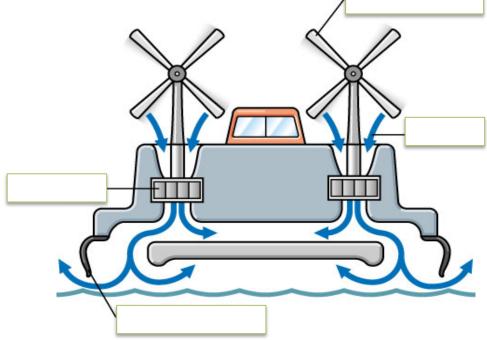
# **All About Hovercrafts**

## **Hovercraft Anatomy**

Label the different parts of a Hovercraft:

- Fan
- Propeller
- Air
- Flexible Skirt



## **Before Building**

- 1. Why is it easier to run through air instead of water?
- 2. Why are boats and airplanes shaped the way they are? Do we see this design in nature?
- 3. Are there situations you can think of where air and water resistance are helpful? Answers will vary.



4. Do you think hovercrafts work better on land or on water? Explain your thinking to a friend, and then write down your answer.

### Let's Build a Hovercraft!

#### **Materials:**

- Sticky tack
- CD's or light circular trays
- Painter's tape
- Snappy Caps<sup>™</sup> or funnels
- Toothpick
- Balloon or hairdryer





### **Instructions:**

 Stretch a piece of sticky tack out and circle it around the centre of the CD.



 Cover the top of the Snappy Cap™ with Painter's tape or masking tape.



3. Poke any number of holes in the tape using a toothpick.



4. Attach the cap to the sticky tack on the CD, pushing the tack in so there are no holes.



 Blow up the balloon, twist, and fasten to the Snappy Cap™. Untwist the balloon and let it slide on a smooth surface.



## Questions to Consider...

- What design made the best hovercraft?
- Can it work across a tub of still water?
- How is a hovercraft different from a ship? Which is more advantageous?
- Explain in a sentence or two how your hovercraft works.
- Does your hovercraft have all the parts from the diagram on the first page?

### **Extension:**

Did you know you could build your own, rideable Hovercraft? Check out the following website, and make it a class project!

http://www.sciencebuddies.org/science-fair-projects/project\_ideas/Aero\_p036.shtml#summary