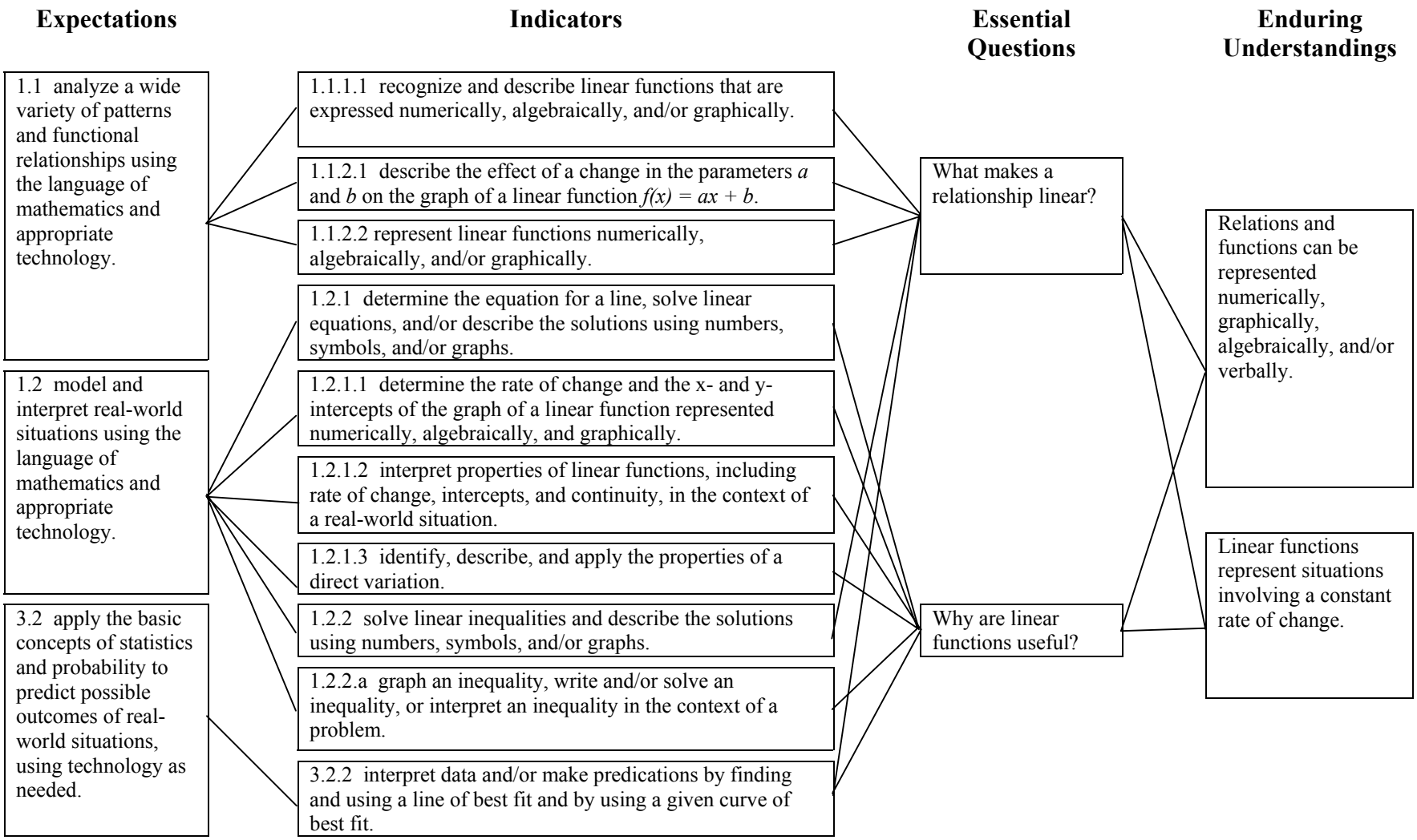
Expectations
Indicators
Essential Questions
Enduring Understandings
1.1 analyze a wide variety of patterns and functional relationships using the language of mathematics and appropriate technology.
1.2 model and interpret real-world situations using the language of mathematics and appropriate technology.
3.2 apply the basic concepts of statistics and probability to predict possible outcomes of real-world situations, using technology as needed.
1.1.1.1 recognize and describe linear functions that are expressed numerically, algebraically, and/or graphically.
1.1.2.1 describe the effect of a change in the parameters a and b on the graph of a linear function f(x) = ax + b.
1.1.2.2 represent linear functions numerically, algebraically, and/or graphically.
1.2.1 determine the equation for a line, solve linear equations, and/or describe the solutions using numbers, symbols, and/or graphs.
1.2.1.1 determine the rate of change and the x- and y-intercepts of the graph of a linear function represented numerically, algebraically, and graphically.
1.2.1.2 interpret properties of linear functions, including rate of change, intercepts, and continuity, in the context of a real-world situation.
1.2.1.3 identify, describe, and apply the properties of a direct variation.
1.2.2 solve linear inequalities and describe the solutions using numbers, symbols, and/or graphs.
1.2.2.a graph an inequality, write and/or solve an inequality, or interpret an inequality in the context of a problem.
3.2.2 interpret data and/or make predications by finding and using a line of best fit and by using a given curve of best fit.
What makes a relationship linear?
Why are linear functions useful?
Relations and functions can be represented numerically, graphically, algebraically, and/or verbally.
Linear functions represent situations involving a constant rate of change.