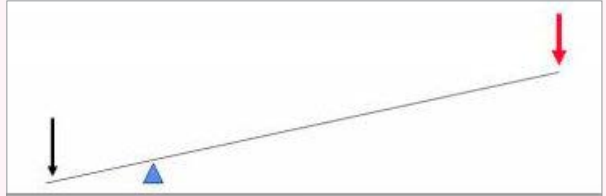


Levers and fulcrums

(Ireland)

Background

A lever is mankind's oldest machine and in many ways still the most often used. A lever is essentially any rigid object that is free to rotate about a fixed point called a fulcrum (or pivot or hinge). Levers are at work in scissors and tweezers for example.



You will need...

- ✓ Two meter sticks,
- ✓ a cable-tie and
- ✓ the cap of a white-board marker.



Follow these steps

1. Place one meter-stick on top of the other and fix the cable-tie around the midpoint of both.



So what happened?

The meter sticks were moved relative to each other to show the action of a scissors.

Then the cable tie was moved towards one end and the cap of a white-board marker (or a wine cork) was positioned near the cable-tie. When the meter sticks were clasped near the middle, the action of a "tweezers" was apparent.

What next?

Build a simple wheel-barrow to show the lever handles lifting a load by rotating about the fulcrum (i.e. the axle of the wheel).