



# Evaluating Non- Standard Populations

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# Diversity of US

- ▶ At least 350 languages spoken in the US per the Census Bureau Report in 2015
- ▶ What are the most spoken languages other than English?
  - ▶ 1. Spanish- 40.5 million
  - ▶ 2. Mandarin- 3.4 million
  - ▶ 3. Tagalog- 1.7 million
  - ▶ 4. Vietnamese- 1.5 million
  - ▶ 5. Arabic- 1.2 million
  - ▶ 6. French- 1.2 million
  - ▶ 7. Korean- 1.1 million

Scamman, K. (2018). Interactive map of language spoken in the United States. Retrieved from <https://telelanguage.com/interactive-map-of-languages-united-states/>

United States Census Bureau. (2015). Census bureau reports at least 350 languages spoken in U.S. homes. Retrieved from <https://www.census.gov/newsroom/press-releases/2015/cb15-185.html>

## Most Frequent Non-English Languages Spoken at Home in the 50 U.S. States and District of Columbia

First Most Common



Second Most Common



Third Most Common



- |  |  |
|--|--|
| <span style="color: red;">■</span> Spanish   | <span style="color: blue;">■</span> Navajo   |
| <span style="color: pink;">■</span> Portuguese   | <span style="color: lightblue;">■</span> other languages of North America            |
| <span style="color: cyan;">■</span> French (including Cajun)                                   | <span style="color: green;">■</span> Chinese (including Mandarin and Cantonese)      |
| <span style="color: teal;">■</span> Haitian  | <span style="color: lightpurple;">■</span> Korean                                    |
| <span style="color: yellow;">■</span> German   | <span style="color: lightgreen;">■</span> Japanese                                   |
| <span style="color: lightyellow;">■</span> Yiddish, Penn. Dutch or other W. Germanic languages | <span style="color: lightcyan;">■</span> Tagalog (including Filipino)                |
| <span style="color: brown;">■</span> Polish  | <span style="color: purple;">■</span> Vietnamese                                     |
| <span style="color: darkred;">■</span> Russian   | <span style="color: magenta;">■</span> Hmong   |
| <span style="color: olive;">■</span> other Indo-European languages                             | <span style="color: orange;">■</span> Arabic   |
| <span style="color: gray;">■</span> Austronesian languages                                     | <span style="color: tan;">■</span> Amharic, Somali, and other Afro-Asiatic languages |

- ▶ At the end of 2017, ASHA represented 185,563 audiologists and speech pathologists, etc.
  - ▶ Only 6% indicated they met the definition of bilingual service providers, though even fewer were actually certified
  - ▶ Of this 6%, 64% were Spanish-language service providers
  - ▶ 80% of bilingual service providers were white
  - ▶ In total, 92% of ASHA's total membership and affiliation were white

	ASHA SLPS	AuDs	ASHA Total	ACS Language Use	English < Very Well	Non-Eng Home
Hawaii	20 3.9%	2 4.1%	23 4.1%	12.2%	26.5%	
Idaho	21 2.6%	4 6.6%	25 2.9%	4.2%	10.8%	
Illinois	425 5.2%	19 3.7%	450 5.1%	8.7%	22.9%	
Indiana	70 2.4%	7 2.4%	80 2.5%	3.3%	8.7%	
Iowa	15 1.3%	3 1.7%	20 1.4%	3.4%	7.7%	
Kansas	81 1.1%	1 0.1%	88 1.5%	1.8%	11.7%	

American Speech-Language Hearing Association (2018). Demographic profile of ASHA members providing bilingual services, year-end 2018 [PDF File]. Retrieved from <https://www.asha.org/uploadedFiles/Demographic-Profile-Bilingual-Spanish-Service-Members.pdf>



## A Diverse STDZ Sample: Race/Ethnicity

Race/Ethnicity	N	%
Asian	87	3.7%
Black	328	13.8%
Hispanic	476	20.0%
Other	137	5.8%
White	1352	56.8%
Total Sample	2380	100%

8 | Copyright 2013, Pearson Education and its Affiliates. All rights reserved.

PEARSON

Scheller, A. (2014). Understanding CELF-5 reliability & validity to improve diagnostic decisions [PDF File]. Retrieved from <http://downloads.pearsonclinical.com/videos/CELF-5/10-21-2014/Handout-CELF-5-Reliability-and-Validity.pdf>

How similar is the normative group to my population?

Year normative sample collected: 2012

Race/ethnicity

- 53.7% White; 46.3% Non-white

Parent education

- 40.7% Parent Education: 12 years or less
- 59.4% Parent Education: 13+ years

\*May not sum to 100% due to rounding

Year normative sample collected: 2002

Race/ethnicity

- 62.1% White; 37.9% Non-white

Parent education

- 45.5% Parent Education: 12 years or less
- 54.5% Parent Education: 13+ years

\*May not sum to 100% due to rounding

Race/ethnicity

Age norm sample:

- African American: 536
- Hispanic: 546
- White: 2,244
- Other: 214\*

Grade norm sample:

- African American: 316
- Hispanic: 318
- White: 1,243
- Other: 126\*

\* Includes American Indians, Alaska Natives, Asian Americans, Pacific Islanders, and all other groups not classified as African American, Hispanic, or White.

## EVT-2 and PPVT-4

Pearson Clinical. (n.d.). EVT-2 publication summary form [PDF File]. Retrieved from <https://images.pearsonclinical.com/images/Products/EVT-2/evt2.pdf>

Pearson Clinical. (n.d.). PPVT-4 publication summary form [PDF File]. Retrieved from <https://images.pearsonclinical.com/images/Products/EVT-2/evt2.pdf>

Pearson Clinical. (2011). PPVT-4 publication summary form publication data [PDF File]. Retrieved from <https://images.pearsonclinical.com/images/Products/GFTA-2/gfta2.pdf>

PLS-5

vs

CELF-P2

GFTA-2

Pearson Clinical. (n.d.). Which test is right for the youngest children on your caseload? [PDF File]. Retrieved from [http://images.pearsonclinical.com/images/assets/celfpreschool-2/pls-5-celf-5\\_comparison.pdf](http://images.pearsonclinical.com/images/assets/celfpreschool-2/pls-5-celf-5_comparison.pdf)


Race	African American: 16.4% (U.S. 15.7%) Hispanic: 15.7% (U.S. 15.7%) White: 64.1%; (U.S. 63.4%) Other: 3.8% (U.S. 5.1%)	African American: 14.6% (U.S. 15.7%) Hispanic: 15.8% (U.S. 15.7%) White: 65.4%; (U.S. 63.4%) Other: 4.2% (U.S. 5.1%)
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# African American English

- ▶ What are some differences between AAE and MAE?
- ▶ What problems might present themselves with standardized testing?
- ▶ Phonological
  - ▶ Consonant cluster reduction
  - ▶ /r, l/ phonemes are lessened or omitted
  - ▶ Occurrence of metathesis
  - ▶ Final consonant deletion
- ▶ Morphologic and Syntactic Characteristics
  - ▶ Omission of past tense endings
  - ▶ Present tense used regardless of person/number
  - ▶ Omission of to-be forms
  - ▶ Negation use is acceptable
- ▶ Some lexical differences


Roseberry-McKibbin, C., & Hedge, M.N. (2011). *An advanced review of speech-language pathology* (3<sup>rd</sup> ed.). Austin, TX: Pro-Ed, INC.



- 
- ▶ In a [study by Jackson and Green \(2005\)](#), groups of white and black children were shown a picture from Sesame Street in which Cookie Monster lay sick in bed without any cookies, and Elmo stood nearby eating a cookie. When asked "who is eating cookies?" the children all pointed to Elmo. When asked "who be eating cookies?" the black AAVE speakers pointed to Cookie Monster, while the European American children pointed to Elmo.
  - ▶ According to Roseberry-McKibbin and Hedge (2011): standardized testing is biased against speakers of AAE on the following tasks:
    - ▶ Grammatical judgment items
    - ▶ Sentence repetition tasks
    - ▶ Grammatical closure tasks
    - ▶ Receptive grammatical tasks
    - ▶ Articulation and phonological tasks

Jackson, J.E., & Green, L. (2005). Tense and aspectual be in children African American English. In H.J. Verkuyl, H. de Swart, & A. van Hout (Eds.), *Perspectives on Aspect* (Vol. 32, pp. 233-250). Netherlands: Springer.

Roseberry-McKibbin, C., & Hedge, M.N. (2011). *An advanced review of speech-language pathology* (3<sup>rd</sup> ed.). Austin, TX: Pro-Ed, INC.

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- ▶ “Due to lack of knowledge about AAE, teachers view speakers of AAE as:
    - ▶ Less intelligent
    - ▶ Less confident
    - ▶ Less likely to success than their standard-English speaking classmates”
    - ▶ “The findings revealed that European American students expressed a belief that African American Vernacular English is a negative and inferior dialect of English, while African American and Hispanic students expressed more favorable views of African American Vernacular English” (Tempii et al., 2012)

Tempii, B., Champion, T., Cobb-Roberts, D., & Bland-Stewart, L. (2012). Future educators' perceptions of African American vernacular English (AAVE). *Online Research Journals*, 1 (5), 80-89. Retrieved from [https://www.researchgate.net/publication/267802506\\_Future\\_Educators'\\_Perceptions\\_of\\_African\\_American\\_Vernacular\\_English\\_AAVE](https://www.researchgate.net/publication/267802506_Future_Educators'_Perceptions_of_African_American_Vernacular_English_AAVE)




# Bilingualism

# Bilingualism

- ▶ Myth- bilingualism is the cause of the speech/language delay
- ▶ FALSE! “Children with LLD [Language Learning Disability] can and do learn two languages effectively” (Roseberry-McKibben & Hedge, 2011)
- ▶ Language impairment in bilingual speakers is thought to be present in similar numbers to monolingual speakers, ~7% of children
- ▶ For children with LI, *delays have to be present in both languages*
- ▶ Must take into account:
  - ▶ how did the child learn L2: sequentially or simultaneously?
  - ▶ What language exposure and experience has the child had compared to her mainstream peers?
  - ▶ What is her difference between BICS and CALP?

Kohnert, K. (2010). Bilingual children with primary language impairment: Issues, evidence and implications for clinical actions. *Journal of Communication Disorders*, 43(6), 456-473. doi:10.1016/j.jcomdis.2010.02.002

Roseberry-McKibbin, C., & Hedge, M.N. (2011). *An advanced review of speech-language pathology* (3<sup>rd</sup> ed.). Austin, TX: Pro-Ed, INC.

- 
- ▶ BICS: Basic Interpersonal Communication Skills
    - ▶ Refers to “linguistic skills needed in everyday, social face-to-face interactions”
    - ▶ More typical OUTSIDE the classroom
    - ▶ ~6 mo-2 years
  - ▶ CALP: Cognitive-Academic Language Proficiency
    - ▶ “Focuses on proficiency in academic language or language used in the classroom in the various content areas”
    - ▶ More typical of IN the classroom
    - ▶ ~5-7 years

Roseberry-McKibbin, C., & Hedge, M.N. (2011). *An advanced review of speech-language pathology* (3<sup>rd</sup> ed.). Austin, TX: Pro-Ed, INC.

What are BICS and CALP? (n.d.) Retrieved from <https://www.colorincolorado.org/faq/what-are-bics-and-calp>



# Forms of Evaluations

# General Rules

- ▶ Use interpreters when needed
- ▶ Test above and below ceiling and basal if using a standardized test
- ▶ Reword task instructions
- ▶ Provide additional training and feedback on performance to ensure task comprehension
- ▶ Give students extra time to respond

Roseberry-McKibbin, C., & Hedge, M.N. (2011). *An advanced review of speech-language pathology* (3<sup>rd</sup> ed.). Austin, TX: Pro-Ed, INC.

# Detailed case history

- ▶ Make sure to determine history of second language exposure
- ▶ How does this child's language relate to peers? Siblings?
- ▶ Warning Signs:
  - ▶ Family history of learning problems
  - ▶ Communication problems at home
    - ▶ Vocabulary deficits
    - ▶ Relying on gestures more than speech
    - ▶ Slower language learning than siblings or peers
    - ▶ Syntactic problems
    - ▶ Difficulty with narrative language
    - ▶ Inappropriate social communication skills
    - ▶ Difficulty with processing
    - ▶ Slow academic achievement in spite of L2 proficiency
    - ▶ Lack of organization, structure, and sequence in spoken and written language

Pieretti, R.A., & Roseberry-McKibbin, C. (2015). Assessment and intervention for English language learners with primary language impairment: Research-based best practices. *Communication Disorders Quarterly*, 37 (2), 117-128. <https://doi.org/10.1177/1525740114566652>



# Ethnographic Interview

- ▶ ASHA Leader- How to give an ethnographic interview
- ▶ Different than a typical interview where you already know what information you need prior to the meeting
- ▶ With an ethnographic interview, the client/spouse/parent has the opportunity to select the most important information
  - ▶ “I don’t know much about the parents’ point of view...”
  - ▶ “I don’t know what the parents want for their child” (Westby, Burda, & Mehta, 2003)
- ▶ Ask open-ended questions
- ▶ Avoid “why” questions

Westby, C., Burda, A., & Mehta, Z. (2003). Asking the right questions in the right ways. The ASHA Leader, 8(8), 4-17. <https://doi.org/10.1044/leader.FTR3.08082003.4>

# Dynamic Assessment

- ▶ Can be used to assess word-learning, rule-learning, narratives
- ▶ Informally identifies a child's skills through **Pretest- Teach –Posttest**

Static	Dynamic
<ul style="list-style-type: none"><li>• Passive participants</li><li>• Examiner observes</li><li>• Identify deficits</li><li>• Standardized</li></ul>	<ul style="list-style-type: none"><li>• Active participants</li><li>• Examiner participates</li><li>• Describe modifiability</li><li>• Fluid, responsive</li></ul>

- Pretest
  - Assess child's current performance
- Teach
  - Using a mediated learning experience (MLE)
  - Help the child develop strategies
  - Observe the child's modifiability
- Post Test
  - Compare performance to pretest
  - Assess transfer of strategies

Dynamic Assessment. (n.d.). Retrieved from <https://www.asha.org/practice/multicultural/issues/dynamic-assessment/>

Dynamic Assessment: Basic Framework. (n.d.). Retrieved from <https://www.asha.org/practice/multicultural/issues/dynamic-assessment/>

# Language Sampling

- ▶ Make sure to use culturally appropriate test stimuli/topics
- ▶ If possible, compare to a community sample to compare results
- ▶ What is SALT? Systematic Analysis of Language Transcripts
  - ▶ MLU, number of different words, number of words per utterance, intelligibility, verbal rate and fluency, omissions, errors, etc.
  - ▶ More naturalistic, can be repeated frequently
  - ▶ \$150
  - ▶ More than 4000 speakers, 3-16
  - ▶ Can analyze writing, ASL, AAC users
  - ▶ Built in support for Spanish, English and French

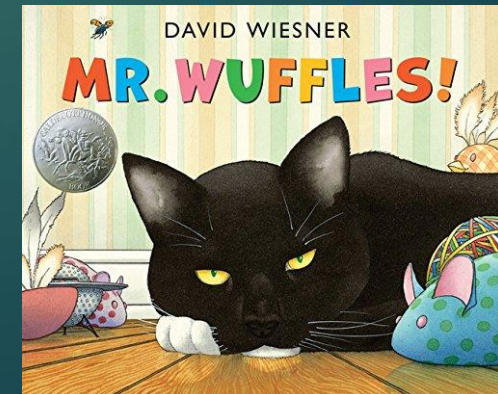
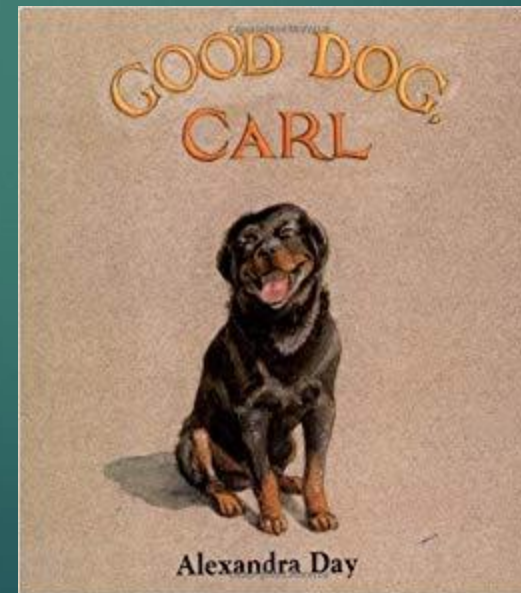
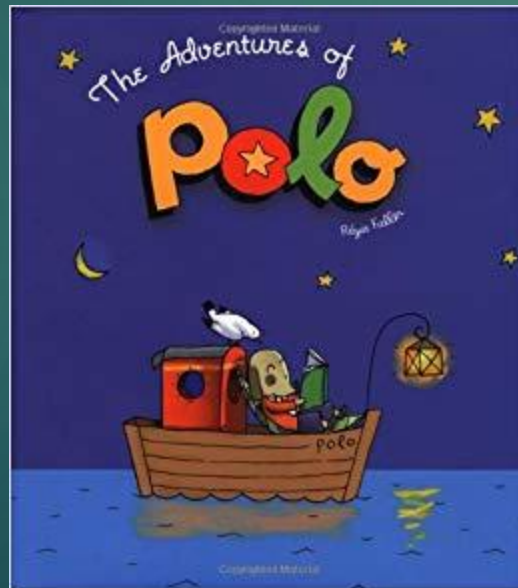
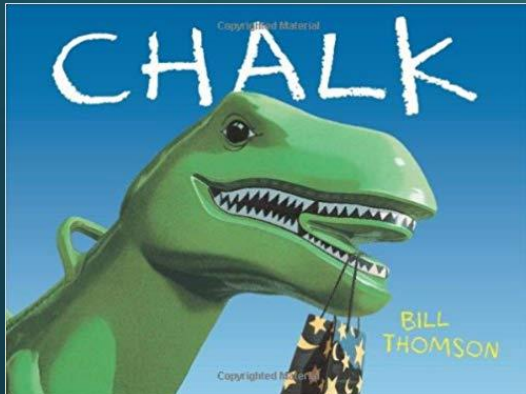
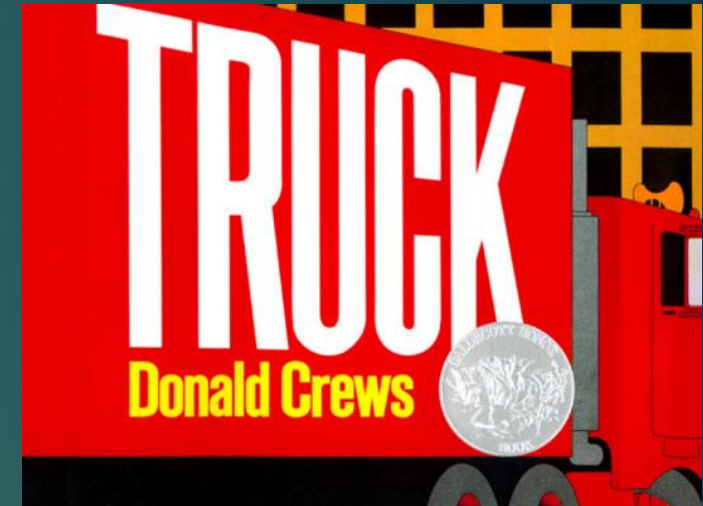
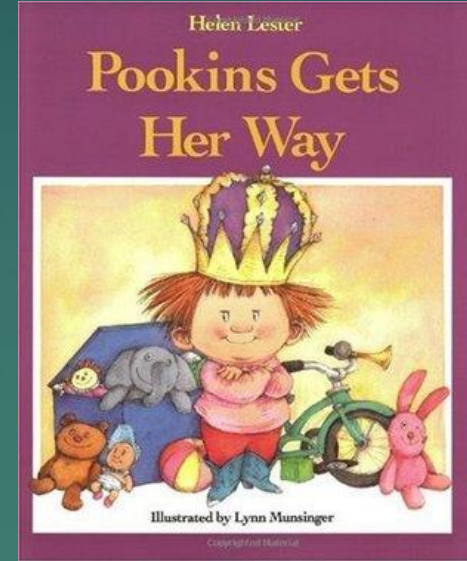
Miller, J.F., & Nockerts, A. (2011). Using SALT software to assess the language production of school-age children [Powerpoint Presentation]. Retrieved from <https://www.asha.org/Events/convention/handouts/2011/Miller-Nockerts/>

What is SALT? (n.d.). Retrieved from <https://www.saltsoftware.com/>

# Wordless picture books

[Reading Rockets- Favorite wordless books](http://www.readingrockets.org/booklists/our-favorite-wordless-picture-books) (<http://www.readingrockets.org/booklists/our-favorite-wordless-picture-books>)

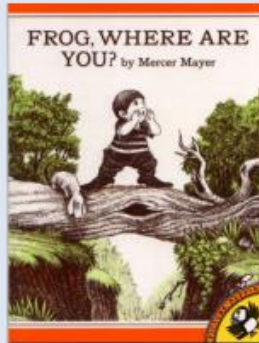
[Learning Press- Wordless picture books](https://blog.allaboutlearningpress.com/wordless-picture-books/) (<https://blog.allaboutlearningpress.com/wordless-picture-books/>)



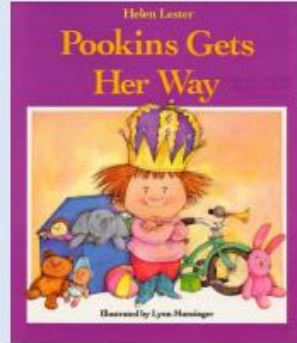


# Narrative Story Retell

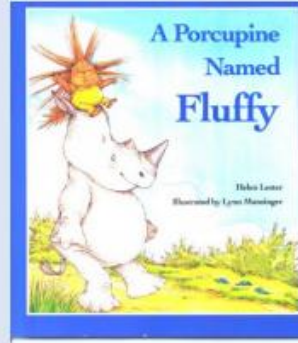
## Database Stories



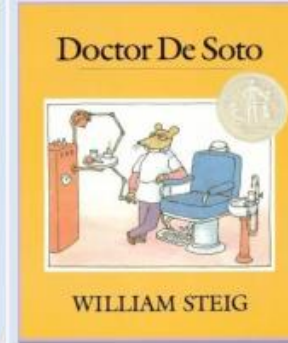
Grades: P, K, 1<sup>st</sup>  
Ages: 4;4 – 7;5  
145 Samples  
Ave time: 3.6 min



Grade: 2<sup>nd</sup>  
Ages: 7;0 – 8;11  
101 Samples  
Ave time: 4.2 min



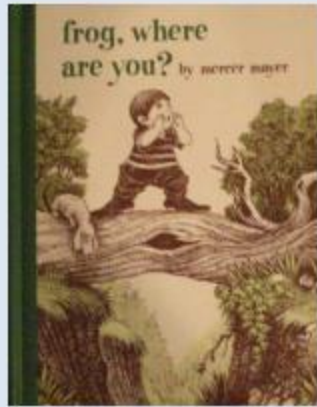
Grade: 3<sup>rd</sup>  
Ages: 7;11 – 9;11  
53 Samples  
Ave time: 4.2 min



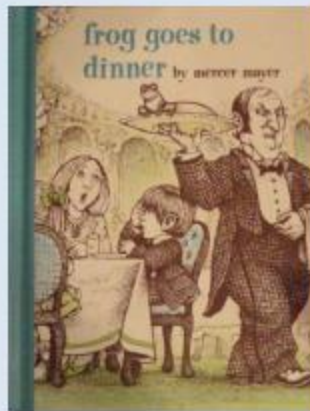
Grade: 4<sup>th</sup> - 6<sup>th</sup>  
Ages: 9;3 – 12;8  
201 Samples  
Ave time: 5.7 min

Miller, J.F., & Nockerts, A. (2011). Using SALT software to assess the language production of school-age children [Powerpoint Presentation]. Retrieved from <https://www.asha.org/Events/convention/handouts/2011/Miller-Nockerts/>

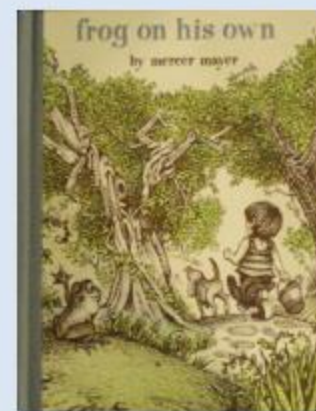
# Bilingual Spanish/English Story Retell Databases



Grades: K – 3<sup>rd</sup>  
Ages: 5;0 – 9;9  
2,070 Samples  
Ave time (E): 3.9 min  
Ave time (S): 3.8 min



Grade: K, 2<sup>nd</sup>  
Ages: 5;5 – 8;11  
1,667 Samples  
Ave time (E): 4.0 min  
Ave time (S): 3.9 min



Grade: 1<sup>st</sup>  
Ages: 6;0 – 7;9  
930 Samples  
Ave time (E): 4.3 min  
Ave time (S): 4.3 min



# Bilingual Spanish/English Unique Story Databases



Grades: K – 3<sup>rd</sup>

Ages: 5;0 – 9;7

475 Samples

Ave time (E): 3.5 min

Ave time (S): 3.7 min

- ▶ CLAN- Computerized Language Analysis
- ▶ Clinician's Guide

We have working MOR grammars for these languages:

- [Cantonese \(yue\)](#): This grammar was built by Brian MacWhinney, Sam Po Law, and Anthony Kong with additional help from a Cantonese-English lexicon provided by K. K. Luke.
- [Chinese \(zho\)](#): This grammar was built by Brian MacWhinney and Twila Tardif. Thanks to K. J. Chen and the CKIP Group of the Academia Sinica for the input lexicon
- [Chinese segmenter and Trad<->Simp converter](#)
- [Danish \(dan\)](#): This grammar is in preparation.
- [Dutch \(nld\)](#): This grammar was contributed by Steven Gillis.
- [English \(eng\)](#): This grammar was built by Brian MacWhinney and Mitzi Morris.
- [French \(fra\)](#): This is revised version of the grammar contributed by Christophe Parisse.
- [German \(deu\)](#): This grammar was developed by Nikolas Koch.
- [Hebrew \(heb\)](#): This grammar was developed by Aviad Albert, Bracha Nir, Shuly Wintner, Brian MacWhinney, and Ruth Berman.
- [Japanese \(jpn\)](#): This grammar was constructed by Norio Naka and Susanne Miyata. The distribution includes the Wakachi system from Susanne Miyata for grammatical reference.
- [Italian \(ita\)](#): This grammar was built by Livia Tonelli and Brian MacWhinney.
- [Spanish \(spa\)](#): This grammar was built by Brian MacWhinney.

Child Language Data Exchange System. (n.d.). Retrieved from <https://childes.talkbank.org/>

Ratner, N.B. , & Brundage, S.B. (2018). A clinician's complete guide to CLAN and PRAAT [PDF File]. Retrieved from <https://talkbank.org/manuals/Clin-CLAN.pdf>

# DELV- Diagnostic Evaluation of Language Variation- Screening Test

- ▶ “As the density of AAE linguistic features is greatest at lower socioeconomic levels (Stockman, 1999; Washington and Craig, 1998), this population was oversampled to ensure the most representative sample of AAE speakers” (“DELV Technical Report,” 2009)
- ▶ Provides two criterion-referenced scores:
  - ▶ Degree of Language Variation (4.0-12.11 yo)
  - ▶ Degree of Risk for a Language Disorder (4.0-9.11 yo)
- ▶ Syntax, Pragmatics, Semantics, Phonology

## Race/Ethnicity Breakout

African American	White	Hispanic	Other
65%	27%	7%	1%

DELV Technical Report [PDF File]. (2009). Retrieved from [https://images.pearsonassessments.com/images/tmrs/tmrs\\_rg/DELV\\_TR.pdf?WT.mc\\_id=TMRS\\_DELV\\_Technical\\_Report](https://images.pearsonassessments.com/images/tmrs/tmrs_rg/DELV_TR.pdf?WT.mc_id=TMRS_DELV_Technical_Report)

# DELV Criterion Referenced

- ▶ “DELV Criterion Referenced is appropriate for use with any child who speaks English as his or her first and primary language, no matter which variety, or dialect, of English is spoken. DELV assesses aspects of language that are considered to be universal or non-contrastive. These non-contrastive features are those that overlap with or are shared by different varieties of American English” (“DELV Technical Report,” 2009)
- ▶ Syntax, Pragmatics, Semantics, Phonology
- ▶ 4-9 yo

## Race/Ethnicity Breakout

African American	White	Hispanic	Other
65%	28%	6%	1%

DELV Technical Report [PDF File]. (2009). Retrieved from [https://images.pearsonassessments.com/images/tmrs/tmrs\\_rg/DELV\\_TR.pdf?WT.mc\\_id=TMRS\\_DELV\\_Technical\\_Report](https://images.pearsonassessments.com/images/tmrs/tmrs_rg/DELV_TR.pdf?WT.mc_id=TMRS_DELV_Technical_Report)



# MacArthur Bates Communicative Development Inventories (MB-CDIs)



## English and Spanish Forms

The long forms of the MacArthur-Bates CDIs in English and Spanish are generally appropriate for use with children 8-30 months. Short form versions in both languages are also available, including a short-form extension for use with English-learning children up to 36 months.

[See More Here!](#)



## Scoring Program

The CDI Scoring program is a free, downloadable Windows-based database application (Access, Word, Excel) which enables users to track CDI administrations, score responses, look-up percentiles, and generate user-friendly summary reports.

[Learn More](#)



## Adaptations in Other Languages

Adaptations of the CDIs have been developed in nearly 100 languages other than English and Mexican Spanish, following guidelines provided by the CDI Advisory Board. Click below for a list of available languages and currently available contact information.

[View Details](#)



## Wordbank

Wordbank compiles responses from many different CDI administrations in dozens of languages, providing exciting new resources for the construction of crosslinguistic lexical norms. Click below to learn about our latest developments!

[Click Here!](#)

The MacArthur-Bates Communicative Development Inventories (MB-CDIs). (n.d.). Retrieved from <https://mb-cdi.stanford.edu/>

## Adaptations in Other Languages

Adaptations of the MacArthur-Bates CDIs have been developed in a number of languages other than American English, including separate versions for dialects which are sufficiently different to merit alternate instruments. The authors of each adaptation version should be contacted directly for information. Contact information and some additional information for these adaptations can be found by **selecting the language of interest in the dropdown menu to the right**. We are currently compiling more complete information about the adaptations, and the listing will be updated as that information becomes available. You may also contact Philip Dale for more information.

Developers of adaptations of the CDIs should remember that the original US English and Mexican Spanish CDI instruments are copyrighted, and creation of new adaptations of these instruments in other languages requires permission of the CDI Advisory Board.

The CDI Advisory Board has formulated guidelines for obtaining authorization for adaptations of the CDIs into other languages, as can be found in the *Adaptations Guide*.

We also suggest that before undertaking an adaptation project, investigators should read *Adaptations, Not Translations!* which contains useful information and guidelines.

Search for available adaptations here!

Search for available adaptations here!

Afrikaans

Albanian

American Sign Language (ASL)

Arabic (Saudi)

Arabic (Kuwaiti)



# Nonword Repetition Task

- ▶ Research shows the NWR tasks have discriminated language impairment in children in English, Swedish, and Spanish
- ▶ For ELLS, “both LI and TD children show decreased repetition accuracy with word length”
- ▶ “Spanish nonwords contribute more information to aid in differentiation of LI than English nonwords, especially at the 4-5 syllable levels” (Summers, Peña, Bedore, Gillam, & Bohman, 1996)
  - ▶ But it CAN be used with bilingual students

## NRT - Nonword Repetition Test

Dollaghan, C., and Campbell, T. F. 1998. Nonword Repetition and Child Language Impairment. *Journal of Speech, Language, and Hearing Research* Vol.41 1136-1146

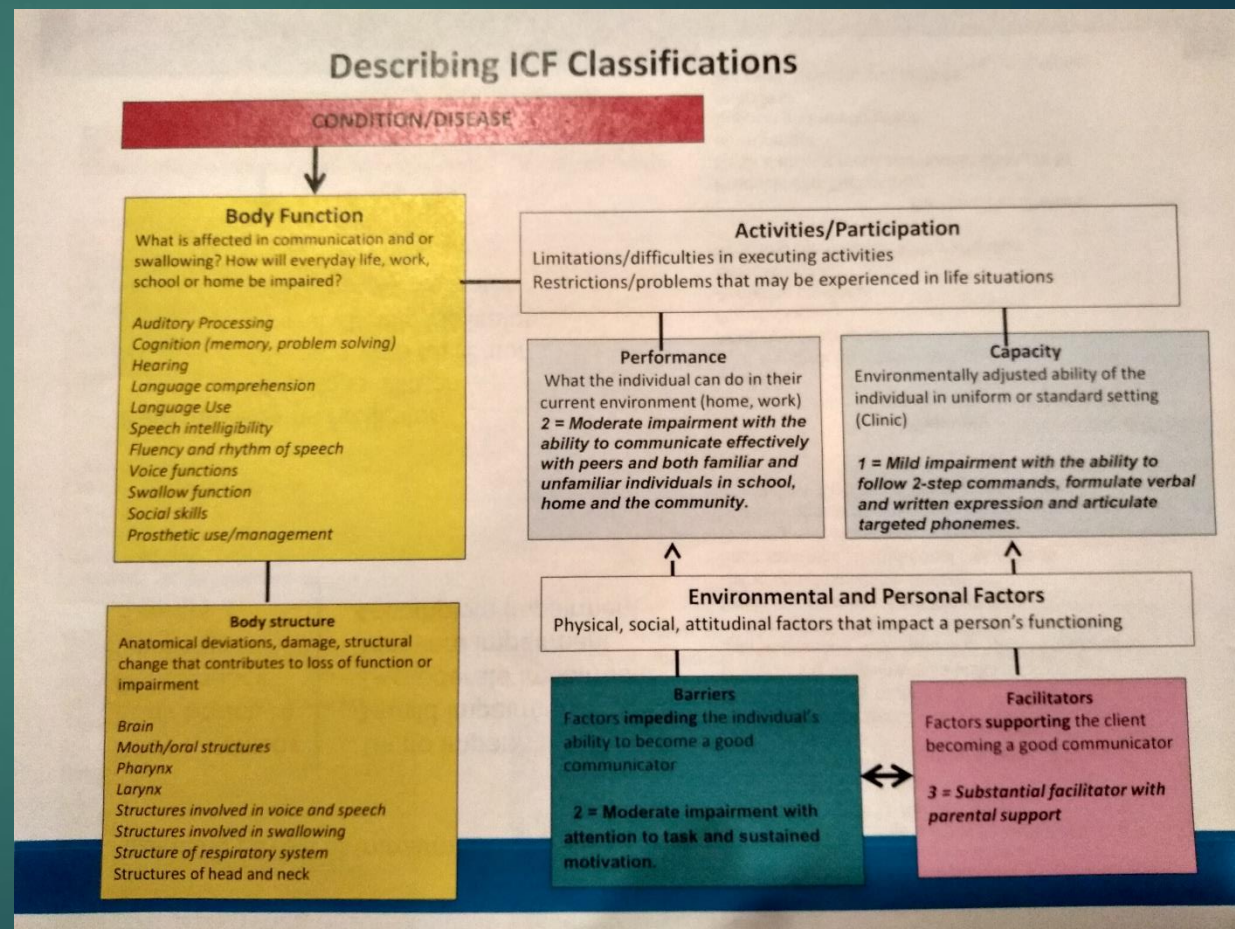
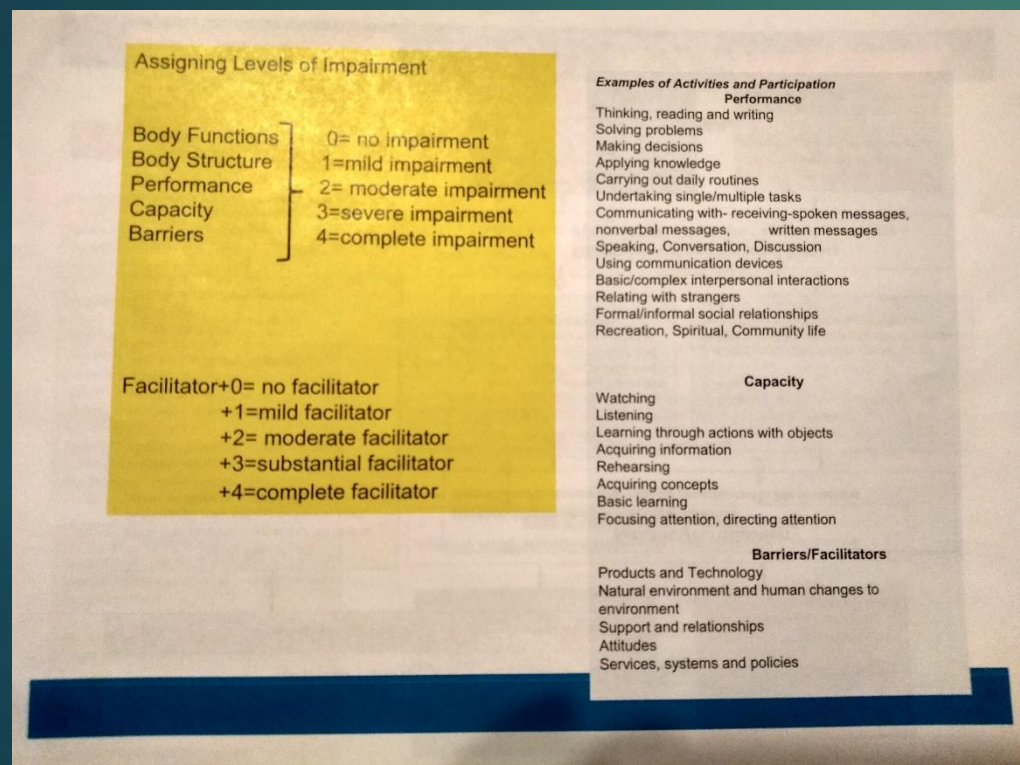
Table 2. Phonetic transcriptions of the nonwords at each length.

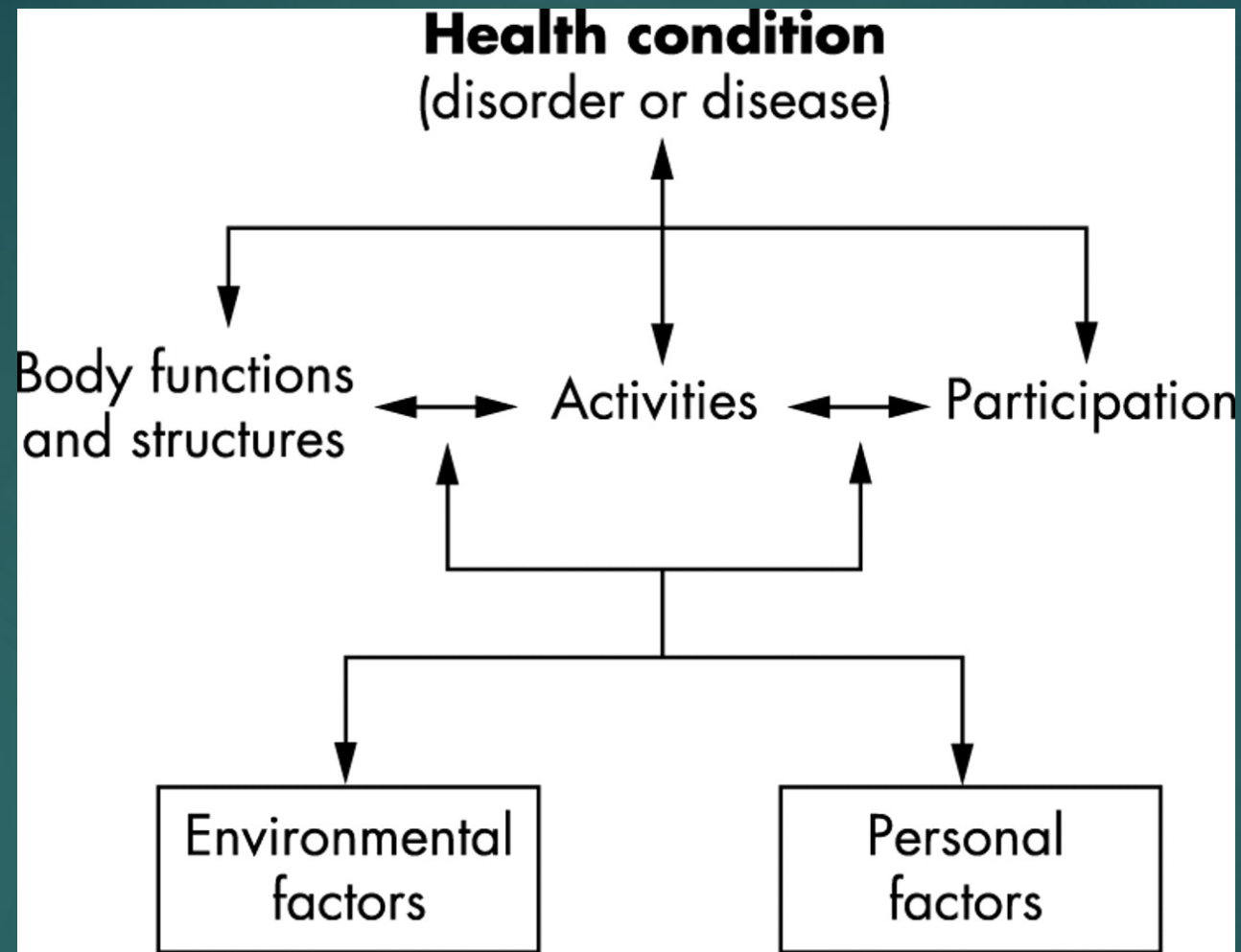
One syllable	Two syllables	Three syllables	Four syllables
/naɪb/	/tɛrvak/	/ʃɪnɔɪtaub/	/veɪtaʃaɪdaɪp/
/voʊp/	/ʃoʊvæg/	/naɪfoʊvɛrb/	/dævoʊnɔɪtʃɪg/
/taʊdʒ/	/væɪʃaɪp/	/dɔɪtaʊvæb/	/naɪfoɪtaʊvub/
/dɔɪf/	/nɔɪtaʊf/	/tɛrvɔɪtʃaɪg/	/tævæɪfɪnɪg/

Dollaghan, C., & Campbell, T.F. (1998). Nonword repetition and child language impairment. *Journal of Speech, Language, and Hearing Research*, 41(5), 1136-1146.  
<https://doi.org/10.1044/jslhr.4105.1136>

Summers, C., Peña, E.D., Bedore, L.M., Gillam, R., & Bohman, T. (n.d.). Nonword repetition in English/Spanish bilingual children with language impairment [Handout]. Retrieved from [https://www.asha.org/Events/convention/handouts/.../1666\\_Summers\\_Connie/](https://www.asha.org/Events/convention/handouts/.../1666_Summers_Connie/)

# International Classification of Functioning





Stucki, G., & Cieza, A. (2004). The International Classification of Functioning, Disability and Health (ICF) Core Sets for rheumatoid arthritis: a way to specify functioning. *Ann Rheum Dis*, 63 (Suppl II), ii40-ii45. doi: 10.1136/ard.2004.028233



# Functional Communication Measures

## ► FCMs

- Artic/Phono
- AAC Comprehension
- AAC Production
- Cognitive Orientation
- Pragmatics
- Feeding/Swallowing
- Fluency/Rate/Rhythm
- Language Comprehension
- Language Production
- Voice Production
- Deaf and Hard of Hearing Comm. Strategies
- Hearing Aids/Assistive Listening Devices:  
Operation and Management

## FCM: Language Comprehension\*

	Meaningful Communication	Length and Complexity of Communication	Environment	Compensatory Strategies/Cueing
<b>Level 0: Independent</b>	Independent.	Age-appropriate.	All settings.	None.
<b>Level 1: Mild</b>	Functional, full-conversational participant. Comprehends 80-90% of conversations.	Minimal errors in understanding language structures (semantic, syntactic, morphologic, pragmatic, phonological awareness) for chronological age.	Familiar and novel settings with a variety of communication partners.	Occasional rephrasing and redirection.
<b>Level 2: Mild - Moderate</b>	Good participant in conversation. Comprehends 60-70% of sentences and conversations.	Understands a variety of language structures consistent with chronological age. Judges phonological awareness tasks correctly less than 50% of the time. Few metalinguistic skills are evident.	Familiar contexts.	Limited topics, needs repetition, requires increased processing time.
<b>Level 3: Moderate</b>	Moderate efficiency as a conversational participant. Comprehends 50% of phrases and sentences.	Understands some semantic language structures and/or syntactic, morphologic, or pragmatic structures appropriate for chronological age. Unable to judge any phonological awareness tasks.	Typical or familiar contexts.	One or two topics, requires increased processing time, rephrasing, and redirection by person communicating.
<b>Level 4: Moderate-severe</b>	Minimal efficiency as a conversational participant. Comprehends 30-40% of words and phrases.	Understands some simple, novel utterances. Recognises environmental sounds and understands some semantic, syntactic, morphologic, or pragmatic structures consistent with chronological age.	Basic needs in restricted contexts.	Requires frequent redirection and cueing to comprehend.
<b>Level 5: Severe</b>	Cannot participate in conversation. Comprehends 10-20% of single words.	Understands some simple, high-frequency words.	Basic needs in a specific context.	May require cueing to localize auditory/visual input and/or attend to person communicating.
<b>Level 6: Profound</b>	No understanding of verbal language.	Understands some simple, high-frequency words.	Basic needs in a specific context.	Does not respond to cueing.

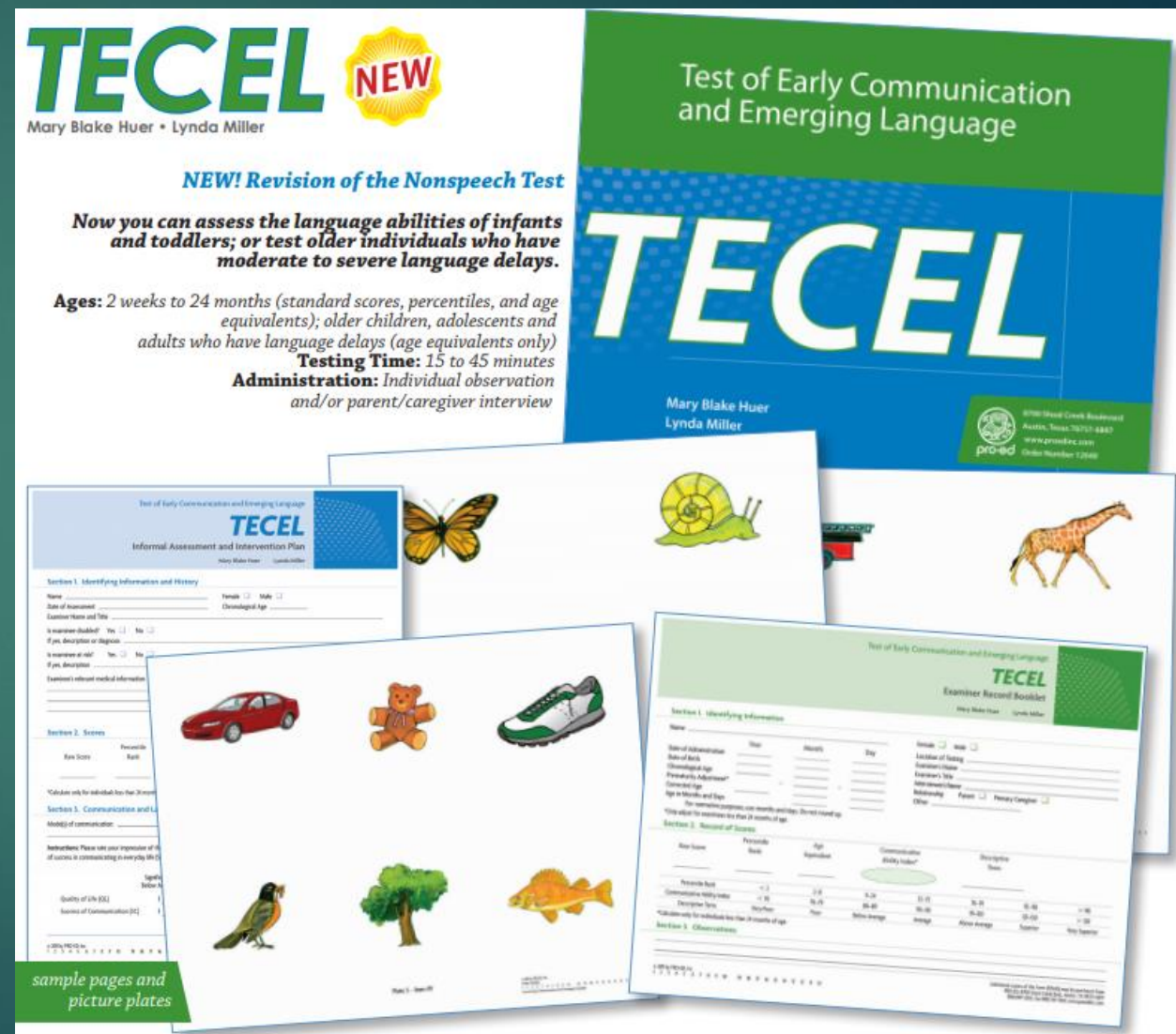
\*Adapted from The American Speech-Language-Hearing Association (ASHA) National Treatment Outcome Data Collection Project, 1997.

Functional Communication Measures: Birth-21 Years [PDF File]. (n.d.). Retrieved from <https://www.edu.gov.mb.ca/k12/specedu/slp/pdf/2.pdf>

# TECEL/Nonspeech Test

- ▶ The TECEL is a revision and standardization of the Nonspeech Test for Receptive/Expressive Language (1988)
- ▶ It assesses the earliest communication behaviors and emerging language abilities in infants and toddlers up to 24 months old, and in older individuals with moderate-to-severe language delays

TECEL: Test of Early Communication and Emerging Language. (n.d.). Retrieved from <https://www.proedinc.com/Products/12640/tcel-test-of-early-communication-and-emerging-language.aspx>

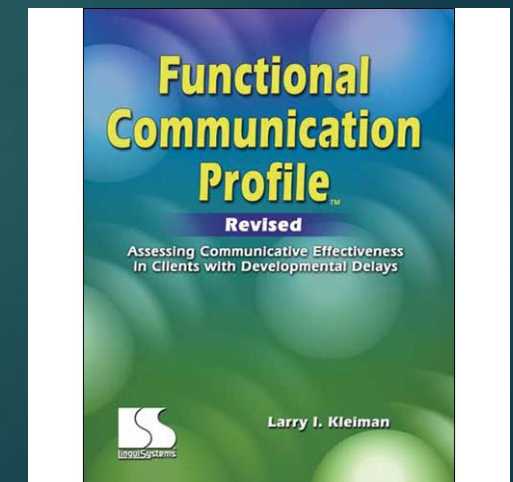
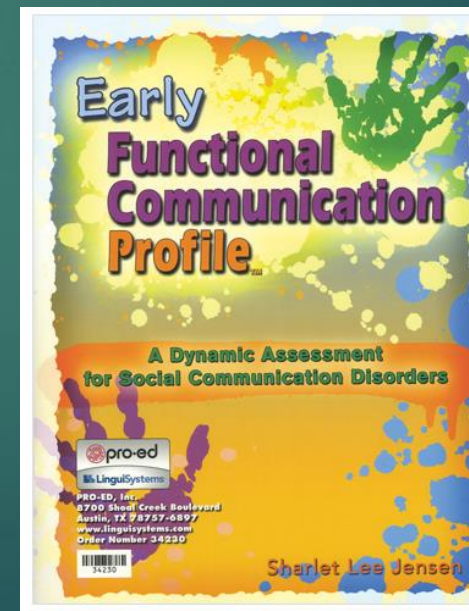




# Functional Communication Profile

- ▶ The FCP-R lets you account for some of the unique aspects of communication and the diversity among individuals with developmental and acquired delays. It addresses all communication possibilities and is not limited to oral language expression
- ▶ The FCP-R yields an overall inventory of the individual's communication abilities, mode of communication, and degree of independence
- ▶ Students are assessed and rated in the major skills categories of communication through direct observation, teacher and caregiver reports and one on one testing. The FCP-R is appropriate for individuals who range between mild and profound deficits.

SPEECH & LANGUAGE EVALUATION					
AREA	LEVEL OF IMPAIRMENT				
	NORMAL	MILD	MODERATE	SEVERE	PROFOUND
Sensory	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Motor	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Attentiveness	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Receptive Language	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Expressive Language	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Pragmatic/Social	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Speech	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Voice	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Oral	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fluency	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>



Functional Communication Profile- Revised. (n.d.). Retrieved from <https://www.superduperinc.com/products/view.aspx?pid=LST4040#.XVrDpPIKjbg>



# ABLLS- The Assessment of Basic Language and Learning Skills

- ▶ The ABLLS-R focuses on 25 skills in the areas of language, social interaction, self-help, academic, and motor skills that most typically developing children need prior to entering kindergarten.

(ABLLS-R) Assessment of Basic Language and Learning Skills, Revised.  
(n.d.). Retrieved from <https://www.wpspublish.com/store/p/2638/ablls-r-assessment-of-basic-language-and-learning-skills-revised>

## ABLLS-R Assessment Kit

Assessment of Basic  
Language & Learning Skills

### **ABLLS Resource Kit**

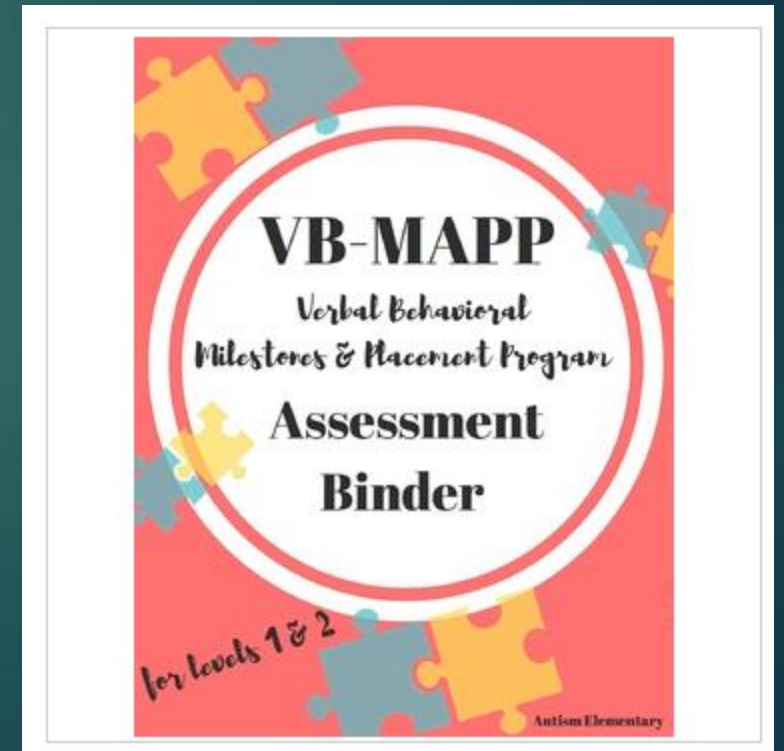


by: [theautismhelper.com](http://theautismhelper.com)

# VB-MAPP

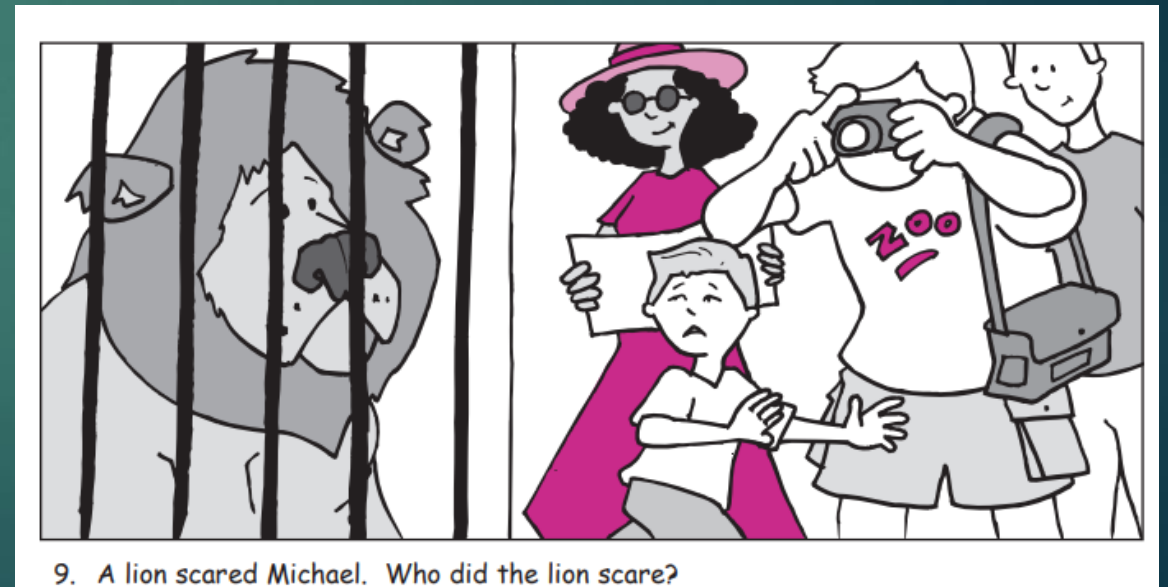
- ▶ Verbal Behavior Milestones Assessment and Placement Program
  - ▶ The VB-MAPP breaks language and related skills down into 16 different skill areas (or domains), including ,manding (asking to receive reinforcers, or to remove undesirable items or events), tacting (naming things and actions in the physical environment), listener skills, and social skills
- 1. Milestones assessment
- 2. Barriers assessment
- 3. Transition Assessment
- 4. Task Analysis and Skills Tracking
- 5. Placement and IEP goals

VB-MAPP. (n.d.). Retrieved from <https://marksundberg.com/vb-mapp/>

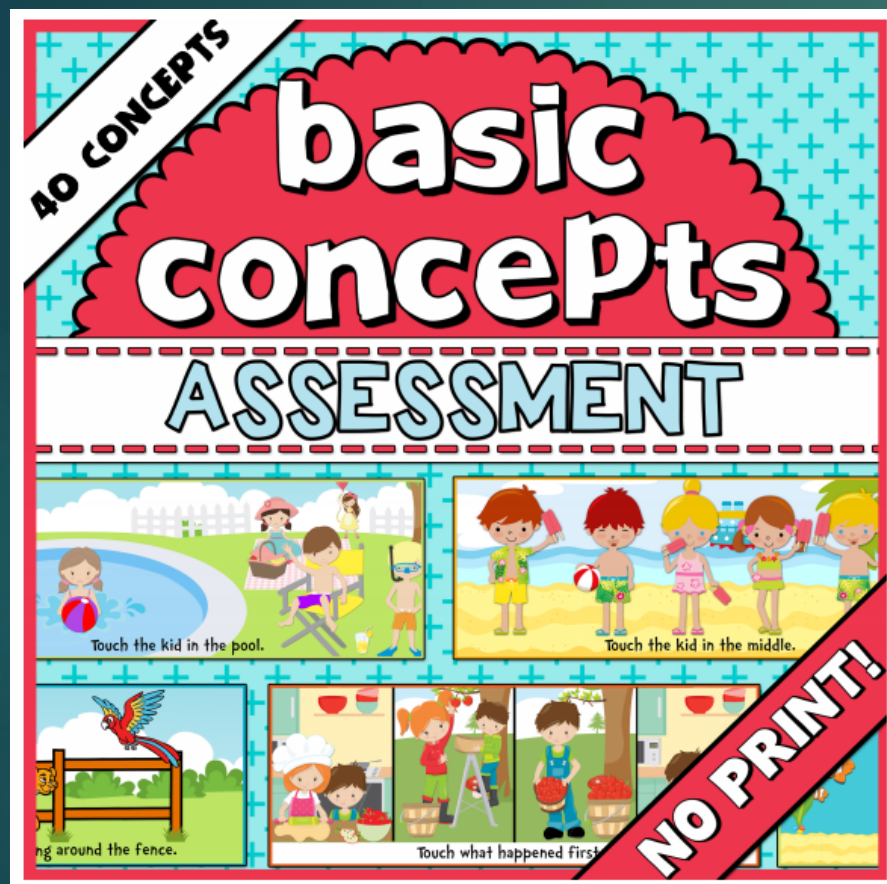


# Wh- Questions Assessment

- ▶ 1-4 sentence stories
- ▶ 1-sentence: Who, Where, What, When, What Happened, How/Why
- ▶ 2-sentences: Who, Where, What, When
- ▶ 3-4 sentences: Who, Where, What, When, What Happened, Why
- ▶ 4+ sentences: comprehension questions and story retelling



# Basic Concepts



[teacherspayteachers.com/Product/Basic-Concepts-Assessment-1580437](https://www.teacherspayteachers.com/Product/Basic-Concepts-Assessment-1580437)

## BASIC CONCEPTS ASSESSMENT SCORING SHEET

		Spatial	Temporal	Quantitative	Attributive	Negation
1	same				<input type="checkbox"/>	
2	top	<input type="checkbox"/>				
3	up	<input type="checkbox"/>				
4	whole			<input type="checkbox"/>		
5	between	<input type="checkbox"/>				
6	neither...nor					<input type="checkbox"/>
7	near	<input type="checkbox"/>				
8	far	<input type="checkbox"/>				
9	front	<input type="checkbox"/>				
10	no			<input type="checkbox"/>		<input type="checkbox"/>
11	middle	<input type="checkbox"/>				
12	before		<input type="checkbox"/>			
13	after		<input type="checkbox"/>			
14	tall				<input type="checkbox"/>	
15	different				<input type="checkbox"/>	
16	half			<input type="checkbox"/>		
17	quarter			<input type="checkbox"/>		
18	upside down	<input type="checkbox"/>				
19	many			<input type="checkbox"/>		
20	few			<input type="checkbox"/>		
21	no			<input type="checkbox"/>		<input type="checkbox"/>
22	each			<input type="checkbox"/>		
23	first	<input type="checkbox"/>				
24	over	<input type="checkbox"/>				
25	through	<input type="checkbox"/>				
26	in	<input type="checkbox"/>				
27	on	<input type="checkbox"/>				
28	first		<input type="checkbox"/>			
29	last		<input type="checkbox"/>			
30	dark				<input type="checkbox"/>	
Column 1 Totals						

		Spatial	Temporal	Quantitative	Attributive	Negation
31	same				<input type="checkbox"/>	
32	in	<input type="checkbox"/>				
33	purple				<input type="checkbox"/>	
34	white				<input type="checkbox"/>	
35	pink				<input type="checkbox"/>	
36	orange				<input type="checkbox"/>	
37	blue				<input type="checkbox"/>	
38	green				<input type="checkbox"/>	
39	yellow				<input type="checkbox"/>	
40	first		<input type="checkbox"/>			
41	second		<input type="checkbox"/>			
42	many			<input type="checkbox"/>		
43	nothing			<input type="checkbox"/>		<input type="checkbox"/>
44	around	<input type="checkbox"/>				
45	under	<input type="checkbox"/>				
46	down	<input type="checkbox"/>				
47	behind	<input type="checkbox"/>				
48	bottom	<input type="checkbox"/>				
49	up	<input type="checkbox"/>				
50	top	<input type="checkbox"/>				
51	light				<input type="checkbox"/>	
52	all			<input type="checkbox"/>		
53	not					<input type="checkbox"/>
54	last	<input type="checkbox"/>				
55	biggest				<input type="checkbox"/>	
56	before		<input type="checkbox"/>			
57	after		<input type="checkbox"/>			
58	small				<input type="checkbox"/>	
59	far	<input type="checkbox"/>				
60	fewest			<input type="checkbox"/>		
Column 2 Totals						
+ Column 1 Totals						
Grand Total						
TOTAL		/23	/8	/12	/15	/5
						/63

### DIRECTIONS:

Read the prompt on the picture with the number corresponding to the one on this list.

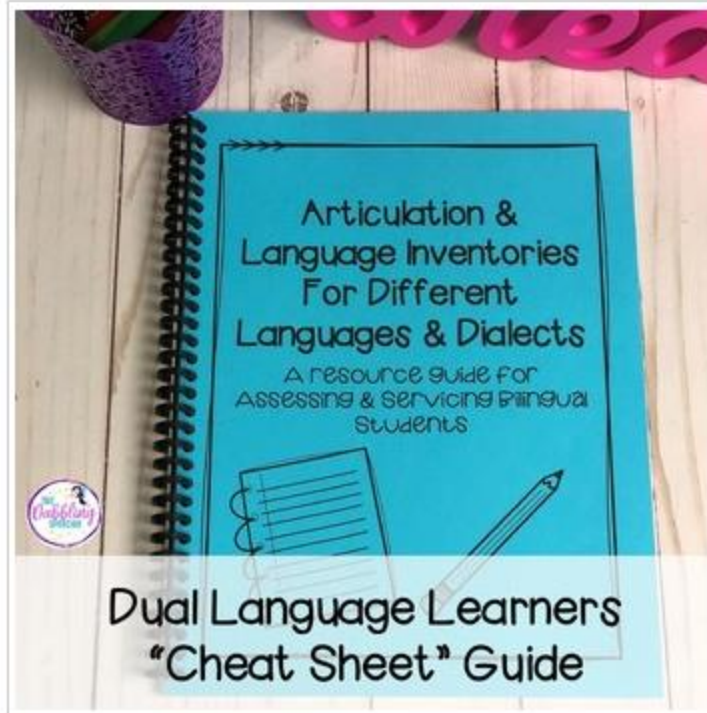
Mark a "✓" for correct and an "✗" for incorrect in the box in the column corresponding to the test item.

Calculate the total number correct. This serves as a pre-test/pre-intervention baseline score that can later be used to compare against post-intervention scores.

The maximum possible points is 63. This is because several items count for both quantitative and negation concepts.



## Dual Language Learners "Cheat Sheet" Guide



### Subject

Special Education, Other (Specialty), Speech Therapy

### Grade Levels

Staff

### Resource Type

Teacher Manuals, Assessment, Professional Documents

### Product Rating

★★★★ 4.0 • 85 Ratings

### File Type

PDF (Acrobat) Document File

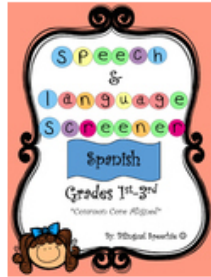
Be sure that you have an application to open this file type before downloading and/or purchasing.

2 MB | 25 pages

### Share







## Speech & Language Screener- Spanish (Grades 1st- 3rd)

By Bilingual Speechie

This is a thorough screener intended for predominately Spanish speaking students in grades 1st through 3rd grade. The screener is intended for use of a licensed bilingual speech language pathologist....

Subjects: Spanish, Speech Therapy, Tools for Common Core  
Grades: 1st, 2nd, 3rd  
Types: Assessment, Printables, Rubrics

**\$4.00**

60 ratings  
★★★★★ 3.9

Digital Download  
PDF (77.51 MB)

**ADD TO CART**

[WISH LIST](#)



## Preschool and Kindergarten Language and Articulation Screener (Spanish)

By Bilingual Speechie

This informal screener is the perfect tool to help you gather information about your student's expressive/receptive language and articulation. The screener is specifically designed for preschool and...

Subjects: English Language Arts, Spanish, Speech Therapy  
Grades: PreK, Kindergarten  
Types: Assessment, Printables, Rubrics

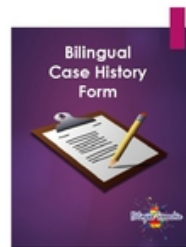
**\$4.00**

51 ratings  
★★★★★ 4.0

Digital Download  
PDF (13.62 MB)

**ADD TO CART**

[WISH LIST](#)



## Bilingual Speech Case History Form

By Bilingual Speechie

This awesome speech case history form was designed to help you gather specific information about your student's developmental history during your parent interviews. The case history comes in English and...

Subjects: Speech Therapy  
Grades: Not Grade Specific  
Types: Assessment

**\$3.00**

12 ratings  
★★★★★ 4.0

Digital Download  
PDF (160.00 MB)

**ADD TO CART**

[WISH LIST](#)


# Resources



- ▶ [Colorin Colorado](#)
- ▶ Website for ELLs and service providers of ELLs
  - ▶ School Support
  - ▶ For Families
  - ▶ Glossary of common terms
  - ▶ Books to read


<https://www.colorincolorado.org/special-education-ell/bilingual>

- [Super Duper Handouts](https://www.superduperinc.com/Handouts/Handout.aspx)
- In English and Spanish



**Handy Handouts®**

Páginas educativas gratuitas (Handy Handouts®) para educadores, maestros, y padres\*  
Número 95




**Super Duper®  
Publications**

### La Comunicación Aumentativa y Alternativa: Términos a Conocer

por Cheris Frailey, M.A. CCC-SLP

Aprender acerca de la Comunicación Aumentativa y Alternativa (AAC, por su sigla en inglés) toma tiempo y paciencia. Hay un gran número de productos, materiales de terapia, y dispositivos en el mercado que pueden hacer abrumador el escoger un dispositivo o sistema de comunicación en general. Mantenga en mente que el uso de la AAC puede ser una trayectoria de toda la vida para algunos individuos según crecen, se desarrollan, y maduran. Las necesidades y los niveles de las habilidades cambian, mientras que para otros, la AAC es una solución a un problema de comunicación que lo puede llevar a la expresión verbal en un futuro sin tener una necesidad de la AAC. Según su niño/a recibe terapia y educación, usted se convertirá consiente de los temas y los términos nuevos. Abajo hay preguntas y términos comunes con los que uno debe familiarizarse para entender mejor la comunicación aumentativa y alternativa.



#### ¿Qué es PECS versus PCS?

El Sistema de Comunicación por Intercambio de Imágenes (Picture Exchange Communication System, PECS, por su sigla en inglés) es un método de enseñar el sistema del uso de los símbolos (causa y efecto). Los Símbolos Pictográficos para la Comunicación (Picture Communication Symbols, PCS, por su sigla en inglés) son las fotos actuales para la comunicación.

#### La Tecnología Baja versus la Tecnología Alta

En términos generales, la tecnología baja se refiere a cualquier cosa desde símbolos de papel sencillos hasta dispositivos aumentativos sencillos en lo cual usted pone un papel cuadriculado de símbolos en el dispositivo. La tecnología alta se refiere a los dispositivos computarizados para la comunicación aumentativa con páginas múltiples en lo cual un individuo toca la pantalla o usa un puntero para hacer "click" en los iconos o las opciones.

#### ¿Qué es el habla sintetizada y el habla digitalizada?

El habla sintetizada es un habla computarizada. El habla digitalizada es un habla

www.handyhandouts.com • © 2010 Super Duper® Publications • www.superduperinc.com

<https://www.superduperinc.com/Handouts/Handout.aspx>

# ASHA

## ► Phonemic Inventories for 17 languages

### Facts on Spanish Phonology

- The following consonant clusters are used in Spanish; these do not occur in word final position<sup>1</sup>:  
/pl/ /pʎ/ /bl/ /bʎ/ /tʎ/ /dʎ/ /kʎ/ /kʎ/ /gʎ/ /gʎ/ /fʎ/ /fʎ/
- There are five consonants used in word final position<sup>2</sup>: /l/, /ʎ/, /d/, /n/, /s/.
- In intervocalic environments the allophonic variations for /b, d, g/ are /β, ð, ɣ/<sup>3</sup>.
- Dialectal variations in Spanish phonology exist. It is important to recognize this when assessing a Spanish speaker.
- By age 4, normal developing monolingual Spanish speakers acquire most sounds of the language except for: /g/, /f/, /s/, /ɲ/, /r/, and /ʎ/<sup>4</sup>.
- Phonemes in English that do not occur in Spanish include:
  - /ŋ/, /v/, /ð/, /θ/, /z/, /ʃ/, /ʒ/, /h/, /dʒ/, /ɹ/
- The Spanish vowel system is much smaller than that of English; they are similar to the short vowels of English. Spanish vowels include: /i/, /e/, /a/, /u/, /ɔ/<sup>5</sup>
- Spanish developmental norms<sup>6</sup>

3:3	3:7	3:11	4:3	4:7	4:11	5:7	>5:7
/p,b,t/	/k,w,m,n/	/j,l/	/f/	/tʃ,d,g,f/	/x,ɲ/	/s/	/r/

Data normed on 120 Spanish-speaking children of Mexican descent living in California. Spanish reported as primary language. Data reflects 90% accuracy of phoneme production..

SPANISH PHONEMIC INVENTORY<sup>1</sup>

	Bilabial	Labiodental	Dental	Alveolar	Postalveolar	Retroflex	Palatal	Velar	Uvular	Pharyngeal	Glottal
Plosive	p b			t d				k g			
Nasal		m		n			ɲ				
Trill				r							
Tap or Flap				ɾ							
Fricative		f		s				x			
Affricate					tʃ						
Glides (Approximant)		w					j				
Liquid (Lateral Approximant)				l							

<sup>1</sup> Chart based on information gathered from the following:  
Goldstein, B. (2000). *Cultural and linguistic diversity resource guide for speech-language pathologists*. San Diego, CA: Singular.

American Speech-Language Hearing Association. (n.d.). Phonemic inventories and cultural and linguistic information across languages. Retrieved from <https://www.asha.org/practice/multicultural/Phono/>



# Portland State University

## ▶ Chicano English

- ▶ History and demographics
- ▶ Myths
- ▶ Morphology, syntax, and semantics
- ▶ Regularization
- ▶ Phonology
- ▶ Aspects of Chicano culture
- ▶ Implications for the SLP

Portland State University. (2019). Multicultural topics in communication sciences and disorders, languages. Retrieved from <https://www.pdx.edu/multicultural-topics-communication-sciences-disorders/languages>

## ▶ African American Vernacular English

## ▶ ASL

## ▶ Hmong

## ▶ Tagalog (Filipino)

## ▶ Nearly 60 languages

- ▶ Spanish Mexican
- ▶ Puerto Rican Spanish
- ▶ Columbian Spanish
- ▶ Cuban Spanish
- ▶ Latin American Spanish



# the speech *accent* archive

how to  
browse  
search  
resources  
about



The speech accent archive uniformly presents a large set of speech samples from a variety of language backgrounds. Native and non-native speakers of English read the same paragraph and are carefully transcribed. The archive is used by people who wish to compare and analyze the accents of different English speakers.

practice your phonetic transcription for the speech accent archive: [click here](#)

last updated: 22 january 2019    2781 samples



► <http://accent.gmu.edu/>