

Date 3rd May 2007 (IV 339)

CEL 443. Transportation Safety and Environment. Major 3:30 to 5:30.

1. a) What are the major factors resulting in street accidents?
 b) There exist four of treatments for road safety engineering measures. Mention those.
 c) Express (~~briefly~~) how will proceed for a road safety plan.
2. a) What are the two main objectives of traffic calming?
 b) What are the various traffic calming techniques?
 c) What are the most harmful pollutants, emitted from road vehicles? Discuss briefly.
3. a) What are the new types of vehicles invented to reduce pollutants?
 b) What are the non-conventional types of fuels are being used in these?
 c) Explain with their physio-chemical characteristics.
4. Draw a neat sketch of the following along with dimensions (where applicable)
 - a) road hump
 - b) rumble strip
 - c) three leg rightangle intersections (showing divisional island and two turning roadways).
5. What are the comparative advantages and disadvantages of
 - a) Fixed Time and
 - b) vehicle actuated signal
 - c) where and when you will provide the intersections without signals.