

$$1) \sqrt[3]{56x^5y^3} = 3 \times 2 \times x^2y \sqrt{14xy}$$

$$2x^2y \sqrt{14xy}$$

$$2) \sqrt{144} = \sqrt{12^2} = 12$$

$$3) \sqrt[3]{64y^6} = \sqrt[3]{4^3y^2} = 4y^2$$

$$4) \sqrt[4]{81x^8} = \sqrt[4]{3^4x^2} = 3x^2$$

$$5) \sqrt[5]{3125R^{15}} = \sqrt[5]{\frac{3125R^{15}}{5}}$$