

reductie van M_{ix}

in de lx -richting $l_x = 475 \times \frac{1}{2} - \frac{1}{2} \times 40 = 217 \text{ cm}$
 $d_x = 475 - \frac{1}{2} \times 40 = 455 \text{ cm}$

$$M_{ix} = - \left\{ 1 - \left(\frac{217}{455} \right)^2 \right\} \times 14820 = \underline{\underline{-11700 \text{ Kgm}}}$$

reductie van M_{iy}

in de ly -richting $l_y = 424 - \frac{1}{2} \times 34 = 407 \text{ cm}$
voor rand A-B ; $d_y = 506 - \frac{1}{2} \times 34 = 489 \text{ cm}$

$$M_{iy_{AB}} = - \left\{ 1 - \left(\frac{407}{489} \right)^2 \right\} \times 18080 = \underline{\underline{-5860 \text{ Kgm}}}$$

voor rand C-D ; $l_y = 87 - \frac{1}{2} \times 34 = 70 \text{ cm}$
 $d_y = 506 - \frac{1}{2} \times 34 = 489 \text{ cm}$

$$M_{iy_{CD}} = - \left\{ 1 - \left(\frac{70}{489} \right)^2 \right\} \times 18080 = \underline{\underline{-17550 \text{ Kgm}}}$$

Berekening van Momenten voor q -belasting

$$\frac{l_y}{l_x} = \frac{511}{475} = 1,07 \quad \text{geval II tabel VIII GBV.}$$

$$M_{(v_x)} = -M_{ix} = 0,001 \times 1395 \times 40 \times 4,75^2 = 1260 \text{ Kgm}$$

$$M_{v_y} = 0,001 \times 1395 \times 36 \times 4,75^2 = 1132 \text{ Kgm}$$

$$-(M_{iy}) = 0,001 \times 1395 \times 36 \times 4,75^2 = 1132 \text{ Kgm}$$