Menoufiya University Faculty of Engineering Shebin El-Kom Academic Year: 2013-2014 Date: 7/6/2014



Department: Civil Eng. Year: Postgraduate Subject/Code: Analysis of structure in the space Time Allowed: 3 hours

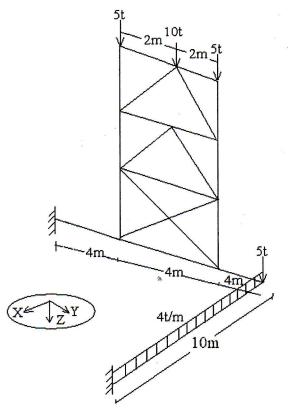
Allowed Tables and Charts: (None or e.g. Steam Tables)

Answer all the following Questions [100 Marks]

Question (1)

<u>Marks</u>

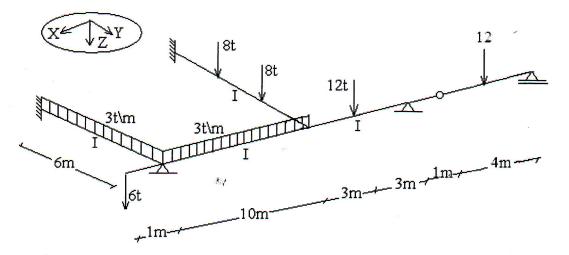
For the shown structure (Constant I), draw shear force, bending moment and torsion moment diagram. [33]



Question (2)

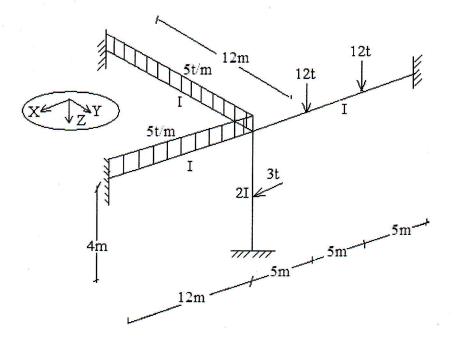
For the shown structure, conclude the overall stiffness matrix.

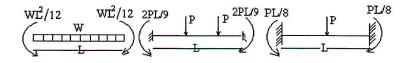
[35]



Question (3)

[35] For the shown structure, draw shear force, bending moment and torsion moment diagram.





With my best wishes