Light, Shadows and Reflections

We are able to see all things around us because of light.

Luminous Objects

Some objects emit light of its own are called as luminous objects. For example the sun and the stars give out their own light. Even the lighted candle or torch bulb can be considered as luminous objects.

Non-Luminous Objects

The objects that cannot produce light of their own are called as non-luminous objects. The moon for example reflects the light of the sun.

Transparent, Translucent and Opaque Objects

Objects that allow light to pass through them completely are called as transparent objects like a transparent glass. They do not cast any shadows as they do not block the light.

Objects that allow light to pass through them partially are called as translucent objects like a butter paper or a tracing paper. They cast faint shadows as they block the light partially.

Objects that do not allow light to pass through them are called as opaque objects like a wood, rubber ball. They cast dark shadows as they block the light.

Retilinear Propagation of Light

The light always travels in a straight light. Take three wooden boards and drill a hole at the same position in each of them evenly. Now take a candle and place it behind the boards such that the flame of the candle can be seen through the hole. Arrange the boards in such a manner so that they superimpose each other. What did you observe? Yes you are correct the candle flame could be been through the holes in the boards. Now let's see another example. Take a ball and two wide hollow tubes. One bent and one straight. Try to see the ball through both the tubes. You will notice that ball is visible through the straight tube but cannot be seen through the bend tube. This explains rectilinear propagation of light.