

GRADE 8 Patterns and Relations Specific Outcomes	Key Concepts in Patterns underpinning Curriculum Outcomes from FSIM: Operations Resource Book and Data Management and Probability Book	Sample Diagnostic Tasks and Activities	Sample Learning Tasks Selected from FSIM: Operations Resource Book AND Data Management and Probability Book	Math Station Ideas:
P8.1 Demonstrate understanding of linear relations concretely, pictorially (including graphs), physically, and symbolically. P8.2 Model and solve problems using linear equations of the form: $ax = b$ $\frac{x}{a} = b, a \neq 0$ $ax + b = c$ $\frac{x}{a} + b = c, a \neq 0$ $a(x + b) = c$ concretely, pictorially, and symbolically, where a, b, and c are integers.	Summarize and Represent Data KU3: • We can display data visually; some graphs and plots show how two quantities are related. Interpret Data KU1: • Graphs, tables, and diagrams display data about the real world, although they are not pictures of the real world. We need to learn how to read them. Patterns and Algebra KU3: • To describe a number pattern means to provide a precise rule that produces the pattern. Patterns and Algebra KU4: • There are strategies that help us become better at recognizing common types of patterns.		Data Management: 186-189 • Measuring Lids 1, 2 • Ordered Measurements Data Management: 235 • Hockey Graph • Junk Food • Buying Chips Operation Sense: 250-251 • Everyday Formulas • Hexagon Patterns • Graphs Operation Sense: 259-261 • Pattern Pairs • Sticky Instructions • Classifying • Graphs	Kahn Academy: Linear Equations and Functions (online interactive) Save the Zogs (online interactive) Graphing Equations Card Sort (printable) Matching Activity: Linear Equations, Graphs, Tables, and Stories (printable) Real World Graphing of Linear Relationships (printable) Teaching Linear Relationships Using Real World Examples (printable)