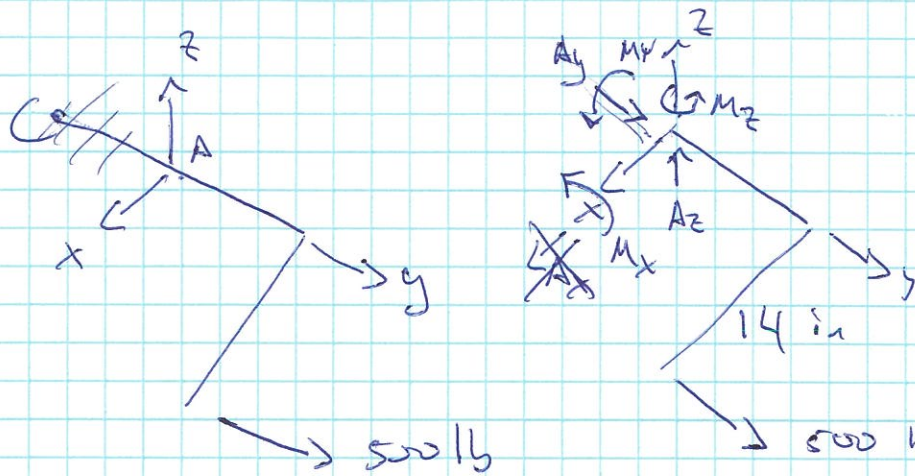
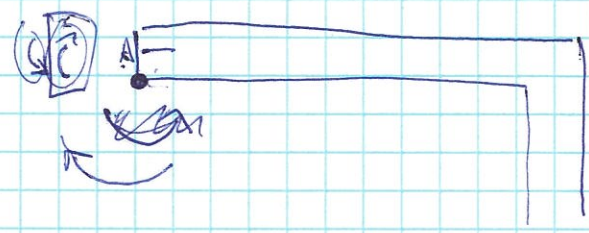


8.5



$$\begin{aligned} A_x &= 0 \\ A_y &= -500 \\ A_z &= 0 \\ M_x &= 0 \\ M_y &= 0 \\ M_z &= -14(500) \end{aligned}$$

$$\sigma_N = \frac{N}{A} = \frac{500}{\pi (.75)^2} = \underline{283 \text{ PSI}}$$



$$\begin{aligned} \sigma_B &= \frac{500(14)^{3/4}}{\frac{1}{4}\pi (.75)^4} \\ &= \underline{21.13 \text{ ksi}} \end{aligned}$$

$$\underline{\sigma_A = 21.4 \text{ ksi}}$$

