English

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1. Language description

English is an Indo-European language which, due to its close relationship with languages like Frisian, (Low) German, and Dutch, is counted among the West Germanic languages. The language originated in England in the time of the Anglo-Saxons and is now the lingua franca (a language used as a common means of communication between people with different native languages) in large parts of the world. Today, English is widely used as a second or official language and is the working language of many international organisations. Approximately 365 million people speak English as their native language, which makes it the world's third biggest language, after Mandarin and Spanish.

English has many dialects. The current word list is based on American English. However, there are also many variants within American English. This word list is based on the variant known as General American English (GAE) (Bosma Smit, 2007).

Table 1Consonant system of American English, (Bosma-Smit, 2007)

					Coronal				Dorsal	Dorsal			
	Bila	bial	La	biodental	Dental	Αlν	veolar	Postalveolar	Palatal	Velar	Uvular	Pharyngeal	Glotta
plosives	р	b				t	d			k g			
nasals	m					n				ŋ			
tap flap													
fricatives			f	V	Θð	S	Z	J 3					h
affricate								t∫ dʒ					
liquids						ı							
semi-	w					r*			j				
vowels													

Black: consonants occur in both languages. Green: only in English

Americans have lenition (weakening) of the t between vowels and/or an l or r. In other words: a t in the middle of a word is pronounced as a d. *Better* sounds like *bedder*, *brittle* like *briddl*, *falter* like *falder*, and *turtle* like *turdl*.

British, and in particular Received Pronunciation, also called 'the Queens English', neglects the r if it is not followed by a vowel, although it does leave a clear mark on the preceding vowel. This consonant was still being pronounced until quite recently. In American English, the /r/ did remain in that position. There is a lot of variation in pronunciation in American as well, especially when the /r/ is positioned at the end of a word. This is now transcribed as schwa with the /r/ as a diacritical mark. This method was taken from American articulation tests (Williams-Hodson, 1986, Goldman Fristoe 2, 2000). In this form, the final /r/ is no longer counted among the consonants. However, there are also tests (Fluharty 1978) which do count the final /r/ among the consonants and transcribe it as such.

Clusters of up to 3 consonants are permitted in English. Clusters occur in initial and final positions.

2. Phonological Development

This overview is based on the acquisition order of consonants according to Prather, Hedrick, and Kern (1975). This study makes no distinction between the syllable-initial and syllable final position of the consonants. . A consonant is considered acquired if 75% of the tested children correctly pronounced a certain consonant in both initial and final positions, whether spontaneously or repeated. The 147 children tested were between 2 and 4 years old.

 Table 2

 Acquisition ages of American English according to Prather, Hedrick, and Kern (1975)

Age	Consonant
2;0	m n ŋ h p
2;4	djfk
2;8	wbt
3;0	g s
3;4	lr .
3;8	∫ tf
4;0	ð 3
> 4	dʒ v z Θ
	clusters

Pollock (2002) studies the percentage of consonants correct (PCC) in separate words and came to the following percentages per age group. Of course, this study used different words than the Speakaboo word list.

 Table 3

 Percentage of consonants correct according to Pollock (2002)

Age	PCC	
1.6-1.11	53%	
2;0-2;5	70%	
2;6-2;11	81%	
3;0-3;5	92%	
3;6-3;11	93%	
4;0-5.5	93%	
4;6-4;11	94%	
5;0-5;5	93%	
5;6-5;11	96%	
6;0-6;5	97%	
6;6-6;11	93%	

3. Common phonological processes

Table 4	
Error patterns according to Dodd et al.	(2006)

Process	Example	Age groups						
		2;6 – 2;11	3;0 – 3;5	3;6 – 3;11	4;0 – 4;5	4;6 – 4;11		
Del. fin. cons.	d∧k→d∧	*****						
Assimilation	d₃d←b₃⊾d	*****						
Reduplication	taigə→taitai	*****						
Stopping	zibrə→dibrə	*****	******					
Deletion weak	εləfənt→εfənt	*****	*****	*****				
syllable								
Fronting	∫ıp→sıp	*****	******	*****				
CC reduction	brεd→ bεd	*****	******	*****				
(De)affrication	law ←ltaw	*****	******	*****	******	******		
Gliding	ræbit→wæbit	*****	******	*****	*****	******		

Note: (***** occurs in at least 10% of the children in this group, ----- clusters of 3 consonants)

4. Lexical variation

No data.

5. Results of normally developing English toddlers

No data.

6. Sources

Bosma Smit, A. (2007). *General American Speech Acquisition*. In: The International Guide to Speech Acquisition. Edited by S. McLeod, Thomson Delmar Learning, NY, p. 128-147.

Buono Fluharty, N. (1978). Fluharty Preschool Speech and Language Screening Test. PRO-ED, Texas.

Dodd, B., Holm, A., Hua, Z., Crosbie, S., Broomfield, J. (2006). *English Phonology: Acquisition and Disorder*. In: Phonological Development and Disorders in Children, A Multilingual Perspective. Edited by Zhu Hua and Barbara Dodd, Multilingual Matters Ltd, Buffalo, p.25-55.

Goldman, R. & Fristoe, M. (2000). *Fristoe2 Test of Articulation*. American Guidance Service, Inc. Circle Pines.

Pollock, K.E. (2002). Identification of vowel errors: Methodological issues and preliminary data from the Memphis Vowel Project. In: M.J. Ball and F. E. gibbon (Eds.) *Vowel disorders* (pp. 83-113). Boston: Buttersworth Heinemann.

Prather, E.M., Hedrick, D.L., and Kern, C.A. (1975). Articulation development in children aged 2-4 years. *Journal of Speech and Hearing Disorders*, 40, 179-191.

Templin, M.C. (1957). *Certain language skills in children* (monograph Series No. 26). Minneapolis, MN: University of Minnesota, The Institute of Child Welfare.

Williams Hodson, B. (1986). The assessment of phonological processes-Revised. PRO-ED, Austin.

https://nl.wikipedia.org/wiki/Engels

https://nl.wikipedia.org/wiki/Amerikaans-Engels

https://en.wikipedia.org/wiki/List of languages by number of native speakers

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