

HW 10.3

Date _____ Algebra _____

Simplify each expression.

1) $\frac{1}{x-2} \cdot \frac{x^2 + 7x - 18}{5x}$

2) $\frac{5v^2 + 35v}{5v} \cdot \frac{3}{v+7}$

3) $\frac{m+4}{14m^2 + 7m} \div \frac{1}{16m+8}$

4) $\frac{p^2 - 4p - 12}{p-8} \div \frac{p-6}{p-8}$

5) $\frac{7p^2 - 46p - 80}{6} \cdot \frac{20p - 40}{35p^2 - 20p - 100}$

6) $(35v + 5) \div \frac{42v + 6}{6}$

$$7) \frac{n-2}{3n+18} - \frac{n-5}{3n+18}$$

$$8) \frac{5b}{5b^3} + \frac{2}{6}$$

$$9) \frac{2x}{2x+2} - \frac{3}{4x+4}$$

$$10) \frac{3}{v+1} - \frac{2}{v+2}$$

State the excluded values for each.

$$11) \frac{b^2 + 2b - 63}{6b + 54}$$

$$12) \frac{b+2}{b^3 + 7b^2 + 10b}$$