

ATTEMPT ALL THE QUESTIONS (100%)

1. What do you understand by the following words?

- i. **Biomechanics -**
- ii. **Anthropometry –**
- iii. **Force platforms or force plates**
- iv. **Sprain –**
- v. **Range of motion (or ROM),**

2. Sports biomechanics studies human motion during exercise and sports. Physics and the laws of mechanics are applied to athletic performance. Explain the following four uses for biomechanics in the sporting and exercise field:

- i. **Equipment:**
- ii. **Individuals:**
- iii. **Injuries:**
- iv. **Training:**

3. What is the difference between stress and strain?

4. There are three main flexor muscles at the elbow as written below. Explain them

- **Brachialis**
- **Brachioradialis**
- **Biceps brachii**

5. What do you understand by active, active assisted and passive range of motion?

Passive Range of Motion (or PROM) -

Active Assisted Range of Motion (or AAROM)

Active Range of Motion (or AROM)

6. State any FIVE common principles associated with biomechanics.