

S3 Science: how well is your learning progressing?

Key area 1: How do we explore the Universe?	I can do this.	I need to go over this.	I don't know this.	Level
I can state the conditions required to support life				3
I can use an equation to solve problems involving distance, speed and time ($d = v t$)				4
I can state that light travels at a speed of 300,000,000 ms^{-1} .				3
I know the distance light travels in one year is called a light year.				3
I know that stars are formed when gravity pulls gas particles together and causes Hydrogen to fuse into Helium.				4
I know that each colour of light has a different wavelength from the other colours. ROY G BIV				3
I can identify the elements present in a star by observing the colours of light it emits. This is called line spectra.				4

I know that an exoplanet is a planet which is not in our solar system.				3
I know that telescopes are different sizes as they are used to detect different types of Electromagnetic waves.				4
I know that when light reflects from a straight mirror the angle of reflection is equal to the angle of incidence.				3
I know that a curved reflector is used to reflect more waves to a focus point to make the signal stronger.				3
I know that a convex lens is used to converge the rays of light to a focus point.				3
I know that a concave lens is used to diverge the rays of light.				3
I know how to complete diagrams to show refraction of light and can label the; normal, angle of incidence and angle of refraction.				4
I know that refraction in when light changes speed when it passes from one material to another.				4