

A Child's Journey to Bilingualism
Simultaneous Dual Language Development
by Grace M. Libardo Alvarez, M.S., CCC-SLP

The myths and misconceptions regarding bilingual development are widespread. Our ability to separate outdated research and myths from empirically supported data is dependent upon a solid foundation of knowledge of bilingual development. This article will focus on establishing this foundation by describing research around the following key issues: paths to bilingualism, advantages to bilingual development, describing developmental milestones of simultaneous dual language learners, and tips for raising a simultaneous bilingual child.

Paths to Bilingualism:

The journey to bilingualism can take two paths:

1. *The Sequential Bilingual* - A child begins the process of second language (L2) acquisition after the first language (L1) is established (typically after the age of three)
2. *The Simultaneous Bilingual* - A child learns two languages simultaneously from infancy. The simultaneous bilingual can be further divided into two groups:
 - a) *The Simultaneous Bilingual from a majority ethnolinguistic community:*
The language and culture of the majority are either formally or unofficially recognized as "official", while the acquisition of L2 is supported and valued (e.g. English/French in Montreal). These children are likely to achieve a high degree of bilingual proficiency.
 - b) *The Simultaneous Bilingual from a minority ethnolinguistic community:*
The language and culture of the group is not reflected in the community at large and in most cases, is not supported or valued (e.g. speakers of any other language other than English in the USA). These children need numerous enriched opportunities to speak and be exposed to the non-majority language in order to reach proficiency.

The focus of this article will be on the typical language development of a simultaneous dual language learner from a majority environment.

Advantages in Bilingual Development

I'd be preaching to the choir if I began by listing all the benefits of being bilingual in today's society. I will instead highlight the cognitive advantages by summarizing research on bilingual children when compared to monolingual children. Cognition includes mental processes such as attending, memory, categorizing, planning, reasoning, and problem-solving.

Contrary to the theory that exposing an infant to two languages is cognitively burdensome, the capacity for dual language learning is an innate aptitude. The theory that infants have a biological capacity for multilingualism has been supported by recent findings. Speech-perception research indicates that infants exposed to two languages can discriminate between the sounds of the two languages (Bosch and Sebastian-Galles, 2001). Infants are able to recognize these differences long before they begin to produce them. There is strong evidence that babies have a highly tuned auditory discrimination capacity.

This aptitude for auditory discrimination is later reflected in bilingual babies' utterances. The babblings of infants are language specific when interacting with each parent in a one-parent, one-language environment (Maneva and Genesee, 2002). For example, an infant will babble using Spanish sounds when interacting with her Spanish-speaking father; that same infant will use English sounds when interacting with her English-speaking mother. Older bilingual children show greater aptitude for thinking about and analyzing language when compared to monolingual peers. They demonstrate the use of more cognitive strategies and flexibility in the use of these strategies in problem solving tasks (Pearl and Lambet, 1962; Bialystok, 2001; Cummins, 1976, Hakuta, 1986). This ability to reflect on and manipulate the elements of language correlates with later success in literacy (Adams, 1990). In addition, bilingual children have better selective attention, a skill important in situations where it is necessary to filter out irrelevant information (Bialystok, 2001). It is important to note that these advantages appear in dual language learners who are in an additive bilingual environment. That is, one which supports and values bilingual skills.

Early Development in Simultaneous Dual Language Learners

There are two theories about how children deal early on with dual language development. One is called the Unitary Language System Hypothesis (Volterra and Traute, 1978). The more recent theory is The Dual Language System Hypothesis (Genesee, 2004).

The Unitary Language System Hypothesis divides early development into three stages:

- Stage One - L1 and L2 comprise one language system until approximately 3 years of age.
- Stage Two - L1 vocabulary separates from L2 but the grammar remains as one language
- Stage Three - The language systems become differentiated. The child is fully bilingual

In contrast, Dual Language System Hypothesis holds that simultaneous learners separate L1 from L2 from the onset. The findings of subsequent research on vocabulary development support this theory. In early language development, monolingual children develop vocabulary with one:one correspondence; that is they only develop one term for each concept. The development of multiple terms for a concept (e.g. synonyms) does not emerge until much later. A bilingual child also develops vocabulary with one:one correspondence; however, he does so in *each* language. In turn, a bilingual child's use of words that have the same meaning in both languages (*translation equivalents*), is considered evidence that the languages have been separated into two systems. For example, a bilingual child learns that both "shoe" and "zapato" represent the same one concept. Translational equivalents are found at early stages of development, before a vocabulary of the first 50 words (Nicoladis and Genesee, 1996; Nicoladis and Secco, 2000; Pearson et al, 1995; Quay, 1995). Evidence of separate grammatical systems, some from the beginning of first word combinations also lend support for the Dual Language System Hypothesis (Paradis et al, 2000).

Later Development

There is no difference between the simultaneous dual language learner and the monolingual child in terms of the major developmental stages/pattern of language development. There are, however, some characteristic differences. All children make systematic errors in their utterances on their way to acquiring language (e.g. "me no want"). The utterances of dual language learners also contain *cross-linguistic* influences. There are two types of cross-linguistic influences: qualitative and quantitative. *Qualitative errors* are unique to bilingual development (e.g. relative clause error in Cantonese/English learner). *Quantitative errors* are those that appear in monolingual development but are more numerous in the utterances of bilingual learners (e.g. German/English bilingual with more errors in word order rules for German productions when compared to German speaking children). In general, quantitative errors are more common than qualitative errors. It is important to remember that these cross-linguistic influences are considered a normal part of dual language development and not a sign of a disorder, nor are they evidence that the child is experiencing difficulty with dual language development.

If the pattern of language development is relatively the same for simultaneous dual language learners as that of a monolingual learner, is that also true of the rate of development? Data on this area is limited and can not be considered normative. The research that has been done was conducted using small groups and case studies of individuals. Another consideration is that bilingual children are a highly heterogeneous group. With these caveats in mind, we can look at the findings to tell us what is possible.

It appears that for some grammatical structures (e.g. negative sentences and verb forms) simultaneous bilingual children exhibit the approximately same rate of development as monolingual children, with a high degree of variation due to individual characteristics and environmental variation (Paradis and Genesee, 1996; Paradis and Crago, 2001). There appears to be an exception when it comes to vocabulary development. The vocabulary measures of preschool and school age dual language learners are relatively lower than monolingual peers. However; when the vocabulary of both languages are combined and translational equivalents are only counted once, the measures are comparable to the monolingual norms (Pearson et al, 1993; Pearson, 1998).

Language Dominance and Language Input

One of the most influential factors in the rate of development in each language is the amount of input in each language. Of course the ideal is a 50-50 exposure. If there is less than 25% input, the child could acquire a

receptive understanding of social language (basic interpersonal) but is not likely to become a fluent speaker (Pearson et al, 1997). Dominant language is marked by longer mean length of utterance, use of more complex grammar, more variety of word types, and lower instances of pauses, restarts, and hesitation.

Tips for Families Raising a Simultaneous Dual Language Learner

The following tips have been extracted from a variety of current research articles and academic texts. For more information, please refer to the following sources: *Two or More Languages in Early Childhood* (article from the *International Association of Applied Linguistics*; 1999); *One Child, Two Languages* (Tabors, Patton; 2003).

- Ensure that your child is exposed to both languages frequently and in a variety of circumstances.
- Example: "One parent, one language" approach (one parents speaks *only* English to the child, the other speaks *only* Spanish to the child)
- Create opportunities for your child to use and hear both languages in a variety of contexts. Raising a bilingual child in the United States will require a conscious effort.
- Examples: Exposure to books, T.V, movies, cultural events, community gatherings, family gatherings, playgroups in *each* language.
- Talk to all of your children in the same way: If you speak Spanish only to one child, do the same with all your other children. This will prevent feelings of exclusion and maintain consistency.
- Encourage your child to respond to you in the same language you use with them. This will prevent a child from developing receptive language skills that exceed their expressive skills.
- If your child does not respond in the same language, encourage them to switch to the language by a) gently modeling their message into the language you want them to use, b) feign misunderstanding until he switches to the other language, or c) asking them to repeat their message in the preferred language.
- Avoid abrupt changes in language exposure (especially for children under age 6). Beware of "experts" that advise you to stop speaking a certain language to your child. This abrupt change can disrupt language development in *both* languages and has negative psychological implications.
- Do not punish or rebuke use or of lack of use of any language.
- Expose your child to both languages *from birth*. Studies have shown that even pre-natal language input impacts children's language development.
- If you feel your child is not talking the way he/she should, have a hearing test done, even if "experts" tell you that bilingualism is the cause of his/her difficulties. If you still have developmental concerns, do not accept that your child's difficulties are caused by dual language exposure. Have your child assessed by a professional knowledgeable about dual language development.