



TENTATIVE TEACHING PLAN (PRACTICAL)

Department: **Civil Engineering**

Name of Teacher: **Engr. Maroosha Larik**

Subject: **Applied Physics**

Course Code: **CE109**

Batch: **23 CE (A+B+C+D)**

Year: **1st**

Semester: **1st**

Semester Starting Date: **15-08-23**

Semester Suspension Date: **24-11-2024**

Course Learning Outcomes (CLOs): Upon successful completion of the course, the student will be able to:

CLO	Description	Taxonomy Level	PLO
CLO-4	DEMONSTRATE external behavior of bodies subject to force system and equilibrium.	P4	4

S #	Topic	CLO's	No: of Lecture/hrs. required
01	Introduction to Applied Physics laboratory and HSE(Health, Safety and Environment) measures.	4	3
02	To verify Parallelogram Law of forces by using Force Board.	4	3
03	To verify Triangle Law of Forces by using Force Board.	4	3
	To verify Polygon Law of Forces by using Force Board.	4	3
05	To verify the polygon law of forces using Funicular polygon apparatus.	4	3
06	To verify the first condition of equilibrium using Force Board.	4	3
07	To verify the second condition of equilibrium using meter scale-beam method Board	4	3
08	To find out the co-efficient of friction on horizontal steel plane for various materials.	4	3
09	To find out the angle of static, dynamic friction and the coefficient of friction between various materials on inclined steel plane for various materials.	4	3
10	To find out the angle of static, dynamic friction and the coefficient of friction between various materials on precision friction force apparatus at different speeds.	4	3
11	To verify that the centrifugal force varies in direct proportion to mass of rotating body, square of speed of rotation and the radius of gyration.	4	3
12	To determine the experimental values of the force in the principal parts of the Jib Crane and to see the effect of altering the tie length	4	3
13	To compare the results of wall Jib crane with the forces obtained from graphical solutions using polygon or triangle law of forces.	4	3
14	To determine the forces obtained from graphical solutions using triangle law and parallelogram law of forces.	4	3
15	To perform an open-ended lab	4	6
TOTAL			48

Signature of Teacher:

Dated: 10-10-2023

Remarks of DMRC: **APPROVED**

Signature of Chairman:

Dated: 20-10-2023