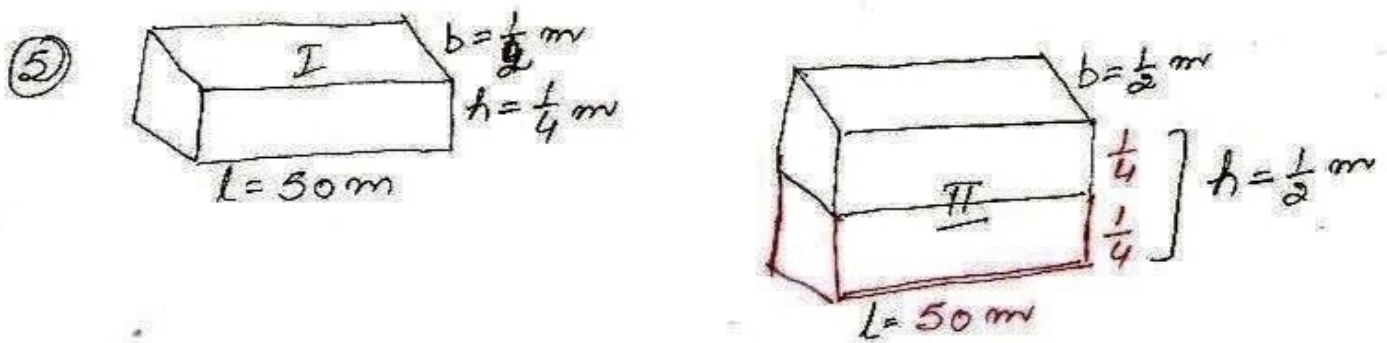


Ex 5.4



$$\begin{aligned} \text{volume of first step} &= lbh \\ &= 50 \times \frac{1}{2} \times \frac{1}{4} \\ &= \frac{25}{4} \text{ m}^3 \end{aligned}$$

$$\begin{aligned} \text{volume of second step} &= 50 \times \frac{1}{2} \times \frac{1}{2} \\ &= \frac{25}{2} \text{ m}^3 \end{aligned}$$

$$\frac{25}{4}, \frac{25}{2}, \dots$$

$$a = \frac{25}{4}, \quad d = \frac{25}{4}$$

$$S_{15} = \frac{15}{2} \left[2 \times \frac{25}{4} + 14 \times \frac{25}{4} \right]$$

$$= \frac{15}{2} \times \frac{25}{4} \times 2 (1+7)$$

$$= 15 \times \frac{25}{4} \times 8$$

$$= 750$$

$$\therefore \text{total volume} = 750 \text{ m}^3$$