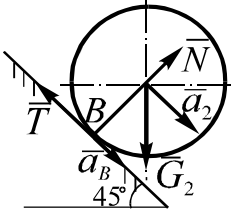


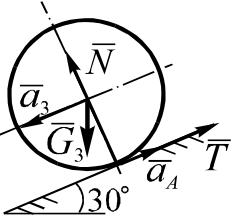
D-2



$$m_2 a_2 = m_2 g \sin 45^\circ - T; J_2 \varepsilon_2 = TR$$

$$J_2 = \frac{1}{2} m_2 R^2; \varepsilon_2 = \frac{1}{R} (a_2 - a_B)$$

$$m a_2 = m g \sin 45^\circ - T; \frac{1}{2} m R (a_2 - a_B) = TR$$



$$m_3 a_3 = m_3 g \sin 30^\circ - T; J_3 \varepsilon_3 = TR$$

$$\varepsilon_3 = \frac{1}{R} (a_3 + a_A) = \frac{1}{R} (a_3 + a_B);$$

$$m a_3 = m g \sin 30^\circ - T; \frac{1}{2} m R (a_3 + a_B) = TR$$

$$T = \frac{1}{2} m (a_2 - a_B); T = \frac{1}{2} m (a_3 + a_B)$$

$$2T = \frac{1}{2} m (a_3 + a_2)$$

$$T = \frac{1}{4} m a_2 + \frac{1}{4} m a_3$$

$$\begin{cases} m a_2 = m g \sin 45^\circ - \frac{1}{4} m a_2 - \frac{1}{4} m a_3 \\ m a_3 = m g \sin 30^\circ - \frac{1}{4} m a_2 - \frac{1}{4} m a_3 \end{cases}$$

$$\begin{cases} 4a_2 = 4g \sin 45^\circ - a_2 - a_3 \\ 4a_3 = 4g \sin 30^\circ - a_2 - a_3 \end{cases}$$

$$\begin{cases} 5a_2 + a_3 = 4g \sin 45^\circ \\ 5a_3 + a_2 = 4g \sin 30^\circ \end{cases}$$

$$a_3 = 4g \sin 45^\circ - 5a_2$$

$$20g \sin 45^\circ - 25a_2 + a_2 = g \sin 30^\circ$$

$$a_2 = \frac{g}{24} (20 \sin 45^\circ - 4 \sin 30^\circ)$$

$$a_3 = 4g \sin 45^\circ - \frac{5g}{24} (20 \sin 45^\circ - 4 \sin 30^\circ) = \frac{g}{24} (20 \sin 30^\circ - 4 \sin 45^\circ)$$

