

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

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

**Learning Goal 6.2**

Solving equations, identifying any non-permissible values and extraneous roots.

Solve the following rational equations. State any non – permissible values and/or extraneous roots.

a.  $\frac{4}{5} = \frac{8}{d}$

b.  $\frac{1}{2x} - \frac{2}{5} = \frac{1}{10x}$

c.  $\frac{5}{x} + \frac{6}{x^2} = 6$

d.  $\frac{1}{8} = 1 + \frac{2}{x}$

e.  $\frac{3w^2}{w+4} = 5$

f.  $1 + \frac{v}{v-4} = 2v$