



## **ROLLING CYLINDERS - metal & plastic**

Cat: MF1350-001 pair of rolling cylinders

### **DESCRIPTION:**

The Rolling Cylinders are very close to the same diameter, length and weight.

**Diameter: 45mm Length: 56mm Weight: approx. 400gm**

When placed on a sloping surface, one cylinder accelerates and rolls much faster than the other cylinder. **The question is: Why ?**

It is a demonstration of the 'Moment of Inertia'. The mass itself and the distance of the mass from the centre of the cylinder determines how quickly it will accelerate. The effect can be called also "Angular Momentum".

The cylinder with the mass concentrated towards the centre rolls faster. The cylinder with the mass concentrated towards the outside accelerates much more slowly because the same magnitude of mass must travel a greater distance around the curve of the cylinder.

### **MF1350-001 rolling cylinders – metal & plastic**



**Physical size: 45x56mm DxL**

**Weight: 0.4 kg each**

**CAUTION:** The plastic is strong, but is not as strong as the metal. Please take care not to drop or damage the cylinders – particularly the cylinder with the plastic on the outside.

**Designed and manufactured in Australia**