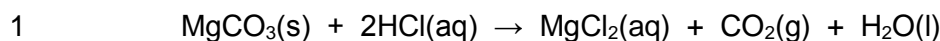


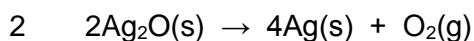
Moles Practice on Masses and Volumes

Assume that all gas volumes are measured at RTP. The molar volume of a gas at RTP is 24 dm^3 or $24\,000 \text{ cm}^3$



- (a) 8.40 g of magnesium carbonate reacts with excess hydrochloric acid. Calculate the volume of carbon dioxide produced. [2]

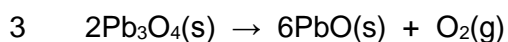
- (b) 0.200 mol of hydrochloric acid reacts with excess magnesium carbonate. Calculate the volume of carbon dioxide produced. [2]



2.32 g of silver oxide decomposes. Calculate:

- (a) the mass of silver produced [2]

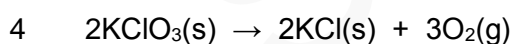
- (b) the volume of oxygen produced. [2]



6.85 g of Pb_3O_4 decomposes. Calculate:

- (a) the mass of lead oxide produced [2]

- (b) the volume of oxygen produced. [2]



2.45 g of KClO_3 decomposes. Calculate:

- (a) the mass of potassium chloride produced [2]

- (b) the volume of oxygen produced. [2]

- (c) the mass of oxygen produced. [2]