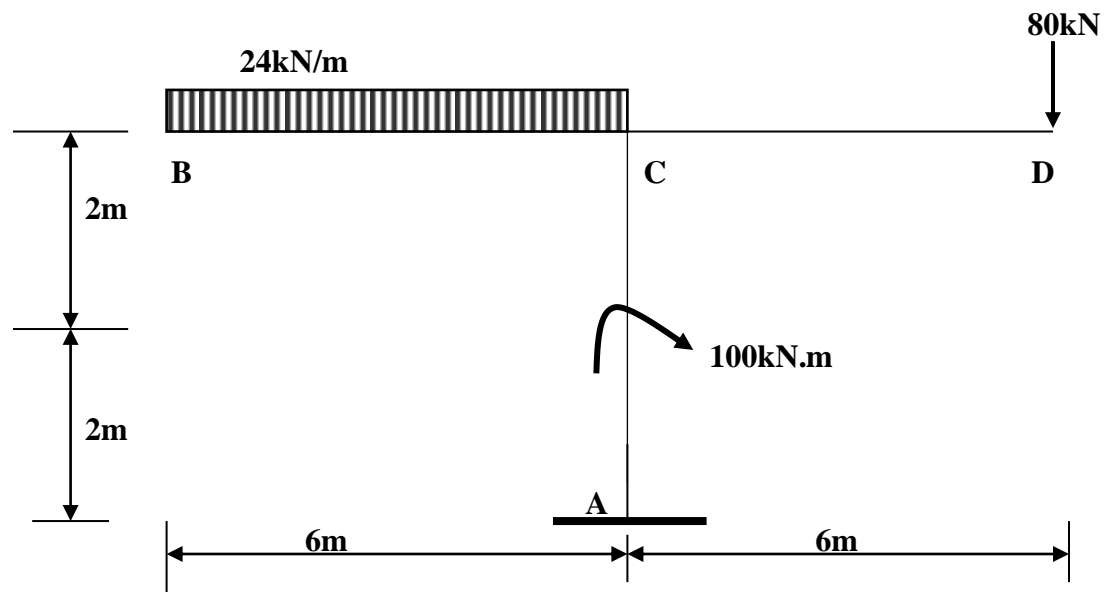


Final Examination

Name:

1- (25 Points) DRAW THE SHEAR AND MOMENT DIAGRAMS.

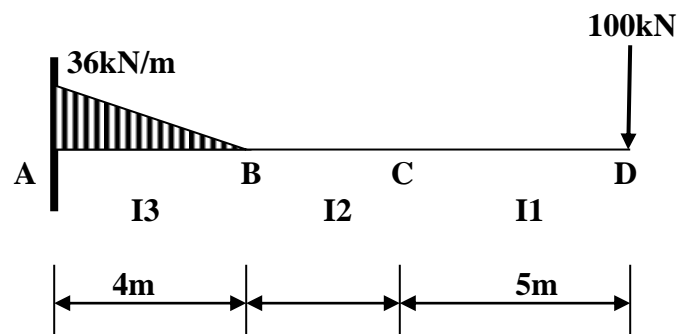


2- (25 Points) DETERMIN θ_B , δ_C , δ_D USING MOMENT AREA METHOD.

$$I_1 = I \quad , \quad I_2 = 2I \quad , \quad I_3 = 3I$$

$$E = 200 \cdot 10^6 \frac{kN}{m^2}$$

$$I_B = 500 \cdot 10^{-6} m^4$$

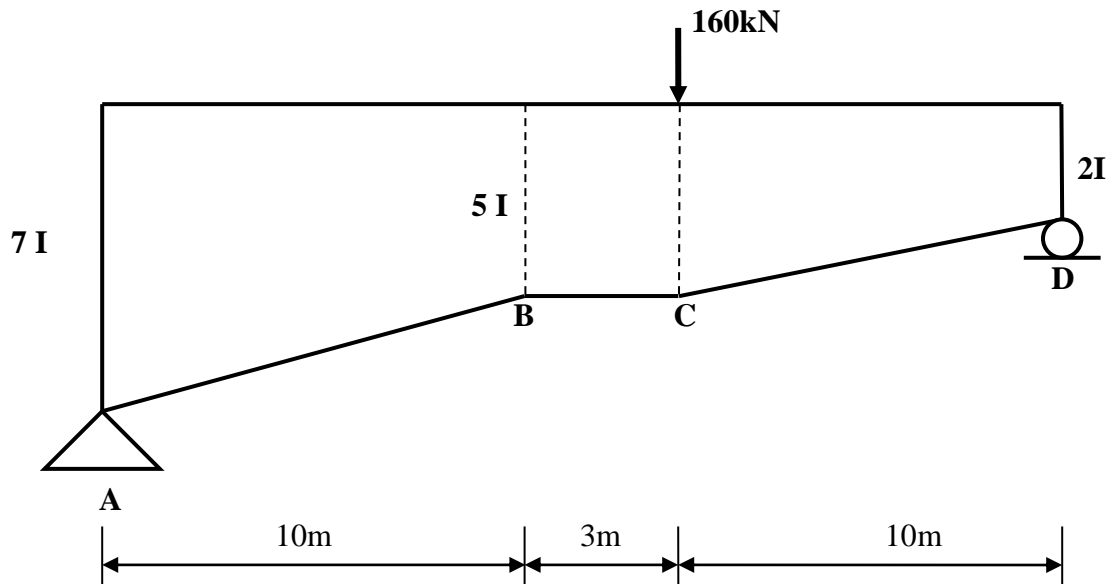


3- (25 points)

DETERMINE δ_c USING ENERGY METHOD.

$$I = 200 \cdot 10^{-6} m^4$$

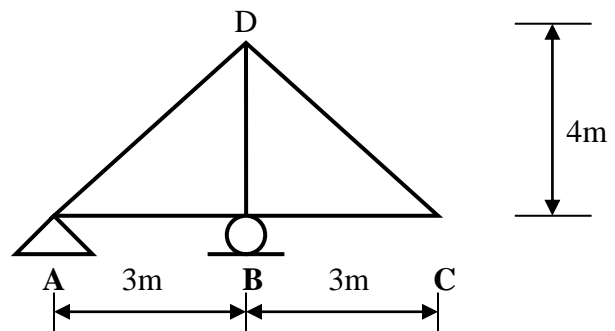
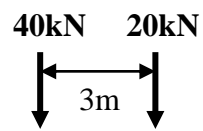
$$E = 200 \cdot 10^6 \frac{kN}{m^2}$$



4- (25 points)

USING INFLUENCE LINES METHOD DETERMINE.

A- $F_{AD \text{ MAX}}$



B- R_D & M_A

