Name: $\qquad$ Period: $\qquad$ Date: $\qquad$
Solve the following problems. Show your work. Include a label.


1. What is the potential energy of the box at the top of the ramp? $\qquad$
2. How much force is needed to slide the box up the ramp?

3. What is the potential energy of the box at the top of the ramp? $\qquad$
4. How much force is needed to slide the box up the ramp?


The box starts to slide down the ramp
5. What is the potential energy of the box, now?
6. What is the kinetic energy of the box, now?
7. What is the velocity at the bottom of the ramp?

