

TCAP Achievement, Grade 7, Mathematics
Criterion Referenced Test (CRT) Reporting Categories with State Performance Indicators

Mathematical Processes	
SPI#	State Performance Indicator
0706.1.1	Use proportional reasoning to solve mixture/concentration problems.
0706.1.2	Generalize a variety of patterns to a symbolic rule from tables, graphs, or words.
0706.1.3	Recognize whether information given in a table, graph, or formula suggests a directly proportional, linear, inversely proportional, or other nonlinear relationship.
0706.1.4	Use scales to read maps.
Number and Operations	
SPI#	State Performance Indicator
0706.2.1	Simplify numerical expressions involving rational numbers.
0706.2.2	Compare rational numbers using appropriate inequality symbols.
0706.2.3	Use rational numbers and roots of perfect squares/cubes to solve contextual problems.
0706.2.4	Determine the approximate location of square/cube roots on a number line.
0706.2.5	Solve contextual problems that involve operations with integers.
0706.2.6	Express the ratio between two quantities as a percent, and a percent as a ratio or fraction.
0706.2.7	Use ratios and proportions to solve problems.
Algebra	
SPI#	State Performance Indicator
0706.3.1	Evaluate algebraic expressions involving rational values for coefficients and/or variables.
0706.3.2	Determine whether a relation (represented in various ways) is a function.
0706.3.3	Given a table of inputs x and outputs $f(x)$, identify the function rule and continue the pattern.
0706.3.4	Interpret the slope of a line as a unit rate given the graph of a proportional relationship.
0706.3.5	Represent proportional relationships with equations, tables and graphs.
0706.3.6	Solve linear equations with rational coefficients symbolically or graphically.
0706.3.7	Translate between verbal and symbolic representations of real-world phenomena involving linear equations.
0706.3.8	Solve contextual problems involving two-step linear equations.
0706.3.9	Solve linear inequalities in one variable with rational coefficients symbolically or graphically.
Geometry and Measurement	
SPI#	State Performance Indicator
0706.4.1	Solve contextual problems involving similar triangles.
0706.4.2	Use SSS, SAS, and AA to determine if two triangles are similar.
0706.4.3	Apply scale factor to solve problems involving area and volume.
Data Analysis, Statistics, and Probability	
SPI#	State Performance Indicator
0706.5.1	Interpret and employ various graphs and charts to represent data.
0706.5.2	Select suitable graph types (such as bar graphs, histograms, line graphs, circle graphs, box-and-whisker plots, and stem-and-leaf plots) and use them to create accurate representations of given data.
0706.5.3	Calculate and interpret the mean, median, upper-quartile, lower-quartile, and interquartile range of a set of data.
0706.5.4	Use theoretical probability to make predictions.