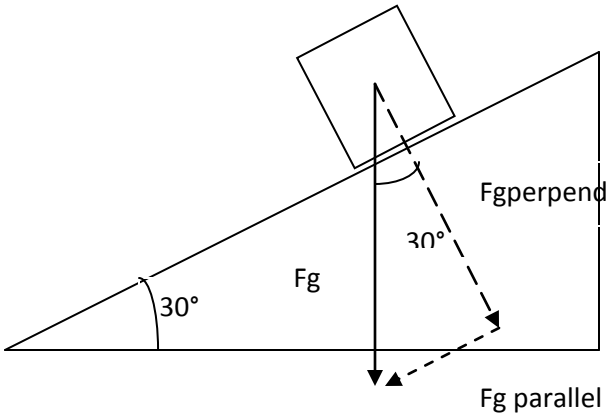
Ramps – 2.5



The trick with ramps is again, to figure out which force you need.

1st calculate Fg – you are usually the mass of the object on the ramp.

2nd calculate Fg parallel and Fg perpendicular. Use trig here. You will know Fg and the angle, so then you can calculate the other 2 sides of the triangle.

What forces affect what?

* Fg parallel will affect the acceleration down the ramp. There may or may not be friction and/or an applied force. Watch your signs and direction.

* Fg perpendicular = Fn. You will need Fn to figure out friction if you're given μ.

* Fg is used only to calculate the Fgparallel and Fgperpendicular. After that you don't use it again.

Organization and good diagrams are the key to success here!