State of Texas Assessments of Academic Readiness (STAAR®) Performance Level Descriptors Grade 8 Mathematics

Performance Level Descriptors

The mathematical process skills describe ways in which students are expected to engage in the content. They are not assessed in isolation but are incorporated into questions that assess grade 8 content. The process skills focus on applying mathematics to solve problems, analyze mathematical relationships, and communicate mathematical ideas.

Students achieving Masters Grade Level Performance can

- Describe relationships between sets of real numbers
- Use multiple representations of proportional and non-proportional linear relationships
- Model one-variable inequalities with variables on both sides of the inequality sign
- Use algebraic representations to describe the effects of rotations, reflections, translations, and dilations

Students achieving Meets Grade Level Performance can

- Represent and use real numbers in a variety of forms
- Use proportional relationships to describe dilations
- Solve problems involving rotations, reflections, translations, and dilations
- Model and solve one-variable equations with variables on both sides of the equal sign

Students achieving Approaches Grade Level Performance can

- Identify proportional relationships
- Use models and diagrams to explain the Pythagorean theorem
- Identify transformations that preserve congruence
- Use trend line to make predictions
- Solve problems involving interest and savings
- Determine the rate of change or slope from a table or graph
- Solve problems involving surface area and volume

Students achieving Did Not Meet Grade Level Performance can

- Solve problems using direct variation
- Solve application problems involving the Pythagorean theorem
- Use proportional and non-proportional relationships to develop foundational concepts of functions
- Approximate the value of irrational numbers