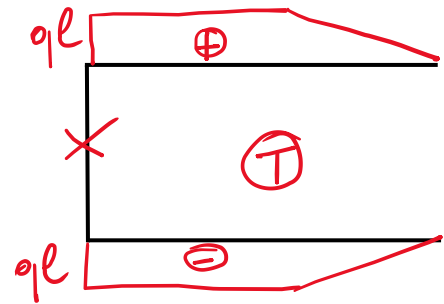
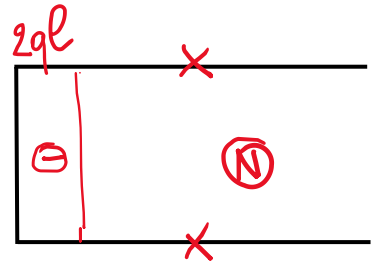
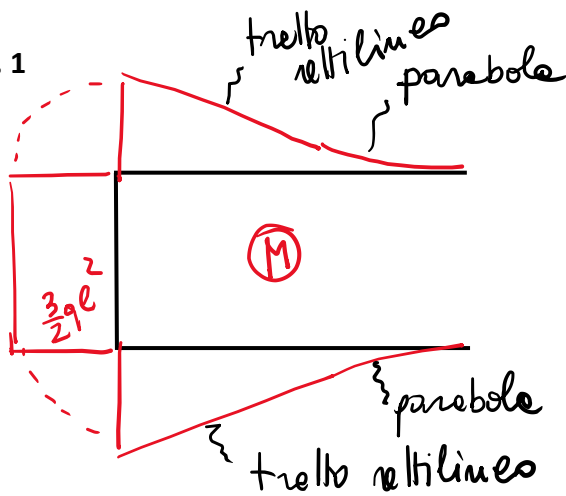
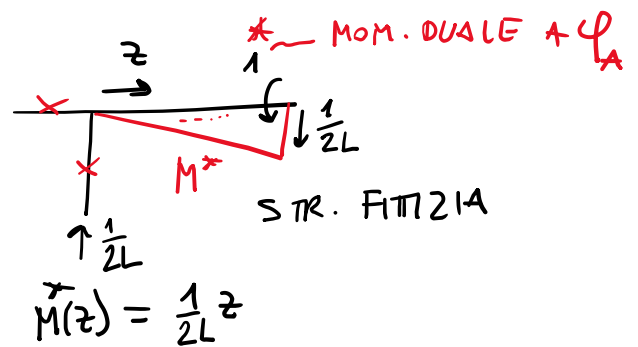
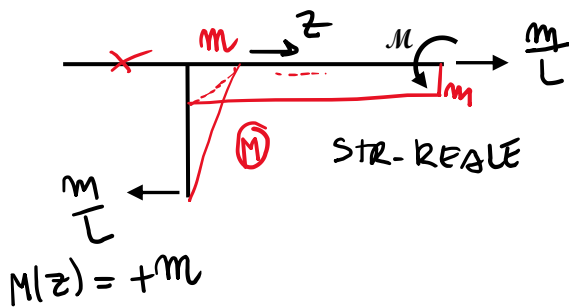


I PARTE

Quesito n. 1



Quesito n. 2



$$\varphi_A = \int_0^{2L} \frac{z}{2L} \cdot \frac{m}{EJ} dz = \frac{m}{2LEJ} \cdot \frac{4L^2}{2} = \frac{mL}{EJ}$$

(IL PILASTRO NON CONTRIBUISCE PERCHÉ
 L' $M^* = 0$)

II PARTE

Quesito n. 1

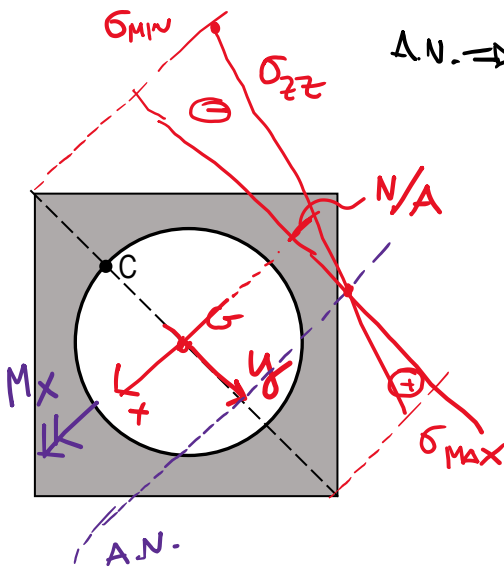
• TENSIONE
NORMALE E
ASSE NEUTRO

$$J_x = J_y = \frac{40^4}{12} - \frac{\pi 15^4}{4} = 173573 \text{ mm}^4; A = 893 \text{ mm}^2$$

$$N = -10 \text{ kN}; M_x = 10 \cdot 15 \text{ kN mm}; M_y = 0$$

$$\sigma_{zz} = \frac{N}{A} + \frac{M_x}{J} y = -\frac{10000}{893} + \frac{150000}{173573} y \left(\frac{\text{N}}{\text{mm}^2} \right)$$

$$\Delta N. \Rightarrow \sigma_{zz} = 0; y = 12.96 \text{ mm}$$



• NOCCIOLLO

