## YEAR 11 REVISION BOOKLET

## SUBJECT: PHYSICAL EDUCATION

## PAPER 1. THE HUMAN BODY.

#### UNIT 1

А.	Describe the functions of the skeleton.
В.	Draw and label a synovial joint.
С.	Explain how different parts of a synovial joint provide support to stabilise
	the joint.
А.	Create a table that shows the joint, the type of joint and the movement that
	occurs at that joint.
В.	Create a table that shows the joint, the type of joint, the movement that
	occurs at that joint and the bones that meet at the joint.
А.	Describe the pathway that air moves through as it passes from the mouth
	to the alveoli.
Β.	Explain four factors that assist gaseous exchange.
С.	Explain the difference between breathing mechanics at rest and during
	exercise.
А.	Label the spirometry trace.
В.	Give definitions for each the following lung volumes: Tidal volume,
	Inspiratory reserve volume, expiratory reserve volume, residual volume.
С.	Explain how the lung volumes change during exercise.
Α.	Label the diagram of the heart.

В.	Give the definitions of the following key terms: Heart Rate, Cardiac Output, Stroke Volume.
С.	Describe the passage of blood through the heart
А.	Create a table that identifies the immediate effects of exercise, the short
	term effects of exercise and the long term effects of exercise.
В.	Describe three methods that can be used to help recover from exercise and
	prevent muscle soreness and DOMS.
С.	Explain the difference between aerobic and anaerobic exercise.
UNIT 2	
А.	Draw and describe the 3 lever systems.
В.	When kicking a football, a lever system operates to move the knee joint
	from flexion to extension. Identify which lever system this is and the body

	from flexion to extension. Identify which lever system this is and the body parts that represent the load, fulcrum and effort.
С.	Discuss whether a second class or third class lever is more important to a long jumper.
Α.	Give definitions for the following key terms: Plane, Frontal Plane, Transverse plane, Sagittal plane, Axis, Sagittal axis, Transverse axis, Longitudinal axis.
В.	Create a table that pairs up the planes & axis and give examples of sporting movements that take place in each plane/around each axis.
С.	<ul> <li>Describe the plane of movement that a gymnast performs <ul> <li>a) a front somersault in</li> <li>b) a cartwheel in</li> <li>c) a full twist in</li> </ul> </li> <li>Describe the axis of rotation about which a gymnast performs <ul> <li>a) a front somersault</li> <li>b) a cartwheel</li> <li>c) a full twist</li> </ul> </li> </ul>
Α.	Create a mindmap/spider diagram that identifies all the movement patterns that can take place at each of the following joints: Shoulder Elbow Hip

	Knee
	Ankle
В.	Choose 5 different sporting actions and identify what is happening at each of the following joints between preparation & execution of the action: Shoulder Elbow Hip Knee Ankle
С.	For the examples above identify the agonist muscle which causes the action.

# UNIT 3

Α.	Create a mindmap and explain each component of fitness. Can you link each component to the relevant fitness test and explain the test?
В.	Evaluate which components of fitness are necessary for a chosen sport?
С.	Can you explain the limitations of each fitness test?
Α.	Create a flashcard for the Principles of Training explaining what is SPORT and FITT
В.	Apply the Principles of Training and FITT to bring about an improvement in your fitness.
С.	Apply the Principles of Training and FITT to bring about an improvement in a sport of your choice.
Α.	Make a poster explaining each 'Method of Training' (circuit, continuous, fartlek, interval /HIIT, static stretching, weight, plyometric).
В.	Describe the disadvantages/ advantages of each training method. Which training methods use which training zones (anaerobic/ aerobic)?
С.	Evaluate which training methods are suitable and not suitable for one sport.
Α.	<ul> <li>Create your own 6-mark exam question and markscheme for the following;</li> <li>1. Three training seasons (pre-season, competitive season and post).</li> <li>2. What is an effective warm up and cool down?</li> <li>3. What is the benefit of high attitude training?</li> <li>4. How to prevent injury.</li> </ul>
В.	What is the importance of high altitude training and knowledge and understanding of the three training seasons to an elite marathon runner.