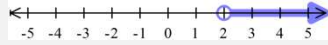


An **Inequality** can be solved just like an equation by placing letters on one side and numbers on the other side of the $<$ or $>$ sign. After a solution has been found, you can represent the answer on the number line.

Eg. $x + 4 > 2$
 $x > 2 - 4$
 $x > -2$



Eg. $4 \geq -3 + x$
 $4 + 3 \geq x$
 $7 \geq x$



Eg. $2x - 2 < 4$
 $2x < 4 + 2$
 $2x < 6$
 $x < 3$



1. Solve the inequality shown and represent on the number line provided.

a) $x - 2 > 1$

b) $x - 1 < 2$

c) $z - 2 \leq 0$

d) $w + 1 > -2$

e) $a - 5 < -6$

f) $y + 1 \geq 5$

g) $p + 4 \geq 4$

h) $r - 1 \leq -3$

i) $m - 3 \leq 1$

j) $s + 2 > -2$

2. Solve the inequality shown and represent on the number line provided.

a) $2x + 2 < 4$

b) $3x - 11 \geq -2$

c) $3y - 6 \geq 0$

d) $9w + 1 < -8$

e) $5a - 2 > -12$

f) $5y + 6 \geq -9$

g) $4x > 4 + 3x$

h) $2x - 4 > -2$

i) $3y \leq 0 - 12$

j) $9 + 7w \geq -12$

k) $3 + 2q < 5$

l) $8y - 15 < 9$

m) $3x - 3 > 3$

n) $4 + x \geq 5$