Solving Ratios

A. When the variable is in the numerator (on top)

example 1 $\frac{x}{3} = \frac{7}{9}$

$x = \frac{7(3)}{9}$

$= 2.3$

example 2 $\frac{15}{23} = \frac{h}{2}$

$\frac{15(2)}{23} = h$

$1.3 \doteq h$

B. When the variable is in the denominator (on bottom)

example 1 $\frac{15}{a} = \frac{7}{2}$ cross multiply

$\frac{7(a)}{7} = \frac{15(2)}{7}$

$a \doteq 4.3$

example 2 $\frac{14}{27} = \frac{3}{b}$

$\frac{14(b)}{14} = \frac{27(3)}{14}$

$b \doteq 5.8$