## **LESSON PLAN**

NAME OF THE FACULTY	: Ar. TWINKLE AGGARWAL
DEPARTMENT	: ARCHITECTURAL ASSISTANTSHIP
SEMESTER	: 2nd
SUBJECT	: BUILDING MATERIALS AND CONTRUCTION TECHNOLOGY –I
LESSON PLAN DURATION	: 17 WEEKS
WORK LOAD PER WEEK	: 07

Week	Lecture Day	Topics
Week-1	1	UNIT-1 Building Stones 1.1 Classification of rocks
	2	1.2 Characteristics and utility of good building stones
	3	1.3 Testing Water absorption, Compressive strength and Durability test
Week-2	4	1.4 Natural bed of stones, its effective and correct placement in building
	5	1.5 Common building stones- 1.5.1 Granite, Basalt and Trap, Sandstone, Lime stone, Slate, Marble
	6	1.5.2 Their composition, Properties, uses and their origin
Week-3	7	1.5.3 Their transportation and storage Techniques
	8	1.5.4 Selection of stones for different building works
	9	1.6 Characteristics and classification of stone masonry
Week-4	10	1.7 Advantages and Disadvantages of different types of stones and their suitability to different elements of building
WEEK T	11	Test Of Unit-1
	12	<b>UNIT-2 Bricks</b> 2.1 Sizes, classification and Composition of bricks
Week-5	13	
	14	Conduct of 1st Sessional Test From 15/03/2024- 21/03/2024
	15	

	16	2.2 Properties and uses of first class and second class bricks, clay and burnt bricks
Week-6	17	2.3 Characteristics of a good brick including size and weight of a standard brick
	18	2.4. Test for burnt clay bricks Compressive strength, Water absorption & efflorescence
	19	2.5 Fire bricks, its properties, uses and availability.
Week-7	20	2.6 Stretcher and header courses in various wall thickness,
	21	2.7 T-junctions and Cross-junction in <sup>1</sup> / <sub>2</sub> , 1 and 1 <sup>1</sup> / <sub>2</sub> thick brick wall
	22	2.8 Different types of bonds - English, Flemish and Rat Trap Bond in different wall width
Week-8	23	2.9 Advantages and Disadvantages of different Bonds
	24	2.10 Advantages and Disadvantages of different types of bricks and their suitability to different elements of building
	25	Test Of Unit-2
Week-9	26	UNIT-3 Foundation 3.1 Different types of foundations (normal and eccentric)
Week-9	26 27	<ul><li><b>UNIT-3 Foundation</b></li><li>3.1 Different types of foundations (normal and eccentric)</li><li>3.2 Their advantage of one over other</li></ul>
Week-9	26 27 28	<ul> <li>UNIT-3 Foundation</li> <li>3.1 Different types of foundations (normal and eccentric)</li> <li>3.2 Their advantage of one over other</li> </ul>
Week-9 Week-10	26 27 28 29	<ul> <li>UNIT-3 Foundation</li> <li>3.1 Different types of foundations (normal and eccentric)</li> <li>3.2 Their advantage of one over other</li> <li>Conduct of 2nd Sessional Test From 22/04/2024- 26/04/2024</li> </ul>
Week-9 Week-10	26 27 28 29 30	<ul> <li>UNIT-3 Foundation <ul> <li>3.1 Different types of foundations (normal and eccentric)</li> </ul> </li> <li>3.2 Their advantage of one over other</li> <li>Conduct of 2nd Sessional Test From 22/04/2024-26/04/2024</li> </ul>
Week-9 Week-10	26 27 28 29 30 31	<ul> <li>UNIT-3 Foundation <ul> <li>3.1 Different types of foundations (normal and eccentric)</li> </ul> </li> <li>3.2 Their advantage of one over other </li> <li>Conduct of 2nd Sessional Test From 22/04/2024- <ul> <li>26/04/2024</li> </ul> </li> <li>3.3 Brief knowledge of different types of foundations in basements</li> </ul>
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Week-10 Week-11	26 27 28 29 30 31 32 33 34	<ul> <li>UNIT-3 Foundation <ul> <li>3.1 Different types of foundations (normal and eccentric)</li> </ul> </li> <li>3.2 Their advantage of one over other </li> <li>Conduct of 2nd Sessional Test From 22/04/2024- <ul> <li>26/04/2024</li> </ul> </li> <li>3.3 Brief knowledge of different types of foundations in basements <ul> <li>3.4 Foundations for columns and verandah steps</li> <li>Test Of Unit-3</li> </ul> </li> <li>UNIT-4 Openings in Walls <ul> <li>4.1 Classification of arches and lintels as per finish, shape and material</li> </ul> </li> </ul>
Week-10 Week-11 Week-12	26 27 28 29 30 31 32 33 33 34 35	<ul> <li>UNIT-3 Foundation <ul> <li>3.1 Different types of foundations (normal and eccentric)</li> </ul> </li> <li>3.2 Their advantage of one over other </li> <li>Conduct of 2nd Sessional Test From 22/04/2024- <ul> <li>26/04/2024</li> </ul> </li> <li>3.3 Brief knowledge of different types of foundations in basements</li> <li>3.4 Foundations for columns and verandah steps</li> <li>Test Of Unit-3</li> <li>UNIT-4 Openings in Walls <ul> <li>4.1 Classification of arches and lintels as per finish, shape and material</li> </ul> </li> <li>4.2 Brick jallies and reinforcement.</li> </ul>

Week-13	37	Test Of Unit-4
	38	<b>UNIT-5 Damp Proof Course</b> 5.1 Explanation of DPC and reasons for its use
	39	5.2 Sources and effects of dampness
	40	<ul><li>5.3 Classification as per hardness of material.</li><li>5.4 BIS stipulations of damp proofing</li></ul>
Week-14	41	5.5 Treatment of Building component for effective damp proofing.
	42	Test Of Unit-5
Week-15	43	Conduct of 3rd Sessional Test From 27/05/2024- 31/05/2024
	44	
	45	
	46	Sheets Final Submission
Week-16	47	Sheets Final Submission
	48	Mock Test of Complete Syllabus
	49	
Week-17	50	Problem Solving Classes
	51	