Integer Order of Operations Worksheet

All work must be shown for credit.

1. $6-15\div 3$

$=6-5$

$=1$

2. $-10\div 2+1$

$-5+1$

$=-4$

3. $3(4-7)-(-6)$

$3(-3)+6$

$=-9+6$

$=-3$

4. $1-(9-4)\div 5$

$1-(5)\div 5$

$1-1$

$=0$

5. $7-(-2)^3$

$7-(-8)$

$=15$

6. $(-2)^3-(-5)$

$-8+5$

-3

7. $2(-6+2)\div 4$

$2(-4)\div 4$

$-8\div 4$

-2

8. $7-3(4-5)$

$7-3(-1)$

$7+3=11$

9. $8-(-4)^2-5$

$8-(16)-5$

-13

10. $-7+1^2+2$

$-7+1+2$

-4

11. $-3^3-6(-2)-2$

$-27+12-2$

-17

12. $5\cdot 3-(-3)^3$

$15-(-27)$

$=42$

13. $-8(2-6)\div 2$

$-8(-4)\div 2$

$32\div 2$

$=16$

14. $4(6-9)\div 6$

$4(-3)\div 6$

$-12\div 6$

$=-2$

15. $-8(2-5)\div(-4)$

$-8(-3)\div(-4)$

$24\div(-4)$

-6

16. $8-3\cdot 2-33\div 11$

$8-6-3$

-1

17. $9-3(6\div 2)$

$9-3(3)$

$9-9$

$=0$

18. $(-3)^2-(-2)^2-1$

$9-4-1$

$5-1$

4

19. $7\cdot 2-5\cdot 3$

$14-15$

-1

20. $20\div 4-14\div 2$

$5-7$

-2

21. $2^3-6\cdot 2+3$

$8-12+3$

-1

22. $(-3)^2\cdot(5-7)^2-(-9)\div 3$

$9\cdot 2^2-(-3)$

$9\cdot 4+3$

$36+3$

39

23. $1^3-6\div(-3)$

$1+2$

$=3$

24. $4\cdot 5-10-2(1-2)+5$

$20-10-2(-1)-5$

$10+2-5$

$12-5$

7

25. $(-1)\cdot(2-6)^2 \div 8 + 8 - 3\cdot 4$

$(-1)(-4)^2 \div 8 + 8 - 12$

$(-1)(16) \div 8 + 8 - 12$

$-16 \div 8 + 8 - 12$

$-2 + 8 - 12$

$= -6$

26. $5-(-3)^2-6$

$5 - 9 - 6$

$= -10$

27. $10 \div 5 - (-2)^2$

$2 - 4$

$= -2$

28. $20-2\cdot 7+1-(-3)+10$

$20 - 14 - 1 + 3 + 10$

$= 18$

Given $w = -1$, $x = 6$, $y = 3$, and $z = -2$; evaluate the following:

29. $4w + 2y$

$4(-1) + 2(3)$

$-4 + 6$

2

30. $x - 3(-z)$

$6 - 3(--2)$

$6 - 6$

$= 0$

31. $xy \div z$

$(6)(3) \div -2$

$18 \div -2$

$= -9$

32. $9z \div x$

$9(-2) \div 6$

$-18 \div 6$

-3

33. $x^2 - y^2$

$6^2 - 3^2$

$36 - 9$

$= 27$

34. $y^2 - z^2$

$3^2 - (-2)^2$

$9 - 4$

$= 5$

35. $\dfrac{2x+y}{z+w}$

$\dfrac{2(6)+3}{-2+(-1)} = \dfrac{15}{-3} = -5$

36. $\dfrac{3x-z}{-w}$

$\dfrac{3(6)-(-2)}{-(-1)} = \dfrac{20}{1} = 20$

37. $\dfrac{x+w}{y-z}$

$\dfrac{6+(-1)}{3-(-2)} = \dfrac{5}{5} = 1$

38. $\dfrac{xy}{z} \div w$

$\dfrac{(6)(3)}{-2} = -9$

39. $(-x+z)^2 \div 8$

$(-6+-2)^2 \div 8$

$(-8)^2 \div 8$

$64 \div 8$

$= 8$

40. $(y+z)^2 + (w-x)^2$

$(3+(-2))^2 + (-1-6)^2$

$5^2 + (-7)^2$

$25 + 49$

$= 74$

ANSWERS

1. 1 **3.** –3 **5.** 15 **7.** –2 **9.** –13 **11.** –17 **13.** 16 **15.** –6 **17.** 0 **19.** –1 **21.** –1 **23.** 3
25. –6 **27.** –2 **29.** 2 **31.** –9 **33.** 27 **35.** –5 **37.** 1 **39.** 8