

NAME _____ DATE _____ PERIOD _____

7th Grade Advanced Math Summer Homework

Integers Review: NO CALCULATORS ALLOWED

***{There will be a test after returning to school on these skills.}**

Explain the rules for adding integers. _____

Explain the rules for subtracting integers. _____

Explain the rules for multiplying and dividing integers. _____

PART A) Add the integers.

1. $15 + (-12)$

2. $-18 + (-13)$

3. $24 + (-29)$

4. $-25 + 13$

5. $17 + (-8)$

6. $8 + (-5) + 5$

7. $9 + (-12) + 10$

8. $-2 + 19 + (-7)$

9. $15 + (-11) + 10$

10. $-17 + (-13)$

11. $-9 + 9 + (-4)$

PART B) Subtract the integers.

***YOU MUST REWRITE EACH PROBLEM AS AN ADDITION PROBLEM FIRST, THEN SOLVE IT! Show all work.**

12. $3 - 9$

13. $-4 - 4$

14. $-8 - 7$

15. $5 - 17$

16. $6 - (-6)$

17. $5 - 9$

18. $42 - (-31)$

19. $-13 - 8$

20. $4 - (-16)$

Evaluate each expression if $k = -3$, $p = 6$, $n = 1$, and $d = -8$. Show all work and rewrite each problem as addition first.

21. $55 - k$

22. $-p - 7$

23. $d - 15$

24. $n - 12$

25. $-51 - d$

26. $k - 21$

27. $k - p$

28. $n - d$

29. $d - p$

PART C) Multiply the integers. {NO CALCULATORS ALLOWED}

30. $4(-7)$

31. $-14(-5)$

32. $9(-12)$

33. $27(-3)$

34. $-11(-13)$

35. $-55(0)$

36. $-12(-4)$

37. $(-3)^2$

38. $(-8)^3$

39. $(-5)(8)$

40. $3(-1)$

41. $-7(-4)(8)$

PART D) Divide the integers. {NO CALCULATORS ALLOWED}

42. $42 \div (-7)$

43. $45 \div (-5)$

44. $-9 \div 3$

45. $-64 \div (-8)$

46. $-39 \div (-13)$

47. $-121 \div 11$

48. $\frac{-48}{12}$

49. $\frac{-35}{7}$

50. $\frac{-38}{-2}$

51. $\frac{32}{-16}$

52. $\frac{55}{-5}$

53. $\frac{-63}{7}$

Evaluate each expression below if $a = -2$, $b = -7$, $x = 8$, and $y = -4$.

54. $2y \div 1$

55. $\frac{x}{ay}$

56. $-y \div a$

57. $x^2 \div y$

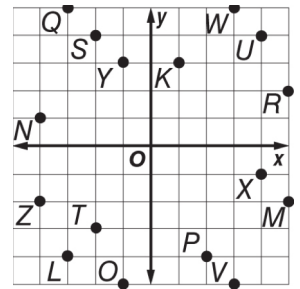
58. $\frac{ab}{1}$

59. $\frac{xy}{a}$

60. $x \div y$

PART E) The coordinate plane.

Use the coordinate plane at the right. Identify the point for each ordered pair.



61. $(-2, 4)$

62. $(-2, -3)$

63. $(4, 4)$

64. $(3, -5)$

65. $(3, 5)$

66. $(4, -1)$

67. $(-1, 3)$

68. $(-4, -2)$

Use the coordinate plane above. Write the ordered pair that names each point. Then identify the quadrant where each point is located.

69. K {ex. $(1,3)$ and it is in quadrant 1

70. L

71. M

72. N

73. O

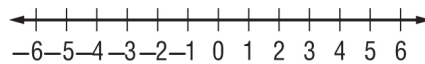
74. P

75. Q

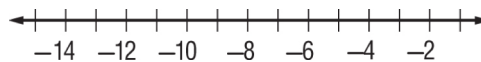
76. R

Graph each set of integers on a number line.

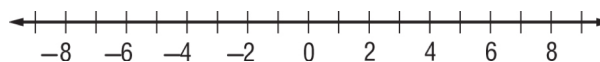
77. $\{-4, -3, 1, 5\}$



78. $\{-15, -12, -9, -2\}$



79. $\{8, 3, -7, -5\}$



80. $\{-14, -7, 10, -1\}$

