

# Cognitive Load Theory

## INSTRUCTIONAL DESIGN TO SUPPORT ALL LEARNERS



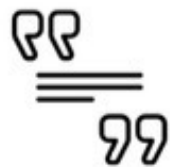
### CUT EXTRANEIOUS INFORMATION

Cognitive load theory tells us that students' working memories are easily overloaded. Remove unnecessary text, graphics, videos, and anything distracting, redundant, or irrelevant to the task.



### SIMPLIFY COMPLEX INFORMATION

Break tasks down into small steps. Use simple-to-complex sequencing. Pair verbal explanations with visuals. Avoid designs that split attention between two sources of information or require holding multiple pieces of information in mind.



### PROVIDE LOTS OF EXAMPLES EARLY

Cognitive load theory tells us to start with examples when introducing something new. Starting with an unguided task may overload working memory.



### ENCOURAGE VISUALIZATION AND SELF-EXPLANATION

Once information is familiar, prompt students to visualize or verbalize the information, either internally or aloud, to support understanding.



### SLOWLY FADE GUIDANCE

As proficiency grows, supports can be gradually removed. For all students, but especially students with executive functioning challenges, this might be more gradual than you're used to.

Learn more!

Research from Cognitive Load Theory  
(Paas & van Merriënboer, 2020; Sweller, 2019)

