An Overview of the *Cognitive Abilities Test (CogAT)*

What does the *CogAT* measure?

The *CogAT* measures learned reasoning skills, which are gained through experiences in and out of school, and which develop throughout a person's lifetime. These reasoning abilities are good predictors of a student's potential to succeed in school. The *CogAT* does not measure factors such as effort, attention, motivation, and work habits, which also contribute to school achievement. The *CogAT* measures reasoning skills in three different areas:

- The verbal section measures reasoning with words or with images that depict objects and concepts. The verbal score assesses vocabulary and word relationships. It is most predictive of reading achievement.
- The quantitative section measures reasoning and problem-solving abilities with numbers or with pictures that represent number concepts. The quantitative battery is most predictive of math achievement.
- The nonverbal section measures reasoning using geometric shapes and figures. No reading is required by the student in this section. The nonverbal score is least predictive of academic achievement.

The video Getting to Know CogAT provides examples of questions in each section.

How do I use the Profile Narrative?

The profile narrative includes the student's test scores and ability profile. The ability profile provides information about your child's overall level of performance, as well as the pattern of performance over the three batteries. For a more complete description of what each element in the ability profile means, watch the video Getting to Know CogAT Profiles. For more detailed information about your child's specific ability profile, including suggestions for using the score for instruction, enter your child's ability profile at https://www.riversideinsights.com/apps/cogat.

What if my child's *CogAT* scores are inconsistent (B, C, and E ability profiles)?

While many students score similarly across the three batteries, even more do not. These students exhibit a relative strength, a relative weakness, or both. Students with B profiles have a relative strength *or* a relative weakness, while students with C and E profiles have both a relative strength *and* a relative weakness. The differences are greater for students with E profiles. Because each domain uses a different symbol system and measures a different type of learned reasoning, it is not surprising that the majority of students have mixed abilities.

Should I be concerned if my child's *CogAT* and achievement scores aren't similar?

While learned reasoning abilities are a good predictor of academic achievement, ability and achievement tests measure different kinds of thinking. Students who score well on the *CogAT* are good at solving novel problems. Students who score well on achievement tests (e.g., *STAR, MAP,* and *CMAS*) are good at remembering and applying explicitly taught skills and knowledge. Furthermore, if a student has very high or very low scores, it's more likely that discrepancies will exist. However, if *CogAT* scores are significantly higher or lower than achievement scores, you may want to explore the following possible explanations.

- If achievement scores are lower than *CogAT* scores, the traditional explanation is a lack of student effort or opportunities in schooling. However, other possible explanations are that the student is particularly good at solving novel problems but has not learned to use these reasoning abilities to connect new knowledge and skills to what is already learned, or the student may have specific physical or learning disabilities.
- If achievement scores are higher than *CogAT* scores, the traditional explanation is the student may have especially good effort and instructional opportunities. However, the student may also have developed problem-solving strategies that work when the context is familiar rather than novel.

This PBS article is just one example of how to encourage more flexible thinking, which can help students apply what is learned in one context to a different context.

(Updated last 10/28/2020)