

Solve this equation for Q .

$$AB - QC = W$$

$$+QC \quad +QC$$

$$AB = W + QC$$

$$-W \quad -W$$

$$\frac{AB - W}{C} = \frac{QC}{C}$$

$$Q = \frac{AB - W}{C}$$

Solve this equation for Q .

Below is another way to solve for Q

$$AB - QC = W$$

$$-AB \quad -AB$$

$$\frac{-QC}{-C} = \frac{W - AB}{-C}$$

$$C = \frac{W - AB}{-C}$$

This answer is equivalent to the previous answer.

Solve this equation for K .

Below are two ways to solve for K . They lead to answers that look different but are actually equivalent (they are variations of each other).

$$G(K + E) - X = D$$

$$GK + GE - X = D$$

$$+X = +X$$

$$GK + GE = D + X$$

$$-GE = -GE$$

$$\frac{GK}{G} = \frac{D + X - GE}{G}$$

$$K = \frac{D + X - GE}{G}$$

$$G(K + E) - X = D$$

$$+X \quad +X$$

$$G(K + E) = D + X$$

$$\frac{G(K + E)}{G} = \frac{D + X}{G}$$

$$K + E = \frac{D + X}{G}$$

$$-E \quad -E$$

$$K = \frac{D + X}{G} - E$$

Solve this equation for M .

$$\frac{M + H}{R} + Z = J$$

$$-Z \quad -Z$$

$$R \left(\frac{M + H}{R} \right) = (J - Z)R$$

$$M + H = (J - Z)R$$

$$-H \quad -H$$

$$M = (J - Z)R - H$$

This is only one way to solve for M other steps will lead to answers that look different but are equivalent.

What happens to this equation if you evaluate for $A = 0$?

$$GK - \frac{M+R}{A} = D$$

$\frac{M+R}{A}$ becomes UNDEFINED!

The restriction
in this problem is $A \neq 0$

What happens to this equation if you evaluate for
 $G = 7$ and $H = 11$?

$$W + \sqrt{G-H} = N$$

$$W + \sqrt{7-11} = N$$

$$W + \sqrt{-4} = N$$

$\sqrt{G-H}$ is not a Real number!

Restriction
in this equation
 $G-H \geq 0$

or
 $G \geq H$

Solve for Q .

$$AB - QC = W$$

$$Q = \frac{W-AB}{-C}$$

State the restrictions on the variables.

$$C \neq 0$$

Solve this equation for K .

$$G(K+E) - X = D$$

$$K = \frac{D+X}{G} - E$$

State the restrictions on the variables.

$$G \neq 0$$