

Secondary Math Standards & Objectives

Instructions: Choose one of the following learning objectives for your sample lesson. The state standard is also provided to you for reference.

*SWBAT-Students will be able to

Middle School Math

Objective: SWBAT* decide whether two quantities are in a proportional relationship

TN State Standard: 7.RP.A.2 Recognize and represent proportional relationships between quantities. a. Decide whether two quantities are in a proportional relationship (e.g., by testing for equivalent ratios in a table or graphing on a coordinate plane and observing whether the graph is a straight line through the origin).

Objective: SWBAT perform operations with numbers expressed in scientific notation.

TN State Standard: 8.EE.A.4 Perform operations with numbers expressed in scientific notation, including problems where both decimal and scientific notation are used. Use scientific notation and choose units of appropriate size for measurements of very large or very small quantities (e.g., use millimeters per year for seafloor spreading). Interpret scientific notation that has been generated by technology.

Algebra

Objective: SWBAT distinguish between situations that can be modeled with linear functions and with exponential functions.

TN State Standard: A1.F.LE.A.1 Distinguish between situations that can be modeled with linear functions and with exponential functions.
a. Recognize that linear functions grow by equal differences over equal intervals and that exponential functions grow by equal factors over equal intervals.

Geometry

Objective: SWBAT determine if two figures are similar using the definition of similarity.

TN State Standard: G.SRT.A.2 - Given two figures, use the definition of similarity in terms of similarity transformations to decide if they are similar; explain using similarity transformations the meaning of similarity for triangles as the equality of all corresponding pairs of angles and the proportionality of all corresponding pairs of sides.

Algebra 2

Objective: SWBAT identify the zeros of a polynomial and construct a rough graph

TN State Standard: A2.A.APR.A.2 Identify zeros of polynomials when suitable factorizations are available, and use the zeros to construct a rough graph of the function defined by the polynomial.