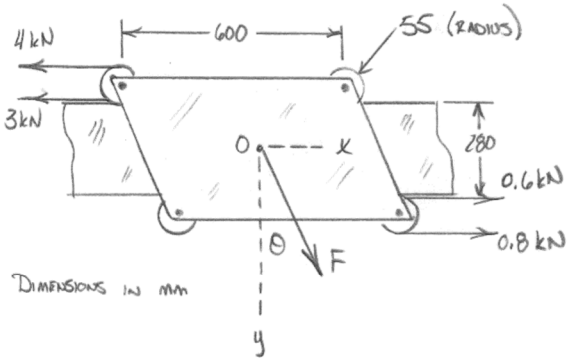
2/98 $F = 5\ \text{kN}, \quad \Theta = 30^\circ$



$$\underline{R} = (0.8 + 0.6 + 5\sin 30^\circ - 4 - 3)\,\underline{i} + 5\cos 30^\circ\,\underline{j} \longrightarrow \underline{R} = -3.10\,\underline{i} + 4.33\,\underline{j}\ \text{kN}$$

$$\Sigma M_O = 0.6\left(\frac{140}{1000}\right) + 0.8\left(\frac{140+110}{1000}\right) + 3\left(\frac{140}{1000}\right) + 4\left(\frac{140+110}{1000}\right) =$$

$$\therefore \Sigma M_O = 1.704\ \text{kN·m CCW}$$

FOR A CCW M_O WITH NEGATIVE R_x, R IS PLACED ABOVE O IN MINUS y.

$$R_x\,y = M_O \longrightarrow 3.10|y| = 1.704 \longrightarrow |y| = 0.550$$

$$\therefore \underline{|y| = 550\ \text{mm ABOVE O OR } (0, -550)\ (\text{mm})}$$