

Name _____ Class _____ Date _____

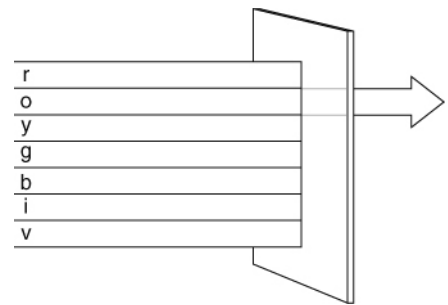
- 1 Fill in the gaps in these sentences using words from the box. You can use each word once, more than once or not at all.

dispersion five lens prism reflection seven
spectrum white yellow

Light from the Sun or a light bulb is called _____ light. If white light passes through a _____ it can be split up into a _____. This is called _____. There are _____ colours in the spectrum.

- 2 The diagram shows light shining through an orange filter. Complete these sentences using words from the box.

absorbs filter orange prism
reflects refracts transmits



You can make coloured light using a _____. This _____ one colour of light and _____ the rest. For example, an _____ filter absorbs all the colours except orange.

- 3 A stage in the theatre uses coloured spotlights at different times during the show. The coloured lights make the performers' costumes appear different colours. For example, a white costume looks red in red light because it reflects all colours, but only red light is reaching it. A green costume looks black in red light because it absorbs red light (it only reflects green light).

Complete the table to show what the different parts of the costumes look like. Some have been done for you.

	Colour in white light	Colour in red spotlight	Colour in blue spotlight	Colour in green spotlight
a	white	red		green
b	red		black	
c	green	black		
d	blue		blue	black
e	black		black	

I can...

- recall how a spectrum is formed
- describe how a filter is used to make coloured light
- work out how coloured light affects the appearance of coloured objects.