

## Exercise

**11–19.** The spring is unstretched when  $\theta = 45^\circ$  and has a stiffness of  $k = 20 \text{ kN/m}$ . Determine the angle  $\theta$  for equilibrium if each of the cylinders weighs  $250 \text{ N}$ . Neglect the weight of the members. The spring remains horizontal at all times due to the roller.

**Ans.**  $\theta = 39.6^\circ$

