Multiplying Fractions

Multiply.

1)
$$\frac{4}{5}*-\frac{6}{6}$$

2)
$$\frac{3}{4} * - \frac{3}{3}$$

3)
$$\frac{1}{2} * \frac{1}{3}$$

4)
$$\frac{1}{5} * - \frac{1}{4}$$

5)
$$\frac{4}{6} * \frac{5}{7}$$

6)
$$\frac{3}{10} * \frac{2}{9}$$

7)
$$\frac{9}{5} * -\frac{7}{1}$$

8)
$$\frac{5}{8} * \frac{1}{8}$$

9)
$$\frac{2}{5}*-\frac{2}{5}$$

Multiplying Fractions

Date_____ Period____

Multiply.

1)
$$\frac{4}{5}*-\frac{6}{6}$$

Answer: $-\frac{4}{5}$

2)
$$\frac{3}{4} * - \frac{3}{3}$$

Answer: $-\frac{3}{4}$

3)
$$\frac{1}{2} * \frac{1}{3}$$

Answer: $\frac{1}{6}$

4)
$$\frac{1}{5} * - \frac{1}{4}$$

Answer: $-\frac{1}{20}$

5)
$$\frac{4}{6} * \frac{5}{7}$$

Answer: $\frac{10}{21}$

6)
$$\frac{3}{10} * \frac{2}{9}$$

Answer: $\frac{1}{15}$

7)
$$\frac{9}{5} * -\frac{7}{1}$$

Answer: $-12\frac{3}{5}$

8)
$$\frac{5}{8} * \frac{1}{8}$$

Answer: $\frac{5}{64}$

9)
$$\frac{2}{5}*-\frac{2}{5}$$

Answer: $-\frac{4}{25}$

Solution Steps

$$\begin{array}{c}
 1) \ \frac{4}{5} * - \frac{6}{6} \\
 \underbrace{(4 * - 6)} \\
 \underbrace{(5 * 6)} \\
 \underbrace{(4^2 * - 6^- 2)} \\
 \underbrace{(5 * 3^1)} \\
 - \frac{4}{5}
 \end{array}$$

$$4) \frac{1}{5} * - \frac{1}{4}$$
$$\frac{(1 * - 1)}{(5 * 4)}$$
$$-\frac{1}{20}$$

7)
$$\frac{9}{5} * -\frac{7}{1}$$

 $-12\frac{1}{5}$

Multiplying a fraction by and integer follows the same rules as multiplying fractions
An integer can be written as a fraction with a denominator of 1 $\frac{(9*-7)}{(5*1)}$

$$2) \frac{3}{4} * - \frac{3}{3}$$

$$\frac{(3*-3)}{(4*3)}$$

$$\frac{(3^{1}*-3)}{(4*3^{1})}$$

$$-\frac{3}{4}$$

$$5) \frac{4}{6} * \frac{5}{7} \\
(4 * 5) \\
\hline
(6 * 7) \\
(4^{2} * 5) \\
(6^{3} * 7) \\
\hline
\frac{10}{21}$$

8)
$$\frac{5}{8} * \frac{1}{8}$$

 $\frac{(5 * 1)}{(8 * 8)}$
 $\frac{5}{64}$

3)
$$\frac{1}{2} * \frac{1}{3}$$

$$\frac{(1*1)}{(2*3)}$$

$$\frac{1}{6}$$

$$6) \frac{3}{10} * \frac{2}{9}$$

$$\frac{(3 * 2)}{(10 * 9)}$$

$$\frac{(3^{1} * 2^{1})}{(10^{5} * 9^{3})}$$

$$\frac{1}{15}$$

9)
$$\frac{2}{5} * - \frac{2}{5}$$
 $\frac{(2*-2)}{(5*5)}$
 $\frac{4}{-\frac{25}{25}}$