

Math 230 – Chapter 8 Review

1) Solve: $3(2x-5) - x = 2x - 48$

2) Solve: $|x-9| + 6 = 13$

3) Solve: $|2x+1| - 9 = -4$

4) Solve: $3x - 7 \leq 17$

5) Solve: $-2x + 1 < -11$

6) Solve: $-5 < 3x + 1 \leq 28$

7) Solve: $|x-6| \leq 4$

8) Solve: $|2x+5| + 3 > 16$

9) Solve: $|3x-1| + 8 > 5$

10) Solve: $|x+9| - 15 < -22$

11) Solve: $|4x-7| = -9$

12) Graph: $f(x) = -\frac{2}{3}x + 8$

13) Graph: $f(x) = 5x + 1$

14) Graph, state the domain & range: $f(x) = |x-5| - 4$

15) Graph, state the domain & range: $f(x) = -|x+3| + 1$

16) Factor completely: $x^2 - 8x - 20$

17) Factor completely: $x^2 + 10x + 24$

18) Factor completely: $3x^2 + 27x - 66$

19) Factor completely: $2x^2 - 13x - 24$

20) Factor completely: $4x^2 - 49$

21) Factor completely: $x^3 - 216$

22) Factor completely: $x^3 + 729$

23) Solve: $x^2 - 3x - 11 = 2x + 25$