

# Algebra Review Asssignment

**Solve each equation.**

1)  $-7m - m = 8$

2)  $-1 + 8n + 2 = -23$

3)  $4(-2n + 7) = 84$

4)  $8(1 - 3n) = -160$

5)  $-8(-8 - n) + 5(2 - 6n) = -80$

6)  $-4(1 - 2r) - 5(-5r - 3) = -55$

7)  $4(p + 8) = 8p - 8(p - 6)$

8)  $4(1 + v) = 4(-4v - 4)$

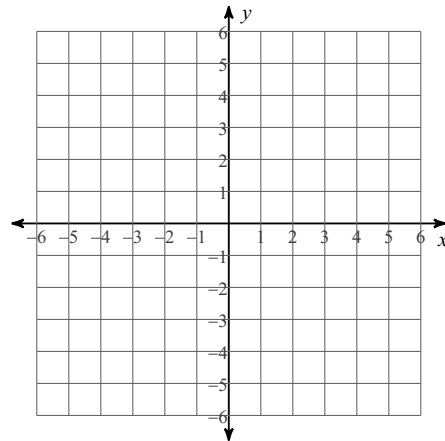
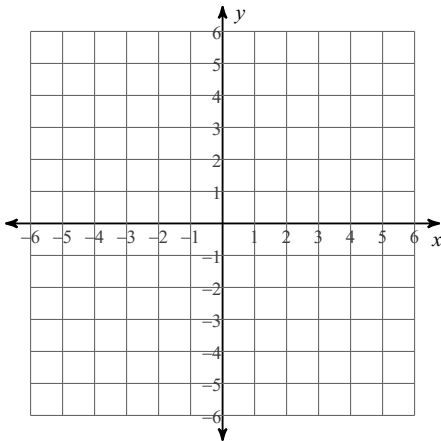
9)  $-4(5 + 8r) = -5r - 8(3r - 2)$

10)  $7(4 + 2n) + 6 = -4 + 6(n + 1)$

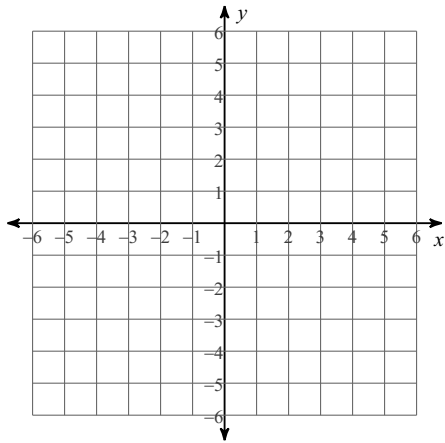
**Sketch the graph of each line.**

11)  $y = -\frac{2}{5}x - 3$

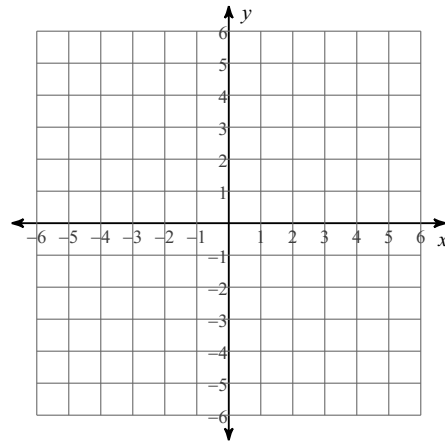
12)  $y = -\frac{1}{4}x + 3$



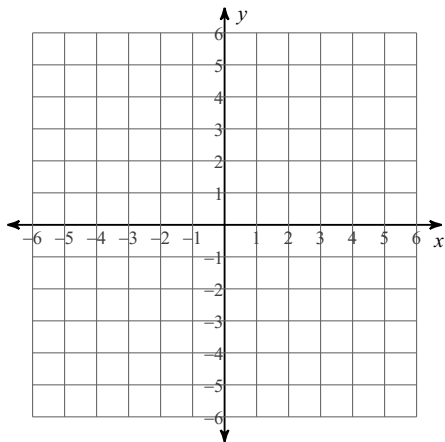
13)  $y = 3x - 3$



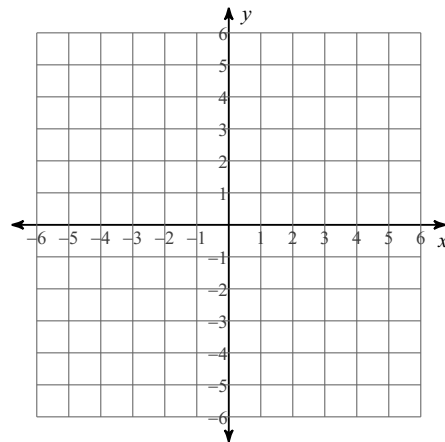
14)  $x = -3$



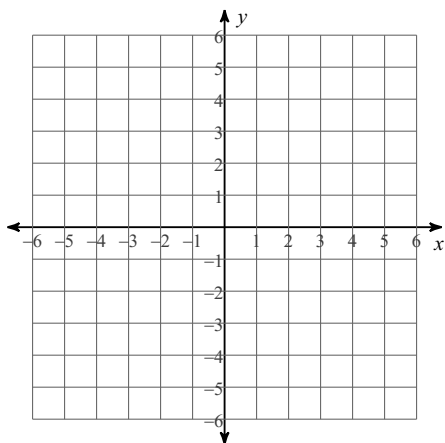
15)  $4x + 5y = -5$



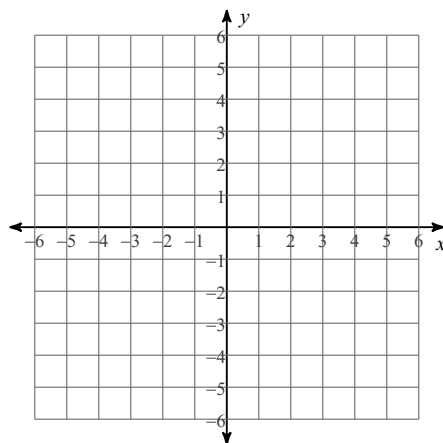
16)  $x + 3y = -3$



17)  $2x - y = -2$



18)  $4x + 5y = 0$



**Factor each completely.**

19)  $a^2 + 10a + 16$

20)  $a^2 - 14a + 48$

21)  $n^2 - 36$

22)  $n^2 + 9n + 8$

23)  $x^2 + 10x + 21$

24)  $r^2 - 2r - 8$

25)  $3n^2 - 19n + 30$

26)  $3k^2 + 17k - 56$

27)  $15x^2 + 69x - 126$

28)  $9n^2 - 57n - 120$

29)  $10x^2 + 7x - 45$

30)  $9x^2 + 36x + 32$