

100N

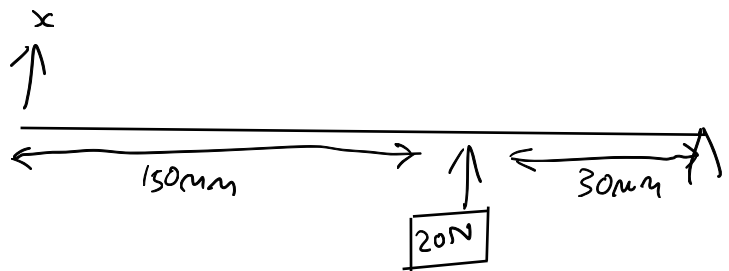


$$F_1 d_1 = F_2 d_2$$

$$100 \times 70 = 8x$$

$$x = \frac{7,000}{8} = 875 \text{ mm}$$

8N

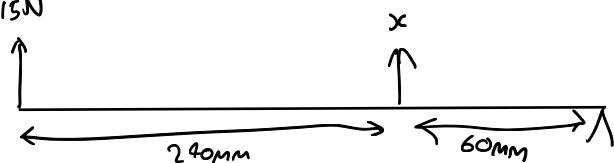


$$F_1 d_1 = F_2 d_2$$

$$30 \times 20 = 180x$$

$$x = \frac{600}{180} = 3\frac{1}{3} \text{ N}$$

15N



$$F_1 d_1 = F_2 d_2$$

$$15 \times 300 = 60x$$

$$x = \frac{15 \times 300}{60} = 75 \text{ N}$$