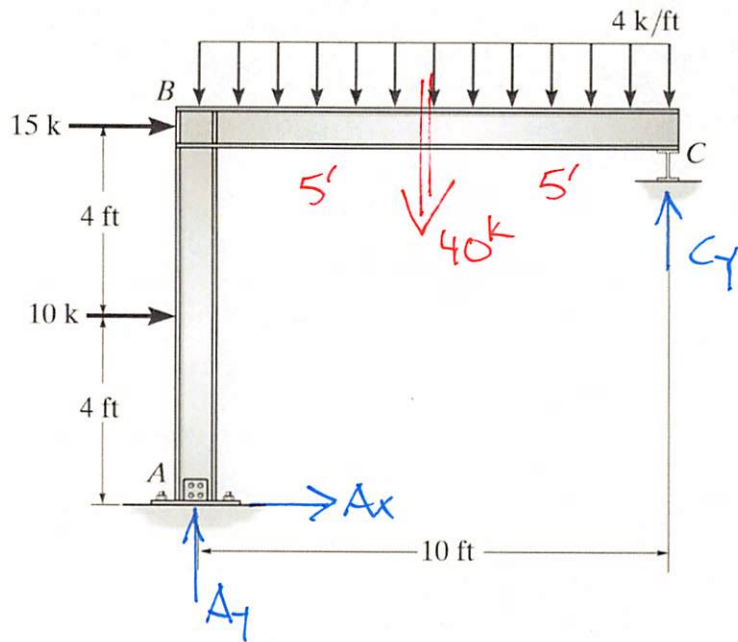


Example 4d-2: Draw the shear and moment diagrams for the following frame:

1/2



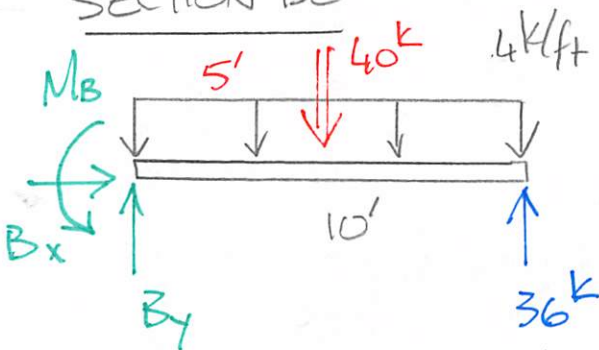
$$\sum M_A = 0 = -10^k(4') - 15^k(8') - 40^k(5') + C_y(10')$$

$$C_y = 36^k$$

$$+\uparrow \sum F_y = 0 = A_y + C_y - 40^k \quad A_y = 4^k$$

$$+\rightarrow \sum F_x = 0 = A_x + 10^k + 15^k \quad A_x = -25^k$$

SECTION BC



$$\sum M = 0$$

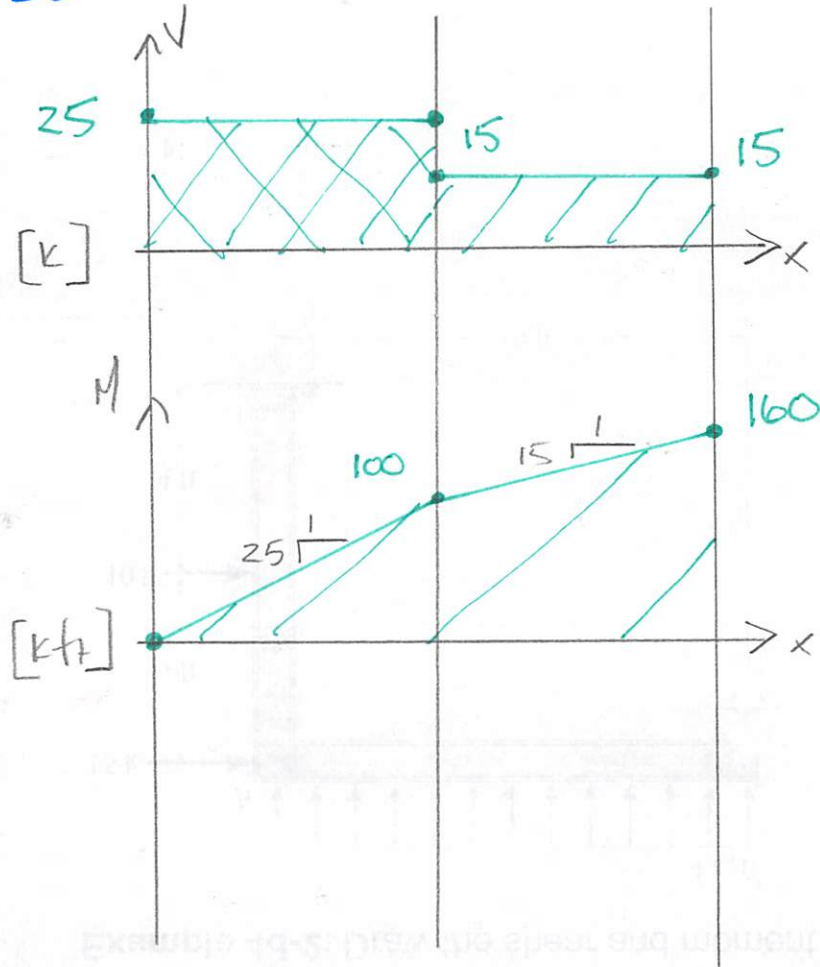
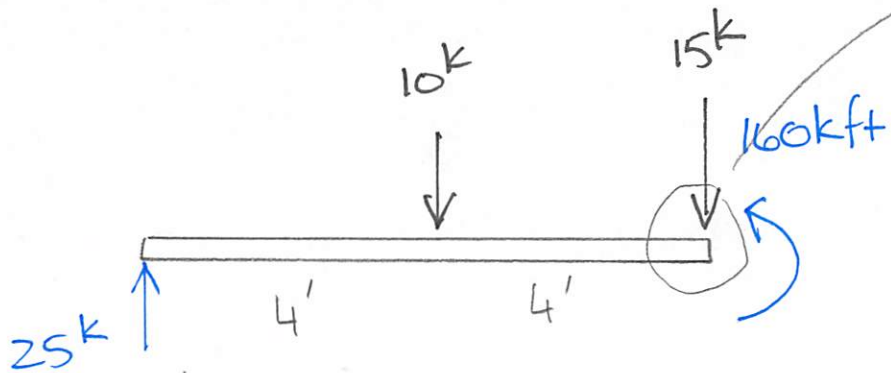
$$= M_B - 40^k(5') + 36^k(10')$$

$$M_B = -160 \text{ k ft}$$

$$+\uparrow \sum F_y = 0 = B_y + 36^k - 40^k \quad B_y = 4^k$$

$$+\rightarrow \sum F_x = 0 = B_x$$

SECTION AB



SECTION BC

