

YEAR 9 GCSE PE Learning Programme May- July

	<p>First, second and third class lever systems within sporting examples.</p>	<p>Identification of first, second and third class lever systems. Basic drawings of the three classes of lever to illustrate the positioning of:</p> <ul style="list-style-type: none"> • fulcrum • load (resistance) • effort. <p>Draw linear versions of a lever, showing the positioning of the fulcrum, load/resistance and effort.</p> <p>Students do not need to be taught to draw anatomical body parts but must be able to link the correct lever to a sporting movement or action. Interpretation of sporting movements or actions which involve flexion or extension of the elbow, hip and/or knee, and plantar or dorsi-flexion at the ankle.</p>	<p>Know the names of the three components of a lever. Identify the points on a lever diagram. Link the levers to anatomical body parts (joints).</p>		
	<p>Mechanical advantage – an understanding of mechanical advantage in</p>	<p>Label the effort arm and load/resistance arm on the three classes of lever. Mechanical advantage = effort arm ÷ weight (resistance) arm.</p>	<p>Label the effort and weight/ resistance arm on a lever. Know the equation.</p>		

	relation to the three lever systems.	<p>Labelling of the effort arm and resistance arm on lever drawings, and interpretation of the mechanical advantage of that lever.</p>	<p>Justify why one lever has a bigger mechanical advantage than another.</p>		
	Analysis of basic movements in sporting examples.	<p>Types of movement:</p> <ul style="list-style-type: none"> • flexion/extension at the shoulder, elbow, hip and knee • abduction/adduction at the shoulder • rotation of the shoulder • plantar flexion/dorsiflexion at the ankle. <p>This section links specific sporting actions to the types of movement. Teaching of this section should include but not be limited to the following sporting actions:</p> <ul style="list-style-type: none"> • elbow action in push-ups/football throw in • knee, hip and ankle action in running, kicking, standing vertical jump, basic squats 	<p>Know the names of the movements and what they mean. Identify these movements when in action. Interpret movements from one position to another. Interpret sporting movements at the shoulder, elbow, hip, knee and ankle.</p>		

		<ul style="list-style-type: none"> shoulder action during cricket bowling (overarm rotation). <p>Include other sporting examples within teaching.</p>			
	<p>Identification of the relevant planes (frontal, transverse, sagittal) and axes (longitudinal, transverse, sagittal) of movement used whilst performing sporting actions.</p>	<p>Planes (frontal, transverse, sagittal) and axes (longitudinal, transverse, sagittal) should be related to sporting actions. Teaching of these planes/axes should include but not be limited to the following sporting actions:</p> <ul style="list-style-type: none"> front somersault/forward roll/running action 360° twist (ice skating spin)/discus thrower rotating in circle effort cartwheel. <p>Teaching should use the specified planes/axes names. Teaching should make use of varying sporting examples.</p>	<p>Identify the planes of the body. Identify the axes of the body. Link the two together and make links to basic movements. Identify the relevant plane/ axes used within specified sporting movements.</p>		