

**Pool Noodle Hot Wheels Ramp**

**K-2**

# 21 Ways To Play With Pool Noodles This Summer**Estimated Time:**

20-30 minutes

# **Materials:**

* Pool noodle
* Hot wheels track of equal length
* Hot wheels cars (or other small vehicles)
* Other ramp materials (optional)

# **Activity:**

Set up the pool noodle ramp adjacent (same angle) to a hot wheel’s track ramp. Which track is faster? Why? Let kids take turns racing cars down the ramps.

# **Possible Variations:**

Now change angle of a ramp. Does this even out the speed of the car? Why does a steeper ramp cause the cars to roll faster? Is there a point where the maximum angle is reached? Use objects other than cars: rocks, sticks, etc.

# **The Science:**

Gravity is pulling the items down the ramp, but there’s another element of physics in play- friction (or resistance). Friction works against gravity to slow items as they go down the slide. Friction can be two surfaces rubbing against one another. We experience this when we rub our hands together when they are cold. The ramps are made of different materials and the different cars will experience different amounts of friction when going down these ramps. This causes the cars to speed up or slow down some.