# Grade 1 Foundational Skills Instruction: Whole and Small Group Settings

In **first grade**, children develop phonological awareness, phonics knowledge, and decoding skill, all of which contribute to the development of fluent reading. These skills are a necessary **foundation** to reach the ultimate goal of reading: **comprehension**.

## Phonological Awareness: What is This and Why Does This Matter?

Phonological awareness is “the recognition that words have constituent sounds. Constituents of a word (e.g., book) may be distinguished in three ways: by syllables (/book/), by onsets and rimes (/b/ and /ook/), or by phonemes (/b/ and /oo/ and /k/)” ([Massachusetts 2017 English Language Arts and Literacy Framework](http://www.doe.mass.edu/frameworks/ela/2017-06.pdf), page 180).

Phoneme awareness is “the ability to understand that sounds in spoken language work together

to make words. Phonemic awareness is auditory; it does not involve printed letters. It includes the

ability to notice, think about, and manipulate the individual phonemes in spoken words. Phonemic

awareness is a type of phonological awareness” ([Foorman et al, 2016](https://ies.ed.gov/ncee/wwc/Docs/PracticeGuide/wwc_foundationalreading_040717.pdf#page=20)).

Phonological awareness is necessary for learning to decode words in an alphabetic language, such as English. “People who can take apart words into sounds, recognize their identity, and put them together again have the foundation skill for using the alphabetic principle. Without phoneme awareness, students may be mystified by the print system and how it represents the spoken word” ([Moats & Tolman, 2009\*\*](https://www.readingrockets.org/article/why-phonological-awareness-important-reading-and-spelling)).

For children at risk of reading difficulties, instructional approaches that are intensive and explicit in phonemic awareness and phonics have had the greatest impact in preventing long-term difficulties (Torgesen, 2002).

### What Linguistic Factors Might Impact How Students Acquire Phonological Awareness?

Students have greatest awareness of the sounds in the language or [language variation](https://www.aft.org/ae/summer2021/washington_seidenberg) that they  hear and speak most often, and can connect that awareness to new or unfamiliar sounds in English. Phonological awareness developed in one language has been shown in studies to “cross over” into English, enabling children who have developed awareness in their home language to utilize those skills in English as well ([International Literacy Association](https://www.literacyworldwide.org/docs/default-source/where-we-stand/9457_Phonological_Awareness_1-2020_Final.pdf), 2020). Beginning phonemic awareness practice with the sounds and patterns that the two languages share is supportive. Instruction can then progress to sounds and patterns that exist in English but not the student’s home language (Helman, 2004).  Additionally, [dialectal variation within American English](https://www.aft.org/ae/summer2021/washington_seidenberg) may result in mismatches between the oral and written language system and could also impact the acquisition of phonics skills.

#### Research-Based Instruction to Support Students in Acquiring Phonological Awareness

Phonological awareness develops in a [typical sequence\*\*](https://www.readingrockets.org/article/development-phonological-skills), first with larger units of spoken language (e.g., syllables) and then moving into smaller units (e.g., onsite-rime, individual phonemes). These are not distinct “steps” but broad stages that can overlap. Awareness of phonemes is most important for reading ability, because in an alphabetic language like English, words are made of letter patterns that correspond to individual sounds.

Poetry, songs, and rhymes are authentic contexts that offer opportunities for students to notice the sounds in words. Word and sound games are also engaging for young children while promoting phonological awareness. Shared reading and engaging students in conversations about texts, while often seen as strategies that primarily promote [language development](http://www.doe.mass.edu/massliteracy/literacy-block/oral-language.html) and comprehension, also strengthen phonological skills for children with different skill levels ([Swanson et al., 2012](https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3319370/); Schickedanz & McGee, 2010).

##### Resources

* Phonological awareness activities, from Florida Center for Reading Research ([Activities](https://www.fcrr.org/student-center-activities/kindergarten-and-first-grade#sca3))
* Phonological Awareness Activities, from Free Reading ([Activities](http://www.freereading.net/wiki/Phonological_Awareness_Activities.html))
* Phoneme Segmentation, from National Center on Intensive Intervention ([Instruction](https://intensiveintervention.org/sites/default/files/Phoneme_Segmentation_508.pdf))
* Elkonin Sound Boxes, from Understood.org ([Video](https://www.youtube.com/watch?time_continue=27&v=Pzg5jRy1PwE&feature=emb_logo))
* Phonemic Awareness Hand Motions, from Heggerty ([Video Playlist](https://www.youtube.com/playlist?list=PLqsyZlEkrFNqOwDChnYX8w01C7YzBwa3X))
* Onset and Rime with felt squares, from The Barksdale Reading Institute ([Video](https://www.youtube.com/watch?v=EKNgx_vo3bQ))
* Correct pronunciation of English phonemes, from Rollins Center for Language and Literacy ([Video](https://www.youtube.com/watch?v=wBuA589kfMg))
* Phoneme Blending, from Literacy Instructional Routines to Support Foundational Skills Instruction, Idaho Department of Education ([Video](https://youtu.be/OO9rFGAbm10))
* Phoneme Segmentation, from Literacy Instructional Routines to Support Foundational Skills Instruction, Idaho Department of Education ([Video](https://drive.google.com/file/d/1d-LaDZtA4oUMPsZHCtYDqrYf7BXUKGg7/view))

#### Phonological Skills: Leveraging Linguistic Assets for Multilingual Learners

* “Young English learners can acquire age appropriate phonemic awareness skills even when their English proficiency is not fully developed and teachers need to provide students opportunities to develop these skills as early as possible” (Linan-Thompson & Vaughn, 2007).
* • English learners may benefit from supports for hearing and producing sounds in English that are new to them. Instruction in the sounds of English will help English learners develop phonological awareness in English (Bear et al., 2003; Helman, 2004).
* Phonological skills are more closely related to word reading ability than is language-minority status (Lesaux et al, 2008).
* Phonological awareness developed in one language has been shown in studies to translate into English, enabling children who have developed awareness in their home language to utilize those skills in English as well ([International Literacy Association](https://www.literacyworldwide.org/docs/default-source/where-we-stand/9457_Phonological_Awareness_1-2020_Final.pdf), 2020). Beginning phonemic awareness practice with the sounds and patterns that the two languages share is supportive. Instruction can then progress to sounds and patterns that exist in English but not the student’s home language (Helman, 2004).

##### Supports for English Learners

* Create extensive experiences with fun and appealing songs, poems, chants, and read-alouds that will allow students to hear and reproduce the sound patterns of English.
* Songs and poems, with their rhythm and repetition, are easily memorized and can be used to teach phonemic awareness and print concepts to English learners. In addition to increased retention due to repetition, rhymes allow English learners to safely play with language. Rhymes exist in every language and teachers can ask students or their parents to share culturally relevant and teachable rhymes with the class and can build phonemic awareness activities around them ([Colorín Colorado\*\*](https://www.colorincolorado.org/article/english-language-learners-and-five-essential-components-reading-instruction-0)).
* Be familiar with the sounds that might be difficult for students of particular language backgrounds to hear or pronounce, and provide extra practice (Helman, 2004).
* Practice phonemic awareness in small groups of 4-6 students when possible (Linan-Thompson & Vaughn, 2007).

##### Learn More

* [Phonemic Awareness and English Language Learners\*\*](https://www.colorincolorado.org/article/reading-101-english-language-learners#h-phonemic-awareness-and-english-language-learners), from Colorín Colorado
* [Reading 101 for English Language Learners\*\*](https://www.colorincolorado.org/article/reading-101-english-language-learners), from Colorín Colorado
* [Phonemic Inventories and Cultural and Linguistic Information Across Languages](https://www.asha.org/practice/multicultural/Phono/#phon), from American Speech-Language-Hearing Association

## Phonics and Decoding: What is This and Why Does This Matter?

**Phonics** is a “way of teaching the code-based portion of reading and spelling that stresses symbol-sound relationships; especially important in beginning reading instruction”([Massachusetts 2017 English Language Arts and Literacy Framework](http://www.doe.mass.edu/frameworks/ela/2017-06.pdf), page 180).

**Decoding is “**the ability to translate a word from print to speech, usually by employing knowledge of letter-sound relationships; also the act of deciphering a new word by sounding it out” ([Foorman et al. 2016](https://ies.ed.gov/ncee/wwc/Docs/PracticeGuide/wwc_foundationalreading_040717.pdf), page 38).

Grade one is a momentous year for reading development. Seminal studies have shown that **virtually all children can develop grade-level word reading skills by the end of grade 1** with appropriate instruction, setting them up for future success (Foorman & Al-Otaiba, 2009). Furthermore, longitudinal studies have shown that students who do not develop grade-level word reading skills by the end of first grade “almost never” catch up in reading later in elementary school (Torgesen, 2002).

Decoding skills allow readers to “get the print off the page.” When children are skilled decoders they can develop fluent, automatic word reading in order to focus on the real goal of reading: comprehension. Fluent reading in an alphabetic language such as English is not possible without skillful phonic decoding. In a review of the research on early reading instruction, prominent researchers Catherine Snow and Connie Juel concluded that focused instruction on letters and sounds is “helpful for all children, harmful for none, and crucial for some” (Snow & Juel, 2005).

### What Linguistic Factors Might Impact How Students Acquire Phonics Knowledge and Decoding Skill?

For multilingual learners, teachers should consider if a student’s home language is logographic or syllabic to inform plans to introduce the child to English letters and to make supportive connections to their home language-based knowledge (Bialystok, 2002; Durgunoğlu, 2002). To make supportive connections to a student’s home language, educators may consider:

* How is the home language the same and how is it different from English?
* Are there words in the home language that sound the same and mean the same thing in both languages?
* Are there words in the home language and English that sound the same but mean different things?
* How are words changed and formed in the home language — singular and plural forms, present tense, and past tense forms of verbs? (Cloud, Genesee, and Hamayan, 2009, Chapter 3)

English learners may speak with a dialect different than the teacher’s. This can affect the pronunciations of English words. This does not indicate any problem with phonics or decoding acquisition, as long as pronunciations are consistent (Colorín Colorado\*\*). Additionally, students who primarily use a non-mainstream dialect of American English experience a mismatch between their oral language system and the written language system taught in school; this can impact the acquisition of phonics skills.  For example, if within the student’s dialect the final /g/ sound is dropped from words like *jumping* or *going*, phonetically decoding those words will take additional time or instruction so the sound/spelling variation used in instruction can be learned (Seidenberg & Washington, 2021).

#### What does Phonics include in Grade 1?

In first grade, it is recommended that students solidify their skills with consistent phoneme-grapheme correspondences; learn to recognize and read more challenging phoneme-grapheme correspondences; and learn to use open and closed syllables and simple morphemes to read words. For more specifics, refer to the *LETRS Scope and Sequence for Word Study, Reading, and Spelling* (Moats & Tolman, 2019).

[LETRS sample scope and sequence](https://www.doe.mass.edu/massliteracy/letrs-scope-sequence.pdf)

#### Research-Based Instruction to Support Skills in Phonics and Decoding in First Grade

Instruction in phonics and decoding should be systematic and explicit. According to Brady (2011), “Systematic and explicit approaches to phonics instruction have been shown in a range of studies to be more effective than more implicit approaches.” **Systematic** phonics lessons follow a planned sequence from simpler to more complex letter-sound correspondences and spelling patterns, as opposed to teaching phonics rules and patterns incidentally as they arise in text. **Explicit** phonics instruction goes beyond pointing out examples of spelling patterns; it provides explanations of how and when spelling rules and patterns are used (Brady, 2011). Explicit instruction also typically includes a gradual release approach with active practice opportunities for students to transfer and apply the phonics they are learning.

If children enter first grade with incomplete alphabet knowledge, teachers should provide rapid, repetitive cycles of practice with each letter’s name, sound, and form, rather than a letter per week ([Jones, Clark, & Reutzel, 2012](https://digitalcommons.usu.edu/teal_facpub/404/)). Letter formation is important to include because slow or labored writing can sap cognitive resources the same way that dysfluent reading does, impeding comprehension (McCarney et al., 2013).

When students are taught new letter-sound correspondences, they should practice applying that knowledge by encoding (i.e., spelling) and decoding words, both in isolation and in connected text. Blending is particularly important to practice as students learn new sound-spelling correspondences and need to practice using them to read real words. Invented spelling is an authentic application of phonics knowledge, and should be supported (Ouelette & Sénéchal, 2016).

##### Resources

* Read and Write Words with Consonant Blends, from National Center on Intensive Intervention ([Instruction](https://intensiveintervention.org/sites/default/files/ConsonantBlends-508.pdf))
* Long and short vowel patterns, National Center for Intensive Intervention ([Instruction](https://intensiveintervention.org/sites/default/files/HideSeek-508.pdf))
* Phonics activities, from Florida Center for Reading Research ([Activities](https://www.fcrr.org/student-center-activities/kindergarten-and-first-grade#sca6))
* Sound-letter mapping, from Literacy How ([Video](https://www.youtube.com/watch?v=NjvjGnSh5-4&feature=emb_logo))
* Phonics and Decoding, from Reading Rockets ([Video\*\*](https://www.readingrockets.org/reading-topics/phonics-and-decoding))
* Sounding Out, from Free Reading ([Activities](http://www.freereading.net/wiki/Sounding_Out_Activities.html))

Also, see this collection of brief videos from the Idaho Department of Education within their Literacy Instructional Routines to Support Foundational Skills Instruction:

* Sound-Spelling Card, ([Video](https://www.youtube.com/watch?v=MvzjXNRm78Q))
* Sound-by-Sound Blending, ([Video](https://www.youtube.com/watch?v=_eO8Y6aAHso))
* Vowel First Blending, ([Video](https://www.youtube.com/watch?v=D_UdGCNodpc))
* Vowel First Blending with Multisyllabic Words, ([Video](https://www.youtube.com/watch?v=LliijfC0EBg))
* Multisyllable Routine- Identify Familiar Word Parts, ([Video](https://www.youtube.com/watch?v=xd_VN73EI7g))
* Sound-Spelling Review, ([Video](https://www.youtube.com/watch?v=pSpUQXKru8Y))
* Dictation, ([Video](https://www.youtube.com/watch?v=q0lGyYXhIOM))

#### Practice with Decodable Text

“**Decodable text** is text in which a high proportion of words (80%-90%) comprise letter-sound correspondences that have already been taught. It is used for the purpose of providing practice with specific decoding skills and is a bridge between learning phonics and the application of phonics in independent reading” ([Florida Center for Reading Research, Glossary of Reading Terms](https://www.fcrr.org/node/1016)).

Decodable texts are used to promote transfer of phonics and decoding skills into real text. Teachers use decodable texts for a targeted purpose, as one part of a wide variety of texts students are exposed to throughout instruction. Decodable texts are most beneficial when children are early in their development of phonics knowledge; this timing varies for individual children. When students are learning basic phonics patterns, including those typically taught in kindergarten and first grade, decodable texts support applied practice.

##### Resources

* Teaching with Decodable Text, from 95% Group (recorded [Webinar](https://info.95percentgroup.com/decodables-webinar-replay?submissionGuid=6ca2b22f-d103-4f77-9483-07ef3da3a8ad))
* Decodable Text Sources, from The Reading League ([Resource](https://www.thereadingleague.org/wp-content/uploads/2020/11/Decodables-Update-November-2020.pdf))
* Decodable Readers Protocol, from Achieve the Core ([Instruction](https://achievethecore.org/content/upload/Decodable%20Reader%20Protocol_2018.pdf))
* [Free online decodable texts](https://portal.flyleafpublishing.com/), from Flyleaf Publishing
* [Free online decodable texts](https://www.speld-sa.org.au/services/phonic-books.html), from SPELD Australia

#### High-frequency Words

“Children must learn to quickly recognize words that appear frequently in all kinds of text, also known as high-frequency words. Because these words occur so often in text, learning to recognize them quickly will speed up the reading process so that students can focus more on the meaning of the text” ([Foorman et al, 2016](https://ies.ed.gov/ncee/wwc/Docs/PracticeGuide/wwc_foundationalreading_040717.pdf#page=28), page 28).

“Many high-frequency words are ‘grammatical glue’ necessary to form and read sentences, such as *do*, *does*, *were*, *are*, *was*, *of*” (Moats, 2019). High-frequency words may be regularly or irregularly spelled. Irregular words are words that have one or more letter-sound patterns that don’t correspond to their typical sounds. A majority of high-frequency words are regular or have just one irregular letter-sound pattern. Whether high-frequency words are regular or irregular, they should be taught associated with their spelling, sounds, and meaning, and **not** memorized as a single unit by “sight” (Moats & Tolman, 2019).

##### Resources

* Strategies for Teaching Irregular “Tricky Words,” from The Reading League ([Video](https://www.youtube.com/watch?v=R2F1_CNImec))
* A New Model for Teaching High-Frequency Words, from Reading Rockets([Instruction\*\*](https://www.readingrockets.org/article/new-model-teaching-high-frequency-words))
* High Frequency Words, from Literacy Instructional Routines to Support Foundational Skills Instruction, Idaho Department of Education ([Video](https://www.youtube.com/watch?v=-e9jbig1dgI))

#### Phonics and Decoding: Leveraging Linguistic Assets for Multilingual Learners

* Teachers should work with a child and their family to understand what literacy skills the child already developed in the home language. Many literacy skills built in the home language can “transfer” and support developing English literacy. For instance, once the concept of matching a symbol with a sound has been learned, it can be applied to new languages ([Colorín Colorado\*\*](https://www.colorincolorado.org/article/fostering-literacy-development-english-language-learners)).
* Systematic phonics instruction is effective in helping ELs learn to decode words, even students at lower levels of English language proficiency. However, decoding alone does not facilitate reading comprehension if students' oral language proficiency is not developed to the level of the texts they are expected to read (Helman, 2004; Droop & Verhoeven, 2003).
* English learners may have alphabet knowledge in a home language with similarities and differences from English. A child’s home language may use the same letters as English but have different names and sounds for each letter (e.g., Spanish). Or a child’s home language may use a different alphabet and English letters are not yet familiar (e.g., Cyrillic alphabet).
* ELs may feel anxious and/or frustrated about attempting to produce sounds in English. A supportive environment helps lower affective filter and promotes risk taking (Krashen & Terrell, 1983).
* During small-group time, provide extra practice opportunities with the sounds or sound patterns that are different from the student’s primary language, keeping in mind that precision from students will develop over time (Instruction Partners, 2021).

##### Supports for English Learners

* “An effective phonics program for English language learners uses a synthetic approach that follows a defined sequence and includes direct teaching of a set of letter-sound relationships” (Linan-Thompson & Vaughn, 2007).
* If students at the beginning of first grade do not know most letter names, teach letter names and letters sounds simultaneously, moving the instruction of letter-sounds at a quicker pace (Linan-Thompson & Vaughn, 2007).
* Empower students by explicitly teaching English letter-sound correspondences. Teach phonics explicitly using a multi-sensory approach, which may include tools such as manipulative tiles ([Foorman et al., 2016](https://ies.ed.gov/ncee/wwc/Docs/PracticeGuide/wwc_foundationalreading_040717.pdf#page=28)).
* Combine phonics and decoding instruction with intensive development of the oral language English Learners need for comprehension (Gersten & Geva, 2003).
* Plan writing activities that encourage children to practice making the letters they are learning and provide them opportunities to experiment with and manipulate letters to make words and messages (Blevins, 1998).
* Teach the meaning and use of high-frequency words when teaching students to recognize them in print ([Foorman et al., 2016](https://ies.ed.gov/ncee/wwc/Docs/PracticeGuide/wwc_foundationalreading_040717.pdf#page=28)).
* Pre-teaching vocabulary is an important part of good phonics instruction with ELs so that students aren't trying to figure out new vocabulary items out of context ([Colorín Colorado\*\*](https://www.colorincolorado.org/article/reading-101-english-language-learners#h-phonics-and-english-language-learners)).

##### Learn More

* [Phonics Challenges and Strategies for ELs\*\*](https://www.colorincolorado.org/article/reading-101-english-language-learners#h-phonics-and-english-language-learners), from Colorín Colorado
* [What Does Research Tell Us About Teaching Reading to English Language Learners?\*\*](https://www.colorincolorado.org/article/what-does-research-tell-us-about-teaching-reading-english-language-learners), from Colorín Colorado

## Fluency: What is This and Why Does This Matter?

“Reading **fluency** refers to efficient, effective word-recognition skills that permit a reader to construct the meaning of text. Fluency is manifested in *accurate, rapid, expressive oral reading* and is applied during, and makes possible, silent reading comprehension” ([Pikulski & Chard, 2005](https://www.researchgate.net/publication/250055749_Fluency_Bridge_Between_Decoding_and_Reading_Comprehension)).

Fluent reading is necessary for the ultimate goal of reading: comprehension. Labored decoding and recognition of words drains cognitive energy and attention away from the language and meaning of the text (Perfetti et al. 1996; [Pikulski & Chard, 2005](https://www.researchgate.net/publication/250055749_Fluency_Bridge_Between_Decoding_and_Reading_Comprehension)).

### Automatic Word Recognition is a Foundation of Fluency

All fluent readers can instantly and automatically recognize a large number of words, which researchers call the “sight vocabulary.” This sight vocabulary is a foundation of fluent reading. “[W]hen a reader has learned a ‘sight word,’ she can retrieve the spelling, pronunciation, and meaning of that word as soon as her eyes alight upon it (Pace Miles & Ehri, 2019). A reader must be able to decode a word, and connect the spelling to its sound and its meaning, to add it to long-term sight memory. Once basic decoding skills are “up and running,” readers can begin rapidly adding new words to the sight vocabulary as they encounter, read, and learn them through reading practice. This process is called *orthographic mapping*. Repeated oral reading is a proven practice to build fluency, once students have these basic decoding skills in place ([National Reading Panel](https://www.nichd.nih.gov/sites/default/files/publications/pubs/nrp/Documents/report.pdf), 2000, page 3-3).

#### Resources for Supporting the Development of Fluency

* Word Recognition, from Free Reading ([Activities](http://www.freereading.net/wiki/Word_Recognition_Activities.html))
* Connected text, from Florida Center for Reading Research ([Activities](https://www.fcrr.org/student-center-activities/kindergarten-and-first-grade#sca8))
* Connected text, from Free Reading ([Activities](http://www.freereading.net/wiki/Fluency_Activities.html))

#### Fluency: Leveraging Linguistic Assets for Multilingual Learners

Fluency is not just speed but also expression. Reading that is rapid but lacks expression and comprehension is not fluent. “Even though fluency instruction is important, teachers must remember that many ELLs can be deceptively fast and accurate while reading in English without fully comprehending the meaning of the text they are reading. That is because reading comprehension depends upon a variety of complex skills that are not as important to word reading. These include deep vocabulary knowledge, syntactical knowledge, and background knowledge of the subject discussed in the text” ([Colorín Colorado\*\*](https://www.colorincolorado.org/article/ells-and-reading-fluency-english)).

##### Supports for English Learners

* Repeated oral reading activities with feedback and guidance provide English learners with practice to develop word recognition and confidence (Linan-Thompson & Vaughn, 2007).
* Allow students to practice reading along with a recorded text; build background knowledge to support comprehension and vocabulary; use questions after reading to process information ([Colorín Colorado\*\*](https://www.colorincolorado.org/article/reading-101-english-language-learners)).

### Sources of Information for Educators: Foundational Skills in Grade 1

* Duke, N. and Mesmer, H. A. [Phonics Faux Pas: Avoiding Instructional Missteps in Teaching Letter-Sound Relationships](https://www.aft.org/ae/winter2018-2019/duke_mesmer), from American Educator (2018).
* [Foundational Skills Guidance](https://achievethecore.org/content/upload/Foundational%20Skills%20Guidance%20Document.pdf), from Achieve the Core
* Foundational Skills to Support Reading for Understanding in Kindergarten Through 3rd Grade, from the Institute of Education Sciences ([Research and information](https://ies.ed.gov/ncee/wwc/Docs/PracticeGuide/wwc_foundationalreading_040717.pdf#page=20), [Video playlist](https://www.youtube.com/playlist?list=PLVHqsnePfULo3KA8dspX6558xwZxVr2rB), [Guide for PLCs](https://ies.ed.gov/ncee/edlabs/regions/southeast/plc.asp))
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* [How Children Learn to Read Words: Ehri's Phases](https://education.ufl.edu/ufli/files/2020/03/EhriPhases.pdf), from University of Florida Literacy Institute
* [Meeting the Challenges of Early Literacy Phonics Instruction](https://www.literacyworldwide.org/docs/default-source/where-we-stand/ila-meeting-challenges-early-literacy-phonics-instruction.pdf), from International Literacy Association (2019).
* Orthographic Mapping: What It Is and Why It’s Important, from the Reading League ([video](https://www.youtube.com/watch?v=XfRHcUeGohc))
* [Phonological Awareness in Early Childhood Literacy Development](https://www.literacyworldwide.org/docs/default-source/where-we-stand/9457_Phonological_Awareness_1-2020_Final.pdf), from International Literacy Association (2020).
* MS Word download [The Role of Orthographic Mapping in Learning to Read](http://www.doe.mass.edu/massliteracy/literacy-block/foundational-skills/orthographic-mapping.docx), from Keys to Literacy [download]
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* Teaching Children To Read: An Evidence-Based Assessment of the Scientific Research Literature on Reading and Its Implications for Reading Instruction, from the National Reading Panel ([full report](https://www.nichd.nih.gov/sites/default/files/publications/pubs/nrp/Documents/report.pdf); [brief summary](https://www.nichd.nih.gov/publications/pubs/nrp/findings))
* Torgesen, J. [Avoiding the Devastating Downward Spiral: The Evidence That Early Intervention Prevents Reading Failure](https://www.aft.org/periodical/american-educator/fall-2004/avoiding-devastating-downward-spiral), from American Educator (2004).
* What Is Phonological Awareness, from Understood.org ([Video](https://www.youtube.com/watch?v=K0G6teawxls))

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