7th Grade Summer Math
2025-2026

Section 1: Order of Operations

Directions: Use PEMDAS to evaluate each expression. Show your work and circle your final answer.

1. $8 + 5 \times 2$	2. $[(3 + 6) - 2^3] \times 2$
3. $4 + 3 \times (2 + 1)$	4. $(12 \div 3) + (5 \times 2)$
5. $6^2 \div (4 + 2)$	6. $(8 + 2) \times 5^2$

Section 2: Multi-Digit Multiplication and Division

<u>Directions</u>: Multiply or divide. Show all of your work and circle your final answer.

7. 324×13	8. $1,253 \times 6$
9. 893×324	10. $9,648 \div 12$
11. $506 \div 11$	12. $8,496 \div 16$

Section 3: Adding and Subtracting Fractions

<u>Directions</u>: Add, subtract, multiply, or divide. Show your work and circle your final answer. Your final answer must be written in simplest form.

13. $\frac{1}{4} + \frac{2}{4}$	14. $\frac{3}{4} - \frac{3}{8}$
15. $\frac{1}{6} + \frac{5}{12}$	16. $\frac{3}{5} - \frac{4}{8}$
17. $\frac{2}{9} + \frac{1}{2}$	18. $\frac{1}{2} - \frac{3}{8}$

Section 4: Multiplying and Dividing Fractions

<u>Directions</u>: Multiply or divide. Show your work and circle your final answer. Your final answer must be written in simplest form.

19. $\frac{2}{3} \times \frac{4}{5}$	20. $\frac{10}{11} \div \frac{2}{5}$
21. $\frac{1}{2} \times \frac{3}{7}$	22. $\frac{7}{8} \div \frac{7}{12}$
23. $\frac{6}{7} \times \frac{1}{3}$	24. $\frac{8}{9} \div \frac{4}{5}$

Section 5: Adding and Subtracting Decimals

Directions: Add or subtract. Show your work and circle your final answer.

25. $3.5 + 4.2$	26. $7.6 - 3.1$
27. $7.15 + 3.85$	28. $10.0 - 6.5$
29. $2.33 + 1.67$	30. $9.8 - 4.6$

Section 6: Multiplying and Dividing Decimals

<u>Directions</u>: Multiply or divide. Show your work and circle your final answer.

31. 2.5×1.2	32. $4.8 \div 0.6$
33. 4.6×1.5	34. $12 \div 1.2$
35. 7.2×0.5	36. $9 \div 0.03$

Section 7: Evaluating Expressions

<u>Directions</u>: Evaluate each expression. Show your work and circle your final answer.

37. Evaluate $4a$ when $a = 3$.	38. Evaluate $m + 2m$ when $m = 4$.
39. Evaluate $b + 7$ when $b = 6$.	40. Evaluate $12 + p \div 4$ when $p = 8$.
41. Evaluate $10 - c$ when $c = 2$.	42. Evaluate $6z \div 3$ when $z = 9$.

Section 8: Solving Equations

<u>Directions</u>: Solve each equation. Show your work and circle your final answer.

43. Solve for x. $x + 4 = 10$	44. Solve for a. $\frac{a}{4} = 6$
45. Solve for y. $y - 5 = 9$	46. Solve for c. $2c + 1 = 9$
47. Solve for z. $3z = 15$	48. Solve for d. $\frac{d}{5} - 2 = 0$

Section 9: Integer Operations

<u>Directions</u>: Use the rules for integer operations to evaluate each expression. Show your work and circle your final answer.

49. $-5 + 3$	50. $-12 \div 4$
51. $-8 - 2$	52. $4 \times (-5)$
53. $6 - (-3)$	54. $9 + (-7)$

Section 10: Area and Perimeter

<u>Directions</u>: Read each question carefully and use the formulas for the area to solve. Do not forget to include units in your answer. Show your work and circle your final answer.

55. Find the area of a rectangle with length 8 cm and width 5 cm.	56. Find the perimeter of a square with side length 7 ft.
57. Find the perimeter of a rectangle with sides 9 m and 4 m.	58. Find the area of a parallelogram with base 12 mi and height 3 mi.
59. Find the area of a triangle with base 10 mm and height 6 mm.	60. Find the area of a trapezoid with bases 7 in and 9 in and a height of 12 in.

Section 11: Solving Proportions

<u>Directions</u>: Solve each proportion. Show your work and circle your final answer.

61. Solve for x. $\frac{x}{3} = \frac{10}{6}$	62. Solve for y. $\frac{7}{y} = \frac{21}{9}$
63. Solve for x. $\frac{4}{x} = \frac{8}{12}$	64. Solve for z. $\frac{z}{8} = \frac{2}{4}$
65. Solve for k. $\frac{k}{5} = \frac{6}{15}$	66. Solve for h. $\frac{9}{h} = \frac{12}{3}$

Additional Resources

The following games and websites are available for additional practice.

- Virtual Number Line: https://www.coolmath4kids.com/manipulatives/number-line
- Tang Math Games: https://tangmath.com/games
- Math Minute: https://webmathminute.com/
- All Ten: https://beastacademy.com/all-ten
- Nerdle: https://nerdlegame.com/?v=202505221222
- Number Hive: https://play.numberhive.org/lobby