific,

Oh it’s so you can fit two people in it. It’s got paddles and push the paddles and you’ve got to move you’re hands otherwise then you just go round in circles. If you want to turn around you just go like this, hold on, but I don’t hold on and then it goes round and you move your hands like this, like a deep sea diver.

In this section Tim used gesture to explicate the meaning and left out one essential feature, agency: “It’s got paddles and (you) push the paddles”. This is an immature clausal construction. John, Lewis, Rory and Mark were

able to connect two propositions through projection. Tim's use of 'and' to join these two clauses rather than projecting one through the other, "It's got paddles that you push" indicates a high degree of congruency and an inability to utilize the grammatical resources necessary to create information linguistically.

Rory also had some difficulty expressing ideas linguistically. In the opening section Rory provided a great deal of information but it sounded confusing due to ideosyncratic grouping of participants and actions,

One day me and my sister and my Mum and my little sister went to a shop to look at lounges, where we got new carpet, and then after we, Alice and me and my sister had had some money, I had just one ten dollar but I needed another one because I bought a Teddy Telly.

In this section one can't be certain if there were two sisters or if Rory had repeated information. A more rhetorically mature approach would be to group the sisters into a category, my two sisters, or specifically separate them by supplying labeling, my big sister and my little sister.

The embedded clause about the shop being the same one in which they bought their carpet was incorrectly sequenced and so tended to be related by the listener to the lounge rather than to the shop.

In much of this text Rory ran together a string of actions without always giving the functions necessary. For instance he would omit a goal, a participant, or a process (given in italics):

Yeah but they didn't buy it I don't know '*why*'

They looked at lots of lounges, I mean my sister and I but my Mum said we couldn't *touch, we were only allowed* to look at things.

and there was one really *great (?) chair*that you could rest *on*

Although Rory realised I didn't share the experience and was able to build a mental picture with me he couldn't organise it into a coherent linguistic text that shared information, indicated affective states, or provided causal motivations.

4.10.4 Student at High Risk - Mark

Mark used words specifically associated with his topic, 'shells', 'beach', 'sand', 'swimming underwater', 'speedo' and even named some of the actions, 'three dollar'. Yet one had difficulty forming an idea of what he actually did. Unconventional word use such as substituting 'beach' for 'sand' as in, "used the beach", compromised meaning. Some vocabulary was highly specific, such as "three dollar", which needed some elaboration for the listener to gather meaning.

Mark could, at times, control transitivity. In the extract below he included actor, process, and goals/participants:

I (actor) found (process) some shells to bake a cake (goal) and I (actor) used (process) the beach (goal)

The processes were given, finding shells, baking a cake, and using the beach (sand) but meaning is compromised. Mark grammatically indicated that he baked the cake using shells (some shells to bake a cake) but then stated that he used the beach. Hence we don't know what he built the cake with, shells or sand. The next clause is even more meaningless:

and I (actor) put and put (process) a candle (participant) as a stick as a campfire (circumstance) .”

Mark has left out so much information that we can only speculate on the meaning. Did he pretend a stick was a candle and then make a fire out of stick/s, perhaps to bake the cake? The sequence of actions and the objects used are ambiguous. Mark confused actor and process. The stick was the medium of the action, not the candle. Sequence in English is essential to the process of action, “I used a candle as a stick” is very different to “I used a stick as a candle”. The one lexical item, ‘a stick’ was used to represent two distinct things – a candle and a campfire. Mark used only one clause with a prepositional phrase to linguistically express a series of actions when multiple clauses linked in a clause complex was actually required.

The cognitive structuring of the action revealed in this linguistic representation is consistent with a one to one matching of remembered actions to words. “I (the actor) found (process) some shells to bake (decorate?) a cake and I (actor) used (process) the beach (sand)”. At this point Mark left out the presumed goal of piling up the sand to form a cake or a campfire, this was unclear, and simply went on to tell us what he did next - “and I (actor) put (process) a candle (participant) as a stick (prepositional phrase: goal) as a campfire”. The logical relationship between ‘stick’, ‘candle’ and ‘campfire’ was completely lost.

Mark demonstrated a tendency to collapse information linguistically, that is, to use too few words to provide the linguistic infra-structure necessary to convey meaning.

Mark’s next statement, “I did a three”, was absolutely impossible to interpret so I simply said, “Ahh”. Mark’s following question and opening statement (in italics) in the next series of events clarified the situation.

Now can I do about swimming?

...

I did a three dollar. I did throwing a bit and swimming underwater to get them, and I always have the blue, because they're a little bit of the colour of my speedo costume.

Once again Mark included himself and processes relevant to him but left out necessary information about participants such as the object that is blue (attribute but no 'thing'). He has also assumed that the listener knows what the specific terms mean without explanation. All the other children gave explanations or added extra information to clarify meaning.

4.10.5 Summary

The children in the High Performance Group had no trouble recalling appropriate content words or utilising grammatical words to form clauses and so convey meaning. Tim, Rory and Mark were able to recall specific vocabulary and a range of processes. However Rory and Mark omitted necessary grammatical words undermining their clauses effectiveness. For any single clause to be effective it needs a noun group, a verb group plus a prepositional phrase or phrases (Butt, 2000). Prepositional phrases and clauses provide circumstances that enhance meaning. Hence a low prepositional count can indicate a lack of circumstantial information which may impact on meaning. Low scores do not necessarily indicate ineffective clause structure. The language could be concise and precise rather than rambling or lacking in meaning. Mark's verbal communication was difficult to follow. Out of seventeen single clauses Mark used only eight prepositions giving 47% whereas Lewis used eight prepositions in ten

clauses giving 80%. Rory used nine prepositions across seventeen clauses, 53%. Lucy, whose recount could be considered as the most rambling, used twenty three prepositions across forty eight clauses, 48%. John's recount, the most precise and concise, contained five prepositions in eight clauses, 63%.

4.10.6 Clause Complex Relations

As explained previously clause complex relations reveal the logic underlying the meaning constructed by the clause. As the extended sections of text are the Record sections of each child's recount only these are included in Table 30. There is a significant difference in the number of clauses produced by the children. This reflected their personal propensity to speech rather than ability or inability to produce meaningful language. Lucy loved to talk. John and Lewis were competent language users but not verbose.

Table 4.31 Number and type of clauses in children's personal recounts
(Data excludes Exchange sections and researcher's clauses)

	Lewis	John	Lucy	Rory	Tim	Mark
No. of clauses	10	4	55	17	19	16
Clause complexes	3	1	11	5	3	3
Incomplete Cl.	0	1	4	0	0	0
hypotaxis	2	0	3	3	2	0
Parataxis						
elaboration	4 – 40%	1 – 25%	12 – 21%	7 – 39%	6 – 30%	3 – 19%
extension	3 – 30%	3 – 75%	19 – 35%	6 – 33%	9 – 45%	9 – 56%
enhancement	3 – 30%	0	18 – 33%	5 – 28%	5 – 25%	3 – 20%
Embedded Cl.	0	0	1	0	0	0
Interrupted Cl.	0	0	2	0	0	0
Dependent Cl.	0	0	3	2	1	0
Locution/idea	0	0	2	0	0	0

Clauses may be hypotactically or paratactically related. A hypotactic relationship is one of dependency whereas parataxis links elements of equal

status (Halliday, 1985, p.221). An interrupted clause occurs when the speaker inserts a clause, usually closely related to the ongoing clause, to add extra information (Butt, Fahey, Feez, Spinks, and Yallop, 2000, p. 169). In the above sentence, “usually closely related to the ongoing clause”, is an example of an interrupting clause.

The low ratio of clause complexes to clauses (eg. Lucy, 11:55; Mark, 3:16) indicates the high use of conjunctions across all the recounts. There were fewer ellipsed clauses in the recounts than in either of the retellings because no exchange sections were included in the above table.

4.10.7 High Performing Students - Lewis, John and Lucy

Lewis and John produced the shortest recounts. They knew what could be left out and how to manipulate language to present propositions clearly and concisely. Lewis began his recount with a statement of fact encoded in one declarative clause, “I was three” followed by a clause complex of one declarative clause hypotactically linked by three prepositional phrases.

Well I got locked out (Declarative clause) without my mum and daddy (Prepositional phrase) only with my little toy (Prepositional phrase), without my dog, (Prepositional phrase) without my brother (prepositional phrase)”.

Within these phrases there was a juxtaposition of opposites, “without..., only with..., without..., without....”.

In the next section of extended discourse there were a series of declarative clauses connected with causal conjunctions.

I went around the backyard **because** I didn’t know. “Mummy,” I was calling ‘Mummy’ **but** she wasn’t there then then and I had to wait

there a for one hour by myself then I stopped crying ‘**cause** I heard a car coming coming. It was my Mum.

The last clause was given as a single sentence with a falling intonation signalling the end of the dramatic situation and the end of the recount.

John’s clausal organisation was very simple. The text was a series of clauses connected by the additive conjunction “and”. The very simplicity of the recount might tempt one to think that this was not “as good” or as “well developed” as some other texts given by Kindergarten children. However the salient question relates to whether or not it satisfied the criteria necessary to form a decontextualised text. John omitted information but maintained coherence by providing all relevant information and organising it in a meaningful manner. For instance in the exchange section John’s use of ellipsis (ellipsed words in square brackets) and specific lexis (in italics) indicated a mature use of language resources.

Every boy in [our] class [came] *plus* another boy.

Lucy’s use of ellipsis wasn’t nearly as competent as that of either John or Lewis giving the impression of a less tightly formed text. For instance in the first section of text she simply added one idea onto another as they occurred propositionally. The information was not sequentially or thematically organised. Hence once the “little beany piggy” was mentioned all relevant information about it was presented in what could be seen as a series of embedded clauses although they are not grammatically indicated as being such. The effect was of an interruption to the main topic which was the expedition with the Grandparents. Tense provided the only clue as to whether we were talking about events at school, today, or events in the past with the Grandparents. Lucy explicitly

states each action connecting them with ‘and’ rather than using grammatical resources to linguistically organize the information. Given below is both Lucy’s original text and a possible alternative that is still congruent in nature as expected from this age group:

Umm, well we went out with our grandparents *and* um I got a little beany piggy *and* it’s at school *and* it’s in my bag *and* I brought it *and* then **I** went home ...’

Alternative: Umm, well we went out with our grandparents and um I got a little beany piggy and it’s at school in my bag. Then **we** went home

Lucy’s text lacked rhetorical and grammatical organisation leading to repetition and restatement of information that could be inferred. This is also reflected in her use of pronouns. Lucy got the beany piggy and brought it to school so ‘I’ (in bold) is appropriate but when she returned home late at night with her grandparents ‘we’ (in bold) would be a more appropriate pronoun and also signal to the listener that the text is returning to last night. John switched from the pronoun ‘I’ to “we” to indicate more people,

J: **I** didn’t have it at my house. **We** had it at Indoor sports

It’s as though Lucy construed the events in a direct one-to-one matching of language onto experience rather than linguistically reconstructing the events. In other words the text was not rhetorically organised but a basic description of real world events as closely as she could represent them.

4.10.8 Students at Moderate Risk - Tim and Rory

In relations built between clauses Tim and Rory demonstrated some difficulty in presenting information linguistically. Due to Rory’s

idiosyncratic grouping and sequencing of linguistic items the listener had to infer information. For example, that the shop where they looked at lounges was the same shop from which they had bought their carpet previously. Rory's first clause complex was two hypotactically linked clauses with a prepositional phrase that gave time, participants, place and motive,

One day me and my sister and my Mum and my little sister went to a shop to look at lounges *where we got our new carpet*.

The second dependent clause (in italics) is related by the listener to the second prepositional phrase 'to look at lounges' rather than the first prepositional phrase, 'to a shop'.

Overall Rory's clause complexes formed a series of logically connected propositions despite being poorly organised. Rory gave a statement, 'they looked at lounges', a clarification, 'I mean my sister and I', an explanation, 'but my mother said we couldn't'. Even when Rory was struggling to linguistically represent an experience he managed to establish meaning.

There was one really, pull the thing back, the leg thing came up that you could rest on and there was one, there was one chair that could go up and down with remote control

The pattern of Tim's linguistic difficulty was different from that of Rory. Whereas Rory had difficulty with sequencing and grouping, Tim's content wasn't logically related in the first four clauses of his recount although he connected them with 'and':

Yesterday I went to the shops

And my brother brought a new telescope.

He had a go on that (Parataxis: elaboration)

And then I pushed my foot down and hand on the ur push pump.

Tim was the main participant in the first clause with no indication that anyone else was involved. In the next clause ‘my brother’ was the main participant and the focus of the clause was on his action, buying a telescope. Tim joined these two, as yet unrelated clauses, with ‘and’. If ‘and’ were left out, creating two separate sentences, structural integrity would be maintained or if the initial participant had been given as ‘we’ the text would maintain logical cohesiveness. As it was, Tim used ‘and’ not to connect two related clauses but rather, according to Painter, as the young child does to possibly indicate the next event in a sequence. The next sentence, “he had a go on that” referred to Tim’s brother playing with his new acquisition possibly in the shop. Tim then used “and then” to signal a new event but also changed location and participant without signalling either:

He had a go on that *and then* I pushed my foot down and hand on the ur push pump but now I call it a hand pump cause I do it with two hands and it blows up the boat

Tim jumped to new information about the boat without a reorientation or new referent given. This appeared to be another example of linguistic “complex grouping” (Vygotsky, 1978). Tim’s brother played with his telescope, this led Tim to associate playing with his new toy, a pump up boat, which led to an episode of both the boys playing with the boat in their backyard pool. When I asked for clarification about the setting at the end of

the recount, Tim simply kept describing the actions in a contextualised manner.

4.10.9 Student at High Risk - Mark

Mark's clause complexes tended to be dominated by patterns of extension, 56%, with only 19% being either elaborative or enhancing. This was the lowest of any child in the study apart from John (75%) and clearly demonstrated the lack of explanation or necessary background information. The logical paratactic relationship in the following two clauses is compromised by the use of two opposing conjunctions (in italics):

I always have the blue *because and* they're a little bit of the colour of my speedo costume.

One conjunction is causal, "because" the other additive, "and". It appears as though Mark couldn't use language to present two propositions and the relationship between them simultaneously. He had the blue object **and** his costume was blue - he had the blue object **because** his costume was blue. These two propositions can be encoded simultaneously by connecting them with 'because'. The second proposition (my costumes are blue) can be inferred from the causal relationship established by the word 'because'.

Mark's attempts to linguistically encode information are generally undermined by omissions. The syntax in the following three clauses is more complex than that constructed by either Lucy or Tim but didn't allow the inclusion of a necessary participant, what is thrown:

I did throwing a bit// and swimming underwater // to get them

To include two participants and a process the clause would have to be totally reconstructed:

I (Participant) threw (Process) the (Participant)

Mark may have become fixed on the “I did” structure that appears in the preceding two clauses, “I did a three dollar and I did torpedo and I did throwing a bit”. He didn’t appear to recognize or be able to change a linguistic expression that was not working as an effective exchange of meaning.

4.10.10 Summary

John, Lewis, Lucy and Tim were able to utilise grammatical resources to construct personal narratives that communicated interpersonal and experiential meanings. John and Lewis built relations between clauses both grammatically through conjunctions, lexis, and projection, and semantically through logically related propositions. Lucy used additive conjunctive relations to construct relations between clauses. She tended not to provide complexities of cause or condition. Her text was also highly congruent indicating a difficulty with utilizing grammatical resources in the development of decontextualised language. There were interesting parallels between Lucy and Tim in the construction of clause complexes. They tended to connect clauses with ‘and’ hence retaining a high level of repetition and redundancy in their text.

All the children in the At Risk Groups, Rory, Tim and Mark were more limited in their ability to build clause complex relations. Although Rory was able to present some complex causal constructions, “I thought we did when we sat in that up and down chair but she knew the way back”. But

generally Rory's text was not as effective as the High Performance group due to omissions and disorganized content.

Tim added propositions together with very little related content. Hence his text was a list of actions rather than logically interconnected discourse. Mark demonstrated poor clausal structure leaving out prepositional phrases, participants and goals.

4.11 Cohesion

Cohesion refers to the internal properties of a text and includes lexical devices of repetition, collocation, equivalence and semblance and grammatical devices of reference, substitution and ellipsis (Butt, Fahey, Feez, Spinks, and Yallop, 2000). The results are presented group by group and, in order to clearly indicate the cohesive devices, I have divided the children's recounts into clauses. The results are summarised at the end of this section.

4.11.1 High Performers – Lewis, John and Lucy

Lewis "Locked Out"

1 I was three.

2 Well I got locked out without my Mum and Daddy, only with my little toy, without my dog, without my brother.

3 Teacher: Can you remember what happened?

4 Lewis: Well ... I went around the backyard

5 because I didn't know.

6 Mummy, I was calling Mummy,

7 but she wasn't there

8 then then I had to wait there for a for one hour by myself

9 then I stopped crying

10 cause I heard a car coming.

11 It was my Mum.

There are three reference chains in Lewis's text, 'I', 'Mummy' and 'the backyard'. Lewis left out redundant information that could be inferred but gave enough detail to interest the listener and express view on the text. The use of repetition in clauses 2 and 6 and the use of conjunctions to indicate time, sequence, causality, and comparison make this a highly cohesive text.

John – “My Birthday Party”

1 I ... played soccer at my party

2 and I played Cops and Robbers at my party

3 and ... I didn't have it at my house.

4 We had it at Indoor Sports

5 and um

6 Teacher: Did you invite a lot of people?

7 John: Um twenty people came.

8 I invited twenty three

9 and um...

10 Teacher: Were they all boys?

11 John: Yes.

12 Teacher: That means there must have been not just the boys from our class?

13 John: Every boy in class plus another boy.

There are two reference chains in this recount – ‘John’ and ‘party’. The pronoun ‘we’ in clause 4 includes John but indicates everyone involved. ‘John’ also forms the Theme in one form or another in almost all the clauses. John organised his texts so a minimum of conjunctions were used or started a new sentence, “I didn’t have it at Indoor sports. We had...”. He also selected specific words to act as conjunctions, “Every boy in class *plus* another boy”. John used ‘and’ more to allow reflection than as a conjunction,

I played cops and robbers at my party and (pause) I didn’t have it at Indoor sports and (pause) um (pause).

Repetition and the ellipsis of unnecessary information adds to the cohesiveness of this text.

Lucy – “Grandparents”

1 Lucy: Um well we went out with our Grandparents

2 and I got a little beany piggy

3 and it’s at school

4 and it’s in my bag

5 and I brought it

6 and then I went home

7 and we were late

8 and we only got home at mid

9 we nearly got home at midnight

10 and I was really tired

11 so I didn’t clean my teeth!

Clauses 12 to 48 are an Exchange

Lucy accurately tracked reference but hasn't utilised ellipsis and so compromised cohesiveness. Although 'home' is repeated three times repetition is not utilised further as a cohesive device. Lucy tended to connect actions and events with additive conjunctions such as, 'and', as in the first recount section on shopping:

And I got a little beany piggy and it's at school and it's in my bag and I brought it and then I went home and we were late and we nearly ...

This construction led to the repetition of redundant information. It is very much situated in actual events rather than being a decontextualised representation of those events. Lucy is matching language to experience rather than linguistically re-creating experience.

Lucy Record 2

49 Mum and Dad got cross with me last night

50 cause I keep screaming.

51 Teacher: Why did you start screaming?

52 Lucy: Because my ... Stephen, that's my brother

53 he kept fighting me outside

54 and it was it was outside daylight saving

55 but I couldn't

56 I like I was tired both my eyes

57 and I couldn't see very well

58 and anyway he came

59 and tackled

60 he runned out

61 and tackled me without knowing
62 because he was behind me
63 Teacher: So he took you by surprise.
64 Yeah (he did)
65 and then I started screaming
66 and crying
67 and then um well Dad thought [[67.1 I did something to Stephen]]
68 and then he said he said
69 he did
70 but he really did it to me.
71 He was only joking.
72 He wanted me
73 to get in trouble.

There are two lexical chains in this section, ‘family’ (4 items) and ‘fighting’ (5 items). In both this section and the one that followed Lucy talked about one event or topic without digressing. They were given as an explanation in response to my interest. Although Lucy used some ellipsis or substitution she included redundant information perhaps indicating uncertainty about what could be omitted and retain meaning. For instance in the sample below I have italicized unnecessary information:

I like I was tired, *both my eyes*, and I couldn’t see very well and anyway he came and tackled *he runned out and tackled* me without (my) knowing because he was behind me

Once again reference is accurately tracked.

Record 3

Teacher: Do you ever play happily together?

77 Lucy: Oh sometimes when we have chips

78 and we go far away.

79 We always say

80 we're having a party in the car

81 and when we get home

82 then we be nice to each other

83 But when it's ahh

84 when we don't go far away

85 like when it's school days or the weekends

86 cause ... last weekend we went to a nursery um on Saturday

87 and it was a very long way

88 and we got chips

89 and then we started having a party in the car,

90 pretending.

The purpose of this section was different to the other two in that Lucy was attempting to provide a de-contextualised explanation – these are the circumstances in which we can play happily. However she was unable to present the opposite situation, “but when it's, when we don't go far away...” and actually provided an example of the first condition. In this section there was some ellipsis. Lucy has stated each proposition in turn demonstrating an inability to linguistically organize the information. “We” forms the Theme in the majority of clauses giving a pattern of repeated information that could be more densely organised using cohesive and grammatical resources of logical relations.

4.11.2 Students at Moderate Risk - Tim and Rory

Tim - "The Boat"

Tim: Yesterday I went to the shops

2 and my brother brought a new telescope

3 He had a go on that

4 and then I pushed my foot down and hand on the ur push pump

5 but now I call it a hand pump

6 cause I do it with two hands

7 and it blows up the boat

8 and we played in the boat

9 and the fat bit was up

10 so we couldn't dive backwards

11 so then we put that down

12 but kept the boat up

13 and the fat bit was to let us lean backwards

14 and when sh my Mummy putted it down

15 and my brother and we pu

16 me and my brother put our flippers on

17 My brother had his goggles on

18 but I don't have mine

19 and then I flipped over, like this, like a deep sea diver.

Tim utilised reference effectively often substituting a pronoun. However in this text there was no ellipsis. Overall cohesion was maintained due to the general maintenance of topic and the consistency of participants. Internal cohesion was generally maintained through the correct tracking of

participants throughout the text and the selection of lexical items that were appropriately related.

Clauses 4 to 7 are a de-contextualised explanation about the boat. Clause 8 begins a recount of a particular event but because Tim has connected each clause with ‘and’ and hasn’t introduced the explanation in clause 4 shared meaning is compromised. He was using language as a one-to-one mapping of words to actions, events and things, without appreciating that it is a mediated symbol system. There is no exact one-to-one correspondence between word and action, events and thought. Thought, particularly non-verbal thought, is multi-dimensional, not sequential or lineal. Hence Tim introduced a part of the boat because that was the thought he was verbalising, before introducing the boat. He hadn’t fully grasped how to use language to share information.

Rory - “Shopping”

1 One day me and my sister and my Mum and my little sister went to a shop to look at lounges

2 where we got new carpet

3 and then after we Alice and me and my sister had had some money

4 I had just one ten dollar

5 but I needed another one

6 because I bought a Teddy Telly.

Clauses 7 to 35 are an exchange.

There are three main reference chains in this recount, ‘me’ with eight items, ‘we’ and ‘money’ which both have three items. Rory has accurately tracked

these throughout. There is no ellipsis although there was some substitution eg. 'one' for ten dollar.

Rory Record 2

36 Teacher: Tell me about your sister running away.

37 Rory: Because she ran away

38 because um we looked at chairs

39 and there was one really

40 pull the thing back

41 the leg thing came up

42 that you could rest

43 and there was one um

44 there was one chair

45 that could go up and down with remote control.

46 Teacher: Tell me about your sister.

47 Rory: She came with me

48 and sometimes we separated

Rory tracked reference accurately and used some ellipsis (Cl. 40) and substitution to support the overall construction of meaning. However Rory's text did not achieve his stated aim of telling me about his sister running away until he answered the question in clause 46.

Although there are omissions in Rory's recount he has demonstrated the ability to linguistically present information using logical relations of projection (Cl. 42, 45) hypotaxis (Cl. 2) and apposition (through conjunctions).

4.11.3 Student at High Risk -- Mark

Mark - "Swimming"

1 Mark: I went into the beach first

2 then I went to swimming.

3 Teacher: At the beach?

4 Mark: No, swimming at the swimming lesson.

5 Teacher: Tell me about both.

6 Mark: Ahh Mummy found some shells with holes in them

7 and I found some shells to bake a cake

8 and I used the beach

9 and I put and put a candle as a stick as a campfire.

10 I did a three.

11 Teacher: Ahh.

12 Mark: Now can I do about the swimming?

13 Teacher: You sure can.

14 Mark: Um I did ... a three dollar

15 I did torpedo...

16 and ... I did ... ah throwing a bit

17 and swimming under water to get them

18 and I always have the blue

19 because and they're a little bit of the colour of my speedo costume.

20 Teacher: So first you went to the beach.

21 Did you go home then

22 or straight to swimming?

23 Mark: Home first

24 then swimming.

In the recount about swimming Mark consistently placed himself in Theme position providing cohesion to the text. The only variation in Theme was Mummy. Reference was accurately tracked with the exception of one chain relating to the thrown item referred to as ‘them’, ‘the blue’ and ‘they’re’ with no presuming reference given.

Too much information was omitted for this text to maintain cohesion. Mark didn’t use ellipsis or substitution as a cohesive resource. He left out important bits of information perhaps because he didn’t understand their relevance. The conjunctive relations were also confusing. These have been covered in the section on clause complexes. Overall this wasn’t a cohesive text.

4.11.4 Summary

Lewis, John and Lucy demonstrated little or no difficulty with any aspects of cohesion. Lewis, the youngest child in the study, demonstrated some immaturity of language use by including more reference terms than needed and using conjunctions only to extend rather than enhance or elaborate.

Tim could control all aspects of cohesion except ellipsis. Rory was also able to accurately track reference, used some substitution and ellipsis, and built conjunctive relations but meaning was compromised through word omissions.

Mark omitted words and information and did not utilise ellipsis.

4.12 Response to Research Question 2

How do Kindergarten children use the cohesive and grammatical resources of English in recounting narratives of their personal experience?

Lewis, John and Lucy, the High Performing Group, were able to structure a recount that effectively communicated meaning. They didn't require extensive scaffolding and produced cohesive, rhetorically well constructed extended segments of text. Lucy showed the greatest linguistic difficulty in that she included redundant information, and sometimes used unconventional terms such as, 'I was tired, both my eyes'.

Children in the Moderate Risk Group, Tim and Rory, were able to construct meaningful oral texts but were not as competent as the HP group in utilising the grammatical resources of English. However the nature of the difficulty varied. Tim produced quite long, detailed texts but tended to list activities rather than rhetorically organise his content. Tim's language described actions or experiences with little or no personal interpretation or reflection. He simply strung clauses together in an additive manner only occasionally using causal conjunctions such as 'but' or 'because'. However when asked a question about the class picnic the response clearly indicated Tim's personal stance and signaled blame.

T: Were you at the class picnic the other day?

Tim: Yes. Chris got his Pringles and I was crying when we got home because Mummy didn't tell me that Heather and Michael said we could help ourselves to the food and I didn't get anything, just one of them little bars and they're not chocolate.

Tim's feelings were communicated through the Textual function and the Mood system. Textually Tim juxtaposed events that highlighted the situation from his viewpoint, "Chris got ...", "I was crying.." "Mummy didn't ..", "Just one of them little bars..." "they're not.." Each successive clause built on the unfairness of the situation. The interpersonal or Mood system was used to further express Tim's feelings through the use of modifiers such as, "not even" and "just one". Meaning was enhanced through Tim's word placement. 'Chris' was put in the Theme position indicating that Tim felt discriminated against, immediately followed by "I was crying" a direct statement of feeling. The circumstantial clause "when we got home" indicated that Tim only found out after the event so making it impossible for the situation to be redressed. 'Mummy' was the subject in the next statement and hence carried the blame implied by the verbal groups, "Mummy didn't tell...". He could have said, "I didn't know the food was for everyone" but this would have conveyed a different message regarding responsibility.

This text demonstrated that Tim could use grammatical resources of lexical selection and placement to effectively and concisely convey meaning.

Rory's recount was lacking in rhetorical organisation and undermined by omissions of both words and phrases that led to ineffective clauses;

and there was one really pull the thing back, the leg thing came up that you could rest

The child in the High Risk Group, Mark, produced texts that were difficult for the listener to comprehend. His recount was marred by

omissions and lack of supporting detail. Reference also posed serious problems for Mark. Table 4.32 compares the children's use of reference.

Table 4.32 Reference Chains in the children's personal recounts – recount sections only.

Feature	Lewis	John	Lucy	Rory	Tim	Mark
No. of head items	4	4	15	8	9	16
No. of major chains	2	4	5	3	4	3
Head items of major chains (no. of items in chain)	I (14) Backyard (3)	I (6)	We (13) I (21) Beany (4) Stephen (13) It's (5)	Me (8) We (3) Money (3)	I (14) Push pump (3) The boat (7) We (5)	I (11) Swimming (3) The blue (3)
Homophoric	0	3	12	5	5	4
Exophoric	1	1		1	1	1
Endophoric	19	5	76	23	34	13
Unretrievable	0	0	0	0	1	7

The majority of children produced no irretrievable reference whereas there were seven irretrievable items in Mark's recount.

Poor referencing was evident in spontaneously produced discourse also:

and today afternoon I'm going to play (inaudible) 'cause I didn't get to play it last night I just got to do the (inaudible) quick and I lie there and.... do it. There's a little cross thing where the arrow is but it's a red one. You click on the red one, then the blue one blocks in

Mark omitted necessary information such as topic and setting. The majority of the text was procedural but lacked contextual information.

In another spontaneous text, prompted by a video story by Tony Ross (1989), “Oscar got the Blame”, Mark conveyed meaning more competently:

My Mum said I should see if my hand should go through the wall. It didn't cause it was brick and I think an imaginary friend um might have magic dust to make them jump out of walls ... I think an imaginary friend jumped out of the wall and creep into the little boy, “Hey, Let's punch your Dad and bash him up and steal the girl's underwear!”

Clearly Mark had the linguistic resources necessary to construct text. In the example above the text coincided with his thought. It was created simultaneously in thought and given expression in language whereas other texts had been a form of recall, either on demand from me, or an attempt by Mark to share previous experience. In the example above Mark constructed effective single clauses with no compromising omissions.

4.12.1 Summary

The language produced by the children was congruent, as expected at this age. Although all the children could create texts that shared information the effectiveness varied both in rhetorical organization and in the effective use of lexical and grammatical resources. All the children demonstrated an awareness that their experience of particular events was not shared by the audience for their recounts. This was the least developed in Mark who assumed others' knowledge of specific terminology.

4.13 Response to Research Question 3 - General Comparison

“Information is unlike other things negotiated by means of language, in itself being created by language and having no existence except by means of language” (Painter, 1999, p.181).

In this study the children were required to share or re-construct a story or experience linguistically. The way they utilized the cohesive and grammatical resources of English varied. Logical relations, which are not confined to any particular section of the grammar, support the linguistic creation of information through word order in noun and verb groups, and the recursive structures of parataxis, hypotaxis, co-ordination, apposition and reported speech. All the children, as expected, consistently conflated the logical, psychological and grammatical subject so their language formed a congruent pattern of;

Subject/Theme process participant/goal/circumstance.

An example from a Kindergarten story would be:

The boot kicked the big, red ball

Subject/Theme process goal

Kindergarten children have difficulty in verbalizing and writing the same information if the logical subject of the clause is not conflated with the Theme. That is they have difficulty formulating the passive voice.

For example:

The big, red ball was kicked by the boot.

Theme/grammatical subject process logical subject

Lucy and Tim produced congruent language that made sense but seemed awkward and repetitive. A close examination of their language compared to the other children suggested that logical relations built into the grammar were not being developed. Tim's discourse on the picnic was the only time he effectively utilized logical relations between clauses - reported speech and projection, co-ordination and apposition established through conjunctions. Lucy and Tim tended to form each clause in a subject, process, participant pattern rather than embedding additional information in adverbial phrases or ellipsed clauses.

Lucy's recount was verbose because she consistently constructed each clause as a separate unit without utilizing logical relationships that allow information to be more densely packed. In the re-telling tasks Lucy gave the essential propositions through direct speech allowing her to maintain congruency, indicate goals and motivations but avoid constructing explanations.

A comparison of the children's clause construction and use of prepositional phrases, indicating the presence of circumstances, gives some indication of the formation of effective clauses that are functionally appropriate.

Table 4. 33 (below) details clause and phrase construction.

Table 4.33 Effective Single Clause Construction across Texts.

(Single Clause count excludes mazes and incomplete clauses.)

Text	Lewis	John	Lucy	Rory	Tim	Mark
Sam and the Ghost Stories Single Cl.	25	24	29	7	23	20
Prep. Ph.	11	13	7	1	6	6
%	44%	54%	24%	14%	26%	30%
Three Billy Goats Gruff	34	absent	31	6 *22	35	14
Prep. Ph.	12	absent	17	5 *12	10	7
%	35%	absent	55%	83% *55%	29%	50%
Recount	10	8	48	17	18	17
Prep. Ph.	8	5	23	9	14	8
%	80%	63%	48%	53%	78%	47%

* with pictures

Although Lucy (55%) has a comparable phrase count to the other children in *Three Billy Goats Gruff* it dramatically drops, in comparison to Lewis (80%) and John (63%) in her personal recount (48%). Her count is almost as low as Mark (47%). However, unlike Mark who didn't provide enough information, Lucy provided adequate information but expressed this through clauses rather than phrases. In both the retelling tasks Lucy had a model to follow whereas in the recount she was creating the information independently giving perhaps a truer reflection of her own use of grammatical resources. Mark also demonstrated difficulty with clause construction. Although seventeen of the twenty-one clauses were effectively constructed in Mark's retelling of *Sam and the Ghost Stories*,

only seven clauses out of fourteen in *Three Billy Goats Gruff* and seven out of fifteen in his recount were effectively constructed. Ineffective clauses include incomplete clauses, clauses without prepositional phrases, subjects or objects. Rory and Tim were generally able to control structuring of single clauses. (See Table 4.)

Tim produced fourteen clauses in his recount that included prepositional phrases or clauses. When Rory created longer pieces of text he produced prepositional phrases effectively. I feel the use of prepositional phrases is important to an understanding of the development of de-contextualised language. The move from congruent language to metaphorical language is gradual. Kindergarten children are developmentally unable to produce grammatical metaphor except in certain formulaic common usage versions or in some interpersonal exchanges. However the form of congruent text undergoes subtle changes leading to the development of grammatical metaphor and incongruent language. John and Lewis were able to create concise texts that effectively communicated meaning. John's text seemed more mature while Tim and Lucy's texts were somehow 'immature'. I feel this is due to the nature of clause construction. They both included redundant information because they created each proposition as a separate item generally connected by an additive conjunction. An analysis of their texts doesn't fully reveal this subtlety because it occurs within the mind in the selection and placement of lexical items. The production of a congruent text form that seems more mature is dependent on the selections made by the speaker. These selections are dependent upon the speaker's developmental level and lexical and grammatical knowledge. John and Lewis, and Rory in the picture supported retelling of *Three Billy Goats*

Gruff, gave the impression that they had an extensive lexicon and understanding of how to appropriately use this to form functionally effective discourse. Their language met social expectations and norms, unlike Lucy who tended to form ideosyncratic terms and/or phrases.

Lewis, John and Lucy were able to re-construct a narrative and personal recount independently. Lewis and John included all essential structural elements and provided the most cohesive texts through the correct use of conjunctions, reference and substitution and ellipsis. Lucy drew on memorized text. The same pattern was followed in her retelling of *The Three Billy Goats Gruff*. Lucy demonstrated an excellent use of narrative language and ‘voice’ in her use of direct speech but demonstrated difficulty with rhetorical organization. She used mainly additive conjunctions and was unsure about what could be omitted. Immaturity of language was evident by the inclusion of redundant information and omission of crucial words.

The children with LD, Rory and Tim, needed intervention to complete the retelling tasks. They had difficulty controlling lexis, including correct verb tense, and with sequence and cause. Although they knew the details, motives and outcomes as indicated by their answers to questions, they had difficulty constructing cohesive text. Tim tended to list actions and had difficulty recalling events stating “I forgot” three times in *Three Billy Goats Gruff*. He also needed assistance with content in retelling *Sam and the ghost Stories*. Reference was generally accurate but became confused when he simply added on events without any causal relationship between the clauses.

Rory was not able to produce any extended discourse in retelling *Sam and the Ghost Stories*. However, when recalling a familiar story, *Three Billy Goats Gruff*, Rory was able to re-construct the essential narrative elements with the support of accurately sequenced pictures. The pictures provided a base for organization of content and allowed Rory to concentrate on representing the information linguistically. This retelling was the most sophisticated use of language resources by Rory in the study. Rory used reference accurately but conjunctive relations tended to be additive rather than comparative, temporal or consequential. Although he used ellipsis correctly in conversation in his own extended text he gave too much information, that is, he was unsure what could be left out and still maintain meaning.

Although Mark was not identified as being LD at the beginning of the study he was not able to complete these tasks successfully. He attempted to structure a narrative re-telling in both instances but forgot crucial content in *Sam and the Ghost Stories*, and confused sequence in *Three Billy Goats Gruff*. Mark's rhetorical organization was not problem orientated yet his responses to questions indicated an awareness of characters' motives. Both retellings were basically a list of events with some causal connections. Mark had difficulty with reference, substitution and ellipsis. He had difficulty recalling appropriate vocabulary, substituted words and modified words (bulled). He also had a tendency to leave out crucial words, change gender reference, and substitute linguistically or visually related terms. Yet Mark's use of conjunctions demonstrated a sophisticated understanding of causality. Well developed linguistic knowledge was demonstrated by clausal projection and the use of a wide range of processes. Mark often

interrupted our sessions with anecdotes from his own life. His use of language was sometimes more comprehensible in these contexts than in the linguistic tasks I set him.

One interesting finding was that tasks involving mediated recall, that is, the recall of information acquired through a mediated source such as hearing a story, affected performance. Tim was unable to independently structure a re-telling but was able to structure a personal recount. Rory's performance was greatly enhanced when provided with a visual memory aid. Nicholson and Fawcett (1990) maintain that dyslexic individuals' performance is compromised when the demand is increased, that is, when two tasks are demanded, such as standing on one foot and counting. In the retelling condition there were two tasks, recalling story content and oral expression. Carlisle, (1999) made a similar finding that recall affected performance in children with LD. Lewis's retelling of *Three Billy Goats Gruff* was similar with and without pictures indicating that his performance was not compromised by the recall component.

This chapter has focused on expressive language abilities. The next chapter focuses on receptive language, comprehension. Individuals generally understand a great deal more than they can express linguistically. Research questions four and five will be addressed in the next chapter.

Chapter Five - Comprehension

Introduction

This chapter seeks to clarify if the differences in the children's comprehension ability are language related and if so, are there specific areas of linguistic difficulty. It seeks to answer Research Questions four and five:

- 4) How did these Kindergarten children use language to respond to comprehension questions interpolated in a text being read to them?
- 5) Were there observable differences among the children with Learning Disabilities in the ways spoken language, orally presented written texts and pictorial texts were interpreted?

Comprehension has been seen by some researchers as the recall of ideas or propositions rather than the design or structure of the text (Horowitz, 1987, p. 123). However it is the patterns of semantic relationships between propositions that are crucial to understanding the main idea, gist, bias, or argument presented by a text.

Martin's conceptualisation of Field, "as sets of activity sequences orientated to some global institutional purpose" (Martin, 1992, p. 292) proved a useful approach to interpreting the children's comprehension. Activity sequences relate to the patterns of semantic relationships mentioned above. Words represent concrete meanings, such as people, places, things etc but also indicate relations between things and activities. As Martin explains activity sequences are comprised of, "taxonomies of actions, people, places and things and qualities", which are then placed in configurations, "of actions with people, places, and of people, places, and things with qualities". These configurations form "activity sequences" (Ibid, p. 292).

Field is realised by the ideational meanings constructed by lexical relations and transitivity and clause complexes at a grammatical level. The experiential aspect of the clause, ie, the participant and process, is referred to by Martin as a **message part**. A message part may be expressed congruently or metaphorically. These two language forms are crucial to comprehension and informed the selection of texts in this study.

Congruence

Congruence is often related to the concept of a 'literal' meaning. The words used represent the meaning as closely as possible to the actual. For instance, Tom was a good boy.

Incongruently or metaphorically this could be expressed as

Tom was **a treasure**. (lexical metaphor)

Good behaviour was usual for Tom. (grammatical metaphor)

In lexical metaphor one word/s stands for another. Grammatical metaphor involves grammatical variation. Many metaphors have become the linguistic norm such as, 'Don't get your knickers in a knot', or "Mind yourself".

Children often have problems understanding these phrases and usually build up a pragmatic knowledge of their meaning rather than mentally processing them. That is, they can act on the instruction encoded but use other clues to gather the meaning such as tone, observation of others, trial and error. Halliday (1988; 1994) describes the difference between commonsense and educational knowledge:

“Commonsense knowledge is typically transmitted in the home: it tends to be spoken, non-technical, informal, without boundaries, and with room for discretion on the part of the child learner, who can take it or leave it. Educational knowledge usually comes packaged by the school: and it differs in these five ways: it is written, technical,

formal, with strong boundaries and with much less discretion on the part of the learner” (Halliday, 1988, p. 11).

However Halliday maintains that informal, spoken language is as systematic as formal written language only organised differently. The ability to comprehend and formulate educational knowledge arises from participation in the linguistic construal of commonsense knowledge: “the child is learning through many different registers, spoken and written, all at once” (Halliday, 1988, p. 11). One can draw the implication that the child who develops an ability to grasp verbally presented commonsense knowledge will transfer this ability to the more formal, educational discourse found in schooling from the earliest years, ie Kindergarten, which then becomes the basis for further decontextualised educational knowledge presented in any mode. This supposition informed the development of this section of the study. Halliday (1994, p. 343) defines congruency as the typical way something is said. These typical patterns are learned through commonsense knowledge. Incongruent, or metaphorical, forms that are atypical forms of expression, such as grammatical metaphor, are not learnt as commonsense knowledge but form part of educational knowledge.

The organisation of this chapter is as follows:

- The parameters of Field and Cohesion are described.
- Source texts are given and analysed. These are coded for easy reference.
- Children’s responses are presented and analysed. The results are presented for the three groupings, High Performing, Medium Risk and High Risk under the headings Field and Cohesion.

- Summary and answer to research questions four and five are presented.

Field

Field relates to the content of any given text. For the meaning of a text, oral or written, to be grasped there needs to be some knowledge of the subject matter and vocabulary. Through analysing the linguistic realisation of the texts and data collected from the children's responses I was able to infer comprehension. The comprehension tasks involved the children in relating categories of words to each other, following activity sequences expressed through clause complex relations, drawing inferences and gathering meaning from congruent and metaphorical language.

Cohesion

In the comprehension tasks the children's use of cohesion involved tracking reference, a non-structural resource for maintaining cohesion in longer discourse (Halliday, 1994, p. 309), understanding the relationships indicated by conjunctions and following the logical relationships between propositions. Table 5.1 specifies what will be covered under each of the headings just given.

Table 5.1 Comprehension features in the source texts.

	Comprehension Feature	Title
Field	Lexical relations, simile, metaphor. Activity sequences – clause complexes Inference	Tigger, The Bay, Dragon Quest
Cohesion	Tracking Reference Metaphorical Language	Tigger, Dragon Quest, Here Come the Aliens, The Bay

5. 1. Texts

Each text will be presented and a brief linguistic analysis given. The excerpts given were the focus for student testing and have key linguistic features and selected comprehension tasks indicated. The excerpts are numbered and the linguistic features tested are coded in Table 5.3

5.1.1 Tigger

The language is mainly congruent but there are some lexical metaphors, marked themes, ellipsed subjects and embedded clauses.

The relevant passages are presented below with the salient grammatical form given in brackets. If the subject has been ellipsed this is given in square brackets.

Excerpt 1:1 (Tablecloth fight)

Pooh got out of bed and began to explain what a looking-glass was, but just as he was getting to the interesting part, Tigger said:

“Excuse me a moment, but there’s something climbing up your table,” and with one loud *Worraworraworraworraworra* (marked Theme) he jumped at the end of the tablecloth, [he] pulled it to the ground, [he] wrapped himself up in it three times, [he] rolled to the other end of the room, and, after a terrible struggle, [he] got his head into the daylight again, and said cheerfully:

“Have I won?” (Milne, 1928, p21).

This passage has one marked Theme. The reference chain may be hard to follow due to the subject ellipsis and the long clause complex. Each child was asked what had just happened and what they thought Tigger was doing or thinking.

The next two excerpts required drawing an inference:

Excerpt 1:2 (Piglet's Fear)

“Hallo, Piglet. This is Tigger.”

“Oh, is it?” said Piglet, and he edged round to the other side of the table. “I thought Tiggers were smaller than that.”

“Not the big ones,” said Tigger.

“They like haycorns,” said Pooh, “so that’s what we’ve come for, because poor Tigger hasn’t had any breakfast yet.”

Piglet pushed the bowl of haycorns towards Tigger, and said, “Help yourself,” and then he got close up to Pooh and felt much braver, and said, “So you’re a Tigger? Well, well!” in a careless sort of voice.

(Milne, 1928, p.23-24)

Each child was asked why Piglet moved closer to Pooh.

Excerpt 1:3 (Tigger spitting)

“After a long munching noise he said:

“Ee-ers o I a-ors.”

And when Pooh and Piglet said “What?” he said

“Skoos ee,” and went outside for a moment.

When he came back he said firmly:

“Tiggers don’t like haycorns.” (Milne, 1928, p. 24).

The question asked at the end of this section was: “Why did Tigger go outside?”

Excerpt 1.4 required the children to relate previously reported actions to a character’s request and identify the character referred to in the request although he is designated by a different lexical item.

Excerpt 1:4 (Eeyore's request)

“You'll find him with Kanga,” said Eeyore. He came close to Pooh and said in a loud whisper:

“*Could* you ask your friend to do his exercises somewhere else? I shall be having lunch directly, and don't want it bounced on just before I begin. A trifling matter, and fussy of me, but we all have our little ways.”

(Milne, 1928, p.28).

Tigger's identity has to be drawn from “your friend”. Eeyore has also referred to Tigger's bouncing as “exercises” adding another lexical complexity this extract.

Excerpt 1.5 included a lexical metaphor, “eleven o'clockish” for hungry. The message that Pooh is going to eat the tin of condensed milk is retrievable if the Pooh reference chain is followed and the inference drawn from his physical state of being hungry.

Excerpt 1:5 (Eleven o'clockish)

“Shall I look too?” said Pooh, who was beginning to feel a little eleven o'clockish. And he found a small tin of condensed milk, and something seemed to tell him that Tiggers didn't like this, so he took it into a corner by itself, and went with it to see that nobody interrupted it.

(Milne, 1928, p.31)

There were two questions after this section: 1.5 “What does ‘eleven o'clockish’ mean?” and 1.6 “What is Pooh going to do with the milk?”

The last extract is a long clause complex comprising a configuration of activity sequences that involve two characters whose actions are dependent upon and interwoven with each other – Kanga and Tigger. Roo is a passive participant even though he is the goal of the intended action. The reference is quite difficult to track particularly as the Circumstance of manner (which is also a Marked Theme) initially appears to relate to Tigger but, in the next clause, is revealed as applying to Kanga. The activity sequence is even harder to follow as the agent (given in square brackets) is ellipsed in the following two clauses.

Extract 1:7 (Medicine)

But Kanga and Christopher Robin and Piglet were all standing round Roo, watching him have his Extract of Malt. And Roo was saying, “Must I?” and Kanga was saying, “Now, Roo dear, you remember what you promised.”

“What is it?” whispered Tigger to Piglet.

“His strengthening medicine,” said Piglet. “He hates it.”

So Tigger came closer, and suddenly he put out his tongue, and took one large galollop, and, *with a sudden jump of surprise*, (Circ: Manner) Kanga said, “Oh!” and then [she] clutched at the spoon again just as it was disappearing, and [she] pulled it safely back out of Tigger’s mouth. But the Extract of Malt had gone.”

Each child was asked, “Who ate it?”

Tigger was read over three or four sessions depending on time available. At the beginning of each session each child was asked what had happened so far. The summaries they gave indicated if they had followed the story line

as well as their overall recall. Any major understandings necessary to the continued comprehension of the story were given by me.

5.1.2 Dragon Quest

Although the language in this book is metaphorical the overall gist of the story is easy to follow as the text is mostly descriptive. The two main participants are usually in the unmarked theme position, “we must pass”, “we must always be ready”, “we have crossed” and so on. Extract 2:1 in this text involved the same word but with two different but legitimate meanings juxtaposed, ‘head head’.

Extract 2:1

Now see, we’re out of troll country – there was no need to be afraid. A double-headed troll cannot be defeated – but it can be outwitted. If the double-headed troll saw us I would ask to talk with the troll’s head head, then watch the heads fight about who is the head head. You are very lucky to be around such a smart Dragon Fighter.

Each child was asked the meaning of “head head”.

(Baillie, 1996)

The next excerpt required that the child relate the text to the pictures in order to draw the intended inference.

Extract 2.2

“What! Nothing here?”

Can you see any dragons?

Look to the glittering ice, to the polished sea, the shifting sands, the forest...

No? No dragon at all?

The following page reveals the top of the mountain as the dragon's head.

No dragon left anywhere.

Nothing to do but go home.

But why are you grinning?

(Baillie, 1996)

The child was asked; "Why is the boy grinning, what can he see?"

5.1.3 Here Come the Aliens

This is a rhyming text and so has some grammatical metaphor. In the extract below omitting the finite part of the verbal group and only giving the predicate (approaching and floating), make this a more difficult text for young children to unpack. The reference in the next stanza, "**It's**" proved to be very difficult for them to follow.

Extract 3:1 (Piece of paper)

Approaching planet Earth, they see:

(Though how it got there, don't ask me)

A piece of paper, floating free.

The aliens are slowing!

It's swiftly passed around the fleet.

A thousand hearts stop – miss a beat.

The order goes out: "FLEET RETREAT!!!"

The aliens are going!

(McNaughton, 1995)

The child was asked what was passed around the fleet. I was seeking to determine if the child had related the aliens going to picking up the paper. At this point we don't know what's on the piece of paper. The inference that

something on the paper caused their withdrawal can only be drawn if the reference chain is followed.

Extract 3:2 (Photo)

For this is what the aliens saw:

A picture of your class – aged four!

5.1.4 The Bay

This text was not a narrative story as all the other texts but a poem. The language was metaphorical making the text difficult to comprehend. The text and analysis are presented in table form.

Table 5.2 Text and Text Analysis for *The Bay*

	<u>Text</u>	<u>Analysis</u>
4.2	The tide has been low for most of the day, Now it creeps slowly back into the bay,	4.2 Congruent, lexical metaphor, 'creeps'
4.4	Rolling before it, with little cat paws, Seaweed and shells and hollow crab claws.	4.4 Marked Theme – 'rolling before it'; 'it' refers to water described as 'tide', circ: manner, "with little cat paws",
4.6	Flowing once more into warm, shallow pools, Where silvered shrimps gleam as glassy pink jewels,	4.6 Reference carried from first page, ie what's flowing? – 'it', 'the tide'. Simile, 'as glassy pink jewels'.
4.8	Moving so quietly 'cross the broad shore, Till the bay lies wide, blue-filled once more.	
4.10	And there in the sea, where the water's deep, There's where the lobster crawl and creep, There's where the sea beasts writhe in their caves,	4.10 Projected elaboration on 'there', 'where the water's deep' Cataphoric reference, 'there', ie in the deep water. Repeated Reference, 'there' anaphoric, back to deep water.
4.12	And wraith weeds sway in the deep sea waves. And deeper yet, where it's cold and still,	4.12 Reference carried over, 'there's'
4.14	Where no sun may reach to warm the chill, Loom pale, gliding fish in strange, blue places,	4.14 Marked Theme (And deeper yet). 4.16 Fish are the subject but the location is given in the next
4.16	With ice-cold eyes in green, ghost faces, Drifting slow where the dead ships lie,	two clauses, 'where it's cold and still', 'where no sun may reach the chill' before the fish are mentioned.
4.18	While long, lean, sea-things slide silently by. (Bacon, 1987)	4.18 Ellipsed subject – relates back to fish (Fish) 'drifting slow...' multiple lexical item, 'long, lean, sea-things' (eels).

The children were asked:

- “What’s making the crab claws move?’ (The water, the tide)
- “Are there really jewels in the pool?’ (Simile for shrimps)
- “Where do the lobsters live?’ (In the deep water)
- “Where do the pale fish live?’ (deeper water)
- “What does, ‘dead ships’ mean?

The tasks associated with each textual element are summarised in Table 5.3.

Table 5.3 Text Feature, Source and Reference Number.

Field	Title	Text Reference
Lexical Relations	Dragon Quest	Head-head (2:1)
	The Bay	Tide (4:2)
Metaphor	Tigger	Eleven o’clockish (1:5)
	The Bay	Dead ships (4:16)
Simile	The Bay	Shrimps like jewels (4:6)
Inference	Tigger	Piglet’s fear (1:2); Tigger spitting (1:3); Drink it (1:6)
	Dragon Quest	Dragon Mountain (2:2)
Activity Sequences	Tigger	Tablecloth (1:1); Medicine (1:7); Eeyore’s request (1:4)
Connection	Aliens are Coming	Photo (3:2)
Reference	Aliens are Coming	Piece of paper (3:1); Photo (3:2)
	The Bay	Hollow crab claws (4:4); Deep water (4:10); Deeper yet (4:14)

5.2 Results

As in Chapter Four the children are grouped according to their performance. Once again this grouping varied with the comprehension data. Although John and Lewis were selected as representing normally achieving children, Lewis's performance (Lewis is six months younger than the other children in the study) placed him in the "Medium Risk" group. In the standardised Listening Comprehension Test given at the beginning and end of the study Lewis ranked with his age group. In this study I was comparing him with children older by six months or more. Hence it was not surprising that his performance was compromised in comparison. The groups are as follows:

High Performing (HP) – John

Moderate Risk (MR) –Lewis, Lucy and Rory

High Risk (HR) – Tim and Mark

The children were able to follow the general meaning of most of the stories I read to them. Of the ten texts selected for comprehension tasks only the four that produced the most significant data are included in this results chapter due to space constraints. Two of the particular sections that I selected for investigation were understood by all the children. The simile, "dead ships" (Extract 4.16) and the dragon being revealed as the mountain (Extract 22) were accurately interpreted by all the children.

5.2.1 High Performing Student – John

Field - Lexical relations, Metaphor and Simile

John was the only child in the study who had minimal difficulty with all the comprehension tasks. Usually a brief discussion about the text was sufficient if any lack of comprehension was demonstrated.

John had little difficulty with lexical relations, metaphor and simile but occasionally could not articulate this understanding clearly making it uncertain if he fully comprehended the text. For instance in Extract 2:1 when I asked about the ‘head head’ John initially said he didn’t know but in exploring the concept suggested a very logical inference,

T: So if I say something is the head what do I mean?

J: The head of something. That means it must not be them because they’ve got two heads.

I rephrased the question;

T: When I asked to talk to the ‘head head’ what do I mean?

John began to understand something of what was being indicated by the author: However he didn’t have the linguistic experience to clarify it;

J: The head of the other head other head of umm, the head of the other head of the um..

T: You mean the boss head.

J: Yep.

When reading *The Bay* John had no trouble relating tide to water and so understood what was moving the crab claws:

T: What’s making the crab claws roll along?

J: The water.

T: Yes. Are there really “little cat paws” down there?

J: No.

T: That’s right, the sea is like little cat paws.

The simile of prawns being like jewels was more difficult for John to follow but on my re-reading the text he was able to accurately answer my questions.

T: Are there jewels in the rock pool?

J: No

T: What’s he saying looks like, “glassy pink jewels”?

J: Umm

T: (Reads) “Flowing once more into warm shallow pools where silvered prawns gleam like glassy pink jewels”

J: The prawns

T: Do you think prawns look like that?

J: No

Activity Sequences

John accurately followed activity sequences. For instance he summarised Tigger’s actions with the tablecloth:

J: He just rolled himself up in it three times.

T: Just playing?

J: Just playing.

Reference

At no point did John demonstrate any difficulty with reference. Even in the most difficult text, *The Bay*, John had the linguistic knowledge to unpack it successfully. In Extract 4.4 the foregoing text was referred to as “there”. Considering the text had not been presented in its complete form but was

interrupted by questions and responses it was not surprising that John missed this reference although he was able to answer the more immediate question;

T: (Reading) “There’s where the sea beasts writhe in their caves,
And wraith weeds sway in the deep sea waves.”

T: Where do the sea-beasts live?

J: In the cave.

When asked where in relation to the sea it was clear he had missed the relevance of “there” until I re-read the relevant lines:

T: What’s the water like?

J: Dark

T: What else did the words tell us? (re-reads)

J: How can they ‘ride’ in their caves?

T: ‘Writhe’, it means they twist. So where did the sea beasts live?

J: In the cave.

T: What’s the water like?

J: Dark.

T: And?

J: In the deep...

On two different occasions John asked for clarification either of one of my questions or about the text itself as in the extract given above (“How can they ‘ride’ in their caves?”). The ability to reflect on language is an aspect of the informative function of language and is crucial to the ability to share previously unknown experience or knowledge (Painter, 1999, p.182) and to the acquisition of educational knowledge.

5.2.2 Students at Moderate Risk - Lewis, Lucy and Rory

The children in this group gathered the gist of each text but demonstrated some difficulty with specific linguistic forms. Lewis had trouble drawing inferences. Lucy tended to add her own ideas to activity sequences and Rory needed support to track reference. However with some help these children were able to follow the texts successfully.

Field – Lexical Relations, Metaphor and Simile

The juxtaposition of ‘head head’ posed no problems for Lucy;

T: What does he mean by “head head”?

L: He means who’s the best, who’s got the bested head.

Lewis queried the meaning of “head head”

L: What’s a head head?

T: What do you think? (Rereads passage).

L: They’re both the head heads.

T: Yes.

Rory experienced a similar difficulty to Lewis in interpreting the meaning of ‘head head’ but was able to follow my explanation:

T: What does he mean by the head head?

R: The two heads.

T: Which head?

R: Both of them

T: No, he wants to speak to the head head. You know how we talk about the head of the school, who’s the head of the school?

R: Mrs. Richmond

T: Yes, she’s the boss, so what would the head head be?

R: The giant

T: The..?

R: Boss head

T: Yes the boss head.

R: Which is the boss head?

T: What a good question! Do you think they will have an argument about who the boss head is? And do you think while they have an argument about who the boss head is you could sneak safely away?

R: (Laughing) Yes.

The lexical relations in the initial lines of *The Bay* were understood by Lewis and Lucy but Rory needed some extended support to establish the field of the text. When he related the content of the text to his own knowledge about the beach he had little difficulty following the language. Rory's failure to access the field of the text emerged as I asked the questions. He yawned and mumbled, pointed to the water and finally announced that, "The bay is the beach" which I interpreted as an understanding of the movement of water in and out and so continued reading.

Rory's attention was aroused by "glassy pink jewels":

R: What glassy pink (mumbling, then very clearly) Where!

T: Where's what?

R: The pink jewels.

I re-read the text;

T: "where silvered shrimps gleam as glassy pink jewels" Now these are the shrimps (pointing them out in the picture). Are they really jewels?

Rory yawned and shook his head. When asked why they might just look like jewels he responded that they shine. It seemed as though we were understanding the text together so I asked what was flowing into the pools. Rory replied “Glass pinky jewels”. I re-read the text from the beginning but he still maintained it was glassy pink jewels. On rejecting this Rory requested a re-reading.

I read it again from the beginning to the section about, “glassy pink jewels” and asked what was happening. Rory replied “jewels” so I tried again by asking what the previous pages had been talking about. I was hoping to establish the field of the text – the tide coming in. Rory simply said, “I don’t know”

T: What does it mean when it says, “The tide has been low”? What’s the tide?

R: Oh um the tide um it um it goes down and then it goes and goes right up right up.

T: What goes down and then it goes right up?

R: The water and like um in when Grandmother’s in her new house um the water comes floating up to the stairs and wrecked the road.

We had finally established the field of the text through the crucial word, ‘tide’. Rory related the topic to something known and a meaningful language-based interaction was now possible. I restated what was happening in the book, the tide was pushing the seaweed and shells and hollow crab claws further up the beach

R: Oh it comes back and picks them up and comes in.

T: That’s right and now it’s coming into the rock pools.

Simile was not difficult for either Lucy or Lewis. Initially Lucy drew on her own resources but was able to differentiate this from information given in the text.

Extract 4:6 Lucy

T: Are there jewels in the rock pool?

L: Sometimes

T: Did the words say that?

L: No, the creatures were in the rock pools

T: Do creatures look like jewels?

L: Yes, cause it's got like patterns of colours.

Both Lewis and Lucy had some difficulty with inference. Although Lewis comprehended the main gist of Tigger he failed to follow some of the implied ideas.

Lewis, Extract 1.2

T: Do you think Piglet is a bit scared of Tigger?

L: No

When I explicitly stated Piglet's action Lewis saw the implication;

T: No... then why has he gone closer to Pooh?

L: Because he's um scared.

T: What's he scared of?

L: Um big ones?

T: The big one's what?

L: Big Tiggers

Extract 1:5

T: What's Pooh doing with the condensed milk?

L: Umm give it to Tigger.

T: Do you think so?

L: Give it to Kanga's baby.

Lewis didn't draw the appropriate inference so I reread the passage. Lewis responded to the implied demand that he engage with the text more effectively.

L: Umm milk.

T: Yeah, the tin of condensed milk. Why?

L: Because he didn't want anybody to see it.

T: What's he going to do with it?

L: Eat it.

Lucy had no trouble with the inference in Extract 1:2 but needed some support with Extract 1:3.

Extract 1:2

T: What's Piglet a bit scared of?

L: Ummm, that he scared that that he will eat him up.

Extract 1:3

T: Why did he go outside?

L: Umm to see if he could see any umm well things that they would like.

T: Ahh (I drew her attention to the action sequence in the story and Tigger's saying "scus ee")

L: He was thinking about it.

T: What about the haycorn in his mouth?

L: He had to spit them out.

T: Is that why he went outside?

L: Yeah.

Rory was able to draw the inference from Extract 1:2 but, like Lucy, had some difficulty with Extract 1:3.

Extract 1:2

T: Why is Piglet feeling not very brave?

R: because umm Tigger is tiger (expressively) is tiger!

T: What's Piglet worried about?

R: (Rory demonstrated chewing)

T: Tigger might eat him? Is that why Piglet went on the other side of the table?

R: (Nods) I think so.

The second inference was embedded in an activity sequence causing Rory some difficulty in interpreting the text.

Extract 1:3

T: Why did he go outside?

R: Catch something

I re-read the passage in which Tigger tries the haycorns mumbles "Scusee" and scuttles outside.

T: So what did he still have in his mouth when he went outside?

R: Haycorns

T: So why did he go outside?

R: To spit it out.

Activity Sequences

Lucy successfully followed activity sequences unlike Lewis and Rory. For example although Lewis knew Eeyore was upset with Tigger he didn't realise why:

Extract 1.4 Lewis

T: Who's Eyore upset about?

L: Tigger.

T: Why?

L: Because...he's never seen one before and he thinks it's..

T: What does Tigger keep doing?

L: Ahh, umm he umm he keeps, he doesn't like it. He keeps saying, "I didn't like this"

T: Yes. What does Eyore mean when he talks about exercises?

L: Ahh I ummm.

T: Who's doing the exercises?

L: Tigger.

T: What sort are they?

L: Umm, eating.

T: What does he like to do all the time?

L: Play

T: Play. He likes to bounce.

L: Yep

Lucy had no difficulty understanding activity sequences actually working out her own rationalisation for an action that seemed, to her, nonsensical.

For instance in the tablecloth episode from *Tigger* Lucy added meanings drawn from personal experience:

Extract 1:1

T: (reading) Have I won?

L: It wasn't a race!

T: (reading) "That's my tablecloth"

L: And it wasn't a race.

T: (Continues reading) What tried to bite Tigger?

L: A little worm.

Lucy paused for a few moments before suggesting worm. Lucy hadn't worked through the implications of the information given in the text of *Tigger's* 'something' actually being a tablecloth. In the following monologue Lucy interwove the textually based information with her own ideas:

T: A worm?

L: Or a snake or something.

I wasn't sure if Lucy was still in touch with the text so I backtracked;

T: What did he just attack?

L: Ahh the tablecloth, that's funny because they're not alive.

T: Does Tigger know that?

L: (Shakes head) I think that tableclothes are just tickling him and he felt something was hiding here but it was only the tablecloth because once when I had when I was only in my pants when it was summer last year I only had my boxer shorts on but I didn't have a T-shirt and I was sitting at the table and I said, "What's that tickling me?" and I thought that it was a worm but then I saw it was really the tablecloth but it looks like worms 'cause it's got worms on the tablecloth.

Lucy rationalised Tigger's thinking from her own experience indicating that she appreciated that another can hold different, even erroneous beliefs, and act on these. An interesting question is whether this actually happened to Lucy as recounted by her or if she embellished a particular episode in her own life and couched it in the first person to aid inner organisation of thoughts and verbalisation to another.

The last event was quickly grasped by Lucy perhaps because she was so involved in the story;

Extract 1:7

L: I had um medicine, white medicine that I hated and I had to have it.

T: Reading: "one large gollop"

L: Of what? Of the medicine.

T (reads). Who ate it?

L: Tigger, he likes it

Rory followed activity sequences unless he confused reference. An example was the episode with the condensed milk in which Rory confused reference and inferred what Tigger would do with the milk, not Pooh. As soon as I questioned the identity of the referent Rory followed the sequence and drew the correct inference:

T: What's he going to do with the condensed milk?

R: Throw it out.

T: Pooh?

R: No Tigger

T: Oh yes, Tigger won't like it but who took it into the corner?

R: Pooh

T: And what's he going to do with it?

R: I don't know, drink it!

Reference

Tracking reference allows one to follow participants through the text and is crucial to accurate interpretation. Lewis successfully tracked reference. Generally Lucy tracked participants but she had difficulty following the photo sequence in *Here Come the Aliens*:

Extract 3:2

L: They're stopping and they're going to go because they've gone the wrong way.

T: So you think they've gone the wrong way?

L: Yeah because they might have like thought they should have gone they might have been turning instead of going straight ahead still.

Lucy had made up her own plausible explanation so I drew attention to the "piece of paper floating free"

L: It said, "Go back because the ships are stolen" (Laughs)

Perhaps Lucy's laugh indicated she knew this was her own idea and not textually based. I tracked through the propositions to scaffold Lucy's representation of the text,

T: What happened when they saw the paper?

L: They went

T: Did they stop and pick up the paper?

L: Nods

At this point I re-read the text to help Lucy clarify the experiential content, then asked;

T: What's passed around the fleet?

L: I don't know.

T: I'll re-read that whole section.

Now that Lucy was focussed specifically on the paper in the text she was able to follow the reference across text;

L: The paper

T: Look, they're all looking at it.

L: We can't see it.

T: (turns the page and reads)

Lucy put the propositions together and understood the story;

L: Ahh they're scared!

T: So what was on the piece of paper?

L: Little kids making, they're making them go away (Laughs)

T: Yes, so we frightened them off?

L: Yeah but we would too if we saw

T: If we saw what?

L: Aliens

T: Yes so the aliens saw us and got frightened

L: Yeah and we're supposed to get frightened of them.

Lucy understood the story and appreciated the humour.

Based on the questions seeking clarification about 'who' that Rory constantly asked while I was reading it would seem that he had difficulty following reference chains. However when supported through questioning he could often provide his own answer:

T: (Reading): "Tigger smiled his happiest smile and said nothing"

R: Who did?

T: Who smiled? Who did it say just smiled?

R: I don't know, Tigger (added quickly).

T: “Pooh explained to Eeyore that Tigger was a great friend of Christopher Robin’s, who had come to stay in the forest, and Piglet explained to Tigger that he mustn’t mind what Eeyore said because he was *always* (sic.) gloomy”

R: Who was? Tigger?

T: Well was Tigger always gloomy? Who’s always gloomy? Who just said, “Ahhh, Ahhh”?

R: The donkey.

T: Who said, “When is he going?” so who is always gloomy?

R: The donkey.

T: (reading) “and Eeyore explained to Piglet that, on the contrary, he was feeling particularly cheerful this morning”

R: Who was? Eeyore.

I kept checking Rory’s tracking at appropriate points in the text;

T: “and Tigger explained to anybody who was listening that he hadn’t had any breakfast yet” Who hasn’t had any breakfast yet?

R: Eeyore, no Tigger, Tigger.

In the section relating to Eeyore and Tigger Rory also confused reference but corrected it immediately when I reminded him of certain characteristics.

Extract 1:4

T: Who’s upsetting Eeyore by doing exercises?

R: Pooh

T: Is it Pooh who usually bounces a lot?

R: Tigger.

Rory didn’t initially follow the reference chain regarding the piece of paper in the Alien text but on a second re-reading followed it successfully.

Extract 3:1

T: Why are they going?

R: I don't know

T: Well something happened here. What happened?

R: I don't know

T: I'll read it again, "Approaching planet. . . A piece of paper"

R: (interrupting) That piece of paper

T: Did they stop and pick it up?

R: Yep

Although Rory had difficulty with expressive language as demonstrated in the language used in his replies his receptive language skills appeared to be less impaired.

In *The Bay* it was unclear if Rory drew his answer from the text or from the information I gave him.

Extract 4:10

T: Where about are the lobsters?

R: Near the sharks.

T: Are they in shallow water or deep?

R: Deep

This answer seemed to indicate that Rory was drawing on general knowledge as well as the text to answer the question. There were no pictures of sharks in the book yet Rory referred to sharks. It was uncertain if his next answer came from the text or from the phrase I had just uttered.

When Rory fully engaged with a text he had no difficulty following reference even when it was carried over a number of pages as in Extract 4:14 from *The Bay*.

Extract 4:14

T: (Reading) “Drifting slow where the dead ships lie” What’s drifting slow?

R: The fish.

5.2.3 Students at High Risk - Tim and Mark

Field - Lexical Relations, Simile and Metaphor

These children tended to interpret texts in a highly literal and ideosyncratic manner. For instance in *The Bay*, Mark was more interested in the sounds of the words than their meaning.

Extract 4:2

M: That rhymes

T: That’s right. What’s it telling us is happening?

M: Ahh, I don’t know, umm I don’t

T: What’s it talking about?

M: ‘Bay’, ‘day’ rhyme.

T: What are the words telling us about?

M: People

T: Did it mention people?

M: Yes.

T: Where? I’ll read it again.

By drawing Mark's attention to the meaning rather than sound analysis I was hoping he would comprehend the text:

M: (interrupting) I know, I know, it goes smaller like large first then it goes (makes a noise), it happens at Collaroy Beach.

T: What goes?

Mark pointed to the picture of the water.

T: The water, so you mean the water goes in and out?

M: Yep

T: When the water goes in and out what do we call it? The word that I just read, I'll read it again.

Using texts as a resource for word knowledge is an important factor in learning educational knowledge. I was scaffolding Mark in listening to the text as a source of information but Mark didn't understand the request.

M: Creeps

T: No, that's what it does. Listen; "The tide has been low for most of the day now it creeps slowly back into the bay."

M: Low

T: Yes, it's low, then it creeps slowly and that makes it high.

M: High

T: Yes, high but what is it that creeps in and out?

M: The water.

Mark had grasped the concept of 'tide' but hadn't related the name to it.

T: The water, but what do we call it as it goes in and out?

I began re-reading, "The tide as it creeps.."

M: The tide.

It seemed that Mark wasn't able to relate his conceptual knowledge of 'tide' to the word. He simply kept suggesting words hoping one would be the right

answer rather than actually reflecting on language as a symbolic representation of reality. As Halliday (1978, p.87) explains information is created by language and has no existence except through language.

Tim also demonstrated an inability to bring together the two different functions of language; language allowing the sharing of essentially non-linguistically representable knowledge (information) and language as a negotiation tool of 'things'- goods and services. An interesting illustration of Tim's difficulty with understanding the lexical relations between words and the metaphorical nature of language was demonstrated in his responses to the text "*I'm Coming to Get You*" (Ross, 1989) The children had initially seen this story in a video format so already knew the basic storyline but when I was reading it to Tim many misunderstandings emerged. In the following section, for instance, Tim questioned the meaning.

T: "nibbling small stars on the way"

Tim: How? He's not flying outside.

T: He must have landed.

The author left it to the reader to reconstruct the activity sequence of the monster landing on a small star, eating it then moving on to the next one. This was indicated in the phrase, 'on the way'. Linguistic convention has established the meaning of this phrase, as in, 'shopping on the way', 'having lunch on the way' and so on.

Tim's next interruption also demonstrated a very literal interpretation of the text. The illustration showed the monster looking at Tommy Brown on his radar screen and saying, "I'm coming to get you":

Tim: How? Is he just going to jump in the picture (on the radar screen?) I know he's too scared.

Tim knew that Tommy treads on the monster at the end because the monster is actually very small and has applied this knowledge to his interpretation of the text and the monster's attitude.

T: The monster is already scared? Why is he saying, 'I'm coming to get you'?

Tim: Cause he's talking to a picture.

Tim's response was contextual and literal. The monster is not scared because he is talking to a picture and a picture cannot hurt you.

Tim comprehended *Dragon Quest* well. Although he initially didn't understand the meaning of "head head" he followed my explanation:

Extract 2:1

T: What does he mean by "head head"

Tim: I don't know

T: Who's the head of our school?

Tim: Ohh Mrs Richmond

T: If it's a two headed troll and I say I want to speak to the 'head head', what do I mean?

Tim: To the boss, he's the boss cause he's out in front

T: But he might think he's the boss (pointing to the other head). Do you think they might have an argument about it?

Tim: Yes

Tim liked the pictures in *The Bay* but was completely uninterested in the text. Throughout the reading he commented on the pictures and asked

questions about what was in the illustrations but didn't really pay attention to the words. His running commentary began as I began reading:

Tim: They're on a beach and the tide isn't big and there's a small boat.

He placed the context of the story very quickly and understood what was happening.

Extract 4:4

T: So what's pushing these things along, shells and crab claws?

Tim: Water

Tim interrupted my reading with a demand about the picture,

Tim: What's that?

When we had worked out it was a starfish he then named everything he could in the picture:

Tim: Crab, lobster, seaweed.

I continued reading but as soon as I stopped Tim continued to describe the illustration

Extract 4:6

T: (reading) ...gleam as glassy pink jewels"

Tim: There's a tent, the writings still in the water.

When I asked about the "glassy pink jewels" Tim asserted that they were shells but, when I didn't accept this, changed it to jewels. I asked him to point to the shrimps to ascertain if he knew what they were. He pointed to the anemones so I showed him the shrimps and explained that we call them prawns.

Tim: I like eating prawns.

When I reread the line Tim pointed to the prawns. He had realised that the author was comparing them to jewels.

Mark had much more difficulty with simile. For example in *The Bay* he was unable to gather meaning from the text.

Extract 4:6

T: Are there pink jewels in there or is he talking about something else?

M: Something else

T: What's he describing as "glassy pink jewels"?

M: Flowing

T: I'm going to read it again and I'm going to change one of the words, "Flowing once more into..."

M: Pools

T: (reading) "...where silvered prawns gleam as glassy pink jewels"

M: Prawns get them

This didn't make sense in relation to the text.

T: Prawns get what?

M: Shells

T: Get the shells? Did it talk about shells?

M: I'll just see, (flips through the book) There, that's KW. They're too noisy all the time. I'm lucky every Saturday 'cause I have ice-blocks.

Mark was trying avoidance tactics and I was losing patience;

T: Tell me what this means; "Where silvered prawns gleam as glassy pink jewels"

M: They glow

This seemed to be a breakthrough;

T: They glow, what do they look like?

This question was literal and could be taken directly from the text.

M: Like glassy pink jewels

T: So the prawns look like jewels, don't they? Are there real jewels in the pond?

M: No, they're prawn eggs.

T: What are?

M: Them like that, shut up and go like that I don't mean the swear word "shut"

T: Yes, I know what you mean, you mean closed.

M: Yes, they're closed

Mark reflected on language and the meaning of words but continued to give frustratingly wrong answers.

Inference

Tim and Mark were unable to draw inferences without support. In section 1:2 Tim drew an incorrect inference, Tigger's bouncing, rather than the fact that tigers eat piglets.

Extract 1:2

T: Why do you think Piglet is a little bit afraid of Tigger?

Tim: Cause he doesn't like bouncing

T: He doesn't like bouncing.

Tim: and um Tigger might jump on him.

T: Why has he gone closer to Pooh?

Tim: Just in case he bounces

T: He feels safer when he's close to Pooh?

Tim nodded.

Tim became quite confused with the section about Tigger spitting out the haycorns because Tim misinterpreted the inference relating “scusee” to not talking with your mouth full.

Extract 1:3

T: Why did he go outside?

Tim: Because they couldn't understand him

T: Yes, so why did he go outside?

Tim: I don't know

T: What was he trying to eat?

Tim: Haycorns

T: Tigger said nothing because his mouth was full of haycorns then he said, “Scusee” so what do you think he did?

Tim: Talked to Piglet?

T: Was Piglet inside or outside?

Tim: Inside.

T: That's right. What do you think Tigger did with the haycorns?

Tim: He was trying to speak

T: Yes, but he couldn't because his mouth was full so what did he do?

Tim: Went outside

T: What did he do outside?

Tim: I don't know

It was obvious from Tim's tone that he was getting frustrated so I provided more scaffolding by attempting to embed the meaning of the text to Tim personally:

T: What would you do if your mouth was full of haycorns and you didn't want to swallow them?

Tim: You would go outside and tell someone.

Tim was still fixated on his original interpretation. I imitated talking with my mouth full then asked;

T: What would you do?

Tim: I don't know

I tried relating the text directly to Tim's own life experience:

T: If you put something in your mouth and you don't like it what do you do?

Tim: Spit it out

T: Ahh, do you think that's what Tigger did?

Tim: Who did go outside Pooh or Tigger?

Tim had lost the thread of the story so I re-read the section about Tigger going outside;

T: Who went outside?

Tim: Tigger

T: Why did he go outside?

Tim: To spit it out.

Tim, through extensive scaffolding, correctly interpreted the text.

Mark drew an inference directly from prior knowledge. However this knowledge was not relevant to the text:

Extract 1:2

M: Cause he's a stranger

T: Who's a stranger?

M: umm, Tigger

I probed;

T: Why else is he scared of Tigger?

M: Umm because he has giant teeth...Um because he might (makes biting action).

Metaphor posed an even greater problem for Mark. He had difficulty following the sequence of events regarding the tin of condensed milk because he hadn't realised that 'eleven o'clockish' was a metaphor for hungry.

T: Why did Pooh take the condensed milk into the corner?

M: I don't know, do you?

T: What does it mean when it says he was beginning to feel a little "11 o'clockish"?

M: I don't know

T: What happens at school at 11 o'clock?

M: Ahh

T: What did we just have?

M: Ahh I mean...

It was only when I presented the information in a congruent, literal manner that Mark was able to infer the action:

T: If Winnie the Pooh is a bit hungry and he's found a tin of condensed milk and gone into a corner with it, what do you think he's going to do with it?

M: Eat it all up.

With extensive scaffolding Mark could accurately follow the text. He enjoyed books but found it hard to focus his attention for any length of time and tended to jump to conclusions based on prior knowledge rather than textually based information.

Activity Sequences

Activity sequences also posed problems for Tim and Mark. They interpreted Extract 1:1 as indicating that something was climbing up the tablecloth rather than realising that Tigger thought the tablecloth was the something climbing up the table. Tim couldn't relate Tigger's statement at the end of this section to the tablecloth fight just described.

Extract 1:1

T (Reading) "Have I won?"

Tim: Why?

T: Why? Why did he say that?

Tim: I don't know.

I re-read that section.

T: What did Tigger think the tablecloth was?

Tim: Ahh I don't, a roll up thing. You roll up and roll down the stairs.

Tim related his definition to the description given in the text of what Tigger did with the tablecloth. I asked why Tigger started fighting it.

Tim: There was something crawling up it.

Tim re-constructed the text from "something's climbing up your table" to "something's climbing up the tablecloth".

When I specifically asked if the something was the tablecloth Tim replied:

Tim: He thought the tablecloth was the something else crawling up the table.

Tim was able to follow activity sequences when the language was mostly congruent as in *Tigger*. In the section on condensed milk (1:6) Tim knew immediately that Pooh was going to "drink it". In the final section (1:7) Tim realised that it was Tigger who licked the extract of malt off the spoon and

liked it. His response to the idea that Tigger ate extract of malt for “breakfast, dinner and tea” was “Eewooo” a very expressive acknowledgement that this was medicine.

In a later session when asked to recall the story Tim gave only the barest essentials leaving out a lot of the key elements:

It was about Tigger getting breakfast then he. At the end he got breakfast and then he was looking all over. He ate a bee and then he went and looked for breakfast again and again and again and then he found some and um he liked it and then he had it for breakfast, lunch and tea.

Mark also added his own ideas to explain the tablecloth segment.

Extract 1:1

M: Might be Rabbit. Oopsie I forgot! Kangaroo and Roo.

T: So you think it could have been Rabbit climbing up the tablecloth?

M: Uhhuh

T: Did it say that in the story?

M: No.

I re-read the section

T: Did Tigger know what a tablecloth was?

M: No, it's something you put on the table.

T: What do you think Tigger thought was climbing up the table?

M: Umm Uhh, a rat? Or a mouse.

T: Do you think the tablecloth might have moved in a breeze and Tigger thought it was alive? Do you think that's silly?

M: Yes

I extensively scaffolded Mark's understanding of the text and then read the appropriate section again.

T: So he really thought the tablecloth was going to bite him?

M: Ahhah, I think he was asleep in the night, having a little snore and dreaming.

Reference

Mark had difficulty tracking reference in all texts except picture books such as *Dragon Quest* (Baillie, 1996) whereas Tim generally tracked reference unless the text was more densely packed as in *Here Come the Aliens* (McNaughton, 1995) and *The Bay* (Bacon, 1987). For instance in *Tigger* (Milne, 1928) Tim experienced no problems with reference:

Extract 1:4

T: Who's Eyore getting upset with?

Tim: Tigger, he doesn't want him jumping on his breakfast.

Whereas Mark, in the final section of text, confused Pooh with Tigger:

Extract 1:7

T: Who ate it?

M: Piglet, I mean Pooh

T: Pooh? So he is the one that grabbed the spoon and gave a great gollop?

M: Yes.

T: You listen again

I re-read the text and now Mark followed it.

M: Tigger

Tim and Mark both missed the reference regarding the piece of paper in *Here Come the Aliens* (McNaughton, 1995) however Tim only needed a second reading to interrupt with:

Extract 3:1

Tim: Ohh so a human must have err let it go by accident and flew up into space.

T: Yes I wonder what's on it?

Tim: Why don't they write it at the back?

Mark needed more support to follow the text:

Extract 3:1

T: What's passed around the fleet?

M: I don't know

T: Well something happened between here, where they're slowing down and here, when, "It's swiftly passed around the fleet"

M: Coming and slowing, the (inaudible) should be coming and slowing, should be the other way

He was attempting to find the meaning in either his general knowledge or from the picture.

T: Why have they slowed down?

M: Cause they needed to look at the paper, there might be a treasure there.

T: Yes, is that what they're doing. Looking at the paper?

M: Yes

T: Do you think that's what this might mean, "It's swiftly passed around the fleet"? Mark nodded.

The rest of the text posed no problems for Mark, probably because the pictures fully supported the written text. However Tim had some difficulty and made up his own explanation:

Extract 3:2

T: So why did they go?

Tim: That's what the humans told them to do.

T: What did it say in the story?

Tim: Ohh that floated up, then they picked it up and it said, "Go away" I think.

Tim knew that something wasn't quite right with his explanation.

T: Does it?

Tim: Ohh

I turned back through the pages so Tim could follow the pictorial sequence

Tim: Yes, that's the picture

T: So what made them go home?

Tim: (Looking at the picture) They weren't the aliens

T: No. that's us aged four, our class. So what made the aliens go home?

Tim: Them

T: Do you reckon they're scared of us?

Tim: Who?

T: The aliens

Tim: Yes

The Bay was a very difficult text for both Mark and Tim to comprehend. Although pictorially supported, the information is created and shared through language. When asking Tim questions to ascertain if he had followed the reference chains I was unsure if the answers were text based.

Extract 4:10

T: So whereabouts does the octopus live?

Tim: Underwater

T: Deep water or shallow water?

Tim: Deep

T: Do the words tell us that?

Tim: Nope Yes

I wasn't sure if Tim was drawing on his general knowledge or had actually taken his answer from the text so I asked him to tell me which part and started re-reading

T: "There's where .."

Tim: (interrupting) I don't know where you're up to though.

He wanted me to point to the actual words as though that would aid meaning. I explained that he only had to listen but this didn't make sense to Tim. He pointed to a piece of text and said, "There"

T: Tell me which words, you don't have to point to them.

I continued reading;

T: "There where the water's deep... there's where the lobsters crawl and creep.." Do the words tell me the water's deep?

Tim nodded so I accepted that as a satisfactory answer.

Tim concentrated more closely and was able to answer my questions.

The incongruent language in *The Bay* posed serious problems for Mark who demonstrated great difficulty in following the text.

Extract 4:4

T: What's making those things roll along?

M: Crabs

T: The crabs?

M: Because crabs are in shells and they make..

T: But this says, "hollow crab claws"?

M: I know 'cause they're not alive

T: They're not alive so what's making those things roll along?

Now Mark realised it was the water. Mark knew the text was giving quite specific information and that I wanted this in his answers but he continually applied logic based on his own prior knowledge to the text rather than utilise that knowledge to support the information given in the text.

The reference chain about the living place of the sea creatures was difficult to follow as it carried over the page so I spelt it out more explicitly:

Extract 4:10

T: So where the water's deep that's where the sea beasts live

M: 'there's where the sea beasts live', so he's trying to get him...

I wasn't sure if Mark was tracking the reference chain across the text as another anaphoric reference to deep water was given; "And deeper yet" so I asked another question:

T: Do these fish live where the lobsters are, no? Whereabouts do they live?

M: Seaweed

T: The lobsters live where the seaweed is, but what about these fish?

M: They live in...gold fish live in a lot of sea weed so they might live in holes.

Mark was drawing on his own general knowledge instead of taking meaning from the text. When I reread the text Mark tried a direct quote from the text:

T: (reading) "...in strange blue places"

M: In places

T: What sort of places?

M: Seaweed places.

T: We're not talking about seaweed places. It didn't talk about seaweed did it?

M: I think it livesin...

T: I'm going to tell you, "and deeper yet where it's cold and still"

Where do they live?

M: Still

T: Where it's cold and still

M: Yeah

T: What kind of water is "and deeper yet"

M: Deep water.

The preceding exchange was a graphic example of a breakdown in communication. Mark was simply giving me any word from the text which might satisfy me. There was no attempt on his part to actively seek meaning from the text.

5.2.4 Summary

It is easy to assume that children are gathering a text's intended meaning. Often they get 'the gist' and can answer general questions such as: "What was the story about?"; "Who helped/What happened?" but a closer scrutiny reveals gaps and misunderstandings. Even specific comprehension testing such as The Listening Test (Barrett, et al, administered at the beginning and end of the intervention doesn't give an accurate indication of what is comprehended. This was obvious from a comparison of the pre and post test responses given by the children. For example Items 6 and 13 in Section A on Main Idea revealed that the children picked out one word and used general knowledge to formulate an answer. Given below are the questions and the children's answers.

Item 6. First they poured it. Then they smoothed it out. After it dried, they drew a yellow line down the centre and dotted white lines in the middle of both lanes.

What am I talking about? (road, street)

Item 13. We all need to be very quiet in this place. People are reading. We can go to the children’s section for story hour.

What am I talking about? (library)

Table 5.4 Sample responses from The Listening Test

	Item 6 Response–Wk.1	Response- Wk.10	Item 13 Response-Wk. 1	Item 13 Response-Wk. 10
John	Sport	Sport	Library	Library
Lewis	Field	Basketball	Classroom	Classroom
Lucy	Road	Cricket	Library	Library
Rory	Boat	No response	School	Library
Tim	Dough	Swimming	Library	Dr’s
Mark	Baseball	Drawing	Neighbourhood	In bed

The children have related the drawing of lines to marking out sport fields hence John, Lewis, Lucy and Mark all gave responses to Item 6 reflecting this. John’s responses did not change whereas all the other children tried another response unless they were certain of their answer. Tim and Mark in both instances gave unexpected answers. The logic could be seen except, perhaps, in Tim’s responses to Item 6, “Dough” and “swimming”. It is also hard to see the logic in Mark’s first response to Item 13, “Neighbourhood”. Both these answers are hopeful guesses and, in Mark’s case, these gave a higher score in Week 1 than in Week 10. The results are detailed Table 5.4

Table 5.5 Listening Test Results Week 1 (Pre –test) and Week 10 (Post-test).

	Chronological Age	Listening Test	Main idea	Details	Concepts	Reasoning	Comprehension
Lewis	Pre: 5.4	6.10	6.1	7.1	7.2	7.2	7.1
	Post: 5.6	7.1	6.5	6.4	7.2	7.10	8.2
John	Pre: 6.1	6.7	6.5	5.6	6.10	6.1	8.10
	Post: 6.3	7.11	6.5	9.2	7.7	8.7	8.10
Lucy	Pre: 5.7	6.7	7.3	7.1	5.11	6.3	6.5
	Post: 5.9	7.7	7.3	8.1	6.4	9.7	8.2
Rory	Pre: 6.1	6.4	6.5	6.4	6.8	7.2	6.9
	Post: 6.3	6.7	6.5	5.9	6.8	6.8	8.2
Tim	Pre: 5.8	6.4	5.10	6.0	7.2	5.9	7.1
	Post: 5.10	6.11	6.1	6.8	6.1	7.10	8.10
Mark	Pre: 5.7	6.4	Below	6.0	5.11	7.10	7.7
	Post: 5.9	5.11	5.10	5.9	6.4	5.9	6.5

This test is American, designed to cover ages six to twelve years making it somewhat unreliable for young Australian children. Small variations between the pre and post test results cannot be regarded as reliable. For instance the variation in Tim’s results on the Concepts component of the test was largely due to guess work. However the test does provide some indication of comprehension ability and improvement.

Mark dropped on four of the five dimensions. Rory dropped on two, while Lewis and Tim dropped on one. Lewis, Lucy, Rory and Tim made significant gains on the story comprehension component of the test. Mark dropped by over twelve months on this component. John scored the same mark on Story Comprehension but made significant gains in Remembering Detail and Reasoning as did Lucy. All the children made significant gains in some component/s, except Mark, indicating greater attention to and reflection on text based information and providing evidence that the intervention was successful.

Research questions four and five are presented in sections 5.3 and 5.4. These explore the differences between the children and possible reasons for the outcome.

5.3 Response to Research Question Four

Research Question Four asked if there was any difference between the ways in which this diverse group of Kindergarten children responded to comprehension questions interpolated in texts being read to them. Although a range of differences emerged there were some similarities.

John was able to complete all comprehension tasks with little or no scaffolding.

Lewis, Lucy and Rory required some scaffolding in certain circumstances:

- inference
- activity sequences
- reference

However the support was minimal and these children generally engaged with the texts actively to seek meaning.

Tim and Mark needed extensive scaffolding to interpret texts, particularly more metaphorical language. They needed extensive help with the following:

- metaphor and simile
- inference
- activity sequences
- reference

Mark had difficulty with lexical relations such as ‘head head’. Tim and Mark also needed more scaffolding in working through the text to gain an accurate meaning.

5.3.1 Analysis of the Results

In examining the data and asking why some sections were more difficult than others to follow, two textual elements emerged:

a) passages involving an inference or omission of information that needed to be inferred or added in, for instance:

Extract 1:1

“There’s something climbing up your table...”

The something is not specified but implied in a subsequent clause, (which, incidentally begins with a marked Theme) “with one loud *worraworraworraworraworra* he jumped at the end of the tablecloth”. It is up to the reader to realise that the tablecloth is the ‘something’. All the children, except John, assumed it was an animal of some kind. Interestingly Lucy commented that that was funny because “they’re not alive” (meaning tablecloths). She then presented a possible explanation of the text.

Extract 3:1 is different in that information is not implied but needs to be added in.

Extract 3:1

A piece of paper floating free.

The aliens are slowing

It’s swiftly passed around the fleet.

(McNaughton, 1995)

We are not told that the ships stopped and retrieved the paper. Details such as these are not generally given in written texts because they are deemed unnecessary. They *have to have happened* for the next event to be possible. A similar situation was

found in “*I’m Coming to Get You*” (Ross, 1985). Tim found this text particularly difficult to follow as he interpreted it literally and didn’t appear to realise that information could be added when necessary (See p. 20)

b) combination of marked Theme and tracking reference.

This was particularly relevant in *The Bay* but also occurred in *Tigger*. Extract 1:7 includes a marked Theme (in italics) which presages a change of agent from Tigger to Kanga.

So Tigger came closer, and suddenly he put out his tongue, and took one large gallop, and, *with a sudden jump of surprise*, Kanga said, ...” (Milne, 1928, p.21)

The participants actions are described in detail but there is no supportive or explanatory commentary. The text is quite script-like and pre-supposes that the reader/listener will visualise the scene. All the children except Mark were able to follow this sequence.

Extracts 4:4, and 4:14 from *The Bay* also include marked Themes. The first extract was difficult for both at risk groups.

Extract 4:4

Rolling before it, with little cat paws,
Seaweed and shells and hollow crab claws

Extract 4:14

And deeper yet, where it’s cold and still,
Where no sun may reach to warm the chill,
Loom pale, gliding fish in strange blue places

In both these extracts the reference is carried over a number of clauses. In these instances given above in which marked Theme and distant referential items are involved the children found the text more difficult to comprehend.

The three textual elements that most of the children found difficult to comprehend were:

- Inference
- Activity sequences with omissions
- Marked Theme combined with complex reference chains

The table below summarises this information. In reading the table a “Yes” means that all questions were answered correctly. Numbers given refer to the text reference numbers (See Table 5.3) and indicate incorrect answers. I have indicated which text extracts included one of the dimensions named above by placing an abbreviation next to the reference number. Omissions - Om. marked Theme + reference - M.T/Ref.

Table 5.6 Comprehension – Analysis of Responses

Children	Lexical Relations Metaphor Similie 1:5, 2:1, 4:2, 4:6, 4:16	Inference 1:2, 1:3, 1.6	Activity Sequence 1:1, 1:4,	Reference 1:4, 3:1, 4:4, 4:10, 4:14	Connections 3.2
John	Yes	Yes	Yes	Yes	Yes
Lewis	2.1	1.2 1.6	1.4	Yes	Yes
Lucy	Yes	1.3	Yes	3.1 Om.	Yes
Rory	4.6 2.1	1.3 1.6	Yes	1.4 3.1 Om.	Yes
Tim	4.6 2.1	1.3 1.6	1.1 Om.	4.4 MT/ Ref 3.1 Om.	3.2
Mark	1.5 4.6 2.1	1.2 1.6	1.1 Om.	3.1 Om. 4.4 MT/ Ref. 4.10 4.14 MT/ Ref.	Yes

It can be seen from this table that inferring was difficult for all the children except John. Metaphor and simile were difficult for most of the children. Reference was difficult in certain textual conditions (when there was omitted information) for Lucy. The children in the High Risk group had particular difficulty with following text that omitted information, or tracking reference when marked Themes occurred.

The answer to Research question Four is that the children varied considerably in their ability to answer questions about texts being read to them. Although the scope and cause of the difficulties varied across the children some similarities emerged:

- Inference was the most common difficult text element to comprehend.
- Metaphor and simile were difficult across the groups
- Activity sequences in which there were omissions were difficult for the High Risk children
- Reference involving marked Theme was difficult for the High Risk children.

5.4 Response to Research Question Five

This question investigates whether there were observable differences between the children with LD and the other children in the way in which they interpreted texts. Only two children were designated as LD at the beginning of the study - Rory reported as ADD and Tim with a family history of dyslexia. Many children are identified in the first two years at school and referred to the school Counsellor for testing. Based on performance in this study Mark will be included in the group of children

with LD. Although Rory's performance placed him in the Moderate Risk group in this section of the study he will also be included in the group of children with LD. This highlights the range and variation of difficulties demonstrated by these children.

There were observable differences in the way the children with LD approached these comprehension tasks. The children with LD experienced difficulty with metaphor, simile, inference and reference. Lewis and Lucy, normally achieving children but placed in the Moderate Risk group, also experienced some difficulty with inference but required minimal support, perhaps only a second re-reading, to correctly interpret the text. If some analysis was necessary, for example, Lewis working with Extract 1.4 or Lucy working with Extract 1.3, these children followed the series of questions and gave relevant replies that quickly led to mutual understanding. Even if a text was not so appealing, such as *The Bay* these children focused on it.

The children with LD required more support to accurately follow a text. As evidenced in the retelling tasks they usually remembered the main gist but often missed details, particularly causes and motives. Reference chains were not always tracked successfully so they confused which character did what. Both Tim and Rory continually interrupted with comments or demands about 'who' or recalled incidents from their own life that were related to the text. Mark had a similar tendency but often his spontaneous anecdotes bore little relation to the text just read. These children required more extensive support to comprehend a section that they missed on the first reading. For instance Rory generally paid close attention but when a text did not capture his interest, eg. *The Bay*, he found it difficult to follow, yawned a great deal

and required extensive support to connect with the field of the text which then allowed ongoing comprehension.

Extensive scaffolding was required for Tim to follow section 1.3 about Tigger leaving the room to spit. My attempts to lead Tim to the correct inference were not successfully followed until I made them personally relevant. This demonstrated a difficulty in placing oneself in another's position. Mark demonstrated a similar tendency in his recount 'Swimming' in which he assumed that I knew the meaning of various terms. Tim's literal interpretation, as demonstrated by his questions about the monster in *I'm Coming to Get You*, also indicated a difficulty with placing himself in another's position.

Although Rory's comprehension was better than Tim or Mark, Rory demonstrated more difficulty with expressive language. For instance in Extract 1.2 Rory mimed chewing to communicate why Piglet was afraid of Tigger. In *Dragon Quest* he avoided verbalising as well,

R: Who was speaking that?

T: Well who said, "You don't want me to fight it?"

R: Points to the knight

T: Yes. Is he talking to the little boy?

R: Nods

T: And what might the little boy want to do?

R: I don't know

T: Rereads text.

R: See a dragon

The majority of Rory's responses were two or three words. When he did give a longer response or make a comment it was often incorrectly formed:

L: Why is, Why? But I've never seen a spit frog.

Only Rory's questions were correctly formed:

R: Why does a blanket go on a horse?

R: Are they dreaming?

R: How do you know it's a poison web?

Mark demonstrated the most difficulty with comprehension often needing extensive scaffolding. For instance when attempting to gather meaning from Extract 4.10 in *The Bay* about where the sea creatures live there was a complete breakdown of communication. Miscomprehensions were also evident in his retelling of *Sam and the Ghost Stories*. Mark tended to give literal and idiosyncratic interpretations. He added his own ideas to text (eg. Extract 1.1) or gave irrelevant answers (Extract 1.2). He couldn't comprehend the metaphor "11 o'clockish" (hungry) even when it was broken down and related to his own experience.

Although there were some commonalities between the three children who demonstrated the greatest difficulty with the comprehension tasks there were also significant differences. Rory had difficulty with expression. Tim interpreted texts literally and could not place himself in another's position but was able to accomplish more with support. Mark demonstrated difficulty with all de-contextualised language features and was less responsive to support indicating a difficulty with all language, both contextual and de-contextual. A discussion of the developmental implications is given in Chapter 6. Chapter 6 also attempts to relate this study to the body of existing research.

Chapter Six

Discussion and Implications

Introduction

I began this research because I was concerned about the successful gathering of meaning by some children in educational settings. Educational discourse in the Kindergarten classroom is a precursor to the negotiation of information as educational knowledge as opposed to commonsense knowledge. Although many Kindergarten children have encountered decontextualised language in stories and, to a lesser extent, in adult discourse, the first year at school actively and directly seeks to move language from a largely contextualized form to a more decontextualised one. The Kindergarten teacher, through demonstration, repetition, and illustration, supports the comprehension of decontextualised formal discourse used in giving directions and presenting and explaining concepts and theories. She attempts to scaffold the children's capacity to move between two very different ways of using language, one situation specific the other decontextualised. Many children make the transition easily and are able to gradually acquire and utilize language resources appropriately. However some children experience difficulty and even when provided with support, fail to competently acquire sophisticated literacy skills.

Theories that may inform the inquiry needed to cover learning, language and cognitive development as the gathering of meaning is not restricted to linguistic factors alone. Vygotsky (1978), Nelson (1989) Karmiloff –Smith (2001) and, to a lesser extent, Halliday (1975, 1978) have all developed descriptions of child development and learning from a language perspective

and so were particularly relevant to my inquiry. However I felt that psychological constructs of ‘self’ were implicated so included Gibson (1979, 1982) and Bermudez, (1998). Constructs of self have not been dealt with explicitly in the data analysis but are relevant to the discussion of results.

I explored six children’s production and comprehension of oral narratives, and their production of oral personal recounts. Using SFL I analysed the data collected for evidence of the creation or disruption of linguistic meaning. In the course of this analysis certain cohesive and lexicogrammatical features came into focus which have already been mentioned. The individual nature of each child’s language use also became apparent, indicating the need for personalized, supportive interaction between teacher and child.

This chapter relates findings of this study to other research findings and discusses the role of psychological constructs on language development and learning. Implications and future research are also discussed.

6.1 Relating the outcomes of this study to other research findings

6.1.1 Learning Disability and Language Functioning

A relationship was found in this study between learning disabilities and language functioning. Such a relationship has been suggested by much previous research (Locke, 1994; Poikkeus, Ahonen, Narhi, Lyytinen and Rasku-Puttonen, 1999; Scarborough, 1991; Spear, and Sternberg, 1987; Taller, Miller and Fitch, 1996; Weinberger, 1996). In both the retelling tasks the findings of this study concur with findings of previous studies. Rory, Tim and Mark could answer questions about the text but were not able to independently structure a cohesive re-telling. The ability to answer questions supports previous research findings (Carlisle, 1999; Kail 1989; Worden,

1986) and indicates that children with learning disabilities understand more than they can indicate verbally unless highly scaffolded.

Roth, Spekman and Fye (1995) and Curran, Kintsch, and Hedberg (1996) found that their subjects with LD didn't assume the role of the listener and had problems organizing and unifying text. Rory, Tim and Mark confused sequence in *The Three Billy Goats Gruff* and left out important details suggesting that they couldn't manipulate their mental models of the story. When using a series of sequenced pictures Rory was able to produce a unified, well organized text indicating problems with expressive language skills. He had constructed a mental image of the story but was unable to manipulate this to construct a story unless supported by an external aid suggesting problems with both receptive and expressive language.

Unlike previous research, this study explored in depth lexicogrammatical features as well as cohesion. The children at risk produced vocabulary across all word functions, such as, conjunctions, verbs, nouns, and adjectives that was limited in scope and refinement. This is illustrated by the repeated use of "ghost" in Tim's text rather than 'haunted' to describe the house. The children at risk also produced fewer clauses in clause complexes, left out words, confused reference, and changed tense. Hence their expressive language was poorer at both the whole text level and the clause level. Research cited in Chapter Two (Locke, 1994; Scarborough, 1991; Spear and Sternberg, 1987; Taller, Miller and Fitch, 1996; Weinberger, 1996) suggested that language skills were causal to Learning Disabilities. This study confirms that supposition. Rory, Tim and Mark needed interactive support to clarify information given in their personal recounts even though they were drawing on experience rather than mediated knowledge. However,

they were able to independently produce longer sections of discourse that gave relevant information perhaps indicating less of a drain on their resources. Nicholson and Fawcett (1992) maintain that dyslexic individuals compensate for their disability by working harder hence they perform more poorly on more demanding tasks such as recalling and retelling a story. In all three children their oral recounts were longer, better sequenced and organized, with greater lexicogrammatical complexity than the retellings. Only Mark's recount was as inadequate linguistically as his retellings, suggesting that problems of recall or managing two tasks simultaneously was not the basis of the poor linguistic performance. That is, it was not attentional processes or conceptual organization and/or classification of knowledge but a difficulty with representing any knowledge in language.

6.1.2 Learning Described in Cognitive Terms

Karmiloff-Smith (1992) proposes a learning theory based on the re-representation of knowledge. Content is memorised and the individual can respond in an appropriate way but only when the knowledge has been fully internalized and is consciously available can it be manipulated and applied across situations. She has tracked this process through language learning but also applies it to all learning, child and adult. The three main processes are behavioural mastery (E1), followed by representational redescription (E2), and finally conscious access (E3). Mark, Tim, Rory and possibly Lucy are in the process of internally working through how to linguistically share information. Formulaic material, that is, behavioural responses, are easier than creating their own linguistic forms. Indeed Mark and Tim feel that the 'correct' behavioural response is preferred. Lucy's reliance on memorised material would also suggest this level of functioning.

6.1.3 Comprehension

Mental models or schemas are necessary to comprehension (Freedle and Hale, 1979; Karmiloff and Karmiloff-Smith, 2001; Nelson, 1996; Scribner, 1979; Trabasso and Magliano, 1996; Warren, Nicholas and Trabasso, 1979). Previous studies on comprehension indicated that individuals with LD formed mental representations of parts of the text but didn't relate or integrate these to form a whole (Curran, Kintsch and Hedberg, 1996; Roth, Spekman and Fye, 1995; Worden, 1986). Kail (1989) hypothesized that individuals with LD didn't construct effective mental models because the links and elaborations in the text were not as elaborate as children without language impairment. This is consistent with my findings. Reference, simile and inference help establish these links. Rory, Tim and Mark demonstrated difficulty with these aspects.

Misunderstandings became evident when I discussed stories such as *I'm coming to get you* and *Tigger*. Tim and Mark interpreted the language very literally or failed to draw inferences and so formed an inaccurate idea of the text.

Generally research has described individuals with LD as inactive learners however Rory actively participated in establishing meaning when he missed a reference tie, inference or cohesive link. This demonstrated the value of the one-to-one format.

When attempting to achieve mutual understanding with Mark in *The Bay* our conversation degenerated into an almost complete breakdown of meaning. This happened in the research by Poikkeus, Ahonen, Narhi, Lyytinen, and Rasku-Puttonen, (1999) on following directions. In the situation in which mother and child could talk to each other communication broke down as the

mother seemed to become more confused by the child's questions. They speculated that,

“a primary language learning context lacking in communicative clarity and sensitivity may be an indirect factor in the evolution and maintenance of specific language processing problems in children” (Poikkeus, Ahonen, Narhi, Lyytinen, and Rasku-Puttonen, 1999).

In the situation with Mark his response to my questions and explanations determined the nature of the exchange. It broke down despite my best efforts, suggesting that Mark would often find himself in unsuccessful or frustrating linguistic exchanges. An adult would be tempted to respond in ambiguous ways such as, “That’s interesting” rather than pursue meaning.

In both retelling and comprehension Mark benefited more from re-reading a text than from an analysis or discussion of the text. A similar finding was made by Worden (1986).

Comprehension research posits the necessity of mental models. Tim and Mark interpreted text literally suggesting a problem with abstraction which supports the construction of mental models. Tim didn't understand the phrase (in italics), “eating small stars *on the way*”. Painter (1999) connects Nelson's (1978) exploration into children's understanding of activity sequences such as the one implied above with language development (See Chapter 4, 1999). A sequence is embedded in “on the way” that can only be understood if the child has developed a conceptual understanding of the sequence – an abstraction based on concrete experiences. Only through in depth, individual sharing of the text did problems of this nature become explicit allowing further teaching and learning experiences.

6.2 Discussion

Children with learning disabilities may not have developed an understanding of language as a symbol system. It is possible that they have a more concrete, perceptually based manner of processing sense impressions. They have learnt language but are not leaning effectively through language (Halliday, 1993). Hence their appreciation and understanding of it as a symbolic representation of meaning is compromised. They experience difficulty with creating and sharing information, hence decontextualised language use and understanding is compromised.

Vygotsky explains that the very young child uses language iconically, words are matched to objects but gradually, “the child begins to perceive the world not only through his eyes but also through his speech” (Vygotsky, 1978, p.32). Vygotsky posits a move from direct perception in which there is a matching between observation and object but no labeling, to a mediated form in which perception becomes subordinate to the name and function. Luria (1979) graphically demonstrated this in his work with uneducated peasants. Initially the peasants described various drawings by relating them to objects in their environment. A circle was a plate, a semi-circle was a half moon and a particular green was not light green but the colour of new grass. After six months of schooling the circle was described as a circle, the moon shape as a semi-circle and colours as shades of light and dark. These same peasants, before being exposed to the decontextualised language of education, were only able to reason when dealing with known, familiar concepts but they could transfer knowledge. For example when asked about the possibility of growing cotton in England, an unknown country:

“I’ve only been in the Kashgar country. I don’t know beyond that. . . .
If the land is good it will grow there, but if it is damp and poor, it
won’t grow. If it’s like Kashgar country, it will grow there too”

The use of language to not only represent but also create knowledge, decontextualisation, was alien to these people. However, with only a little exposure to decontextualised language they were able to develop the ability to reason verbally. So why do some children find the transition from common sense knowledge to educational knowledge so difficult? Theory (Vygotsky, 1978, Karmiloff-Smith, 1992, 2001) would suggest that the source of the problem is not environmental but intrinsic to the individual. These individuals acquire knowledge as in Karmiloff-Smith’s (1992) E1 level of learning but somehow do not successfully move to E3 in which implicit knowledge becomes explicit and so applicable across domains and contexts. Halliday (1993) posits that children begin to move into abstraction around five allowing decontextualisation.

Mark wanted to “read the book” perhaps because he viewed knowledge as an object not open to interpretation. When his memory failed, indicating an inadequate mental model, Mark described the final picture. All the children used memory as indicated in their direct quoting of particular words and passages from both *Sam and the Ghost Stories* and *Three Billy Goats Gruff*. As already mentioned young children seem to equate memory and knowledge. Early reading is based on memory. Tim demonstrated a similar dependence on memory. His statement, “I don’t know” could usually be equated with “I don’t remember”. He didn’t value his own interpretation and expression, preferring the book-based form. For example, he asked a number of times for help in remembering what the Troll said and wanted an actual

quote. The book language was seen by Tim as ‘correct’ and his own expression not right or what was required.

Memory and perceptive processes are unmediated until language reconstructs perception. Individuals then become capable of consciously mastering their own attention. Speech and memory allow us to consider past and future and as we mature we do this in more abstract ways, in our mind’s eye. In Halliday’s description of proto-communication and protolanguage he explains that the care-giver provides the interpretation both internally, through supposition, and externally in language and action directed towards the child. Children learn to match action and linguistic expression to their experience and so develop their own interpretations of life. It is possible that some children, such as Tim and Mark, don’t realize that the world can be interpreted as a subjective experience. They may think that there is an objective reality – a reality ‘out there’ and true for everyone. There is always a right and wrong answer. Mark requesting that he read the book and Tim desiring to know what the troll said are evidence for this.

I can remember as a child wondering how people knew what to say to each other. I felt there was a right response, some words might be interchangeable such as ‘happy’ and ‘glad’, but overall all responses were ‘out there’ to be learned and applied appropriately. Children’s development is socially and culturally based. They learn from others around them within biological constraints (Karmiloff-Smith, 2001). Initially words are inherent to the situation, (my belief as a child) but because language can be de-contextualised it frees the individual from the here and now and allows knowledge to encompass the concrete and the abstract. The individual has to realize people’s experience of the same situation varies, others hold different beliefs. An implication that can be drawn from language development theory

is that a linguistic concept of 'self' that is, a mediated internal "I" that comments, interprets, evaluates and selects action is essential to the development of expressive and receptive language skills.

The development of a 'self' which monitors performance is necessary to the ability to structure a text. Halliday (1978) explains that lexicogrammar, "makes it possible to name, and so to separate meaning as observation of reality from meaning as intrusion into reality" (Ibid, p.86). It is only when this separation takes place that conversation can develop into narrative and dialogue. Narrative is context free in that it is separated from perception. Language is a tool. The child develops language to facilitate communication and describe the world to himself and others. The metafunctions of language develop through this innate desire to know the world through naming it. Halliday (1993) explains that the textual metafunction, which allows the creation of discourse, develops as children learn,

"to structure the clause as a piece of information (a message), and also learn(ing) to construct semantic relationships above and beyond those construed by the grammatical structure" (Ibid, p.107).

Sophisticated literacy skills (eg. understanding and development of grammatical metaphor) are dependent on the development of abstraction:

"until they learn to exchange abstract meanings children cannot gain entry to education, because without this one cannot become literate" (Halliday, 1993, p. 109).

Mark, Tim and Rory were obviously compromised in the development of abstraction as evidenced by their highly literal interpretations and difficulty with inference and metaphor. Lucy also showed some idiosyncracies of interpretation and dependence on formulaic, memorized material. These

children need support to ensure their attainment of sophisticated literacy skills.

We can assume from the data collected that Rory, Tim and Mark did not follow the cognitive or linguistic developmental pattern outlined by researchers such as Karmiloff-Smith (1992, 2001), Painter (1999) and Halliday (1993). Perhaps they didn't actively engage in linguistic experimentation. Parents are competent at supporting language development but they have no guidelines or parameters. The child to a large extent determines his/her own learning environment by selecting preferred activities or staying within certain boundaries (Eaves, Eysenck, and Martin, 1989). Minor discrepancies may go unnoticed even at the school level. Rory was identified as experiencing difficulties at school in terms of behaviour not language. Tim was identified at the end of Kindergarten as needing help with learning to read (as in decoding) but not literacy skills such as story composition and comprehension. Mark was not identified at the school level until Year 5 when his comprehension scores caused concern. His problems with language manifested as behaviour problems.

6.3 Future Research Directions

More research into specific lexicogrammatical features that affect comprehension is needed. The combination of marked Theme and reference chains was found in this study to lead to incorrect comprehension. Examples came from *The Bay* where Tim and Mark were unable to comprehend text with this feature (See Chapter 5). Drawing inferences was found to be problematic for Lewis (possibly due to his age) and also for the children at risk. The development of inferential understanding in both normally achieving children and those at risk needs further exploration. Syntax in both

word order and clause and phrase order in more complex sentences also needs to be investigated. Literacy, largely through language development and early reading experiences, in the years before school has attracted much investigation. The first year of formal schooling is a generally neglected area. Highly scaffolded, interactive teaching was generally shown to be beneficial in this study but further research into individual and group interventions would be useful.

6.4 Implications for Teaching and Remediation

Language learning is a continuous development. Developing the textual skills necessary for writing is dependent upon oral skills learnt through early linguistic interactions of increasing complexity such as following a narrative. For those children who are not learning these skills as expected, directed, supported and interactive experiences are necessary. When working with children individually misunderstandings and breakdowns in meaning can be immediately ascertained and addressed as in this study. Intervention concentrating on jointly constructed coherent discourse would probably be more useful than isolating and teaching particular lexicogrammatical structures. However knowledge of the specific areas of difficulty, such as Mark's problems with reference or Tim's limited use of conjunctions, would be useful in providing focus to the lessons. Specific grammatical forms such as these can be assessed in small group situations within the classroom. Comprehension difficulties can become apparent through oral questioning and discussion as a whole class or in groups. A teacher who is aware of lexicogrammatical features and textual features can recognize more readily how any particular child is utilizing the grammatical resources of English. These can be addressed in the normal writing

conferences as well as through specific lessons. Explicit teaching of functional grammar is becoming more usual in teacher training courses as the relevance of grammar to literacy learning and teaching becomes apparent.

Normal language development occurs interactively through the joint construction of meaning (Bruner, 1997; Halliday, 1975, 1978; Karmiloff and Karmiloff-Smith, 1992, 2001; Kintsch, 1998; Painter, 1999; Nelson, 1996; Trevarthen, 1987). Oral experiences that support and extend the use of decontextualised language are vital to all children's literacy skill development (Halliday, 1993; Painter, 1999; Vygotsky, 1978). In this study children with ADD, dyslexia and comprehension difficulties, three different kinds of learning disability, demonstrated problems with utilizing linguistic resources. Classrooms that focus on meaning and which make oral language the precursor to developing skills in understanding and utilizing decontextualised language required in educational discourse will support all children including those with potential problems. It is more likely that these problems will become apparent if the classroom talk is based on gathering meaning from text.

6.5 Conclusion

There is a connection between Learning Disability and the development of decontextualised language skills. Although this may be apparent to the trained observer in children prior to school, it is generally only recognized as school language demands focus more on decontextualised language as in comprehension tasks and story composition.

Narrative provides a powerful tool for approaching an understanding of decontextualised language. Narratives begin very early in a child's life as the parent talks about past and future events. Teachers can also utilize narrative to help all children acquire educational knowledge. The value of narrative as a teaching tool has been understood by story tellers, authors and mothers for time immemorial as indicated by this extract from Sara Crewe (Burnett, 1888).

“But he wants me to read them,” said Ermengarde.

“He wants you to know what is in them,” said Sara;

“and if I can tell it to you in an easy way and make you remember, I should think he would like that.”

“He would like it better if I read them myself,” replied Ermengarde

“He will like it, I dare say, if you learn anything in any way,” said Sara. “I should if I were your father.’ . . .

Her imagination helped her to make everything rather like a story, and she managed this matter so well that Miss St. John gained more information from her books than she would have if she had read them three times over by her poor stupid self.

(Burnett, 1888, p.38).

BIBLIOGRAPHY

- Aaron, P (1989) *Dyslexia and Hyperlexia* Dordrecht: Holland Kluwer Academic Pub.
- Adams, M (1990) *Beginning to read: thinking and learning about print* The MIT Press. Cambridge: Massachusettes
- Aguiar, L, and Brady, S (1991) Vocabulary acquisition and reading ability In B. Pennington, (Ed.) pp. 413-425 *Reading disabilities: genetic and neuropsychological influences* Dordrecht: Holland Kluwer Academic Pub.
- Allport, A., MacKay, D. Prinz, W.; and Sheerer E. (Eds) *Language perception and Production: Relationships between listening, speaking, reading, and writing.* London: Academic Press
- Astington, J. (1990) Narrative and the child's theory of mind. In B. Britton and A.D. Pelligrini *Narrative thought and Language* N.J.: Lawrence Erlbaum
- Allport, A. MacDay, D. Prinz, W. and Sheerer, E (1987) (Eds) *Language perception and production: Relationships between listening, speaking, reading, and writing.* London: Academic Press
- Bacon, R. (1987) *The Bay* Sydney: Ashton Scholastic
- Baillie, A. (1996) *Dragon Quest* Sydney: Scholastic
- Bakker, D. and Light, R. (1986) Learning to read: Changing horses in mid-stream. In G. Pavlidis and D. fisher, (Eds) *7 Dyslexia: Its neuropsychology and treatment.* Chichester: John Wiley & Sons
- Ball, D. (1990) *Jeremy's Tail* Sydney: Ashton Scholastic
- Balota, D. (1990) The role of meaning in word recognition. In D. Balota, G. Flores d'Arcais, and K. Raynor (eds) *2 Comprehension processes in reading* Hillsdale: Lawrence Erlbaum
- Balota, D. Flores d'Arcais, G. and Raynor, K. (1990) (eds) *Comprehension processes in reading* Hillsdale: Lawrence Erlbaum
- Bamberg, M. (1997) (Ed) *Narrative development: Six approaches* New Jersey: Lawrence Erlbaum Ass.
- Bandura, A. (1986) *Social foundations of thought and action.* New Jersey: Prentice Hall, Inc.
- Barr, R., Kamil, M., Mosenthal P. and Pearson, P. (Eds) *Handbook of Reading Research Volume 11* N.Y.: Longman Pub. Group
- Barrett, M. , Huisingh, R. , Zachman, L. , Blagden, C. and Orman, J. (1992) *The listening test* East Moline: Lingui Systems.
- Bermudez, J. (1998) *The paradox of self-consciousness* Cambridge: MIT Press
- Blair, S. (1981) *The Three Billy Goats Gruff* Gosford: Ashton Scholastic
- Blumsack, J., Lewandowski, L. and Waterman, B. (1997) Neurodevelopmental precursors to Learning Disabilities: A preliminary report from a parent survey. *Journal of Learning Disabilities* 30 (2), 228-237
- Britton B. and Pelligrini A.D. (1990) (Eds) *Narrative thought and Language* N.J.: Lawrence Erlbaum
- Bruner, J.(1997) Labov and Waletzky, thirty years on. In A. McCabe (ed) *Journal of narrative and life history,* 7 Nos, 1-4 pp.61-68 Lawrence Erlbaum Ass.

- Bruner, J., Lucariello, J. (1989) (2) 73-97 Monologue as narrative recreation of the world. In K. Nelson, (Ed) *Narratives from the crib* Cambridge: Harvard Uni. Press
- Burnett, F. H. (1888) *Sara Crewe; or, What happened at Miss Minchin's and Editha's Burglar*. London: Frederick Warne and Co.
- Butt, D. Fahey, S. Feez, S. Spinks, S. and Yallop, C. (2000) *Using Functional grammar An Explorer's Guide 2nd*. Ed. Sydney: National Centre for English Language Teaching and Research Macq. Uni.
- Carlisle, J. (1999) Free recall as a test of reading comprehension for students with Learning Disabilities *Learning Disability Quarterly* 22 pp11-22
- Cazden, C. (1997) Speakers, Listeners and speech events in issues of universality. In *Journal of Narrative and Life History* 7 Nos. 1-4 pp. 185-188
- Chase C., G. Rosen and G. Sherman, (1996) (Eds) Chap 8 *Developmental dyslexia Neural, cognitive and genetic mechanisms* Baltimore: York Press
- Ceci S. (1986) (Ed) *Handbook of cognitive, social and neuropsychological aspects of learning disability Vol. 1* Hillsdale: Lawrence Erlbaum
- Ceci S. (1987) (Ed) *Handbook of cognitive, social and neuropsychological aspects of learning disability Vol. 11* Hillsdale: Lawrence Erlbaum
- Christie, F. (1990) *Literacy for a changing world*. Australia:ACER
- Copeland, K. Winsor, P. and Osborn J. (1994) Phonemic awareness: A consideration of research and practice In F. Lehr and J. Osborn (Eds) *Reading, Language and Literacy: Instruction for the Twenty-First Century* N.J.: Lawrence Erlbaum Ass.
- Connor, F. and Olson, R. (1990) Reading comprehension in Dyslexic and normal readers: A component skills analysis Chap 26 In D Balota, D. Flores d'Arcais, and K. Raynor. (1990) (eds) *Comprehension processes in reading* Hillsdale: Lawrence Erlbaum
- Crain, S., and Shankweiler, D. (1990) Explaining failures in spoken language comprehension by children with Reading disability. Chap. 25 In D Balota, D. Flores d'Arcais, and K. Raynor. (1990) (eds) *Comprehension processes in reading* Hillsdale: Lawrence Erlbaum
- Curran, C., Kintsch, E. and Hedberg, N. (1996) Learning- disabled adolescents' comprehension of naturalistic narratives. *Journal of educational Psychology* Vol. 88 (3) pp.494-507
- Dore, J. (1989) Monologue as reenforcement of dialogue In K. Nelson (Ed) *Narratives From the Crib* Cambridge: Harvard Uni. Press
- Dunn, L.M. and Dunn, L. M. (1981) *Peabody picture vocabulary test – revised* Circle Pines, MN: American Guidance Service
- Edwards, (1997) Structure and function in the analysis of everyday narratives In A. McCabe and M. Bamberg (Eds) *Journal of Narrative and Life History* U.S.A.: Lawrence Erlbaum
- Eggins, S. (1994) *An introduction to systemic functional linguistics* London: Pinter
- Engel, S. (1995) *The stories children tell. Making sense of the narratives of childhood* New York: WH Freeman and Co.
- Fawcett, A, and Nicholson, R. (1994) Naming speed in children with Dyslexia *Journal of Learning disabilities* Vol. 27 (10) pp.641-646
- Fawcett, A, and Nicholson, R. (1992) Automatisation deficits in balance for dyslexic children *Perceptual and Motor Skills*, 75, p.507-529

- Francis, D., Shaywitz, S., Stuebing, K., Shaywitz, B., and Fletcher, J. (1996) Developmental lag versus deficit models of reading disability: A longitudinal, individual growth curve analysis *Journal of educational Psychology* Vol. 88 (1) pp.3-17
- Freedle, R. (1979) (Ed) *New Directions in discourse processing Vol. 2* Norwood NJ: Ablex Pub. Co.
- Freedle, R. and Hale, G. (1979) Acquisition of new comprehension schemata for expository prose by transfer of a narrative schema In R. Freedle (1979) (Ed) *New Directions in discourse processing Vol. 2* Norwood NJ: Ablex Pub. Co.
- Gathercole, S., and Baddeley, A. (1989) Evaluation of the role of phonological STM in the development of vocabulary in children: A longitudinal study *Journal of Memory and Language* 28, pp. 200-213
- Gee, J. (1997) Thematized echoes . In A. McCabe, and M. Bamberg (Eds) *Journal of Narrative and Life History* 7 Nos. 1-4 pp 189-196
- Gerot L., and Wignell, P. (1994) *Making Sense of functional grammar* Australia: Gerd Stabler Antipoean Ed. Enterprises
- Gibson, J. (1979) *The Ecological Approach to Visual Perception* Boston: Houghton Mifflin Co.
- Gibson, J.(1982) *Reasons for Realism Selected Essays of James J. Gibson* (Eds) E. Reed and R. Jones Hillsdale: Lawrence Erlbaum
- Goodwin, (1997) Towards families of stories in context In A. McCabe and M. Bamberg (Eds) *Journal of Narrative and Life History* U.S.A.: Lawrence Erlbaum
- Graesser, A; Golding, J. and Long, D. (1991) Narrative Representation and Comprehension In R. Barr, M. Kamil, P. Mosenthal and P. Pearson (Eds) *Handbook of Reading Research Volume 11* N.Y.: Longman Pub. Group
- Graves, M., van den Broek, P. and Taylor B.(Eds) *The first R. Every child's right to read* NY: Teachers College Press
- Grodin M. and Gantz L. (Eds) *Children as research Subjects* USA: Oxford Uni Press
- Halford, G. (1993) *Children's Understanding: The Development of Mental Models* New Jersey: Lawrence Erlbaum
- Halliday, M.A.K. (1975) *Learning How to Mean – Explorations in the Development of Language* London: Edward Arnold Ltd.
- Halliday, M.A.K. (1978a) *Language as Social Semiotic: The social interpretation of language and meaning* London: Arnold
- Halliday, M.A.K. (1978b) 'Meaning and the construction of reality in early childhood. Chap. 5 In H.L. Pick and E. Saltzman (eds) *Modes of perceiving and processing of information* Hillsdale: Erlbaum
- Halliday, M.A.K. (1988) 'Language and socialization: Home and school' In L. Gerot, J. Oldenburg and T. Van Leeuwen (eds) *Language and Socialisation: Home and School: Proceedings from the Working Conference on Language in Education Macquarie Uni 17-21 Nov. 1986, 1-12*
- Halliday, M.A.K. (1991) Linguistic perspectives on literacy – a systemic-functional approach Chap. 1 in F. Christies's (Ed) *Literacy in Social Processes* Australia: Centres for study of language in education
- Halliday, M.A.K. (1993) Towards a language based theory of learning *Linguistics and Education* 5, 93-116

- Halliday, M.A.K. (1994) *An Introduction to Functional Grammar*, 2nd. Ed. London: Edward Arnold
- Halliday, M.A.K., Gibbons, J. and Nicholas, H. (1990) (Eds) *Learning, Keeping and Using language* Vol. 1 Amsterdam: John Benjamins
- Halliday M.A.K. and Hasan, R (1976) *Cohesion in English* London: Longman
- Halliday M.A.K. and Hasan, R. (1985) *Language Context and Text: Aspects of Language in a Social Semiotic Perspective* Victoria: Deakin Uni. Press
- Hammond, J. (1990) Is learning to read and write the same as learning to speak? In F. Christie (Ed) *Literacy for a Changing World* Australia: ACER
- Harnadek, M. and Rourke, B. (1994) Principle identifying features of the syndrome of Nonverbal learning disabilities in children *Journal of Learning disabilities* Vol. 7 No. 3 p. 144-154
- Heath, S. and Branscombe, A. (1986) The book as narrative prop in language acquisition In B. Schieffelin, and P. Gilmore (Eds) *The Acquisition of literacy: Ethnographic perspectives* Norwood, NJ: Ablex
- Hoff-Ginsberg, E. (1997) Frog stories from four-year-olds: Individual differences in the expression of referential and evaluative content In A. McCabe and M. Bamberg (Eds) *Journal of Narrative and Life History* U.S.A.: Lawrence Erlbaum
- Johnstone, B. (2002) *Discourse Analysis* Masechuttus: Blackwell
- Kail, R. (1989) The locus of word finding problems in language-impaired children, In P. Soloman, G. Goethals, C. Kelly, and B. Stephens (Eds) *Memory: Interdisciplinary approaches*. N.Y.: Springer-Verlag
- Soloman, P. G. Goethals, C. Kelly, and B. Stephens (Eds) *Memory: Interdisciplinary approaches*. N.Y.: Springer-Verlag
- Karmiloff-Smith, A. (1992) *Beyond Modularity. A developmental Perspective on Cognitive Science* Cambridge: Bradford Book, MIT Press
- Karmiloff K. and Karmiloff-Smith, A. (2001) *Pathways to Language From Fetus to Adolescent* Cambridge: Harvard Uni Press
- Kass, C. and Maddox, C. (1993) *A Human Development View of Learning Disabilities* Springfield: Charles C. Thomas, Pub.
- Kavale, K. and Mattson, D. (1983) "One Jumped off the balance beam" Meta-analysis of perceptual motor training *Journal of Learning disabilities* Vol. 16 No. 3 p. 165-173
- Kelly, B. (1998) Dyslexia/reading difficulty: reassessing the evidence for a developmental model *Educational research* Vol. 40 No. 1 p.3-14
- Kintsch, W. (1998) *Comprehension A paradigm for Cognition* N.Y.: Cambridge Uni Press
- Kolb, B. and Wishaw, I. (1990) *Fundamentals of Human Psychology* 3rd. Ed. N.Y. W.H. Freeman and Co.
- Koocher, G. and Keith-Speigel, P. (1994) Scientific issues in psychological and educational research with children. In M. Grodin and L. Gantz (Eds) *Children as research Subjects* USA: Oxford Uni Press
- Korkman, M. and Pesonen, A. (1994) A comparison of neuropsychological test profiles of children with Attention Deficit-Hyperactivity Disorder and/or Learning disorder. *Journal of Learning Disabilities*. Vol. 27, No. 6 p. 383-392
- Labov, W. (1972) *Sociolinguistic patterns*. Philadelphia: University of Pennsylvania Press

- Labov, W. (1997) Some further steps in narrative analysis In A. McCabe, and M. Bamberg (Eds) *Journal of Narrative and Life History* 7 Nos. 1-4 NJ: Lawrence Erlbaum
- Labov, W. and Walatzky, J. (1997) Narrative analysis: Oral versions of personal experience In A. McCabe, and M. Bamberg (Eds) *Journal of Narrative and Life History* 7 Nos. 1-4 NJ: Lawrence Erlbaum
- Loban, W. (1976) *Language development K. through to Grade 12* USA: NCTE
- Locke, J. (1994) Gradual emergence of developmental language disorders *Journal of speech and hearing research* Vol. 37, p. 608-616
- Lehr F. and J. Osborn (Eds) *Reading, Language and Literacy: Instruction for the Twenty-First Century* N.J.: Lawrence Erlbaum Ass.
- Luria, A. R. (1976) *Cognitive Development. It's Cultural and Social Foundations* London: Harvard Uni. Press
- MacKay, D. (1987) Constraints on theories of sequencing and timing perception and production Chap. 18 in A Allport, D. MacKay, W. Prinz, and E. Sheerer (Eds) *Language perception and Production: Relationships between listening, speaking, reading, and writing*. London: Academic Press
- McCabe A. and Bamberg M. (Eds) (1997) *Journal of narrative and life history* U.S.A.: Lawrence Erlbaum
- Mahy, M. (1984) *Wibble-Wobble* New Zealand: Shortland Pub.
- Martin, J. R. (1992) *English Text: System and structure* Amsterdam: John Benjamins Pub. Co.
- McNaughton, (1995) *Here Come the Aliens* London: Walker Books
- McTear, M. (1985) *Children's Conversation* Oxford: Basil Blackwell
- Merriam, S (1998) *Qualitative research and case study applications in education* USA: Jossey-Bass
- Michaels, S. and Cazden, C. (1986) Teacher/child collaboration as oral preparation for literacy. Chap. 7 In B. Schieffelin, and P. Gilmore (Eds) *The Acquisition of literacy: Ethnographic perspectives* Norwood, NJ: Ablex
- Milne, A. A. (1928) *The House at Pooh Corner* London: Egmont Books
- Murdock, B. (1995) Primacy and recency in the chunking model. In C. Weaver, S. Manns, and C. Fletcher (Eds) *Discourse comprehension Essays in honor of Walter Kintsch* New Jersey: Lawrence Erlbaum
- Nelson K. (1989) (Ed) *Narratives from the Crib* Cambridge: Harvard Uni. Press
- Nelson K. (1989) Remembering: A functional developmental perspective. In P. Soloman, G. Goethals, C. Kelley, and B. Stephens (Eds) *Memory: Interdisciplinary approaches*. NY: Springer-Verlag
- Nelson, K. (1996) *Language in cognitive development: Emergence of mediated mind* Cambridge: Cambridge Uni. Press
- Nelson, K. and Levy E. (1987) Development of referential cohesion in a child's monologues. In R. Steele and T Threadgold (Eds) *Language Topics (Vol. 1 p. 119- 136)* Philadelphia: John Benjamins
- Nicholson, R. I. and Fawcett, A. J. (1990) Automaticity: A new framework for Dyslexia research? *Cognition*, 35 p. 159-182

- Nicoloupou, A. (1997) Labov's legacy for narrative research- Its ironies In A. McCabe, and M. Bamberg (Eds) *Journal of Narrative and Life History* 7 Nos. 1-4 NJ: Lawrence Erlbaum
- Oldenberg, J. (1990) Learning the language and learning through language in early childhood. In M.A.K. Halliday, J. Gibbons, and H. Nicholas (Eds) *Learning, Keeping and using language: Selected papers from the Eighth World Congress of Applied Linguistics, Sydney, 16-21 August 1987* (p. 27-38) Philadelphia: John Benjamins
- Painter, C. (1999) *Learning through language in early childhood* London: Cassell
- Pennington B. (Ed) *Reading Disabilities: Genetic and Neuropsychological influences* Dordrecht: Kluwer Academic Pub.
- Perfetti, C. and Britt, M. (1995) Where do propositions come from? In C. Weaver, S. Mannes and C. Fletcher (Eds) *Discourse comprehension Essays in honor of Walter Kintsch* New Jersey: Lawrence Erlbaum
- Poikkeus, A., Ahonen, T., Narhi, V., Lyytinen, P. and Rasku-Puttonen, H. (1999) Language problems in children with learning disabilities: Do they interfere with maternal communication? *Journal of Learning disabilities* Vol. 32, No. 1 p. 22-35
- Prater, J. (1985) *The Gift* England: Puffin Books
- Rogoff, B., Mistry, J., Goncu, A. and Mosier, C. (1993) Guided participation in cultural activities by toddlers and caregivers. *Monographs for the society for research in child development*. Vol. 58, No. 8 1993
- Ross, T. (1984) *I'm coming to get you* London: Andersen
- Ross, T. (1989) *I want a cat* London: Andersen
- Ross, T. (1989) *I want a cat and other stories* (Video) London: Andersen
- Roth, F., Spekman, N. and Fye, E. (1995) Reference cohesion in the oral narratives of students with learning disabilities and normally achieving students. *Learning Disability Quarterly*. Vol. 118, p. 25-40
- Rothstein, A. Benjamin, L., Crosby, M. and Eisenstadt K. (1988) *Learning Disorders: An integration of neuropsychological and psychoanalytic considerations*. Madison: International Press Inc.
- Rourke, B. (1989) *NLD The syndrome and the model* NY: Guilford Press
- San Miguel, S. Forness, S. and Kavale, K. (1996) Social skills deficits in learning disabilities: The psychiatric comorbidity hypothesis. *Learning disability Quarterly*. Vol. 9 p. 252-260
- Scarborough, H. (1991) Antecedents to reading disability: Preschool language development and literacy experiences of children from dyslexic families. In B. Pennington (Ed) *Reading Disabilities: Genetic and Neuropsychological influences* Dordrecht: Kluwer Academic Pub.
- Schegloff, E. (1997) "Narrative analysis" Thirty years later In A. McCabe, and M. Bamberg (Eds) *Journal of Narrative and Life History* 7 Nos. 1-4 NJ: Lawrence Erlbaum
- Schiffrin, D. (1997) Stories in answers to questions in research interviews In A. McCabe, and M. Bamberg (Eds) *Journal of Narrative and Life History* 7 Nos. 1-4 NJ: Lawrence Erlbaum
- Schiefflin, B. and Gilmore P. (1986) (Eds) *The Acquisition of literacy: Ethnographic perspectives* Norwood, NJ: Ablex

- Scribner, S. (1979) Modes of thinking and ways of speaking: Culture and logic reconsidered Chap. 9 In R. Freedle (1979) (Ed) *New Directions in discourse processing Vol. 2* Norwood NJ: Ablex Pub. Co.
- Seymour, P. (1990) Semantic processing in Dyslexia Chap 27 In D. Balota, G. Flores d'Arcais, K. Raynor (eds) *Comprehension processes in reading*. Hillsdale: Lawrence Erlbaum
- Spear, L. and Sternberg, R. (1987) An information processing framework for understanding reading disability. In S. Ceci (Ed) *Handbook of cognitive, social and neuropsychological aspects of learning disability Vol. 11* Hillsdale: Lawrence Erlbaum
- Soloman, P., Goethals, G., Kelley, C., and Stephens B. (Eds) *Memory: Interdisciplinary approaches*. NY: Springer-Verlag
- Stanovich, K. (1988) Explaining the differences between Dyslexic and garden-variety poor reader: The phonological-core variable-difference model *Journal of Learning disabilities*, 21, p. 590-612
- Stanovich, K. (1993/94) Romance and reality *The reading Teacher Vol. 47, No. 4* p. 280-291
- Steele R. and Threadgold T. (Eds) *Language topics: Essays in honor of Michael Halliday, Vol. 1* p. 177-99 Amsterdam: Benjamins
- Stein, J. (1991) Hemispheric specialization and dyslexia. In B. Pennington (Ed) *Reading Disabilities: Genetic and neuropsychological influences* Dordrecht: Kluwer Academic Pub.
- Stein, N.L. and Glenn, C. G. (1979) An analysis of story comprehension in elementary school children. In R. O. Freedle (Ed) *New directions in discourse processing (Vol. 2, p. 53-120)* Norwood NJ: Ablex
- Stothard, S., Snowling, M. and Hume C. (1996) Deficits in phonology but not dyslexic? *Cognitive Neuropsychology 13 (5)* p. 641-672
- Swanson, H. (1994) Short-term memory and working: Do both contribute to our understanding of academic achievement in children and adults with learning disabilities *Journal of Learning disabilities Vol. 27 No. 1* p. 34-50
- Tallal, P., Miller, S. and Fitch, R. (1996) Neurobiological basics of speech: A case for the preeminence of temporal processing In C. Chase, G. Rosen and G. Sherman, (Eds) Chap 8 *Developmental dyslexia Neural, cognitive and genetic mechanisms* Baltimore: York Press
- Taylor, G. H., Anselmo, M., Foreman, A. L., Schatschneider, C. and Angelopoulos, J. (2000) Utility of kindergarten teacher judgments in identifying early learning problems *Journal of Learning Disabilities Vol. 33, No. 2* p. 200-210
- Torr, J. (1990) Learning the language and learning through language in early childhood. In M.A.K. Halliday, J. Gibbons, and H. Nicholas (Eds) *Learning, Keeping and Using Language Vol.1* Amsterdam: John Benjamins
- Trabasso, T. and Magliano, J. (1996) How do children understand what they read and what can we do to help them? In M. Graves, P. van den Broek, and B. Taylor (Eds) *The first R. Every child's right to read* NY: Teachers College Press
- Trevarthen, C. (1987) 'Sharing makes sense'. In R. Steele and T. Threadgold (Eds) *Language topics: Essays in honor of Michael Halliday, Vol. 1* p. 177-99 Amsterdam: Benjamins

- Turner, W., Herriman, M. and Nesdale, A. (1988) Metalinguistic abilities and beginning reading. *Reading Research Quarterly* Vol. 23, No. 2 p. 134-157
- Vygotsky, L. (1962) *Thought and language* E. Hanfmann and G. Vakar (Eds and Translators) NY: Wiley
- Vygotsky, L. (1978) *Mind in society. The development of higher psychological processes* M. Cole, V. John-Steiner, S. Scribner and E. Souberman (Eds) Cambridge: Harvard Uni. Press
- Vygotsky, L. (1986) *Thought and Language* Translator A. Kozulin Cambridge: The MIT Press
- Warren, W., Nicholas, D. and Trabasso, T. (1979) Event chains and inferences in understanding narratives Chap 2 In R. Freedle (1979) (Ed) *New Directions in discourse processing* Vol. 2 Norwood NJ: Ablex Pub.Co.
- Weaver, C. Manns, S. and Fletcher C. (Eds) *Discourse comprehension Essays in honor of Walter Kintsch* New Jersey: Lawrence Erlbaum
- Weinberger, J. (1996) A longitudinal study of children's early literacy experiences at home and later literacy development at home and school *Journal of Research in reading* Vol. 19 Issue 1 p. 14-24
- Ker Wilson, B. (1960) *The Stones of plouvenic and The Mortal bride* In *Fairy tales of France* London: Cassell
- Wolf, S. H. and Heath, S. B. (1992) *The braid of literature Children's worlds of reading* Cambridge: Harvard Uni. Press
- Worden, P. (1986) Prose comprehension and recall in disabled learners In S. Ceci (Ed) Chap 8 *Handbook of cognitive, social and neuropsychological aspects of learning disabilities* Vol. 1 Hillsdale: Lawrence Erlbaum
- Yopp, H. (1988) The validity and reliability of phonemic awareness tests. *Reading Research Quarterly* Vol. 23 No.2p.159-177

