

$$\begin{aligned} \textcircled{6} \text{ Temperature after 10 hours} &= 40 - 5 \times 10 \\ &= 40 - 50 \\ &= -10^\circ\text{C} \end{aligned}$$

$$\begin{aligned} \textcircled{7} \text{ (i) Mohan's score} &= 4 \times 5 + 6 \times (-2) \\ &= 20 - 12 \\ &= 8 \end{aligned}$$

$$\begin{aligned} \textcircled{7} \text{ (ii) Reshmas score} &= 5 \times 5 + 5 \times (-2) \\ &= 5(5 - 2) \\ &= 5 \times 3 \\ &= 15 \end{aligned}$$

$$\begin{aligned} \textcircled{7} \text{ (iii) Heemas score} &= 2 \times 5 + 5 \times (-2) \\ &= 10 - 10 \\ &= 0 \end{aligned}$$

$$\begin{aligned} \textcircled{8} \text{ (a) Balance} &= 3000 \times 8 - 5000 \times 5 \\ &= 24000 - 25000 \\ &= -1000 \end{aligned}$$

\therefore loss = Rs 1000

$$\begin{aligned} \textcircled{8} \text{ (b) Profit on white bags} &= \text{Loss on grey bags} \\ \text{let no. of white bags} &= x \\ 8 \times x &= 5 \times 6400 \\ \Rightarrow x &= \frac{800 \times 6400 \times 5}{8} \\ \Rightarrow x &= 4000 \end{aligned}$$