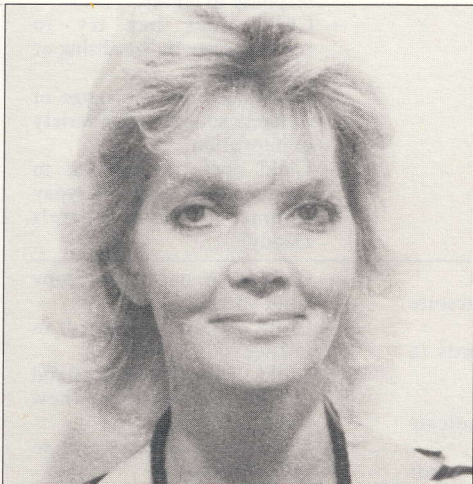


Speech and Language Disorders in Children

The Family Practitioner's Role

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Curriculum vitae

Brenda Louw graduated from the University of Pretoria with a BA (Log) in 1975. In 1977 she obtained an MSc (Speech Pathology) cum laude from the University of Alabama, USA; in 1980, a Tertiary Teaching Diploma and in 1986 a D Phil, both from the University of Pretoria. She has been a member of the staff of the Department of Speech Pathology and Audiology at the University of Pretoria since 1977, and teaches courses on speech and language disorders and cleft palate. She is a member of various local and USA speech therapy associations and has presented and published papers both locally and in the USA in the field of speech therapy. She is the editor of the South African Journal of Communication Disorders and a professional member of the self-help group, Cleft Pals. She is married and has a son aged 5.

One of the most fundamental, personal aspects of human life is the ability to communicate easily and effectively. Communication involves the process of expressing and receiving meaningful information. Acquisition of speech and language skills is essential to the development of communicative abilities.

Summary

A practical approach to the early identification of speech and language disorders in children is presented, as well as clear guidelines for referrals to the speech therapist.

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KEYWORDS: Speech disorders; Language disorders; Child; Physician, family; Referral and Consultation

According to Van Riper and Emerick¹ up to 7% of children exhibit a developmental speech and language disorder. Delayed speech and language skills may seriously hinder social, emotional, educational and vocational aspects of life. Early identification and treatment of these problems is essential.

The family practitioner plays a key role in early intervention of children with speech and language disorders. The first step most parents take when anxious about their child's communication development is usually to consult their family practitioner for advice. Timely referral to a speech therapist will improve the child's prognosis and early intervention will minimize the severity of the problem and prevent the development of secondary problems².

Normal Speech and Language Development

Four major factors contribute to the process of speech and language development in children: the physical ability to produce and hear speech; intellectual capacity for language learning; maturational readiness for language performance; and environmental stimulation.

Speech and Language Disorders

Table 1. Guidelines for Referral of Pre-School Children to a Speech Therapist

Age	Normal Development		Refer if: [†]
	Comprehension	Expression	
0-12 months	<p>Responds to speech by looking at speaker.</p> <p>Responds differently to aspects of speaker's voice (for example, friendly or unfriendly, male or female).</p> <p>Turns to source of sound.</p> <p>Responds with gesture to <i>Hello</i>, <i>Bye-bye</i> and <i>Up</i>, when these words are accompanied by appropriate gesture.</p> <p>Stops ongoing action when told <i>No</i> (when negative is accompanied by appropriate gesture and tone).</p>	<p>Makes crying and non-crying sounds.</p> <p>Repeats some vowel and consonant sounds (babbling) when alone or when spoken to.</p> <p>Interacts with others by vocalizing after adult.</p> <p>Communicates meaning through intonation.</p> <p>Attempts to imitate sounds.</p>	<ul style="list-style-type: none"> — Mother is not communicating with the child. — There are excessive difficulties in feeding due to oral motor problems. — Child is silent most of the time even when alone. — Child has not babbled or has stopped babbling. — Child shows no consistent response to noises. — Child does not try to communicate by vocalising or pointing. — Child does not use range of different sounds with a variety of intonation. — Child does not respond to single words and everyday comments, eg "where's Daddy?"
12-24 months	<p>Responds correctly when asked <i>where</i>, when question is accompanied by gesture.</p> <p>Understands prepositions <i>on</i>, <i>in</i>, and <i>under</i>.</p> <p>Follows request to bring familiar object from another room.</p> <p>Understands simple phrases with key words (for example, <i>Open the door</i>, or <i>Get the ball</i>).</p> <p>Follows a series of 2 simple but related directions.</p>	<p>Says first meaningful word.</p> <p>Uses single words plus a gesture to ask for objects.</p> <p>Says successive single words to describe an event.</p> <p>Refers to self by name.</p> <p>Uses <i>my</i> or <i>mine</i> to indicate possession.</p> <p>Has vocabulary of about 50 words for important people, common objects, and the existence, nonexistence, and recurrence of objects and events (for example, <i>more</i> and <i>all gone</i>).</p>	<ul style="list-style-type: none"> — Child does not try to copy adult speech. — Child is not interested in talking. — Child does not understand simple instructions, new words. — Child does not use words to indicate needs. — Child cannot identify objects and pictures of everyday items. — Child vocalizes and points but does not use recognizable single words.
24-36 months	<p>Points to pictures of common objects when they are named.</p> <p>Can identify objects when told their use.</p> <p>Understands question forms <i>what</i> and <i>where</i>. Understands negatives <i>no</i>, <i>not</i>, <i>can't</i> and <i>don't</i>.</p> <p>Enjoys listening to simple storybooks and requests them again.</p>	<p>Joins vocabulary words together in two-word phrases.</p> <p>Gives first and last name.</p> <p>Asks <i>what</i> and <i>where</i> questions.</p> <p>Makes negative statements (for example, <i>Can't open it</i>).</p> <p>Shows frustration at not being understood.</p>	<ul style="list-style-type: none"> — Child is unable to carry out two-step commands, eg "make Teddy sit down". — Child's vocabulary is not increasing. — Child is not joining words together, eg "Mummy drink". — Child's speech is difficult for mother to understand. — Child does not understand a wide range of different sentences. — Child is not asking questions and using a variety of sentences.
36-48 months	<p>Begins to understand sentences involving time concepts (for example, <i>We are going to the zoo tomorrow</i>.)</p> <p>Understands size comparatives such as <i>big</i> and <i>bigger</i>.</p> <p>Understands relationships expressed by <i>if . . . then</i> or <i>because</i> sentences.</p> <p>Carries out a series of 2 to 4 related directions.</p> <p>Understands when told, <i>Let's pretend</i>.</p>	<p>Talks in sentences of three or more words, which take the form agent-action-object (<i>I see the ball</i>) or agent-action-location (<i>Daddy sit on chair</i>).</p> <p>Tells about past experiences.</p> <p>Uses "s" on nouns to indicate plurals.</p> <p>Used "ed" on verbs to include past tense.</p> <p>Refers to self using pronouns <i>I</i> or <i>me</i>.</p> <p>Repeats at least one nursery rhyme and can sing a song.</p> <p>Speech is understandable to strangers, but there are still some sound errors.</p>	<ul style="list-style-type: none"> — Child has unintelligible speech. — Child has a poor vocabulary and sentence formation. — Child has difficulty in asking and answering questions. — Child has noticeable non-fluent speech.

Speech and Language Disorders

Table 1 (continued)

Age	Normal Development		Refer if: ⁴
	Comprehension	Expression	
48-60 months	Follows three unrelated commands in proper order. Understands comparatives like pretty, prettier, and prettiest. Listens to long stories but often misinterprets the facts. Incorporates verbal directions into play activities. Understands sequencing of events when told them (for example, <i>First we have to go to the store, then we can make the cake, and tomorrow we will eat it</i>).	Asks <i>when, how</i> and <i>why</i> questions. Uses modals like <i>can, will, shall, should</i> and <i>might</i> . Joins sentences together (for example, <i>I like chocolate chip cookies and milk</i>). Talks about causality by using <i>because</i> and <i>so</i> . Tells the content of a story but may confuse facts.	<ul style="list-style-type: none"> — Child is unable to relate a short sequence of events. — Child does not understand more complex sentences. — Child's speech is unintelligible. — Child has difficulty in relating to other children. — Child's non-fluency persists.
60-72 months	Demonstrates pre-academic skills.	There are few obvious differences between child's grammar and adult's grammar. Still needs to learn such things as subject-verb agreement, and some irregular past tense verbs. Can take appropriate turns in a conversation. Gives and receives information. Communicates well with family, friends, or strangers.	<ul style="list-style-type: none"> — Child uses simple sentences. — Child does not understand more complex sentences. — Child exhibits speech errors eg /s r/ — Child is a poor communicator, eg makes poor eye contact; does not take turns, cannot repair communication breakdown. — Child's non-fluency persists.

Speech and language develops in a definite pattern and this pattern correlates closely with the sequential development of social, self-help, cognitive, hearing and motor skills. The child learns to communicate before he has acquired speech and language and development continues to adolescence³. Table 1 provides a broad overview of pre-school speech and language development.

Almost 7% of all children show a speech disorder

Causes of Delayed or Disordered Speech and Language Development

Delayed speech and language skills are demonstrated by children who follow an orderly pattern of development but a slower than normal rate. Children who do not follow an orderly pattern when learning language are usually classified as language disordered.

Causes of a speech and language delay or disorder are numerous, eg physical factors, intellectual factors and environmental factors have been identified in the literature as causes of a communication disorder¹.

The reason for delayed or disordered speech and

language development cannot always be determined. Frequently a combination of causes may contribute to a child's problem or the speech and language disorder or delay may be secondary to a problem experienced in the past but which no longer exists.

Identification

Children with a speech and language delay or disorder can be identified by listening to the parents. Parents have expertise in identifying a problem but seldom have the knowledge and conviction of which steps to take to confirm and treat the problem.

According to Cash, et al⁴ any anxiety expressed by the parents deserves the time needed to consult developmental guidelines. (See Table 1.) Referral to a speech therapist can then be undertaken if necessary. Early intervention achieves the best results².

Early intervention will minimize problem drastically

What Happens Next?

When a child is referred to a speech therapist the child is assessed in the areas relevant to

communication development. Baseline functioning is determined in order to describe the developmental level of the child in the assessment areas, to verify the existence of a communication problem and to describe the nature and degree of the delay or disorder. This data is then utilized to design an individual therapy plan. Therapy is usually carried out on a weekly basis with an accompanying home-programme. Frequent re-assessments are done to determine progress and adapt the treatment programme is necessary.

Parents will almost always identify the problem – listen to them!

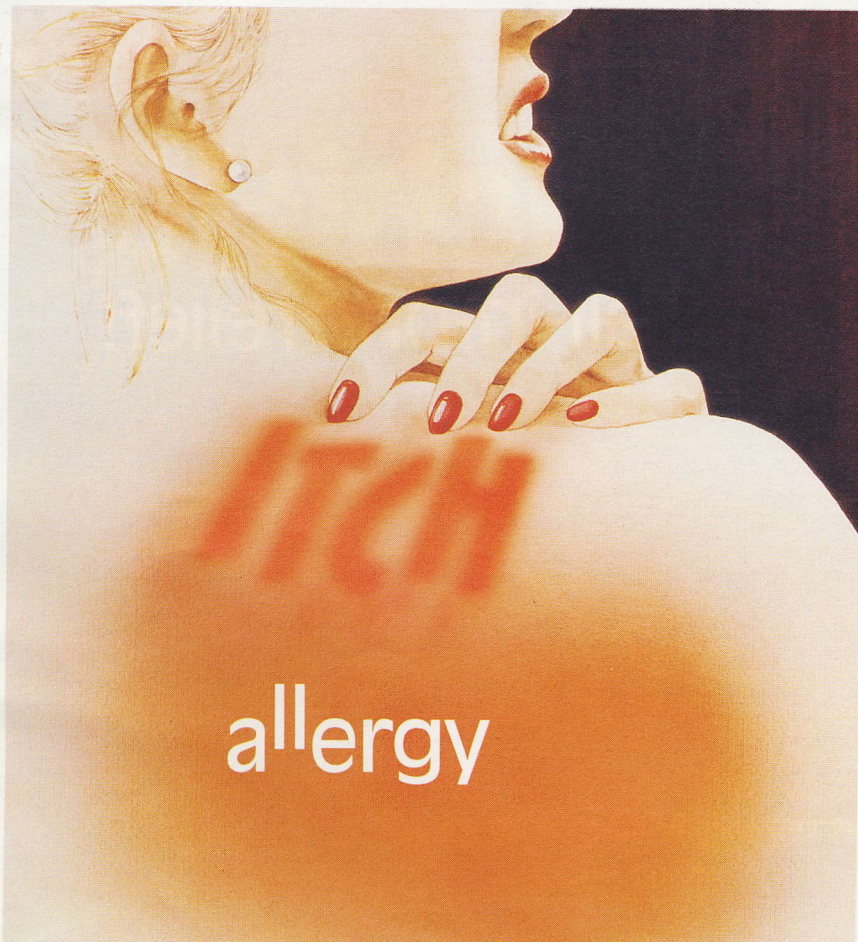
Conclusion

Children with a speech and language delay or disorder are often only identified when they reach school-going age⁵. At this stage the critical language learning period has passed and language programmes do not always compensate for lost time during normal development.

The family practitioner can play an important role in the prevention of more debilitating communication disorders by making early referrals to the speech therapist. The family practitioner has an important contribution to early intervention which allows for a child with a communication problem to develop to his full potential.

References

1. Van Riper C, Emerick L. Speech Correction: An Introduction to Speech Pathology and Audiology. Prentice Hall Inc, 1984: 117-43
2. Louw B. Kommunikasie-evaluasie van jong kinders. Communiphon 1986; 270: 2-38
3. Owens RE. Language Development. Charles E Merrill, 1984: 229-64
4. Cash J, Green EK, Russel VJ. Speech and Language Development and its problems. The Practitioner 1987; 231: 1198-202
5. Aram D, Nation J. Preschool Language Disorders and Subsequent Language and Academic Difficulties. J Communication Dis 1980; 13: 159-70



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