

# Right Angled Mirrors

## Apparatus

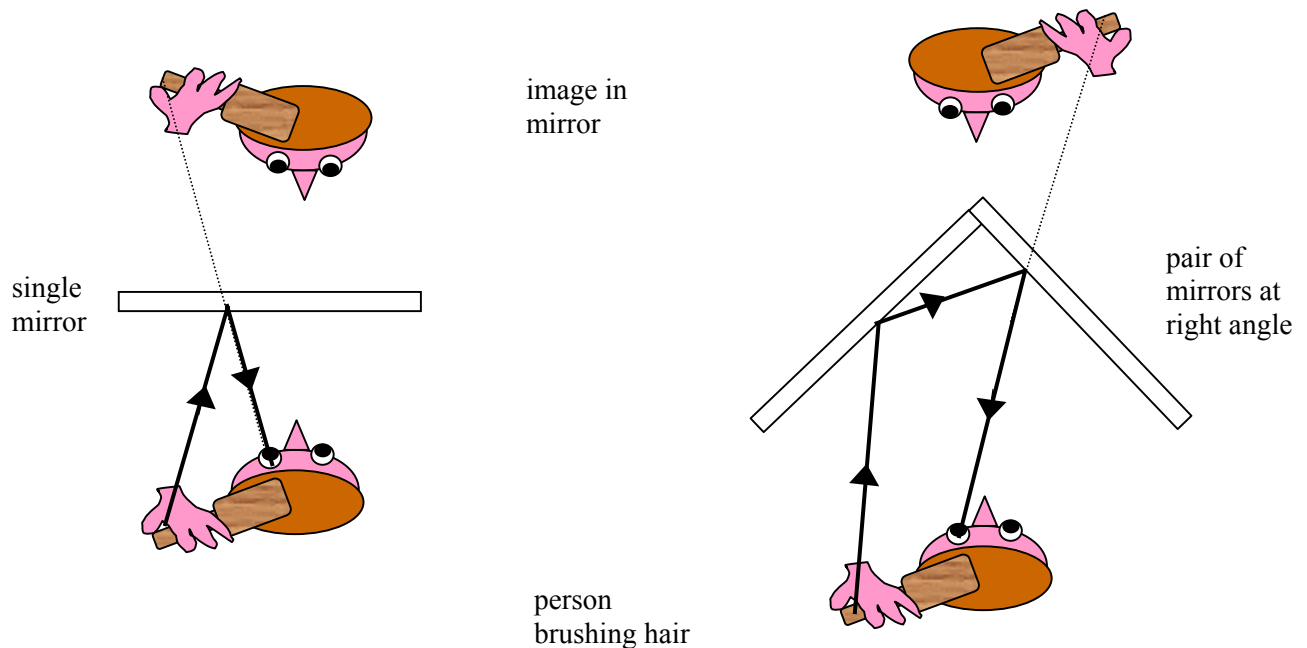
two flat rectangular mirrors, stuck together at the edge to form a right angle, see below

## Action

The students look at their reflection in the mirror. They move their hand and see which way they move in the reflection. It may be interesting to ask them to pretend to brush their hair, or some other task done in front of a mirror.

## The Physics

See diagram below. In the right angled mirrors the reflection is *not* left-right reversed, as in a single mirror. This can be somewhat disorienting, as we are used to seeing a reversed reflection. The ray diagram can be constructed as shown below



## Accompanying sheet

### Right Angled Mirrors

Look at your image in the mirror.

What do you notice when you move your hands?

How is this different to a single mirror?

Draw a ray diagram showing the path of a light ray from your hand to your eye.