

Make a Stomp Rocket Launcher!



Supplies:

- (2) 12-18" sections of ½" PVC pipe
- (1) 2" section of ½" PVC pipe
- (1) ½" PVC 45-degree elbow fitting
- (1) ½" PVC 4-way cross fitting
- (2) wine cork to plug ends of cross fitting and add stability
- (1) 12-24" piece of ½" OD (3/8" ID) vinyl tubing or hose. Available by the foot at some hardware stores (e.g. Johnson's Home and Garden).
- (1) Flexible plastic squeeze bottle with lid.
- Duct tape
- Hot glue (optional)

Rocket:

- Pool noodle with ¾" hole. (Dollar Tree has the right size.)

STEP 1: Prepare Bottle

- a. Cut off dispenser tip



- b. Use scissors to enlarge hole to fit tubing (just under ½" for a tight fit)



- c. Insert tubing into hole. It should fit snugly. If it is loose, wrap the tubing with duct tape for a tighter fit.



- d. Apply hot glue to secure tubing and bottle lid (optional).



- e. Screw lid onto bottle and wrap with duct tape to seal and secure.



STEP 2: Assemble fittings

- a. Connect 4-way cross and 45-degree elbow together with 2" pipe section.



- b. Securely plug two side openings with corks.



STEP 3: Assemble Launcher

- a. Connect pipe sections to elbow and cross fittings.



- b. Insert vinyl tubing into the PVC section that is connected to the cross fitting. If tubing is loose, wrap with duct tape to secure.



STEP 4: Make a Rocket:

- a. Cut an 8-12" section of pool noodle.



- b. Seal one end with duct tape.



- c. Improve your rocket's performance by adding a nose cone and fins.



More to Explore:

- Adjust the angle of the fins to make the rocket spin.
- Experiment with different sizes and shapes of fins.
- Decorate your rocket with strips of duct tape. Does the added weight change anything?
- Add streamers to the end of your rocket. Does it help or hurt your rocket's performance?