



R22 Regulation *Subject code:4E3AE*
TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
 (Autonomous, Accredited by NAAC with 'A+' Grade)

B.Tech III Semester Regular/Supplementary Examinations, December 2024

BUILDING MATERIALS, CONSTRUCTION & PLANNING
 (CE)

Maximum Marks: 60

Date: 11.12.2024

Duration: 3 hours

- Note:**
1. This question paper contains two parts A and B.
 2. Part A is compulsory which carries 10 marks. Answer all questions in Part A.
 3. Part B consists of 5 Units. Answer any one full question from each unit.
 4. Each question carries 10 marks and may have a, b, c, d as sub questions.

Part-A		CO	Bloom Tx
All the following questions carry equal marks (10X1M=10 Marks)			
1.a)	What are the different types of paints?	1	1
b)	What role does aluminum play in building construction?	1	1
c)	List out the ingredients of cement.	2	1
d)	What are different types of admixtures?	2	1
e)	What is the requirement of a good ventilation system?	3	1
f)	Explain Plumbing services.	3	1
g)	What is stone masonry?	4	1
h)	Define pointing.	4	1
i)	Write any four basic principles of building planning?	5	1
j)	What are building bye laws?	5	1
Part-B		CO	Bloom Tx
Answer All the following questions. (5X10M=50Marks)			
2	a) What are the operations involved in manufacturing of bricks? [5M] b) Differentiate between river sand and M-sand. [5M]	1	2
OR			
3	Explain in detail seasoning of timber. [10M]	1	2
4	Explain detail different laboratory tests of cement. [10M]	2	2
OR			
5	a) Explain about functions of admixtures. [5M] b) Write a short note on field test of cements. [5M]	2	2
6	What is acoustics? State various types of sound absorbing materials according to mode of their performance. [10M]	3	2
OR			
7	a) Write classification of arches based on shape. [5M] b) Describe various types of bricks arches. [5M]	3	3

8	a) Explain in detail about High performance concrete. [5M] b) Explain in detail about Light weight concrete. [5M]	4	2
	OR		
9	a) Explain about types of bonds in brick Masonry works. [5M] b) Explain different types of stones Masonry. [5M]	4	2
10	State and explain the various basic principles of building planning? [10M]	5	2
	OR		
11	Explain various principles underlying building bye-laws. [10M]	5	3