

Solving Inequalities

A4

*Copy problems onto your own paper and show work.***Graph each inequality on a number line.**

1. $3 < x < 5$

2. $x \leq -4$ or $x \geq -1$

Solve for x . Give answers in simplest form—no decimals. Graph the solutions on number lines.

3. $4 \leq x - 7 \leq 15$

4. $-3 \leq 2x + 5 \leq 11$

5. $-7 < -1 - 6x < 11$

6. $1 < \frac{2}{5}x + 3 < 7$

7. $x - 4 \leq 2$ or $x - 4 \geq 12$

8. $2x + 1 > 13$ or $-18 > 7x + 3$

9. $1 - 5x \leq -14$ or $-3x - 2 \geq 7$

10. $15 - 4.2x > 6.6$

11. $2x + 2(4 + x) > 3(-x - 2)$

12. $\frac{2}{3}x + \frac{1}{4} \geq 2x - \frac{5}{6}$

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