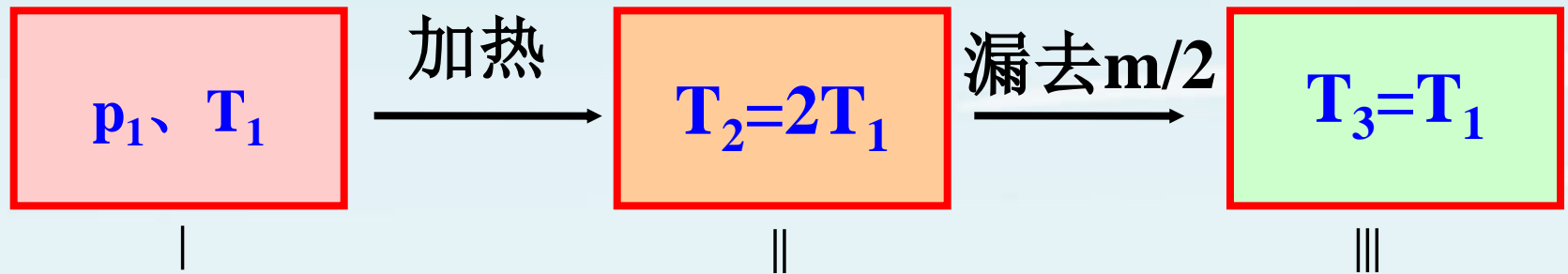


[例题6-1] 保持V不变, 求 p_2 、 p_3



解: $I \rightarrow II$: $m = \text{const.}$

$$\frac{\cancel{p_1 V_1}}{T_1} = \frac{\cancel{p_2 V_2}}{T_2} \Rightarrow p_2 = 2 p_1$$

$II \rightarrow III$: m 变化

$$\left\{ \begin{array}{l} p_2 V_2 = \nu_2 R T_2 \\ p_3 V_3 = \nu_3 R T_3 \end{array} \Rightarrow \frac{p_2}{p_3} = \frac{\nu_2}{\nu_3} \frac{T_2}{T_3} = 4 \right\} \Rightarrow p_3 = \frac{1}{2} p_1$$