## **2ND YEAR KINESIOLOGY**

Sr no.	Course Outcome	PO1	PO2	PO3	PO4	PO5	PO6	PO7
1	Describe the composition of a muscle fibre and the contractile unit of a muscle with well labelled diagrams.	3	1	1	1	2	1	2
2	Explain Motor Unit with help of diagram.	3	1	1	1	1	1	1
3	Enumerate the difference in characteristic of skeletal muscle fibres.	3	1	1	1	1	1	1
4	Explain active and passive insufficiency of muscles with example.	3	1	1	1	2	2	2
5	Define Muscle tension. Describe in brief the types of Muscle fibre. Explain Length-Tension relationship with well-lab	3	1	1	1	1	1	1
6	Enumerate the factors affecting muscle tension and describe the force tension curve.	3	1	1	2	1	1	1
7	Describe Classification of muscles and factors affecting muscle function.	3	1	1	1	2	1	1
8	Discuss the effect of immobilization on muscles, injury and aging.	3	1	1	2	1	1	1
9	Discuss how immobilisation affects joint structures.	3	1	1	1	1	1	1
10	Write about Delayed - onset muscle soreness(DOMS).	3	1	1	2	1	2	1
11	Describe Stretch Reflex with labelled diagram. Enlist factors affecting muscle function. Enumerate the difference b	3	1	1	1	1	1	1
12	Write in detail the Principles of Joint Design and classify the joints.	3	1	1	1	1	2	1
13	Describe composition of connective tissues and enumerate its types in brief.	3	1	1	1	1	1	1
14	Define Kinetic and Kinematics. Describe the difference between open chain and closed chain with examples.		1	1	1	2	1	1
15	Explain Stress and Strain with examples using load deformation curve.	3	1	1	1	2	1	1
16	What is Torque?	3	1	1	1	2	1	1
17	Describe the effects of Exercise on Bone, Cartilage, Tendons and Ligaments.	3	1	1	1	1	1	1
18	Define Range of motion(ROM). Enumerate the difference between Osteokinematics and Arthokinematics.		1	1	1	1	1	1
19	Define Sprain and its grading.	3	1	1	1	1	1	1
20	Define concave -convex rule rule. Describe in detail Arthokinematics.	3	1	1	1	2	2	1
21	Describe the structure of Atypical Di-arthrodial joint and classify the sub-classifications of joint.	3	1	1	1	1	2	1
22	Describe the Joint lubrication with its models. Enumerate the essentials of Joint Lubrication.	3	1	1	1	2	2	1

23	Explain Creep and how it affects joint structure and functions.	3	1	1	1	2	2	1
24	Explain in brief Spinal curves with diagram.	3	1	1	1	2	2	1
25	What is Inter-vertebral Disk explain with well labelled diagram.	3	1	1	1	2	2	1
26	Describe the biomechanics of thoracic spine.	3	1	1	1	2	2	1
27	Describe kinetic and kinematic of lumbar spine flexion and extension from erect standing position. Discuss the phys	3	1	1	1	3	3	1
28	Describe kinetic and kinematics of Cervical spine.	3	1	1	1	3	3	1
29	Describe biomechanics of thorax.	3	1	1	1	3	3	1
30	Explain role of Diaphragm in breathing.	3	1	2	2	3	2	1
31	Describe kinetic and kinematics of Knee joint(Diagram).	3	1	2	1	3	2	1
32	Explain the structures stabilising the Knee joint.	3	1	1	1	3	2	1
33	Describe the Arches of foot.	3	1	1	1	3	2	1
34	Describe kinetic and kinematics of normal human gait.	3	1	1	1	3	2	2
35	Describe the Determinants of Gait. Describe the stance phase of gait cycle. Describe the kinematic of Stance phase	3	1	1	2	3	2	3
36	What do you mean by Gait cycle? Describe the sagital plane analysis of stance phase of gait cycle.	3	1	1	1	3	1	3
37	Describe static stability of Elbow Joint.	3	1	1	1	3	2	1
38	Describe Biomechanic of Elbow Joint.			1	1	3	2	1
39	Describe the Biomechanics of Temporomandibular joint and explain muscles of Mandibular elevation and depressio		1	1	1	3	2	1
40	Discuss the Biomechanics of Gleno-humeral joint.		1	1	1	3	2	1
41	Describe Scapulo-humeral Rhythm.	3	1	1	1	3	2	1
42	Describe the Biomechanics of Elbow joint.		1	1	1	3	2	1
43	Describe "Carrying angle" of Elbow Joint.		1	1	1	3	2	1
44	Describe Q angle and its uses.		1	1	2	3	2	1
45	Describe the mechanism of injury in Tennis elbow.	3	1	1	1	3	2	1
46	Describe the biomechanics of Wrist joint .Write a note on Wrist Instability.	3	1	1	1	3	2	1
47	Describe the Annular pulleys in digits.	3	1	1	1	3	2	1

48 Discuss power grips and prehension patterns and explain primary muscles involved in each action.

3	1	1	1	3	2	1

PROGRAMME OUTCOME

PO1 = CLINICIAN

PO2 = LEADER AND MEMBER OF HEALTH CARE TEAM AND SYSTEM

PO3 = COMMUNICATOR

PO4 = LIFE LONG LEARNER

PO5 = PROFESSIONALS

PO6 = CRIRTICAL THINKER

PO7 = RESEARCHER