## Key Learning

#### **Performing** simple tests

The children use practical resources provided to gather evidence to answer auestions generated by themselves or the teacher. They carry out: tests to classify; comparative tests; pattern seeking enquiries; and make observations over time. **Gathering and** 

# recording data to

#### help in answering questions

The children record their observations e.g. using photographs, videos, drawings, labelled diagrams or in writing. • They record their

#### Year 2/3 Science: Light



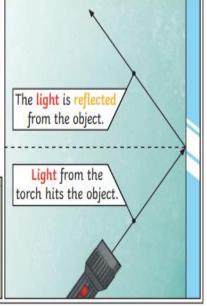
## Light.

#### Key Knowledge

We need light to be able to see things. Light travels in a straight line. When light hits an object, it is reflected (bounces off). If the reflected light hits our eyes, we can see the object. Some surfaces and materials reflect light well. Other materials do not reflect light well. Reflective surfaces and materials can be very useful...







Mirrors reflect light very well, so they create a clear image. An image in a mirror appears to be reversed. For example, if you look in a mirror and raise your right hand, the mirror image appears to raise its left hand.



### **Key Scientific Vocabulary**

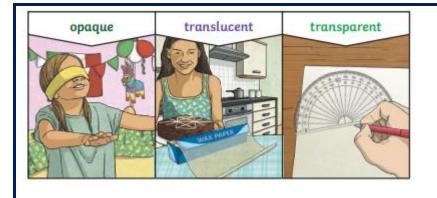
Key Vocabulary		
light	A form of energy that travels in a wave from a source.	
light source	An object that makes its own light.	
dark	Dark is the absence of light.	
reflection	The process where light hits the surface of an object and bounces back into our eyes.	
reflect	To bounce off.	
reflective	A word to describe something which reflects light well.	
ray	Waves of <mark>light</mark> are called <mark>light rays</mark> . They can also be called beams.	

measurements
e.g. using
prepared tables,
pictograms, tally
charts and block
graphs.

graphs.
Conclusions.
Begin to draw and express some conclusions by looking at changes, patterns, similarities and differences in data.

## Investigation Questions

- Which surfaces reflect light best?
- How is a shadow formed?
- Which materials block light to form a shadow?
- Why do shadows change in their



#### **Common Misconceptions**

- we can still see even where there is an absence of any light
- our eyes 'get used to' the dark
- the moon and reflective surfaces are light sources
- a transparent object is a light source
- shadows contain details of the object, such as facial features on their own shadow
- shadows result from objects giving off darkness.

Key Vocabulary		
pupil	The black part of the eye which lets light in.	
retina	A layer at the very back of the eye. The retina takes the light the eye receives. It then changes it into nerve signals to send to the brain.	
shadow	An area of darkness where light has been blocked.	
opaque	Describes objects that do not let any light pass through them.	
translucent	Describes objects that let some light through, but scatter the light so we can't see through them properly.	
transparent	Describes objects that let light travel through them easily, meaning that you can see through the object.	

shape	Т	
and size?		