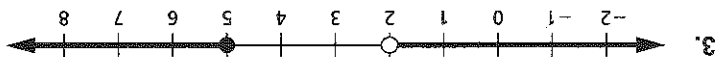
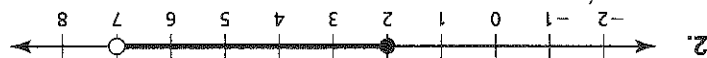
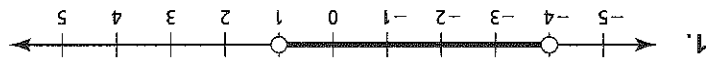


# 2.5

## Practice A

In Exercises 1–3, write a compound inequality that is represented by the graph.



In Exercises 4–6, write the sentence as an inequality. Graph the inequality.

4. A number  $t$  is less than 5 and greater than 3.

5. A number  $m$  is less than  $-3$  or greater than or equal to 1.

6. A number  $s$  is at least  $-2$  or less than  $-6$ .

7. You are purchasing a new refrigerator. To fit in the space, the width of the refrigerator cannot be more than 42 inches. To meet your storage requirements, the width of the refrigerator must be at least 36 inches. Write a compound inequality that represents this range.

In Exercises 8–13, solve the inequality. Graph the solution.

8.  $3 < x + 4 \leq 10$

9.  $15 > -5t \geq -10$

10.  $-4 \geq 8 - 4q \geq -12$

11.  $h + 7 < 5$  or  $-9h < -45$

12.  $-11 > m + 4$  or  $2m \geq -16$

13.  $3w + 2 < 5$  or  $-w + 8 \leq 2$

14. A bike shop rents bikes with heights ranging from 18 inches to 26 inches. The shop says the height of the bike should be about 0.6 times a cyclist's leg length. Write and solve a compound inequality that represents the leg lengths of the cyclists the shop does *not* provide bikes for.

In Exercises 15–18, solve the inequality. Graph the solution, if possible.

15.  $24 < -5t + 4 < 16$

16.  $3p - 2 \geq 4$  or  $7p > -28$

17.  $-n + 5 \leq 9$  and  $n + 3 > 8$

18.  $a - 6 \leq 3$  or  $3a + 2 > 8$