

# Curriculum Overview

Subject: Science

Year Group: 8



Pupils are encouraged to secure and deepen their knowledge into the importance of Science in the world around them. Pupils will continue to develop the powerful knowledge needed to go beyond the common understanding of science to a deeper, more rounded world view. With a focus on key concepts, Apparatus and Techniques pupils will develop the subject disciplinary knowledge needed to think, write, communicate and relate Scientific ideas to the wider world. Pupils will follow the national curriculum and have opportunities to undertake open ended investigations each term developing analytical and rational thought processes.

TERM 1	TERM 2	TERM 3
<p><b>KNOWLEDGE/SKILLS</b></p> <p><b>Biology:</b> Health and drugs, Variation and survival</p> <p><b>Chemistry:</b> Obtaining useful materials</p> <p><b>Physics:</b> Motion on Earth and in Space, Waves</p> <p>Skills:</p> <ul style="list-style-type: none"> <li>• Development of scientific thinking (modelling).</li> <li>• Experimental skill and strategies (risks and variables)</li> <li>• Analysis and evaluation (graphing)</li> <li>• Use of scientific vocabulary, units and symbols.</li> </ul>	<p><b>KNOWLEDGE/SKILLS</b></p> <p><b>Biology:</b> Energy for the body</p> <p><b>Chemistry:</b> Physical changes</p> <p><b>Physics:</b> Magnetism</p> <p>Skills:</p> <ul style="list-style-type: none"> <li>• Development of scientific thinking (modelling).</li> <li>• Experimental skill and strategies (risks and variables)</li> <li>• Analysis and evaluation (graphing)</li> <li>• Use of scientific vocabulary, units and symbols.</li> </ul>	<p><b>KNOWLEDGE/SKILLS</b></p> <p><b>Biology:</b> Health and disease, Respiration</p> <p><b>Chemistry:</b> Acids and alkalis.</p> <p><b>Physics:</b> Electricity and circuits</p> <p>Skills:</p> <ul style="list-style-type: none"> <li>• Development of scientific thinking (modelling).</li> <li>• Experimental skill and strategies (risks and variables)</li> <li>• Analysis and evaluation (graphing)</li> <li>• Use of scientific vocabulary, units and symbols.</li> </ul>
<p><b>KEY ASSESSMENTS</b></p> <p>Half term 1: Investigation focus- Variables Models - Planets</p> <p>Half term 2: Effects of drugs assessment, EOT test.</p>	<p><b>KEY ASSESSMENTS</b></p> <p>Half term 1: Investigation focus - Methods</p> <p>Half term 2: EOT test</p>	<p><b>KEY ASSESSMENTS</b></p> <p>Half term 1: Investigation focus- methods, FIFA assessment.</p> <p>Half term 2: EOY test</p>

Extended reading suggestions and external resources:

KS3 Bitesize Science <https://www.bbc.co.uk/bitesize/subjects/zng4d2p>

Oak National Academy Lessons <https://classroom.thenational.academy/subjects-by-key-stage/key-stage-3/subjects/science>

Chase High Youtube Playlists <https://www.youtube.com/channel/UCSK4ImJfi5sPH4UBp7cZtyQ>

We actively encourage pupils to read and research about the wider Scientific world- Planet Earth and Perfect Planet both on BBC iPlayer are examples of where pupils can engage with Science from the safety and comfort of their own homes.