

AQA

	111146: Introduction to cell biology	116508: Cells	115098: Using a light microscope to observe and draw a cell
Experienced	Drawing a simple animal and plant cell Preparing a slide for use under a microscope		
Show knowledge of		<p>The function of the parts of an animal cell ie. cytoplasm, nucleus, cell membrane</p> <p>The function of the parts of a plant cell ie. cytoplasm, nucleus, cell membrane, vacuole, chloroplast</p> <p>At least three different types of specialist cells e.g. sperm, red blood, nerve</p> <p>Why specialist cells are needed</p>	<p>Label a diagram of a light microscope to include the main parts ie. eyepiece lens, coarse focusing wheel, fine focusing wheel, objective lens, arm, base, stage and light source</p> <p>Draw a table to include the names of the main parts of a light microscope and what function they have when looking at a biological specimen</p> <p>Use a light microscope to bring animal and plant cells, from at least two prepared slides into focus</p> <p>Use a pencil to make a clear, labelled drawing of two different types of cell</p> <p>Write the overall magnification underneath the drawing, remembering to multiply the objective lens magnification by the eyepiece magnification</p>
Demonstrate the ability to	<p>Independently use a light microscope to look at a pre-prepared slide</p> <p>Identify a plant and an animal cell from a diagram</p> <p>Label an animal cell with : nucleus, cytoplasm , mitochondria and cell membrane</p> <p>Label a plant cell with : nucleus, cytoplasm, mitochondria, cell membrane, chloroplast, cell wall and vacuole</p>	<p>Label a diagram of an animal cell</p> <p>Label a diagram of a plant cell</p> <p>Make a model of a cell and label the parts</p> <p>Make a video or audio clip describing how its structure links to its function</p> <p>Observe an image of a sperm cell and describe how its structure links to its function</p> <p>Observe an image of a red blood cell and describe how its structure links to its function</p> <p>Observe an image of a nerve cell and describe how its structure links to its function</p>	

	73246: Cells characteristics and functions	113081: Nature and variety (unit 2) :level of organisms: cells	
Experienced			
Show knowledge of	<p>The relationship between the characteristics of cells and their function</p> <p>The structure of animal and plant cells</p> <p>The process of osmosis</p>	<p>The basic description of eukaryotic cells and prokaryotic cells</p> <p>The organelles found in both animal and plant cells</p> <p>The organelles found only in plant cells</p>	
Demonstrate the ability to	<p>Identify the nucleus, cell membrane and cytoplasm from a slide or photograph of animal cells</p> <p>Use a slide of plant tissue</p> <p>Use a light microscope effectively in order to draw and label a plant cell</p> <p>Identify red cells and white cells from a slide or photograph of a blood smear</p> <p>Plan a fair test to show osmosis</p> <p>Select appropriate equipment for the test</p> <p>Make and record appropriate observations</p> <p>Analyse the results of the test</p>	<p>Explain the function of the nucleus, cell membrane, cytoplasm, mitochondria, ribosomes</p> <p>Explain the function of the chloroplasts and the cell wall in plant cells</p>	