Roll No.                               Total No. of Pages : 02

Total No. of Questions : 09

**B.Tech. (CE) (Sem.–5th)**

**TRANSPORTATION ENGG-I**

Subject Code : CE-311

Paper ID : [A0617]

Time : 3 Hrs.                               Max. Marks : 60

INSTRUCTION TO CANDIDATES :

1.  SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2.  SECTION-B contains FIVE questions carrying FIVE marks each and students has to attempt any FOUR questions.
3.  SECTION-C contains THREE questions carrying TEN marks each and students has to attempt any TWO questions.

**SECTION-A**

1. Answer briefly :

(a) Explain the different modes of transportation.

(b) Write the difference between Bituminous and concrete roads.

(c) Why extrawidening is provided on curves?

(d) What are the requirements of a road alignment?

(e) Why camber is provided on roads?

(f) Why pavement evaluation is carried out?

(g) Why Rotaries are provided on road intersections?

(h) What are the surveys carried out in Road projects?

(i) Why minimum gradient is required on roads?

(j) What are the causes of road accidents?

2. A falling gradient 1 in 80 meets a risi... with a design speed of 80 kmph. Calc...

3. Derive an expression for calculating st...

4. Write short note on maintenance of hi...

5. How the data of O-D study is analyse...

6. Explain the different types of signs on...

7. Write the stepwise procedure for the ...

8. Explain the various types of joints in ...

9. Write an explanatory note on the stre...