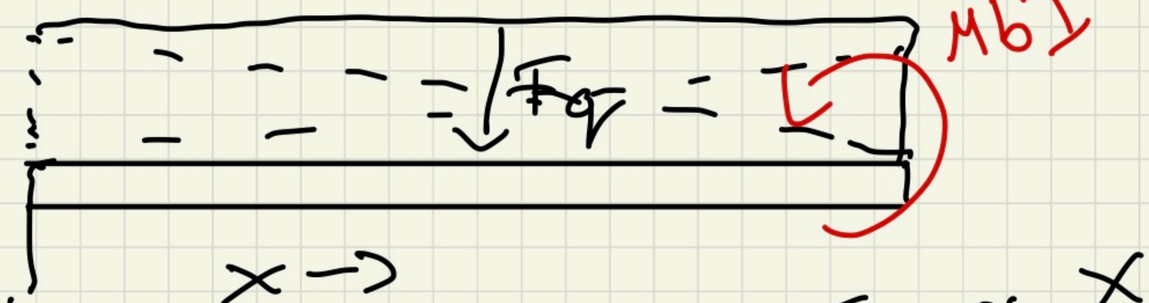
$F = 3kN \quad F_q = 2kN \quad A_z = 0{,}5kN$

$B_z = -5{,}5kN$

Schnitt (I)



$A_z \qquad 0 \le x \le 1m \qquad F_q = q_0 \cdot x$

$\sum M^{(I)} = 0 \quad q_0 \cdot x \cdot \frac{x}{2} + A_z \cdot x + M_{bI} = 0$

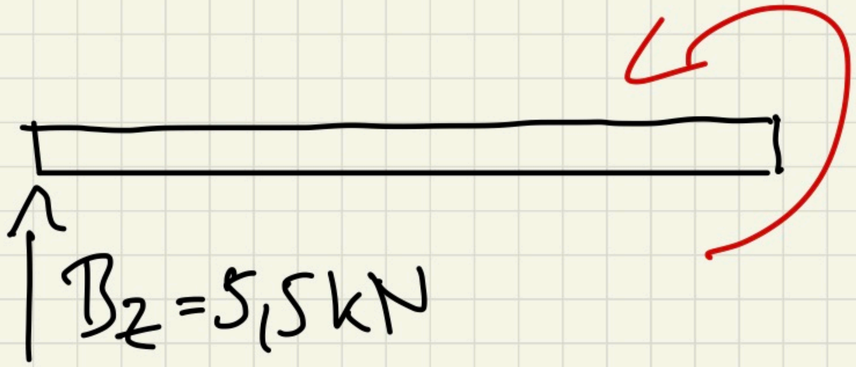
$M_{bI} = -q_0 \cdot \frac{x^2}{2} - A_z \cdot x$

$x = 0m \quad M_{bI} = 0$

$x = 1m \quad M_{bI} = -1{,}5kNm$

Schnitt (2)

M_{bII}



$1m \leq x \leq 1{,}5m$

$\leftarrow \sum M_y^{(II)} = 0 \quad q_0 \cdot \frac{x^2}{2} + A_z \cdot x$

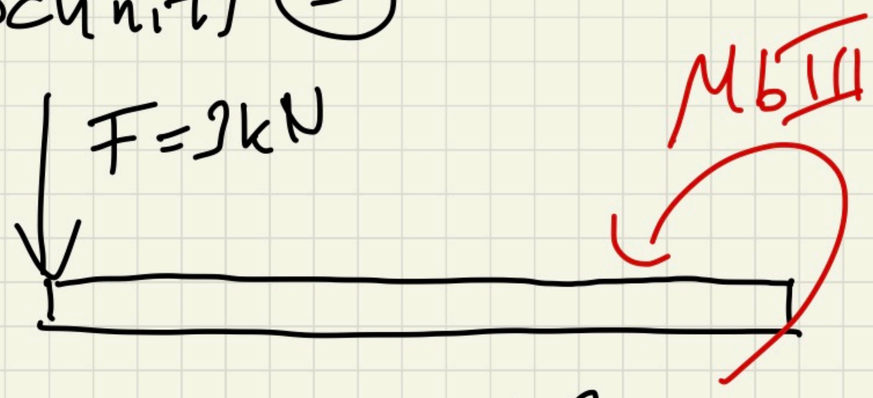
$- B_z \cdot (x - 1m) + M_{bII} = 0$

$$M_{bII} = -q_0 \cdot \frac{x^2}{2} - A_z \cdot x + B_z \cdot (x - 1m)$$

$x = 1m$ $\quad M_{bI} = -1{,}5\,kNm$

$x = 1{,}5m$ $\quad M_bI = -0{,}25\,kNm$

Schnitt ③



$1{,}5 \leq x \leq 2m$

$$\sum M_y^{(III)} = 0 \qquad q_0 \cdot \frac{x^2}{2} + A_z \cdot x - B_z \cdot (x - 1m) + F \cdot (x - 1{,}5m)$$

$$+ M_{b\,III} = 0$$

$$M_{b\,IV} = -\,q_0 \cdot \frac{x^2}{2} - A_z \cdot x$$

$$+ B_z \cdot (x - 1\,m)$$

$$- F \cdot (x - 1{,}5\,m)$$

$x = 1{,}5\,m \quad M_{b\,III} = -0{,}25\,kNm$

$x = 2\,m \quad M_{b\,III} = -1\,kNm$

$x = 1{,}7 \quad M_{b\,III} = -0{,}49$