Objective

By the end of this lesson, you will be able to understand and work with rational numbers effectively.

Materials and Prep

- Pencil and paper
- Rational numbers worksheet (provided)

Activities

- Start by reviewing the definition of rational numbers. Write down the definition in your own words and provide a few examples.
- Complete the provided worksheet on rational numbers. Solve the given problems and show your work.
- Create a visual representation of a rational number using a number line. Choose a few examples and mark them on the number line, labeling each point with its corresponding rational number.
- Play a game of "Rational Number War" with a partner. Each player draws two cards from a deck of playing cards. The first card represents the numerator, and the second card represents the denominator. Compare the two rational numbers and determine the larger one. Keep track of the number of rounds won by each player.

Talking Points

- "Rational numbers are numbers that can be expressed as a fraction or a ratio of two integers. For example, 1/2, -3/4, and 5/1 are all rational numbers."
- "Rational numbers can be positive, negative, or zero. The sign of the rational number is determined by the sign of the numerator."
- "To add or subtract rational numbers, we need to have a common denominator. If the denominators are different, we need to find the least common multiple (LCM) of the denominators and convert the fractions to have the same denominator."
- "When multiplying or dividing rational numbers, we simply multiply or divide the numerators and the denominators. Remember to simplify the resulting fraction if possible."

- "Rational numbers can also be represented on a number line. The position of the rational number on the number line corresponds to its value."