

Name of Examination:- Master of Physical Education (M.P.E.d)
Paper :- MPE-804 (ii)
Subject:- Subject specialization- Sports Biomechanics
Semester:- II (May/June 2025)
Maximum marks:- 50
Time:- 3 hours

(Write your Roll No. on the top immediately on receipt of this question paper)

Note:- Attempt any five questions.

All questions carry equal marks.

Each question carry 10 marks.

Q1. Write note on –

- a) All and None Law
- b) Strength of Contraction
- c) Group action of muscles

Q2. Discuss on the biomechanics of musculoskeletal system in regards of lever like, wheel and axle like and pulley like arrangements.

Q3. Write note on Linear Movement Responses to applied forces.

Q4. Write note on relationship between the followings:

- a) Angular momentum
- b) Angular impulse

Q5. Explain the analysis of activities in which the body rotates free of support as well as while supported.

Q6. Write note on movement analysis emphasizing on Kinesiological, Mechanical and Biomechanical analysis with suitable examples.

Q7. Write note on-

- a) Conservation of angular momentum within a system
- b) Vector resolution of angular momentum

Q8. Give a comprehensive biomechanical analysis of a technique of your choice.