

Math 8 11.4
Solving with Brackets

Name _____

Date _____

Rewrite each expression using the distributive property.

1. $4(a + b)$

2. $k(x + y)$

3. $4(c - 6)$

4. $a(x - y)$

5. $(x + 1)y$

6. $(c + d)9$

7. $(m + n)p$

8. $(y - 2)7$

9. $6(2k - 3m)$

10. $6\left(m + \frac{1}{2}\right)$

11. $(m + n + 1)(4)$

12. $\frac{4}{7}(21m - 35p)$

13. $\frac{3}{2}(8y + 2)$

14. $\frac{4}{7}(21m - 35p)$

Solve and check.

15. $2(x + 1) = 3x - 8$;

16. $10a + 6 = 2(a + 9)$;

17. $3(a - 8) = -24$

18. $68 = -4(m + 9)$

19. $8(z - 3) = -25$

20. $9(7h + 8) = 72$

21. $10(3r + 8) = 45$

22. $3(6p - 13) = -3$

23. $-12(1 - 2y) = 108$

24. $4(y - 9) - 10y = 0$

25. $-3(z + 5) + 29 = -10$

26. $22 = 5b + 7(b - 2)$

27. $-19 - 6(w - 8) = 35$

28. $5\left(3r - \frac{3}{4}\right) = 0$

29. $-20\left(5 - \frac{1}{4}p\right) = -15$

30. $48 = 18\left(\frac{2}{3}w - 1\right)$

31. $-15\left(3y + \frac{8}{5}\right) = 66$

32. $4(2a - 2) = -2(1 - 5a)$

33. $2(3u + 10) = 5(4 - 2u)$

34. $-3(8 + 2y) = 2(y - 8)$

Answer List

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|--------------------|-------------------|--------------------|
| 1. $4a + 4b$ | 2. $kx + ky$ | 3. $4c - 24$ |
| 4. $ax - ay$ | 5. $xy + y$ | 6. $9c + 9d$ |
| 7. $mp + np$ | 8. $7y - 14$ | 9. $12k - 18m$ |
| 10. $6m + 3$ | 11. $4m + 4n + 4$ | 12. $12m - 20p$ |
| 13. $12y + 3$ | 14. $12m - 20p$ | 15. $12m - 20p$ |
| 16. $12m - 20p$ | 17. 0 | 18. -26 |
| 19. $-\frac{1}{8}$ | 20. 0 | 21. $-\frac{7}{6}$ |
| 22. 2 | 23. 5 | 24. -6 |
| 25. 8 | 26. 3 | 27. -1 |
| 28. $\frac{1}{4}$ | 29. 17 | 30. $\frac{23}{4}$ |
| 31. -2 | 32. -3 | 33. 0 |
| 34. -1 | | |

Catalog List

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