



EPPro8 Challenge

Engineer Problem Solve Innovate

Laser Tracking - Teachers Notes

Principles

Optics and focal point, movement in two dimensions, measurement and angles

Extra Equipment

Torch

Magnifying Glass (100mm). You can purchase these at your local \$2 shop.

- Add tape to the handle of the magnifying glass so that it fits tightly into one of the red joiners.
- It is best you do this as we don't want tape in the kit. It will be tempting for students to use this on the aluminium, which will leave a residue.

Meteor Printout (attached to the rear of this document)

Rubber Bands (10)

What to Aim For

See the "Getting the Most from your Equipment" document for guidelines on what to aim for from these challenges.

Ensure that the teams build a solid frame for their tracker.

We have used gradient rather than angle in this challenge as the maths is easier using gradient. As an example, a slope that is 10m horizontal and 4m vertical has a gradient of $4/10 = 0.4$

Our Solution



