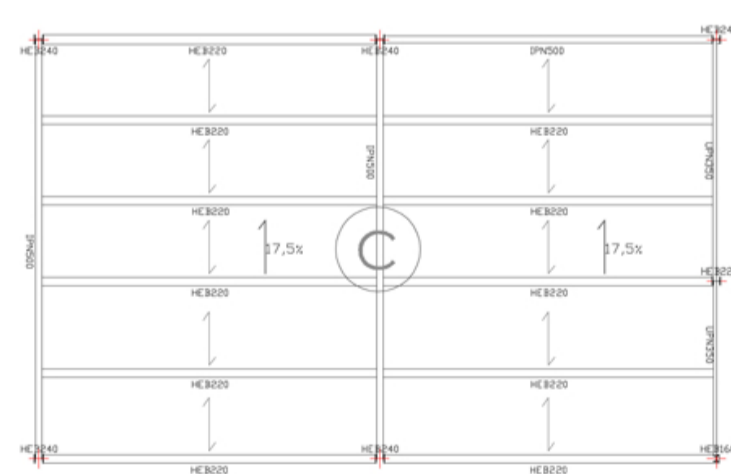
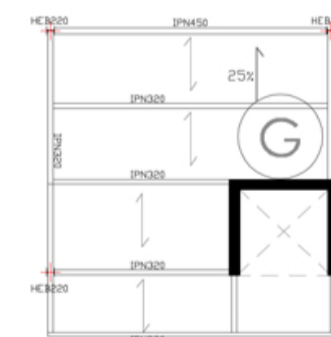


COBERTES TALLERS

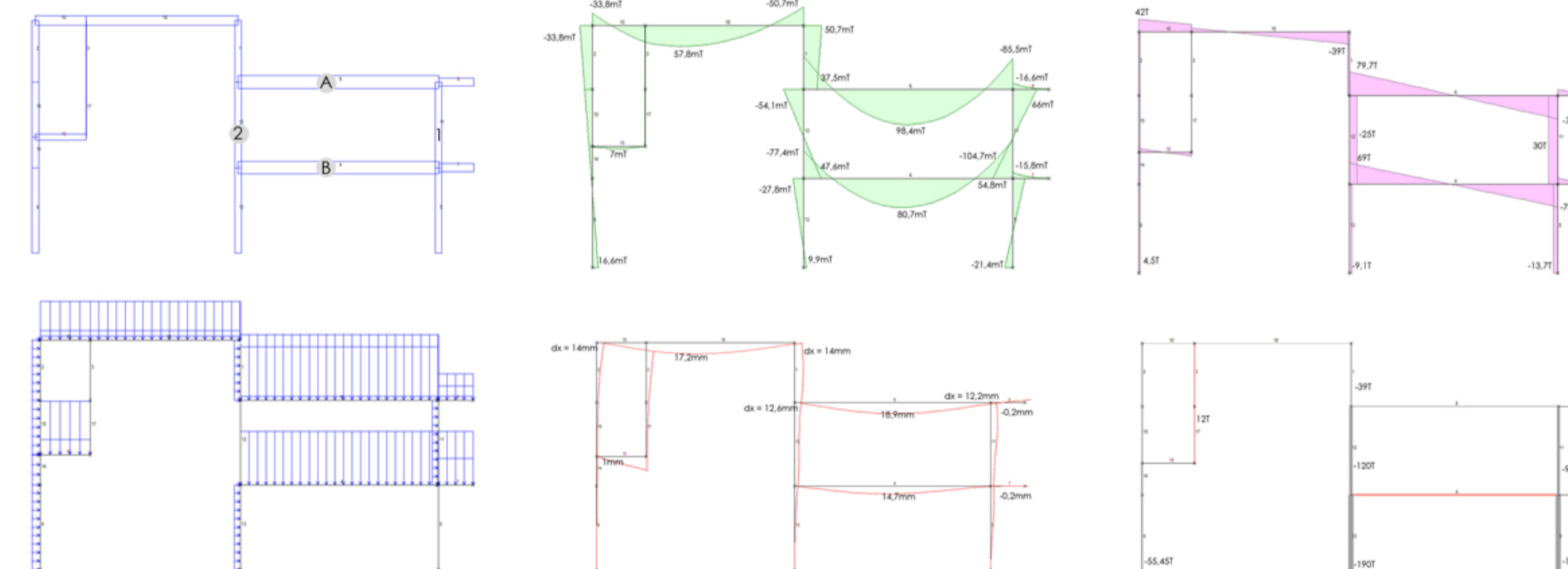


BADALOT

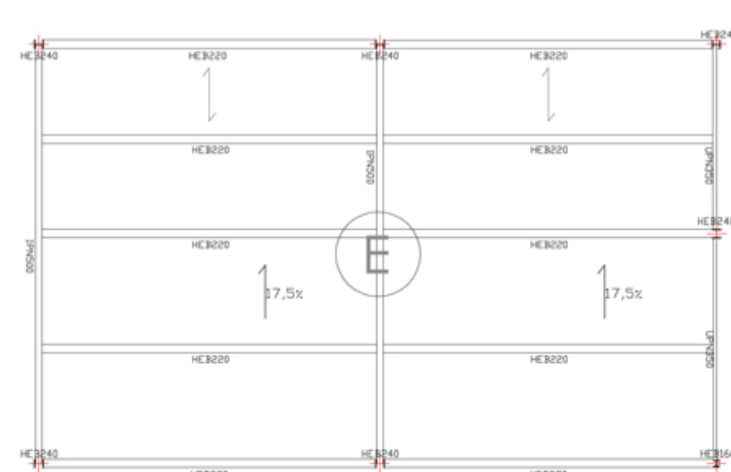


PÒRTIC 3

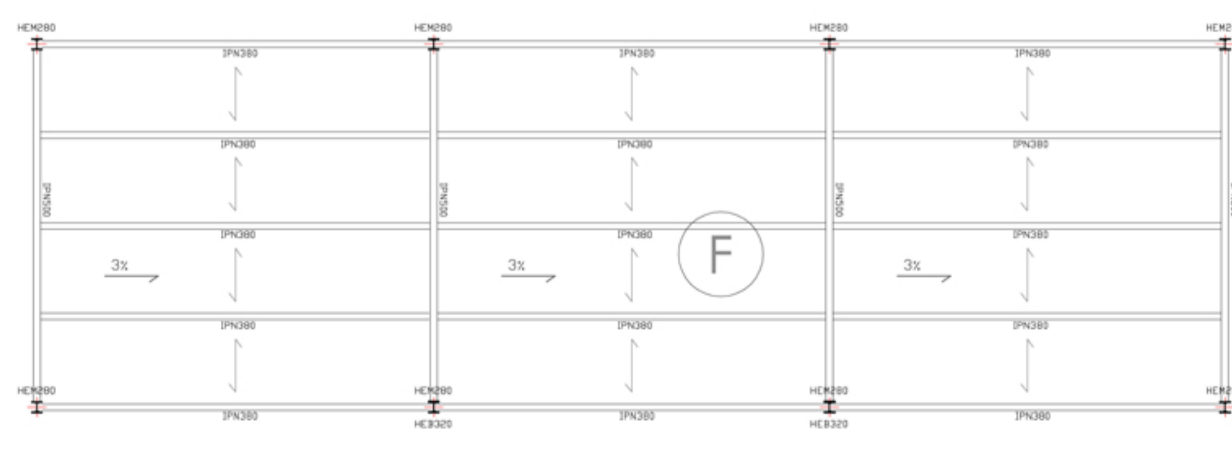
COMBINATÒRIA: 1,35(pes propi) + 1,5(sobrecàrrega ús) + 1,35(neu) + 1,35(vent)
ESTATS LÍMIT DE SERVEI: 1(pes propi) + 1(sobrecàrrega ús) + 1(neu) + 1,35(vent)



COBERTA GIMNÀS



COBERTA VESTÍBUL



PREDIMENSIONAT

Jàssera A (IPE600)

Flexió
M_{màx} = 98,4Tm (segons WinEva)
W_x = (98,4Tm / 2,600kg*cm²)10
W_x = 3784cm³ < 4630cm³ (IPE600)
Flexia
F_{màx} = 9500mm/500 = 19mm
F = 18,9mm (WinEva) < 19mm

Jàssera B (IPE600)

Flexió
M_{màx} = 63,5Tm (segons WinEva)
W_x = (63,5Tm / 2,600kg*cm²)10
W_x = 2442cm³ < 3610cm³
Flexia
F_{màx} = 9600mm/500 = 19,2mm
F = 18,2mm (WinEva) < 19,2mm

Pilar 1 (HEM280)

Flexió
M_{màx} = 66Tm (segons WinEva)
W_x = (66Tm / 2,600kg*cm²)10
W_x = 2538cm³ < 2550cm³ (HEB240)
Carrega crítica (eix desfavorable)
β: 1,2
Lp: 1,2x400 = 480cm
Ncr = π²EI_{min}/Lp²
Ncr = π²*2,1*10⁸kg/cm²*13163cm⁴*10⁴ / (4600)² mm
Ncr = 12893126,2 N = 12893T > 193,3T
ocr = 12893000kg/240,2cm²
ocr = 53653,8kg/cm² > 2600kg/cm²

Pilar 2 (HEM280)

Flexió
M_{màx} = 66Tm (segons WinEva)
W_x = (66Tm / 2,600kg*cm²)10
W_x = 2538cm³ < 2550cm³ (HEB240)
Carrega crítica (eix desfavorable)
β: 1,1
Lp: 1,1x1100cm = 1210cm
Ncr = π²EI_{min}/Lp²
Ncr = π²*2,1*10⁸kg/cm²*13163cm⁴*10⁴ / (1210)² mm
Ncr = 1863387 N = 186T > 55,5T
ocr = 186338 kg/240,2cm²
ocr = 775,7kg/cm² < 2600kg/cm²
Axial
N = 55,5T
σ = 55500kg/240,2 cm² = 231kg/cm² < 2600kg/cm²
Desplaçament horitzontal
Dx = 14mm < 12000mm/500 = 24mm (Dx_{màx})