Synthetic and Analytic Instructional Routines

Synthetic and analytic practice activities are a core component of **science of reading-aligned literacy instruction**. When students engage both synthetic thinking skills and analytic thinking skills, they activate areas in the brain associated with the four language construct areas: reading, writing, speaking, and listening. Thus, instructional routines that incorporate synthetic and analytic thinking strengthen neural pathways associated with literacy proficiency and help students process and retain literacy skills.

Educators can use this infographic to double check that literacy lessons at all levels of instruction integrate both synthetic and analytic practice. This graphic is meant to be a starting point and idea generator for educators to then go and write lessons that include the skills listed in the chart. As a reminder, these routines should stay consistent as content increases in complexity. Additionally, all skills must be taught explicitly and systematically, following a logical **scope and sequence**. For more information on the benefits of synthetic and analytic practice, see our blog post **"Read It, Say It, Hear It, Write It: Instructional Routines That Engage the Four Language Skill Areas,"** by Meg Mechelke.

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Skill/Concept	Analytic Practice	Synthetic Practice
Letter/Sound Correspondence	See the letter, say the letter	Hear the sound, write the letter
Decoding Words	See the word, read the word	Hear the word, write the word
Reading Sentences	See the sentence, read the sentence	Hear the sentence, write the sentence
Learning Strategies	See syllable types/spelling patterns, read them out loud	Hear syllable types/spelling patterns, spell them accurately
Vocabulary Aquisition	Read and comprehend words, with and without context	Hear and comprehend words, with and without context
Comprehension Skills	Read and comprehend a text	Listen to and comprehend a text