DAY 15

TOPIC: LIGHT

Refraction

Aim: Explain refraction.

Acitvity :

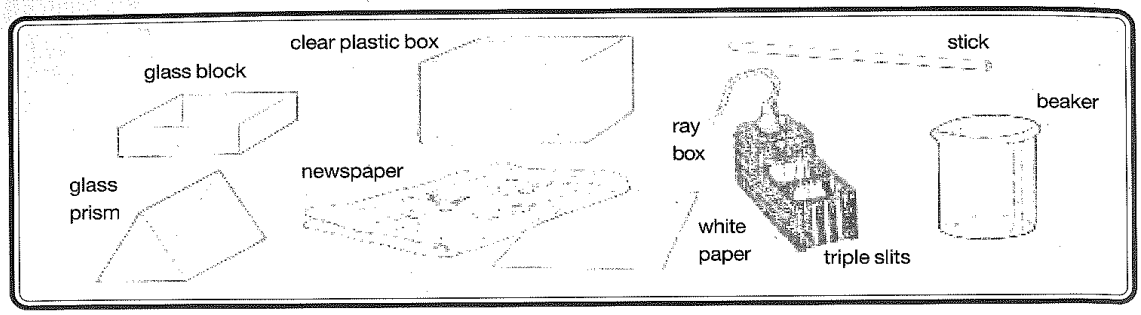
Watch videos 8.L.15-20

Read and answer questions on light 7 below.

Light 7

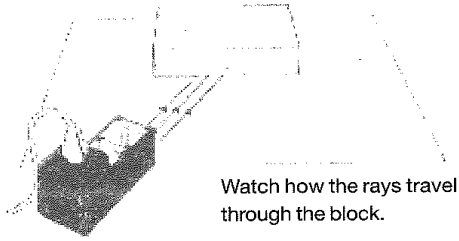
Bending light

You will need:



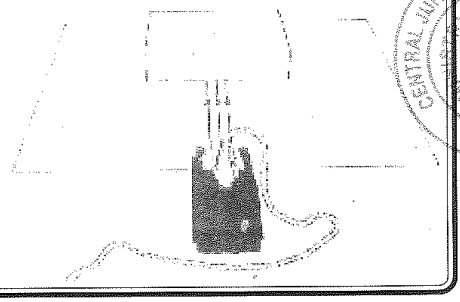
Work in a darkened area

1 Put the glass block on a sheet of white paper. Shine the rays of light at the block. They should hit it at an angle as shown.

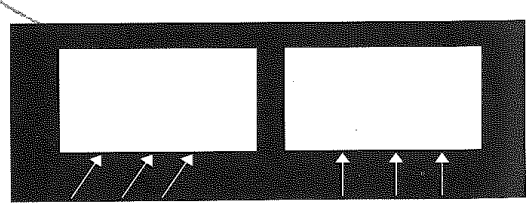


Watch how the rays travel through the block.

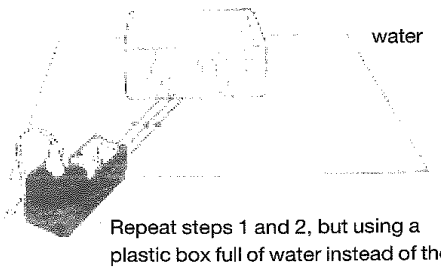
2 Repeat, with rays at right angles to the block.



Q1 Copy these diagrams. Then draw in the rays passing through and leaving the block.

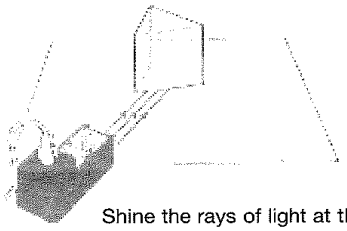


3



Repeat steps 1 and 2, but using a plastic box full of water instead of the glass block.

4

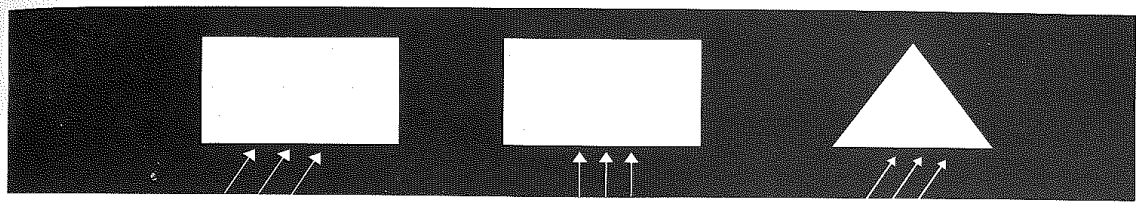


Shine the rays of light at the glass prism. They should hit it at an angle as shown.

YEAR 8

7

Q2 Copy these diagrams. Then draw in the rays passing through and leaving the objects.



Q3 What happens to a ray of light as it enters a glass block or water at an angle (as in the first diagram)?

Q4 What happens to a ray of light as it enters a glass block or water at a right angle?

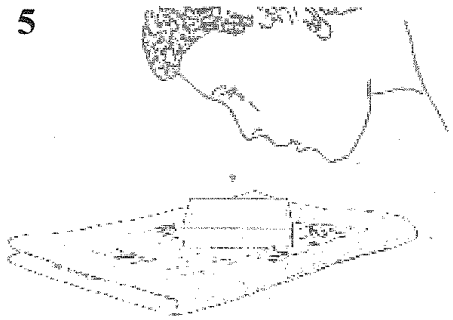
Q5 What do you notice about the direction of the rays entering and leaving the glass block and the water?

Q6 Copy this information.

When light rays enter and leave a transparent liquid or solid they are bent. This is called **refraction**.

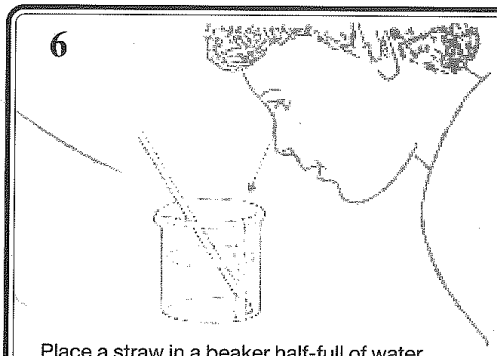
These two effects are the results of refraction

5



Put a glass block on the newspaper. Look at the writing through the glass block.

6



Place a straw in a beaker half-full of water. Look at the straw as shown.

Q7 Copy and complete these sentences.

When a _____ block is placed over writing, the letters seem to be _____. When a straw is placed in a beaker of _____ it appears to _____ at the surface. This is due to _____.

NEW WORD: refraction