



Science investigation!

Remember!

As always, if you have a go at this activity you must make sure that your grown up is around and that they have said you can have a go.

Safety - Ensure the shooter is pointed away from other faces when blown.

Equipment per child

- 1 thin bendy straw
- 1 thicker straw (eg milkshake straw)
- Rocket template (see next page)
- Sticky tape
- Scissors
- Coloured pens

Top tips!

- Seal the end of the straw with the least amount of tape possible, otherwise the rocket will nose dive.
An alternative to a thicker straw, is a small piece of paper (approx. 5 cm width), the same length as the rocket, wrapped around a pencil and taped together.
- Remove the pencil before folding/taping the end.



Procedure

1. Colour in the rocket template and then cut it out.
2. Cut a piece of the thicker straw to approximately the same length as the rocket.
3. Pinch the end of this straw together and put a piece of sticky tape over the end to tape it securely shut.
4. Test there are no air leaks by blowing into the straw.
5. Tap this straw to the back of the rocket. Ensure the closed end is at the top of the rocket.
6. Slide the thin straw into the thicker straw and angle the rocket ready for launching.
7. Blow a big puff of air into the thin straw and watch the rocket take off!



The rocket and thick straw



Squeeze and tape the end



Stick to the rocket



Put the thin straw inside the thick one

Challenge:

- Blow hard and softly and observe what happens.
- Change the launch angle of the straw.
- Try modifying the thicker straw or the rocket template and observe what happens to the rocket's flight path.

Background notes

Air is made up of tiny gas particles. These particles push against surfaces they meet. When air is blown down a straw it travels to the end. If the end is sealed, it has nowhere to go. The air pushes against the sealed end, pushing the straw off taking the rocket connected to the sealed straw with it.

