

## Order of Operations with Fractions (J)

Name: \_\_\_\_\_

Date: \_\_\_\_\_

Simplify each expression using the correct order of operations.

$$\left(\left(-\frac{5}{9}\right) \div \left(\frac{2}{3}\right)^2\right) \times \left(\left(-\frac{1}{2}\right) + \frac{5}{8} - \frac{5}{9} - \left(-\frac{3}{8}\right)\right)$$

$$\left(\frac{3}{8} - \left(-\frac{7}{9}\right) + \left(-\frac{7}{8}\right) \div \frac{7}{9} \times \left(-\frac{5}{9}\right)\right) \times \left(-\frac{1}{4}\right)^3$$

## Order of Operations with Fractions (J)

Name: \_\_\_\_\_

Date: \_\_\_\_\_

Simplify each expression using the correct order of operations.

$$\begin{aligned} & \left( \left( -\frac{5}{9} \right) \div \left( \frac{2}{3} \right)^2 \right) \times \left( \left( -\frac{1}{2} \right) + \frac{5}{8} - \frac{5}{9} - \left( -\frac{3}{8} \right) \right) \\ &= \left( \left( -\frac{5}{9} \right) \div \frac{4}{9} \right) \times \left( \left( -\frac{1}{2} \right) + \frac{5}{8} - \frac{5}{9} - \left( -\frac{3}{8} \right) \right) \\ &= \left( -\frac{5}{4} \right) \times \left( \left( -\frac{1}{2} \right) + \frac{5}{8} - \frac{5}{9} - \left( -\frac{3}{8} \right) \right) \\ &= \left( -\frac{5}{4} \right) \times \left( \frac{1}{8} - \frac{5}{9} - \left( -\frac{3}{8} \right) \right) \\ &= \left( -\frac{5}{4} \right) \times \left( \left( -\frac{31}{72} \right) - \left( -\frac{3}{8} \right) \right) \\ &= \left( -\frac{5}{4} \right) \times \left( -\frac{1}{18} \right) \\ &= \frac{5}{72} \end{aligned}$$

$$\begin{aligned} & \left( \frac{3}{8} - \left( -\frac{7}{9} \right) + \left( -\frac{7}{8} \right) \div \frac{7}{9} \times \left( -\frac{5}{9} \right) \right) \times \left( -\frac{1}{4} \right)^3 \\ &= \left( \frac{3}{8} - \left( -\frac{7}{9} \right) + \left( -\frac{9}{8} \right) \times \left( -\frac{5}{9} \right) \right) \times \left( -\frac{1}{4} \right)^3 \\ &= \left( \frac{3}{8} - \left( -\frac{7}{9} \right) + \frac{5}{8} \right) \times \left( -\frac{1}{4} \right)^3 \\ &= \left( \frac{83}{72} + \frac{5}{8} \right) \times \left( -\frac{1}{4} \right)^3 \\ &= \frac{16}{9} \times \left( -\frac{1}{4} \right)^3 \\ &= \frac{16}{9} \times \left( -\frac{1}{64} \right) \\ &= -\frac{1}{36} \end{aligned}$$