

Answer Key

- 1) $-2.2 \times 10^{-9} \text{ m/s}^2$ (towards the 8kg mass)
- 2) $T_1 = 270 \text{ N}$ (left), $T_2 = 303 \text{ N}$ (right), $\theta = 40 \text{ degrees}$
- 3) $F_x = 160 \text{ N}$, $F_y = 213 \text{ N}$
- 4) $1.38 \times 10^7 \text{ m}$
- 5) (a) $W = 140 \text{ N}$
(b) 6 cm to the right