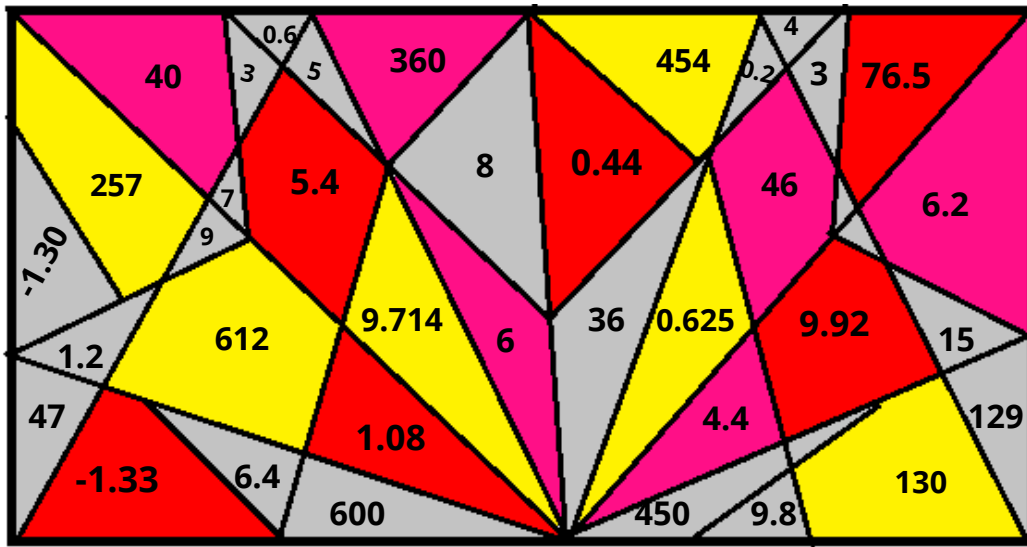


Answer



Find the value of each expression if $m=6$ & $n=28$

$$1. \frac{8 + 2m \div 4 + n}{8 + 2(6) \div 4 + 28} = \frac{20 \div 32}{0.625}$$

$$2. \frac{9n + 5}{9(28) + 5} = \frac{257}{257}$$

$$3. \frac{(m + n) + 16m}{(6 + 28) + 16(6)} = \frac{34 + 96}{34 + 96}$$

$$4. \frac{(3n - 16) \div 7}{[3(28) - 16] \div 7} = \frac{9.714}{9.714}$$

$$5. \frac{(7m - 6) + (15n - 2)}{[7(6) - 6] + [15(28) - 2]} = \frac{(42 - 6) + (420 - 2)}{454}$$

$$6. \frac{18(m + n)^{130}}{18(6 + 28)} = \frac{612}{612}$$

Find the value of each expression if $x=2, y=5, z=3$

$$7. \frac{(xyz + yxz)^2}{10} = \frac{(2 \times 5 \times 3 + 5 \times 2 \times 3)^2}{10} = \frac{3600}{10} = 360$$

$$8. \frac{x^2 + y^2 + z^2 + 28}{11} = \frac{(2)^2 + (5)^2 + (3)^2 + 28}{11} = \frac{66}{11} = 6$$

$$9. \frac{14 + 2y + 4x + 10y}{9 - x + z} = \frac{14 + 2 \times 5 + 4 \times 2 + 10 \times 3}{9 - 2 + 3} = \frac{62}{10} = 6.2$$

$$10. \frac{(xyz/yz)^2 + (12y/xy)^2}{[2 \times 5 \times 3 / 5 \times 3]^2 + [12 \times 5 / 2 \times 5]^2} = \frac{(2)^2 + (6)^2}{40} = 40$$

$$11. \frac{z^2 + (30 - 5y + 16x)}{(3)^2 + [30 - 5(5) + 16 \times 2]} = \frac{9 + (30 - 25 + 32)}{46} = \frac{46}{46} = 1$$

$$12. \frac{2x^2 + 4z^2}{xy} = \frac{2(2)^2 + 4(3)^2}{2 \times 5} = \frac{44}{10} = 4.4$$

Find the value of each expression if $a=1/2, b=5/2, c=3/2$

$$13. \frac{(a - b)(a + b)}{a + b + c} = \frac{(1/2 - 5/2)(1/2 + 5/2)}{1/2 + 5/2 + 3/2} = \frac{-4/3}{9/2} = -1.33$$

$$14. \frac{ab + bc + ca}{5a + 2c + 3b} = \frac{1/2 \times 5/2 + 5/2 \times 3/2 + 3/2 \times 1/2}{5(1/2) + 2(3/2) + 3(5/2)} = \frac{23/52}{23/52} = 0.44$$

$$15. \frac{18a(b^2 + c^2)}{9(34/4)} = \frac{18(1/2)[(5/2)^2 + (3/2)^2]}{9(34/4)} = \frac{76.5}{76.5} = 1$$

$$16. \frac{b}{a} + \frac{c - a}{b} = \frac{5/2}{1/2} + \frac{3/2 - 1/2}{5/2} = \frac{27}{5} = 5.4$$

$$17. \frac{a^2 - b^2}{a^2 + b^2} + 2a + 2b + 2c = \frac{(1/2)^2 - (5/2)^2}{(1/2)^2 + (5/2)^2} + 2 \times 1/2 + 2 \times 5/2 + 2 \times 3/2 = \frac{0.92 + 9}{9.92} = 9.92$$

$$18. \frac{a + 2b + 5a + c}{a^2 + b^2 + c^2} = \frac{1/2 + 2(5/2) + 5(1/2) + 3/2}{(1/2)^2 + 2(5/2)^2 + (3/2)^2} = \frac{38/35}{38/35} = 1.08$$