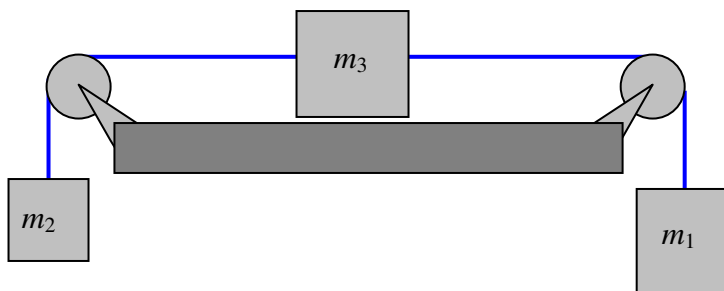


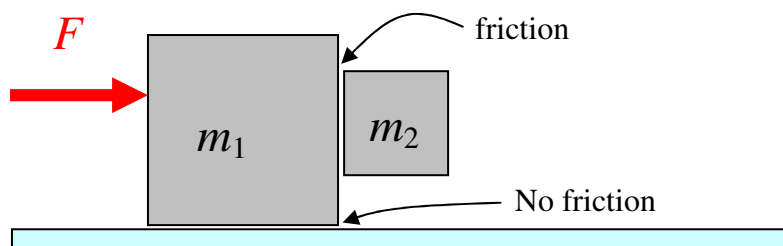
There is no friction between box 3 and the table.

**Determine  $a_3$ :** given:  $m_1, m_2, m_3, g$ , and  $m_1 > m_2$ .

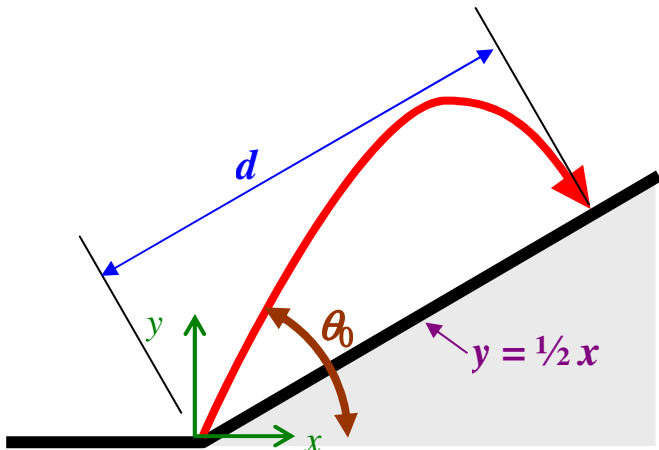


Force  $F$  is just barely large enough so that box 2 won't slide down to the ground.

**Determine  $F$ :** given:  $m_1$ ,  $m_2$ ,  $g$ , and  $m_1 > m_2$ .



**Determine  $d$ :** given:  $v_0$ ,  $\theta_0$ , and  $g$ .



**Determine  $v_0$ :** given:  $H$ ,  $R$ ,  $\theta_0$ , and  $g$ .

