

See the ANSWERS below on PAGE 2.

Identify any mistake that may have been made simplifying the expression. If you find one, explain why it's incorrect and correct it. If not, then say "no mistake."

$$1) (5z^0xy^2)^2 = 5zx^2y^4$$

$$2) (3x^2y^4z^3)^{-2} = \left(\frac{1}{9x^4y^8z}\right)$$

$$3) \left(\frac{4x^{-2}y^3}{5x^4z^8}\right)^{-3} = \left(\frac{64x^{12}z^{30}}{125y^9}\right)$$

$$4) \frac{27x^2y^3}{9xy^4z^2} = \frac{3xz^2}{y}$$

$$5) 3x^2y^3z^4 \cdot 4x^3y^0z = 7x^5y^3z^4$$

Answers:

1) It didn't raise 5 to the second power and anything to 0 power is 1. $25x^2y^4$

2) z should be raised to the 6th power. $(3x^2y^4z^3)^{-2} = \left(\frac{1}{9x^4y^8z^6}\right)$

3) 4^{-3} *should be* $\frac{1}{64}$ *and* $\left(\frac{1}{5^{-3}}\right) = 125$

4) z should not have been moved to the numerator, it was not a negative exponent. $\frac{3x}{yz^2}$

5) 3 should be multiply by 4 and z should be raised to the fifth power. $12x^5y^3z^5$