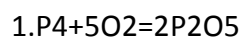


Consider a situation in which 112 g of P₄ are exposed to 112 g of O₂. What is the maximum amount of moles of P₂O₅ that I can theoretically be made from 112 g of P₄ and excess oxygen.

Solution:



2. $n(P_4) = 112/124 = 0.9 \text{ mol};$

3. $n(O_2) = 112/32 = 3.5 \text{ mol};$

4. $n(P_2O_5) = 3.5 \times 2/5 = 1.4 \text{ mol}.$

Answer: $n(P_2O_5) = 1.4 \text{ mol}.$

Answer provided by www.AssignmentExpert.com