

GANESH INSTITUTE OF ENGINEERING AND TECHNOLOGY, POLYTECHNIC

DEPARTMENT OF CIVIL ENGINEERING

FACULTY NAME:- Er. Sundeep Behera

LESSON PLAN CUM PROGRESS REPORT

SUBJECT: CONCRETE TECHNOLOGY				SEMESTER: 6 TH			BRANCH: CIVIL ENGINEERING		
LECTURE NO.	CO	BTL	TOPIC TO BE COVERED	BOOK NAME./CHAPT. NO./PAGE NO.	WEB REFERENCE IF ANY	TEACHING LEARNING METHOD	PLAN DATE	ACTION DATE	REVIEW BY HOD
1	1	1	Concrete as a construction material: 1.1 Grades of concrete	M.L. Gambhir & Lecture Notes		1-Introduction to CT-10 min 2-Prerequisites for CT-10 min 3-Syllabus & CO discussion-10 min 4-Lecture-30 min	22.12.2025		
2	1	1	Advantages and disadvantages of concrete	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	23.12.2025		
3	1	1	Cement:	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	24.12.2025		
4	1	1	Composition, hydration of cement, water cement ratio and compressive strength	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	26.12.2025		
5	1	1	fineness of cement, setting time, soundness, types of cement	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	29.12.2025		
6	1	1	fineness of cement, setting time, soundness, types of	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min	30.12.2025		
7	1	1	Aggregate, Water and Admixtures	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min	31.12.2025		
8	1	1	Classification and characteristics of aggregate, fineness	M.L. Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min	01-01-2026		
9	1	1	Classification and characteristics of aggregate, fineness modulus, grading of aggregate, I.S.383	Lecture Notes		1-Previous class topic Review-5 min 2-Lecturer-45 min 3-Doubts	05-01-2026		
10	1	1	Quality of water for mixing and curing	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	06-01-2026		

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11	1	1	Important functions, classification of admixtures, I.S 9103, accelerating admixtures, retarding admixtures, water reducing	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	07-01-2026		
12	1	1	Important functions, classification of admixtures, I.S 9103, accelerating admixtures, retarding admixtures, water reducing admixtures air	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min & Assignment-10 min	08-01-2026		
13	2	1	Properties of fresh concrete:	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	12-01-2026		
14	2	1	Concept of fresh concrete, workability	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts	13-01-2026		
15	2	2	Concept of fresh concrete, workability	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	15-01-2026		
16	2	2	slump test, compacting factor test	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	16-01-2026		
17	2	2	V-bee consistency test and flow test,	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	19-01-2026		
18	2	2	requirement of workability, I.S.1199	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	20-01-2026		
19	2	2	Properties of hardened concrete:	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	21-01-2026		
20	2	2	Cube and cylinder compressive strengths, flexural strength of concrete, stress	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts	22-01-2026		
21	2	2	Cube and cylinder compressive strengths, flexural strength of concrete, stress-strain and elasticity	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	27-01-2026		

22	2	3	phenomena of creep and shrinkage, permeability	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	28-01-2026		
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23	2	1	durability of concrete, sulphate, chloride	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	29-01-2026		
24	2	2	acid attack on concrete, efflorescence	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	30-01-2026		
25	2	2	acid attack on concrete, efflorescence	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min & Assignment-10 min	31-01-2026		
26	3	1	Concrete mix Design 6.1 a) Introduction b) Data or input required for mix	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	02-02-2026		
27	3	1	Concrete mix Design 6.1 a) Introduction	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min	03-02-2026		
28	3	1	Nominal mix concrete & design mix concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	04-02-2026		
29	3	2	Basic consideration for concrete mix design, Methods of proportioning concrete	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	05-02-2026		
30	3	2	Basic consideration for concrete mix design, Methods of proportioning concrete mix – I.S Code method of mix	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min & Assignment-10 min	09-02-2026		
31	4	2	Production of concrete:	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	10-02-2026		
32	4	2	Batching of materials, mixing of concrete materials, transportation, placing of concrete, compaction of	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	11-02-2026		
33	4	2	Batching of materials, mixing of concrete materials, transportation, placing of concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	12-02-2026		

34	4	2	Batching of materials, mixing of concrete materials, transportation, placing of concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	16-02-2026		
LECTU RENO.	CO	BTL	TOPIC TO BE COVERED	BOOK NAME./CHAPT. NO./PAGE NO.	WEBREFERENCEIFANY	TEACHINGLEAR NINGMETHOD	PLAN DATE	ACTIO N DATE	REVIEW BY HOD
35	4	3	Curing of concrete, Formwork-requirements and types ,stripping of forms. (Concepts only)	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	17-02-2026		
36	4	3	Curing of concrete, Formwork-requirements and types ,stripping of forms. (Concepts only)	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts	18-02-2026		
37	4	2	Inspection and Quality Control of Concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	19-02-2026		
38	4	3	Quality control of Concrete as per I.S.456, Factors causing the variations in the quality of concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	23-02-2026		
39	4	3	Mixing, Transporting, Placing &curing requirements of Concrete as per I.S.456.	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	24-02-2026		
40	4	3	Mixing, Transporting, Placing &curing requirements of Concrete as per I.S.456.	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	25-02-2026		
41	4	3	Inspection and Testing as per Clause 17 of IS:456.	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	26-02-2026		
42	4	2	Durability requirements of Concrete as per I.S:456	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min & Assignment-10 min	02-03-2026		
43	5	2	Special Concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	05-03-2026		
44	5	2	Introduction to ready mix concrete	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	06-03-2026		
45	5	2	high performance concrete, silica fume concrete,	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts & Assignment-10 min	07-03-2026		

46	5	2	high performance concrete, silica fume concrete,	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min	09-03-2026		
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47	5	2	shot-crete concrete or gunitting (Concepts only)	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	10-03-2026		
48	5	2	shot-crete concrete or gunitting (Concepts only)	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min & Assignment-10 min	11-03-2026		
49	6	3	Deterioration of concrete and its prevention:	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	12-03-2026		
50	6	3	Deterioration of concrete and its prevention:	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	16-03-2026		
51	6	3	Types of deterioration, prevention of concrete deterioration	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	17-03-2026		
52	6	3	Types of deterioration, prevention of concrete deterioration	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	18-03-2026		
53	6	2	corrosion of reinforcement, effects and prevention	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	19-03-2026		
54	6	2	corrosion of reinforcement, effects and prevention	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	23-03-2026		
55	6	2	Repair technology for concrete structures:	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	24-03-2026		
56	6	3	Symptom, cause and prevention and remedy of defects during construction,	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts	25-03-2026		
57	6	3	Symptom, cause and prevention and remedy of defects during construction,	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	26-03-2026		

58	6	2	cracking of concrete due to different reasons.	Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	30-03-2026		
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59	6	3	Repair of cracks for different purposes, selection of techniques, polymer based repairs, common types of	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min	06.04.2026		
60	6	3	Repair of cracks for different purposes, selection of techniques, polymer based repairs, common types of repairs	M.L.Gambhir & Lecture Notes		1-Previous class topic Review-10 min 2-Lecture-40 min 3-Doubts -10 min & Assignment-10 min	07.04.2026		

Principal

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