



Parachute Investigation – 2

Resources

A copy of the BLOODHOUND SSC parachute template.	Six lengths of string three times the radius of the parachute	A plastic bin liner	Marker pen
Heavy Tape. (Duck type or brown parcel)	Scissors	Ruler	Hole-making tool

Construction

1. Cut the bin liner into two 700mm square panels.
2. Align your parachute template on the plastic and using a ruler draw extension lines to the edge of the plastic and cut out the canopy.
3. Mark the six anchor points 10mm from the end of each line.
4. Stick a 40mm² square of heavy tape at the end of each line.
5. Using a sharp pointed tool such as a bradawl make holes through the anchor points.
6. Having measured the radius of your parachute, cut six lengths of string three times this radius plus 30 mm extra to allow for knots.
7. Tie a knot in one end of each of your lengths of string.
8. Pass the unknotted end of the string through the anchor holes.
9. Gather all the ends of string and tape them together.
10. Find an open space such as a playground, hold your strings in one hand and trot along to see that the parachute inflates and that your anchor points hold fast.

Investigation

1. Measure a set run, marking the start and the finish.
2. One person should race from the start to the finish with another timing the runs.
3. Note the results in the table.
4. Repeat three times per runner.
5. Return to the start. Attach a parachute by string or tape to the waist of each runner.
6. Repeat the runs with the parachute, making sure that you note the times.



7. Compare the times of each run.
8. Discuss the experience of running without a parachute and with a parachute.
9. Work out the average of running speeds with and without a parachute.
10. Is it easier to run with or without a parachute?
11. What difference might the weather conditions have on your experiment?

Results

Run	Time 1	Time 2	Time 3	Average ($1+2+3 \div 3$)
Without Parachute				
With Parachute				

Notes

What have you learned/discovered?