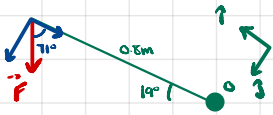


Ex 1



$$1 \text{ rad} = \frac{360^\circ}{2\pi}$$

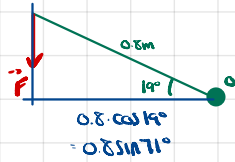
$$\frac{1.73}{360} \cdot 2\pi \text{ rad} = 73^\circ$$

$$\vec{\tau}_0 = \vec{r} \times \vec{F}$$

$$\vec{r} = 0.8 \hat{i}$$

$$\vec{F} = -F \cos 71^\circ \hat{i} + F \sin 71^\circ \hat{j}$$

$$\begin{aligned} \vec{\tau}_0 &= F \cdot 0.8 \cdot \sin 71^\circ \hat{k} \\ &= 900 \cdot 0.8 \sin 71^\circ \hat{k} \\ &= 658.5 \text{ N} \cdot \text{m} \end{aligned}$$



$$\vec{\tau}_0 = \vec{F} \cdot 0.8 \cdot \cos 19^\circ$$