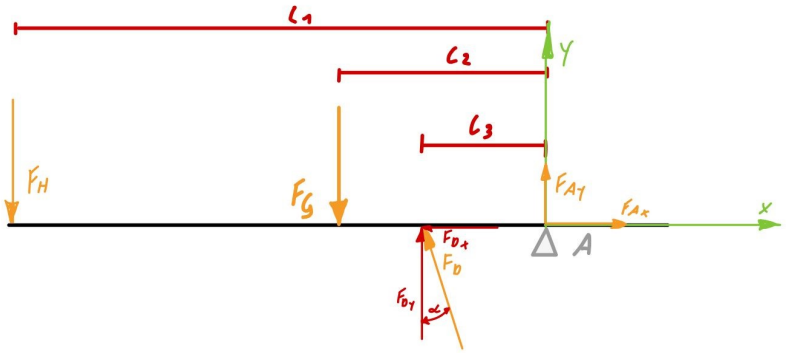

$l_1 := 590\ mm$
$l_2 := 250\ mm$
$l_3 := 180\ mm$
$F_g := 105\ N$
$F_D := 200\ N$
$\alpha := 11.5°$

Fg ... Gewichtskraft
FD ... Dämpferkraft
FH ... Haltekraft
FA ... Auflagekraft

$F_{Dy} := \sin(\alpha) \cdot F_D = 39.874\ N$
$F_{Dx} := \cos(\alpha) \cdot F_D = 195.985\ N$

$\Sigma F_x = -F_{Dx} + F_{Ax} \quad = 0$
$\Sigma F_y = -F_H - F_G + F_{Dy} + F_{Ay} \quad = 0$
$\Sigma M_A = F_H \cdot l_1 + F_g \cdot l_2 - F_{Dy} \cdot l_3 \quad = 0$

$$F_H := \frac{F_g \cdot l_2 - F_{Dy} \cdot l_3}{l_1}$$

$F_H = 32.327\ N$

$F_{Ay} := F_H + F_g - F_{Dy}$

$F_{Ay} = 97.453\ N$

$F_{Ax} := F_{Dx}$

$F_{Ax} = 195.985\ N$

$F_A := \sqrt{F_{Ay}^{\ 2} + F_{Ax}^{\ 2}}$

$F_A = 218.877\ N$