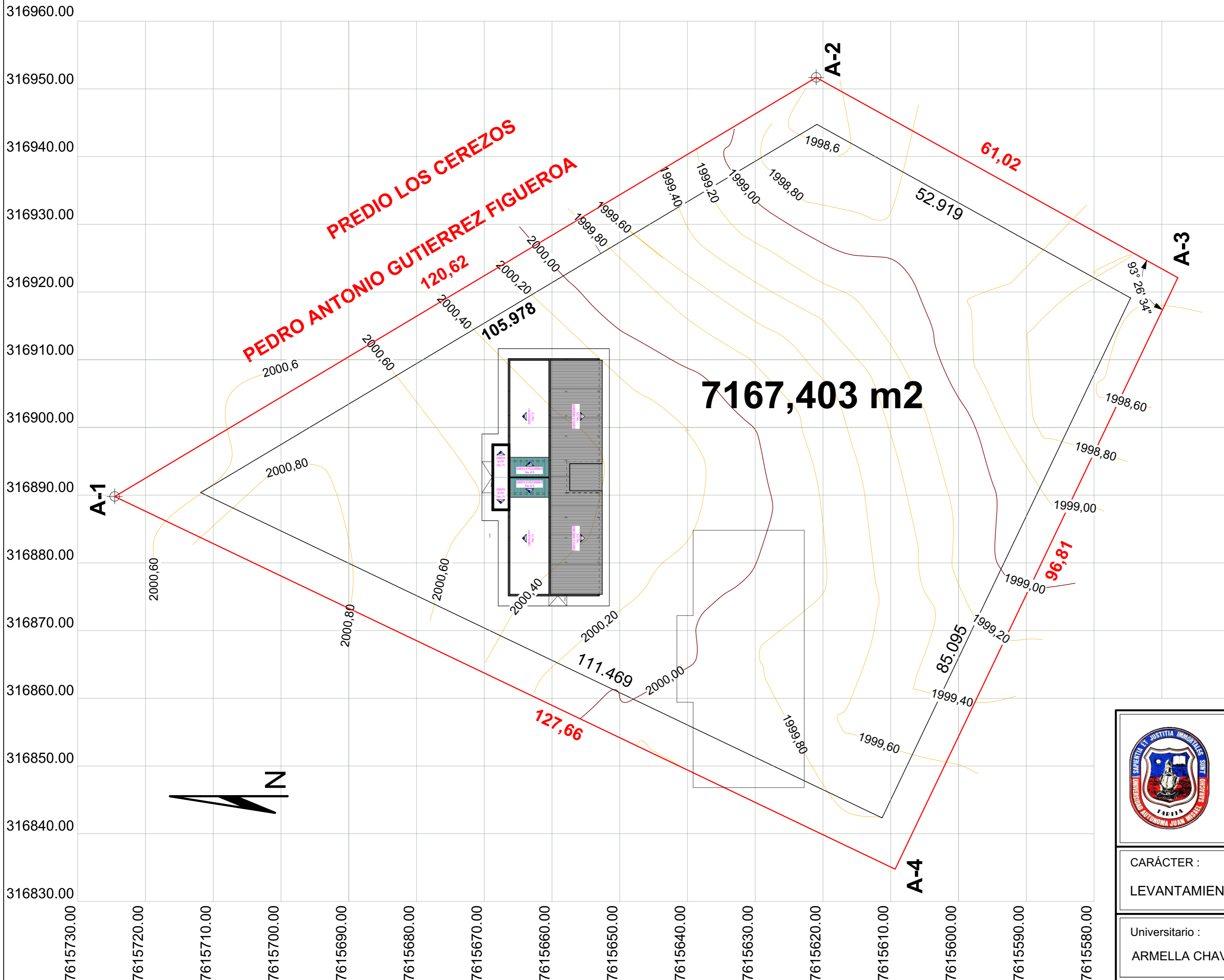


FEDERACION DEPARTAMENTAL DEL MOVIMIENTO UNICO DE TRABAJADORES DESOCUPADOS DE TARIJA



**PLANILLAS DE COORDENADAS
UTM - SISTEMA WGS-84**

| PUNTO | ESTE | NORTE |
|-------|--------------|---------------|
| A-1 | X=316889,793 | Y=7615724,548 |
| A-2 | X=316951,678 | Y=7615621,012 |
| A-3 | X=316922,116 | Y=7615567,630 |
| A-4 | X=316834,766 | Y=7615609,358 |

**UNIVERSIDAD AUTÓNOMA
JUAN MISAEL SARACHO**

PROYECTO:
DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO"

UBICACIÓN

Departamento: Tarija Municipio: Tarija
Provincia: Cercado Comunidad: Turumayo

CARÁCTER :
LEVANTAMIENTO TOPOGRAFICO

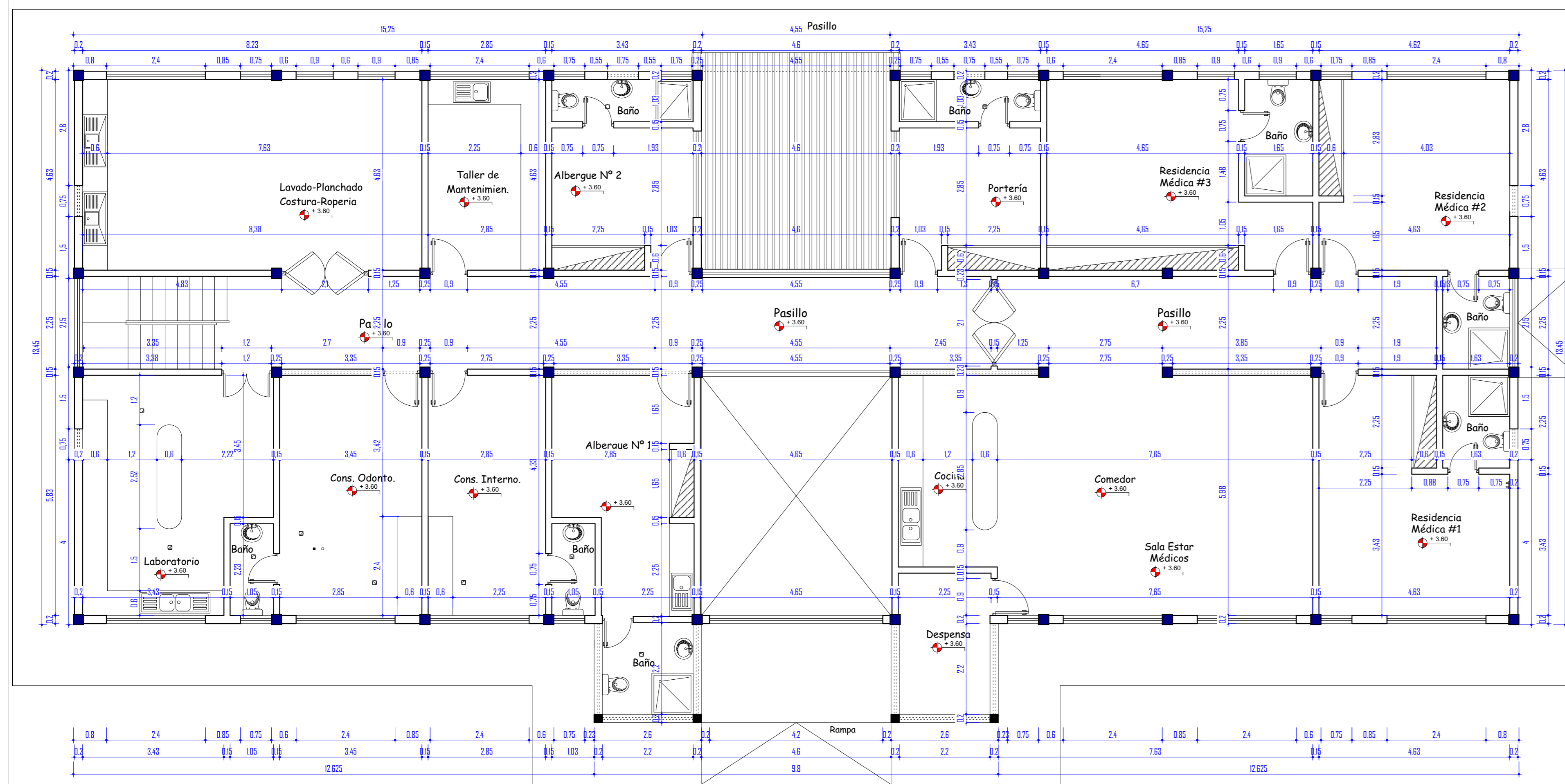
Universitario :
ARMELLA CHAVARRIA FREDDY

ESCALA: 1:400

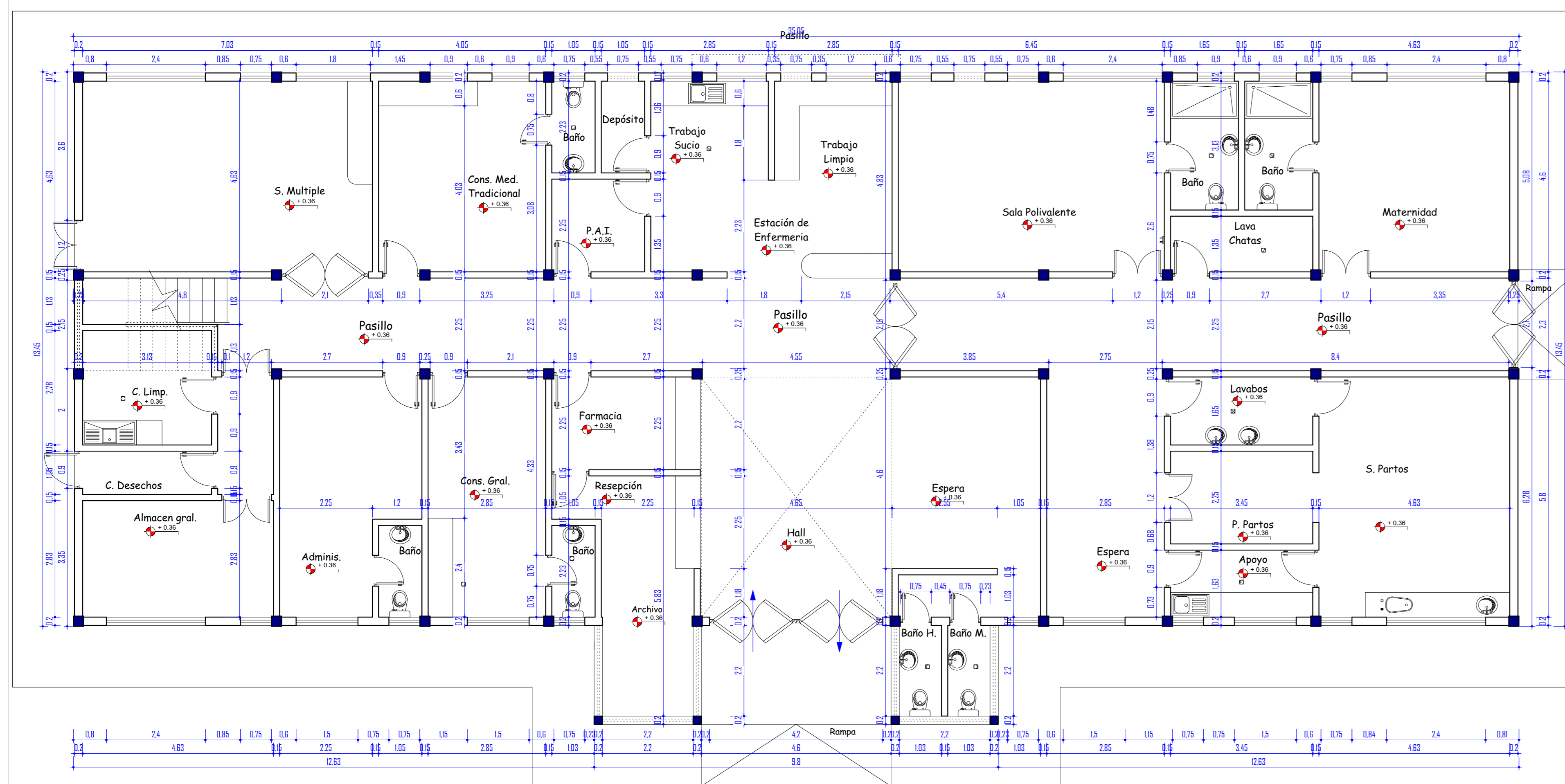
APROBADO

Lámina:
UNICA

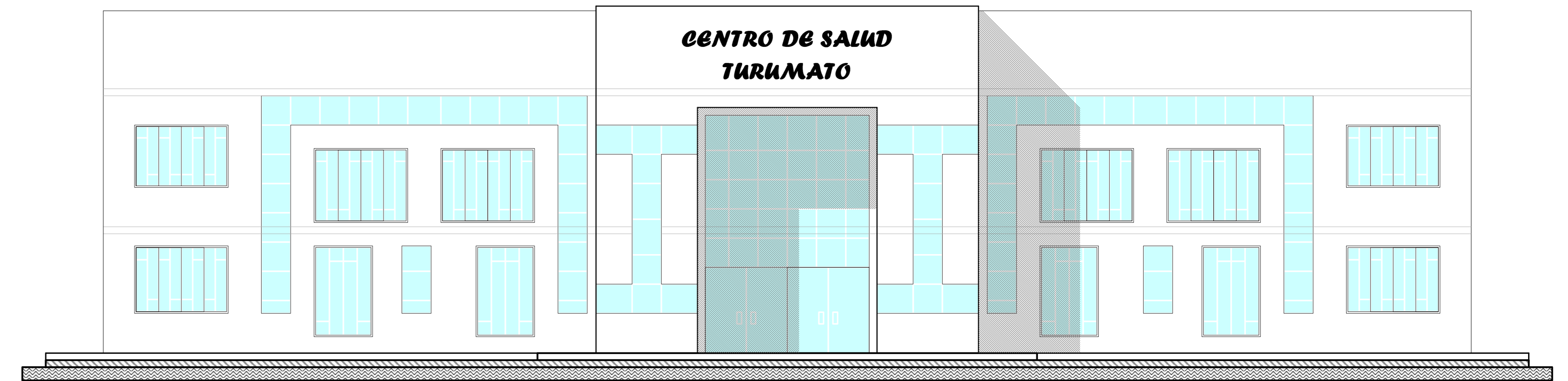
FECHA : Junio del 2017



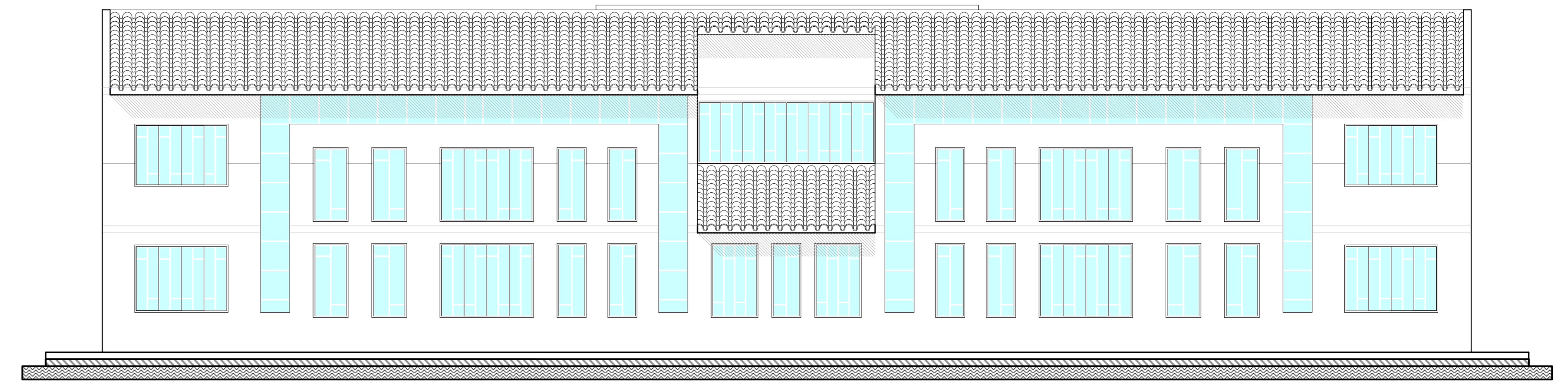
PLANTA ALTA ACOTADA
ESCALA 1 : 75



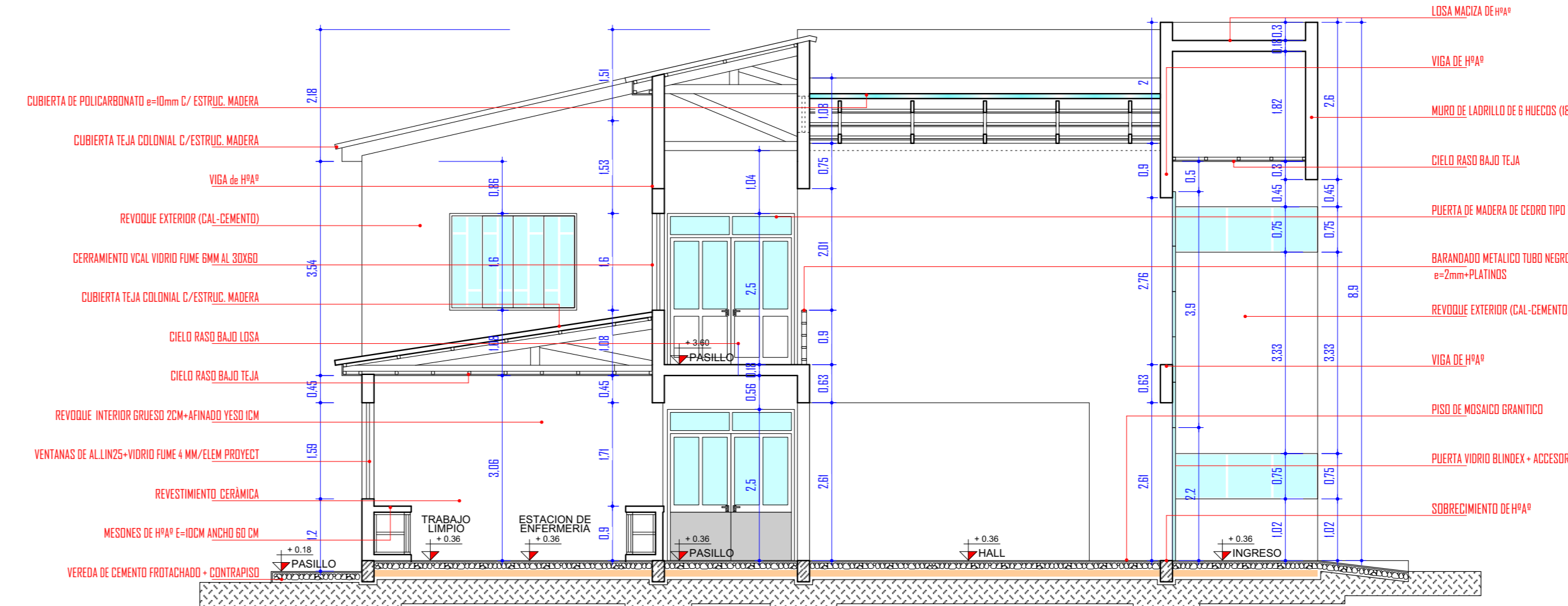
PLANTA BAJA ACOTADA
ESCALA 1 : 75



FACHADA FRONTAL
ESCALA 1 : 75

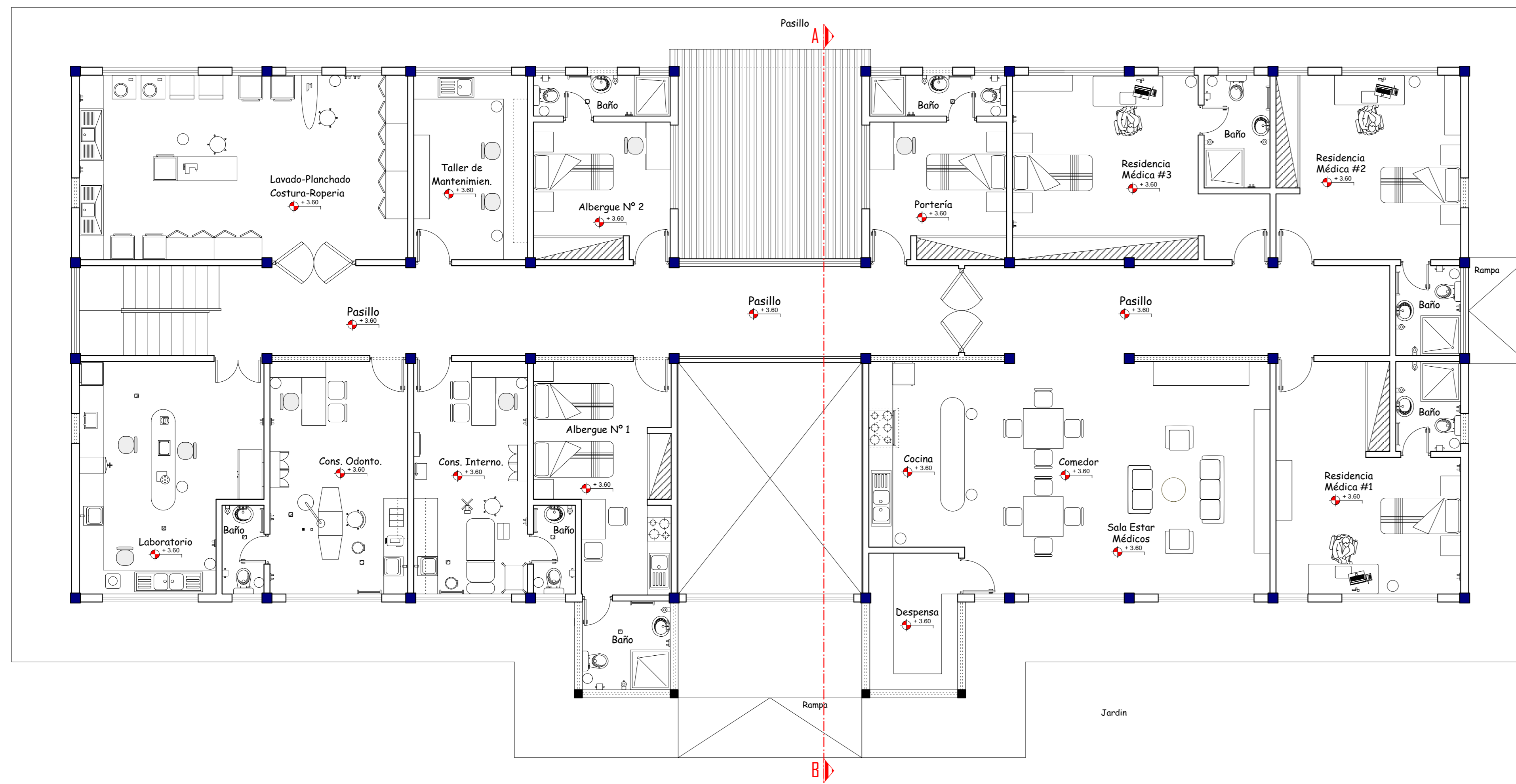


FACHADA POSTERIOR
ESCALA 1 : 75

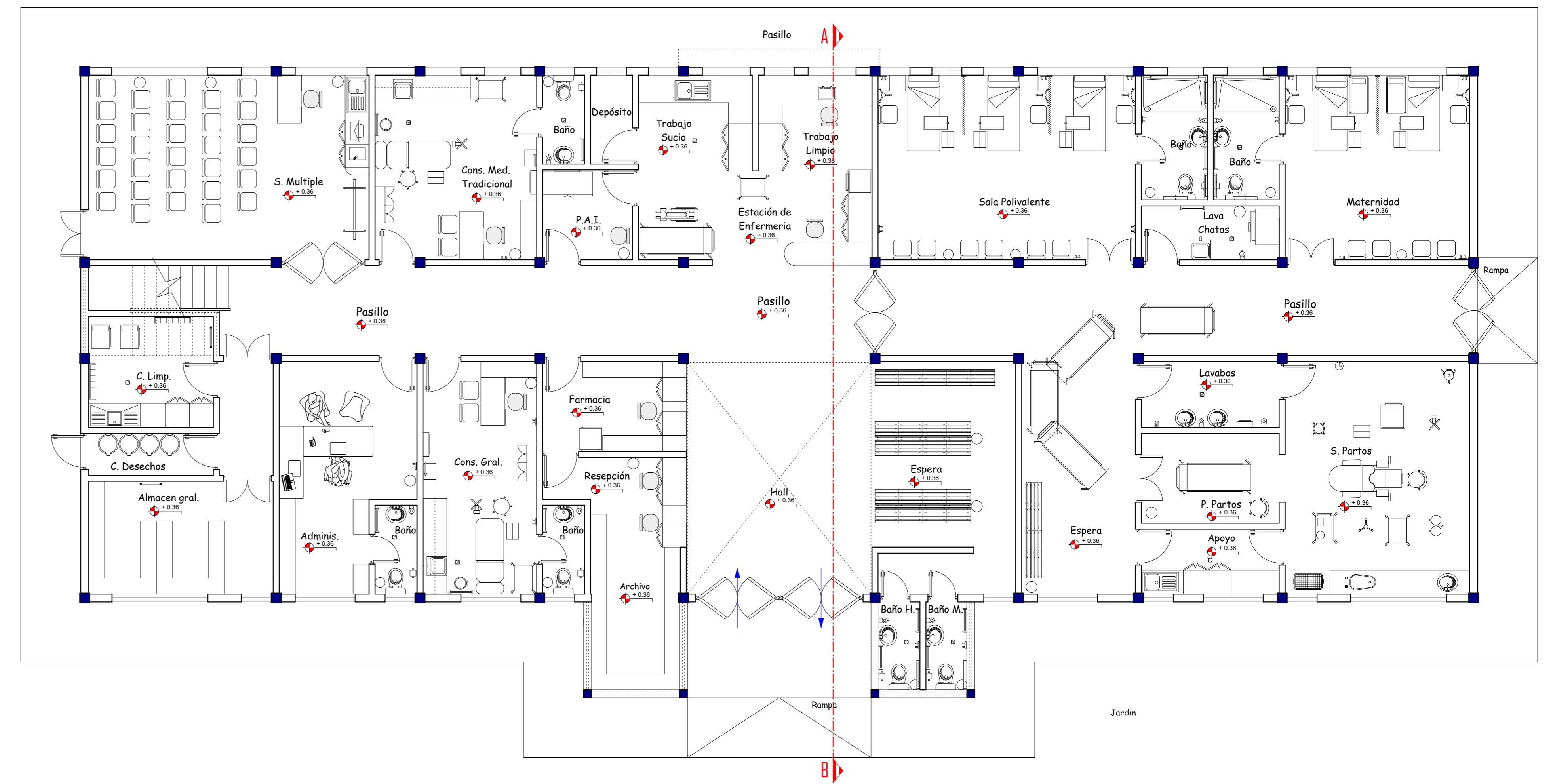


CORTE A - B
ESCALA 1 : 75

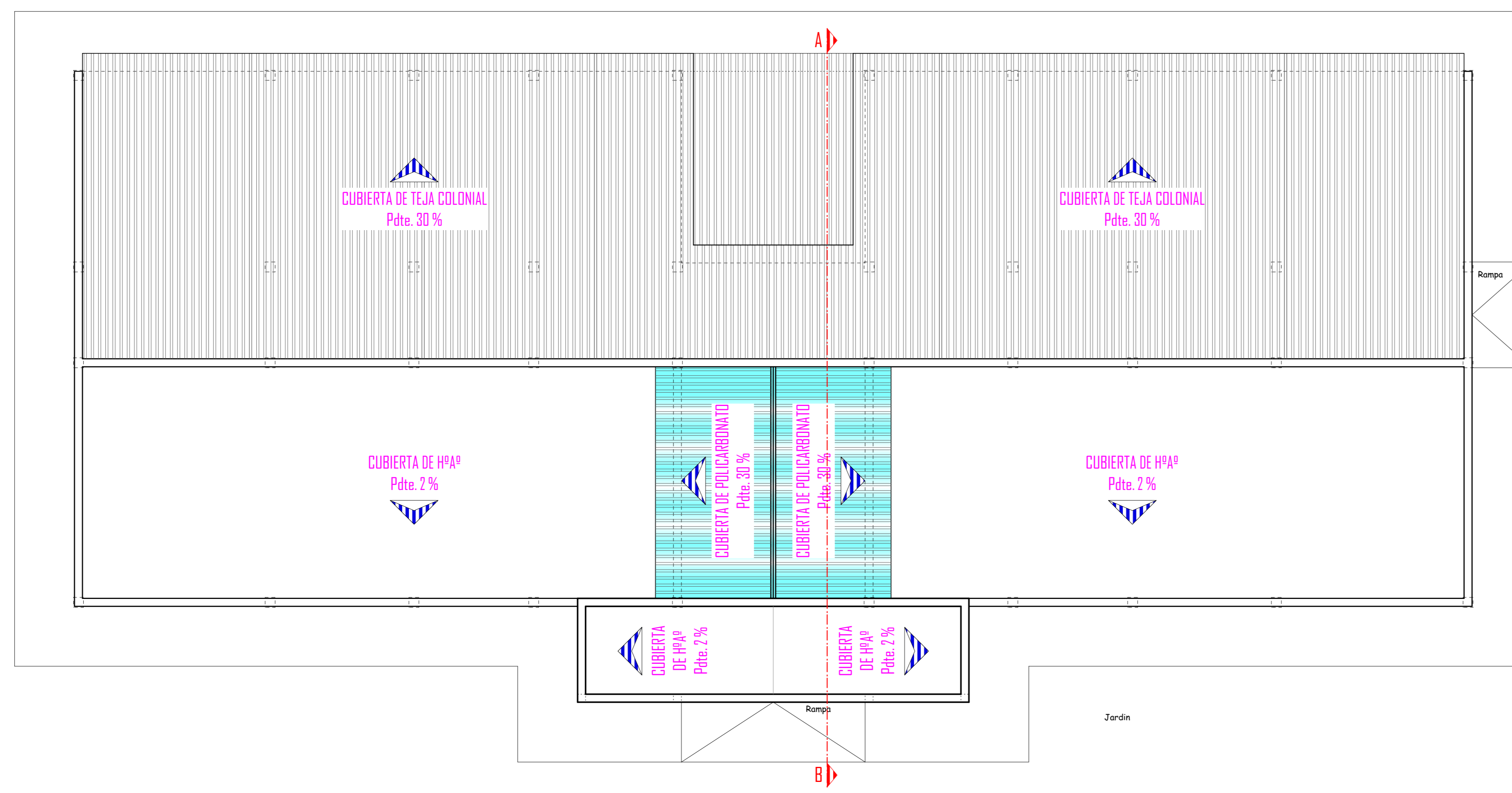
| | | | |
|---|--|--|--|
| Caracter: | | CENTRO DE SALUD " TURUMAYO " | |
| Propietario: | | Federación Departamental del Movimiento Único de Trabajadores Desocupados de Tarija | |
| Notas Marginales: | | | |
| Superficie: | | Lámina: | |
| SUP. DE LOTE SEGUN7167.40 m ² | | Unica | |
| PLANTA BAJA HABITABLE.....483.77 m ² | | | |
| PLANTA ALTA HABITABLE.....434.333 m ² | | | |
| PLANTA ALTA NO HABITABLE.....0.00 m ² | | | |
| SUP. TOTAL CONSTRUIDA.....929.03 m² | | | |
| Ejecuto: | | Ubicación: | |
| | | | |
| Aprobación D.D.U.: | | Cod. Catastral: | |
| | | | |
| | | Fecha: Tja. - Ferbero - 2019 | |
| | | Escala: Indicada | |
| | | Zona: " TURUMAYO " | |
| Sello: | | Registro: | |
| | | | |



PLANTA ALTA AMOBLADA
ESCALA 1 : 75



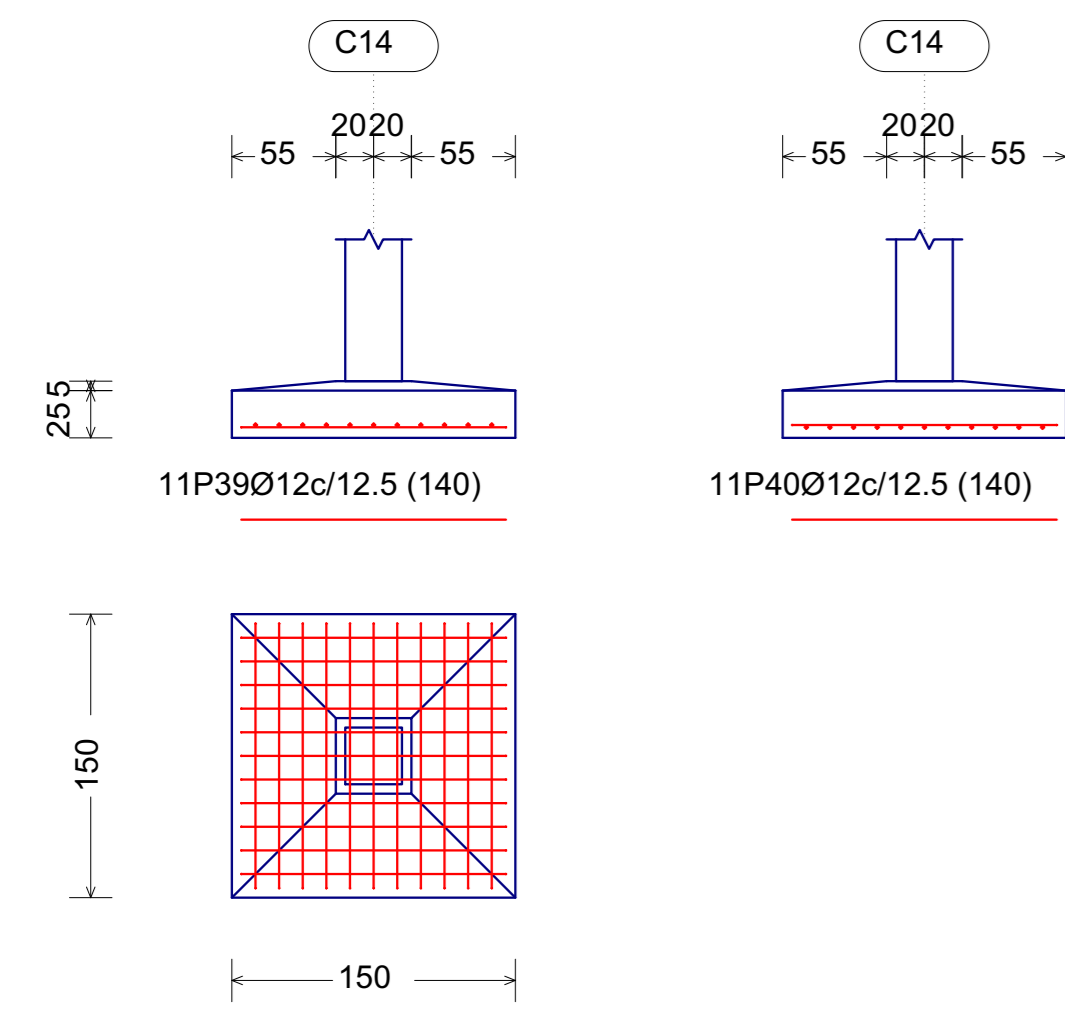
PLANTA BAJA AMOBLADA
ESCALA 1 : 75



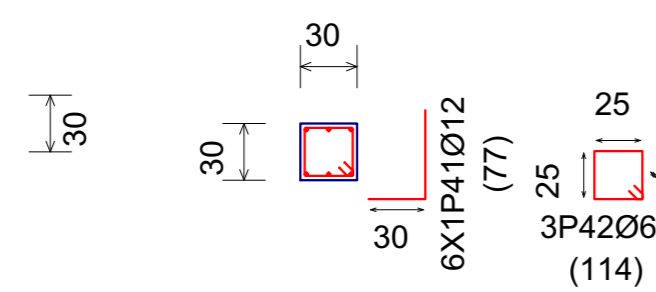
PLANO DE CUBIERTA
ESCALA 1 : 75

| | |
|--|---|
| Caracter: CENTRO DE SALUD " TURUMAYO " | |
| Propietario: Federación Departamental del Movimiento Único de Trabajadores Desocupados de Tarija | |
| Notas Marginales: | |
| Superficie: SUP. DE LOTE SEGUN7167.40 m ² PLANTA BAJA HABITABLE.....483.77 m ² PLANTA BAJA NO HABITABLE.....10.93 m ² PLANTA ALTA HABITABLE.....434.33 m ² PLANTA ALTA NO HABITABLE.....0.00 m ² SUP. TOTAL CONSTRUIDA.....929.03 m² | Lámina: Unica |
| Ejecuto: | Ubicación: |
| Aprobación D.D.U.: | Cod. Catastral: |
| Sello: | Fecha: Tja. - Ferbero - 2019 Escala: Indicada Zona: " TURUMAYO " Registro: |

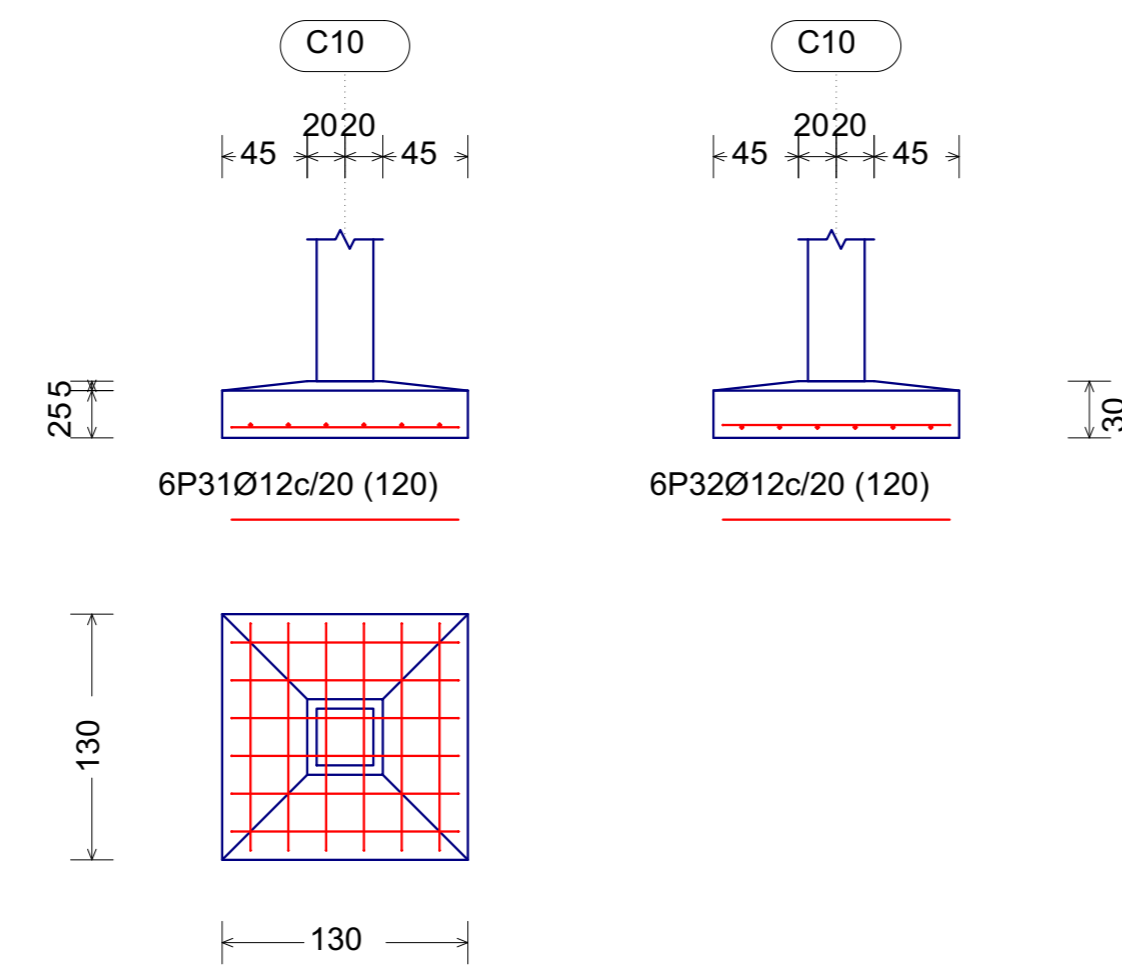
C14



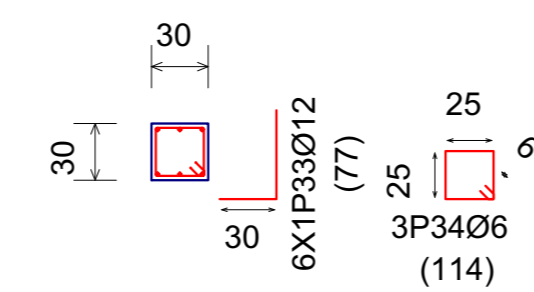
C14



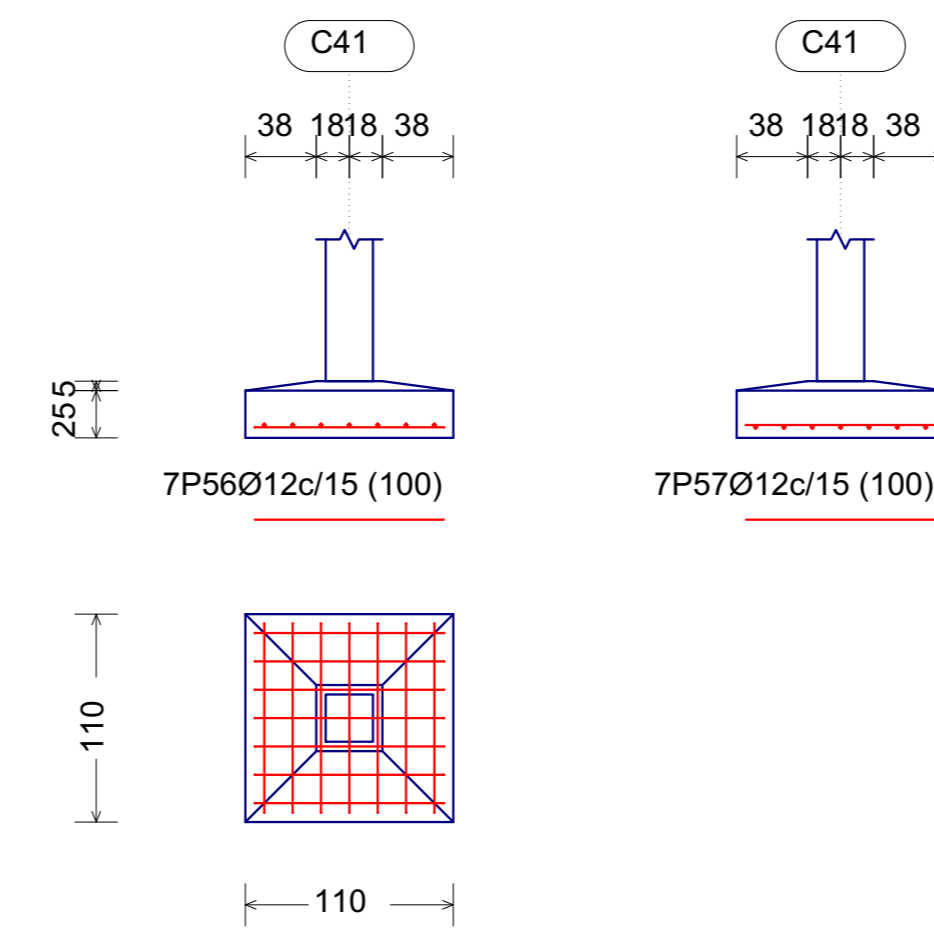
C10, C32 y C37



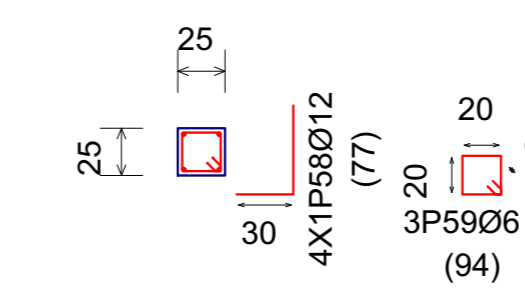
C10



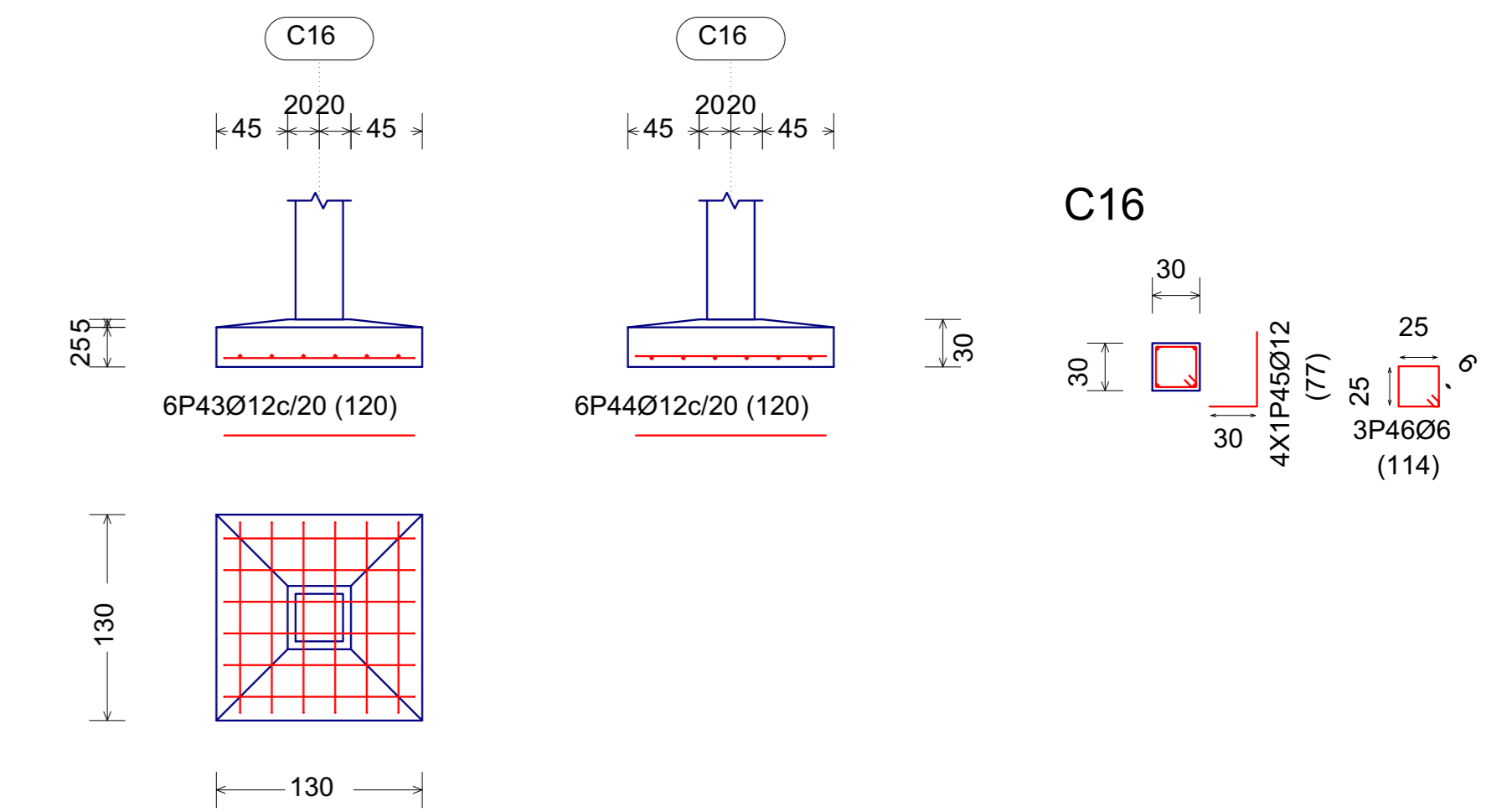
C41, C43 y C44



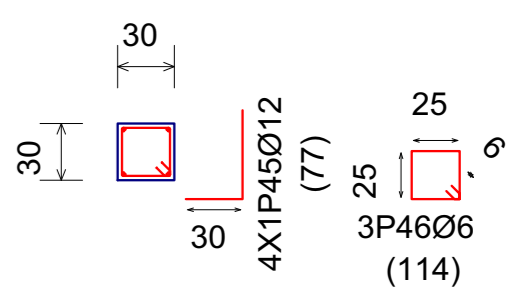
C41



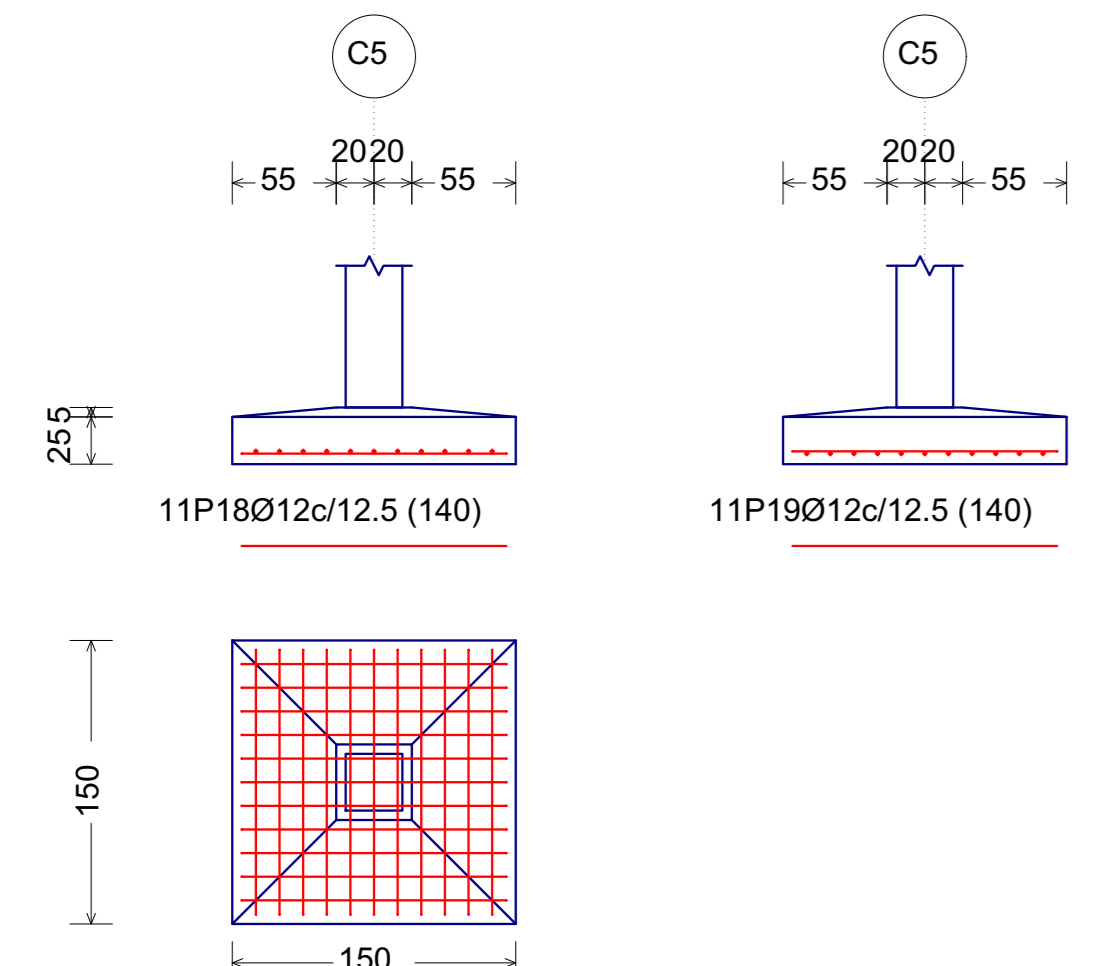
C16, C21, C23, C24, C25, C26, C28, C30, C36 y C38



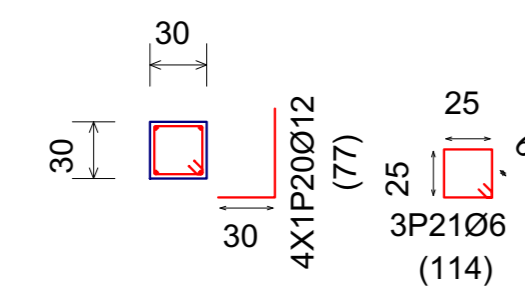
C16



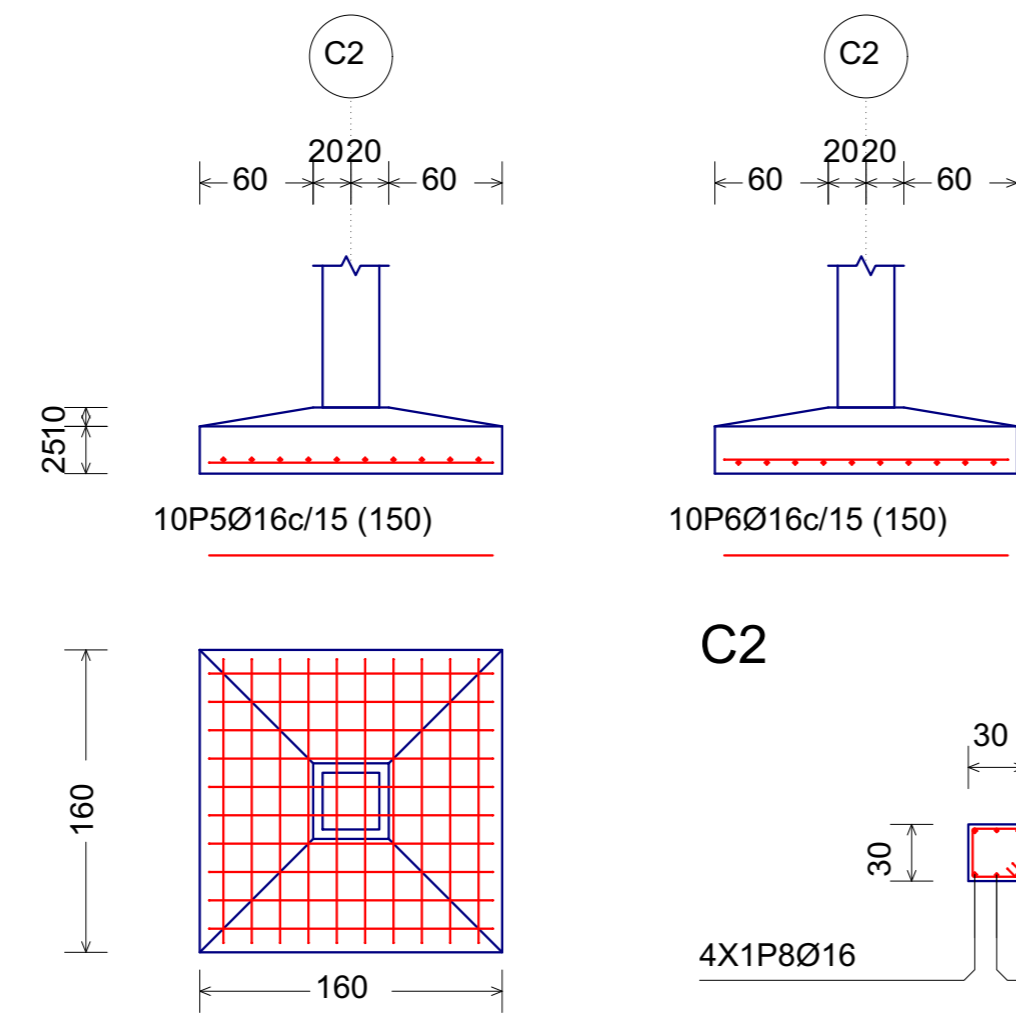
C5, C6 y C11



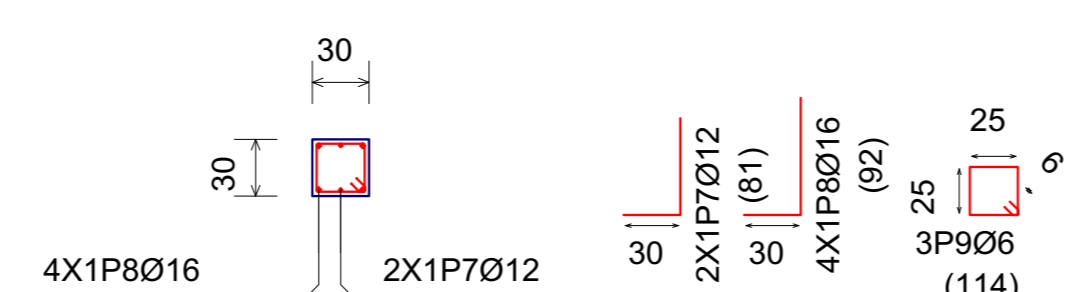
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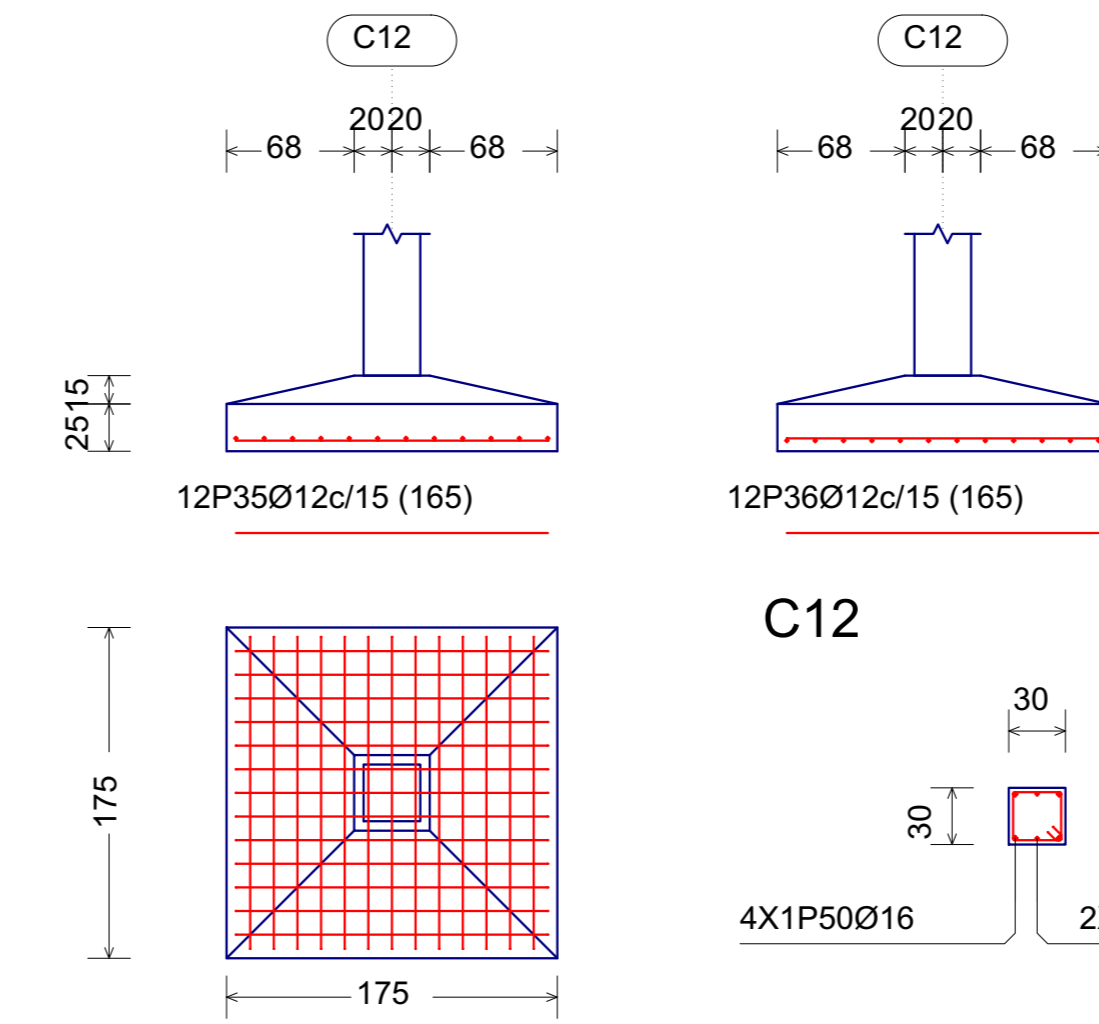
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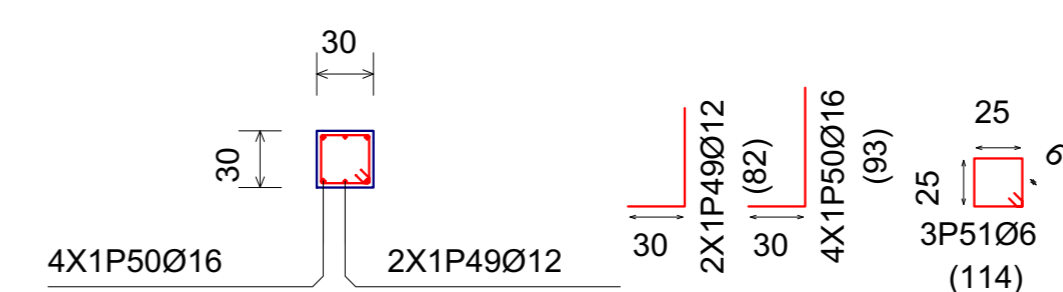
C2



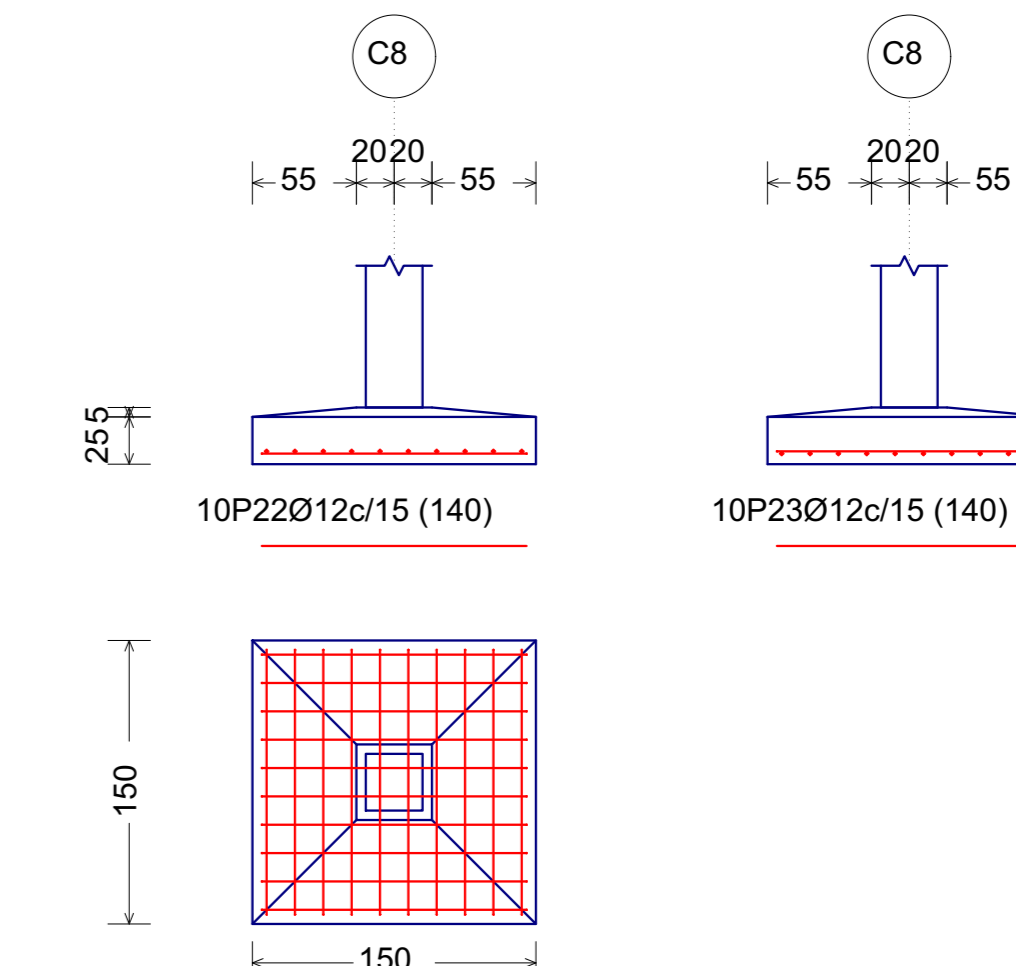
C12



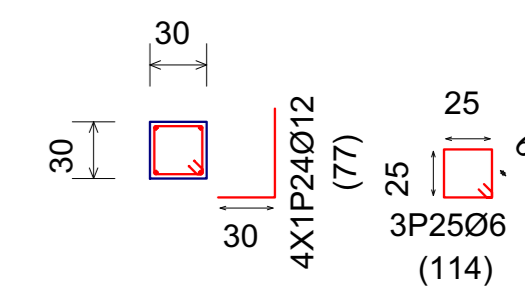
C12



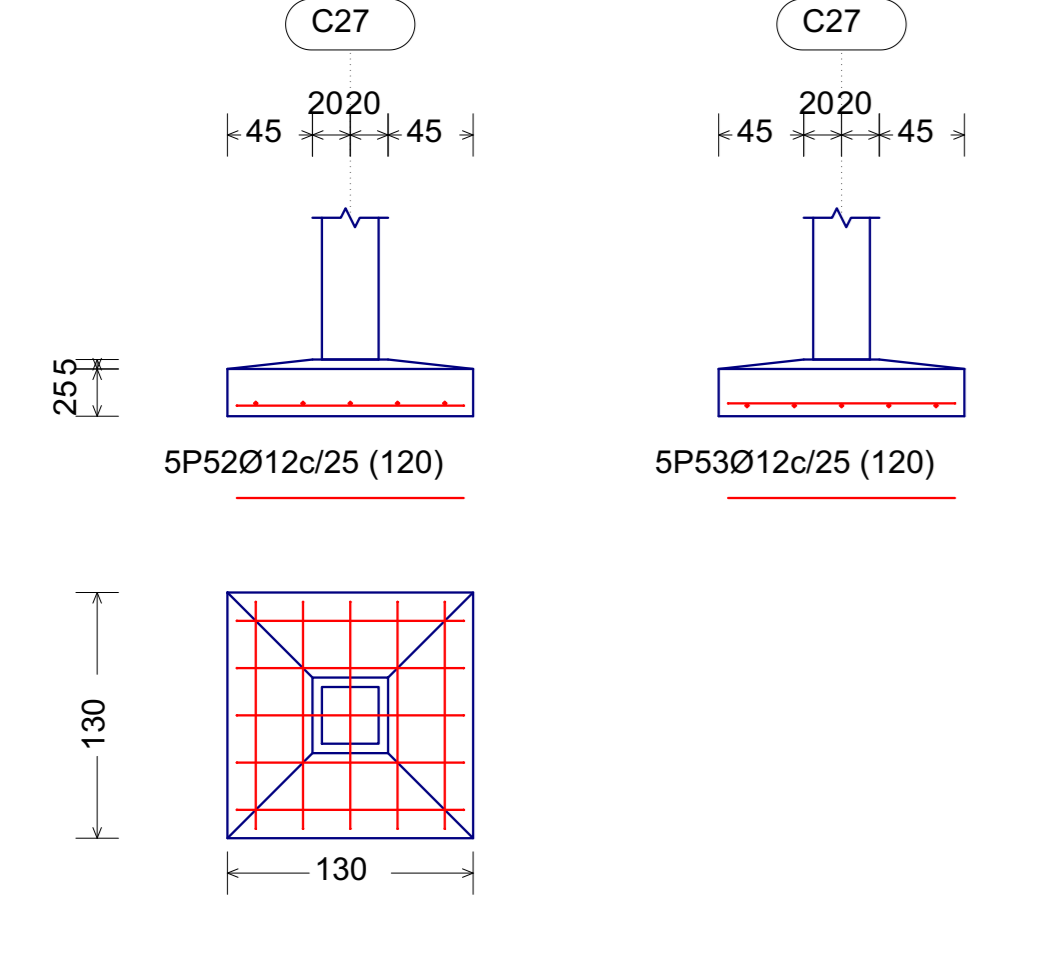
C8, C15, C17 y C18



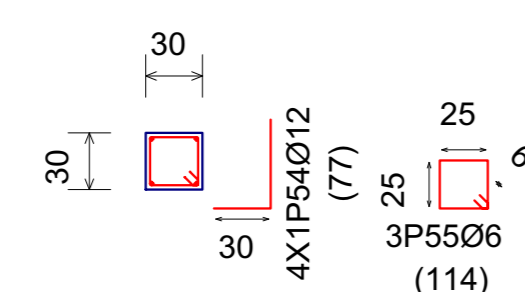
C8



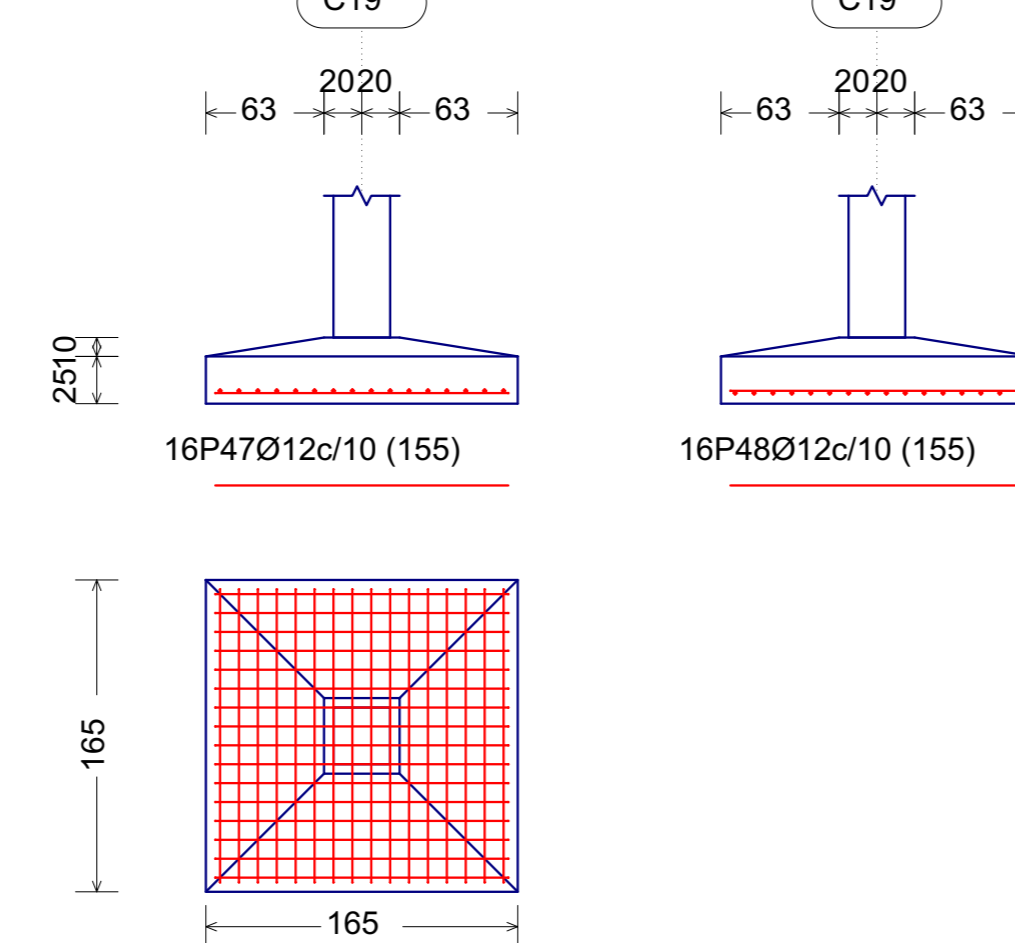
C27, C31, C33, C35 y C40



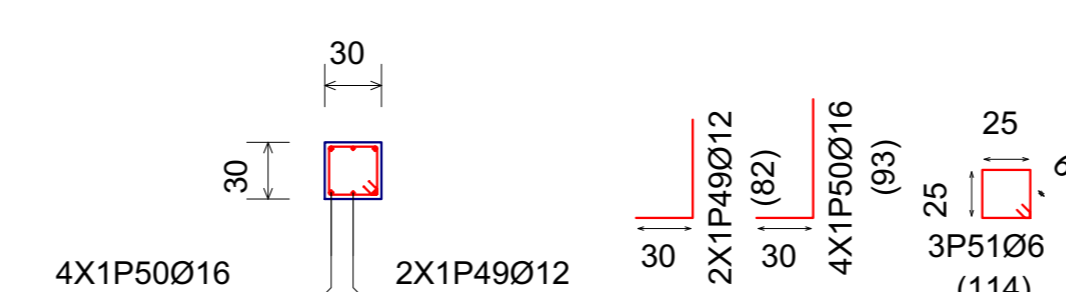
C27



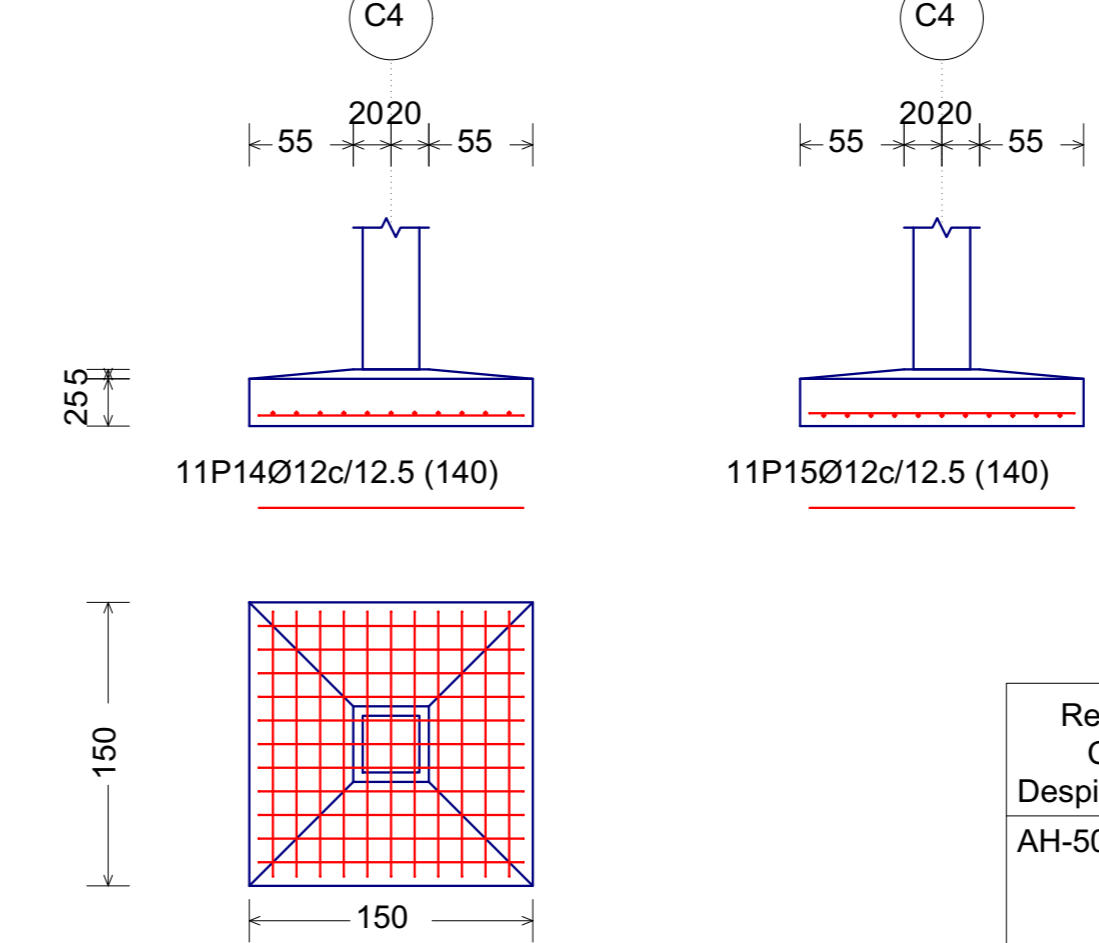
C19



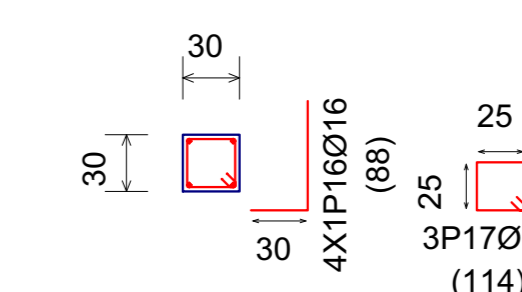
C19



C4 y C7



C4

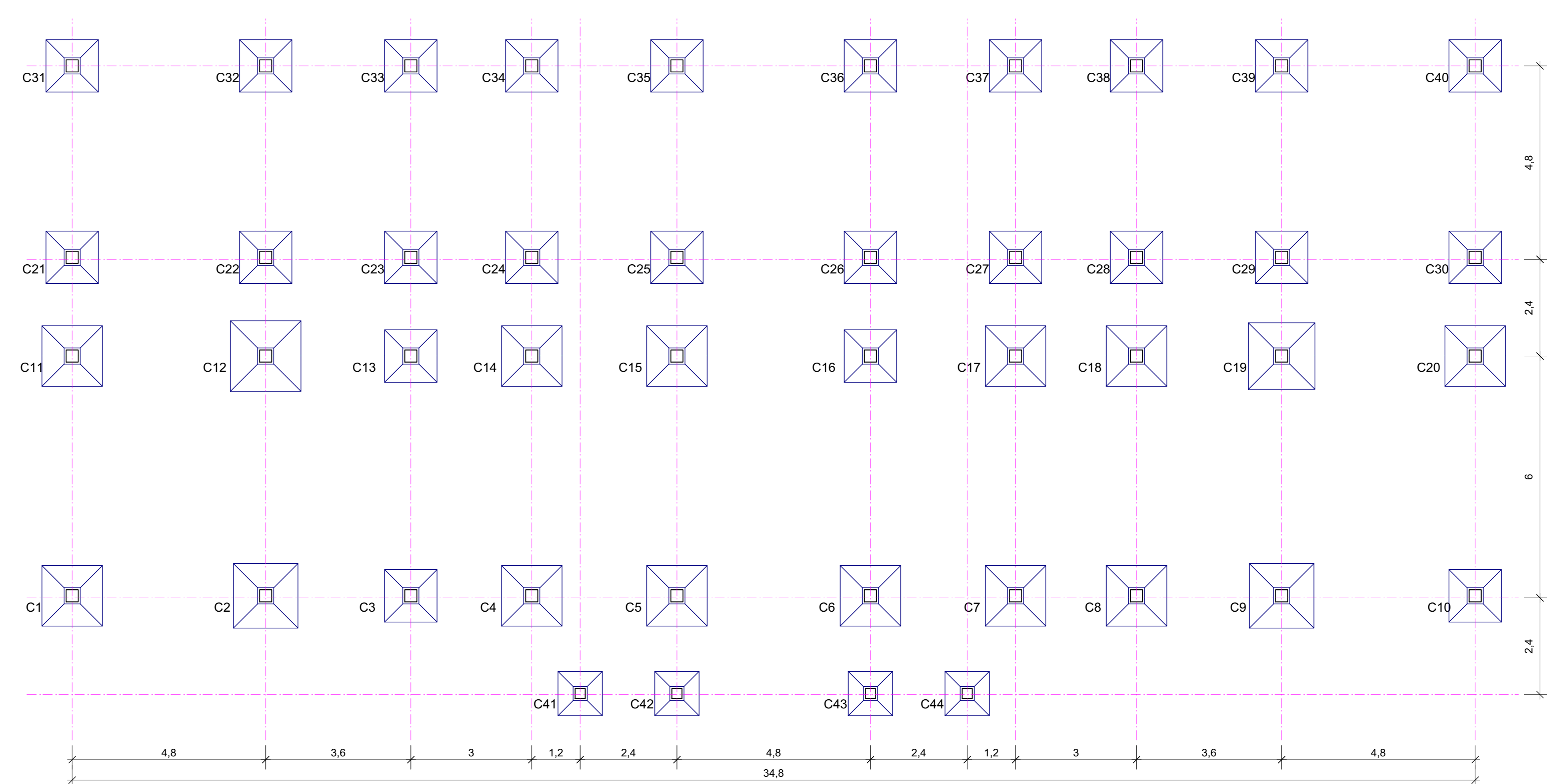


Cimentación
Despiece cimentación
Hormigón: H-21, Control Normal
Escala: 1:100

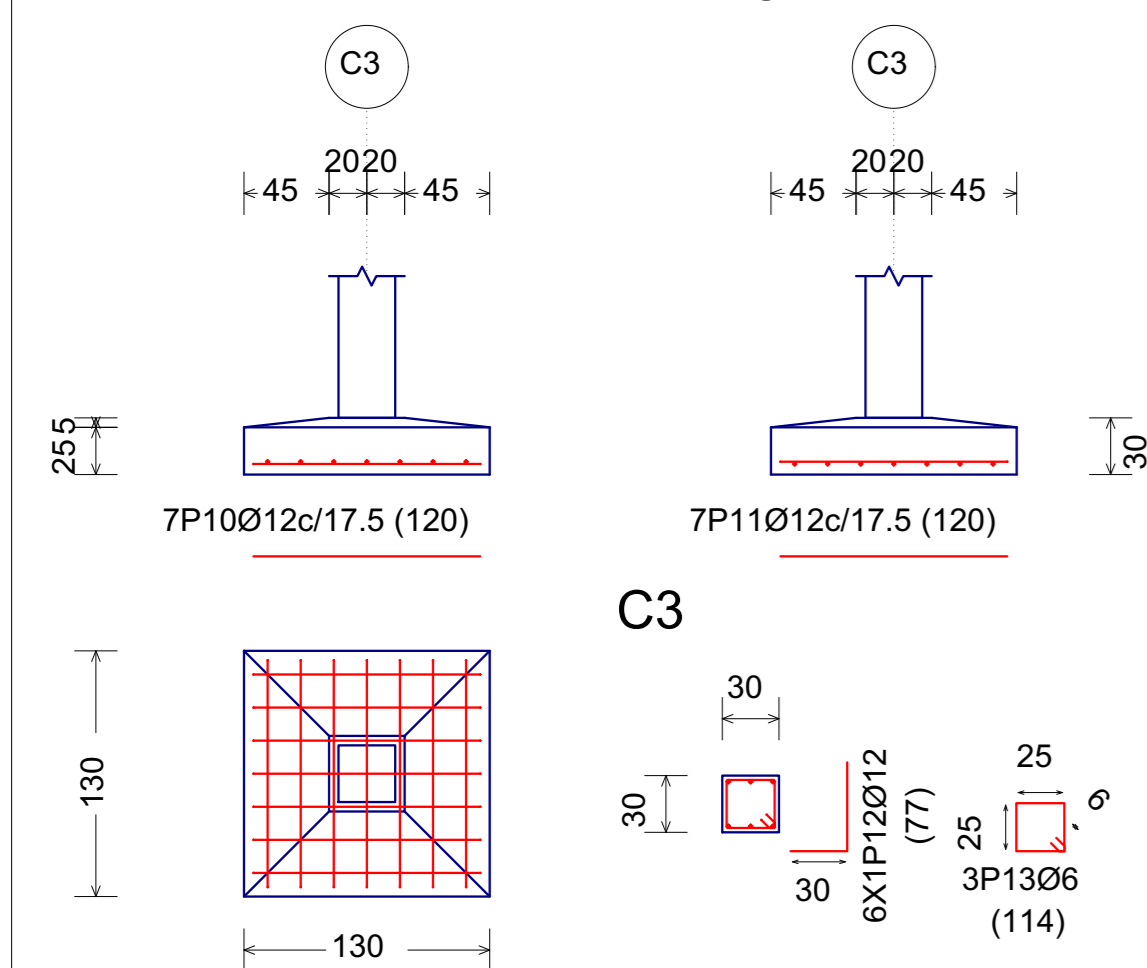
| Resumen Acero Cimentación | | Long. total (m) | Peso+10% (kg) | Total |
|---------------------------|-----|-----------------|---------------|-------|
| AH-500CN | Ø6 | 148.1 | 36 | |
| | Ø12 | 1021.7 | 998 | |
| | Ø16 | 52.1 | 90 | 1124 |

| Elemento | Pos. | Diam. | No. | Paq. (cm) | Paq. (cm) | Long. (cm) | Total (cm) | AH-500CN (kg) | |
|---|------|-------|-----|-----------|-----------|------------|------------|---------------|-------|
| C1+C20 | 1 | Ø12 | 10 | 140 | 140 | 140 | 140 | 12.4 | |
| | 2 | Ø12 | 10 | 140 | 140 | 140 | 140 | 12.4 | |
| | 3 | Ø12 | 6 | 30 | 47 | 177 | 442 | 4.1 | |
| Total+10% | | | | | | | | | 32.2 |
| C2 | 5 | Ø16 | 10 | 100 | 100 | 100 | 100 | 23.7 | |
| | 6 | Ø12 | 2 | 30 | 51 | 81 | 152 | 1.4 | |
| | 7 | Ø16 | 4 | 60 | 62 | 114 | 342 | 0.9 | |
| Total+10% | | | | | | | | | 26.0 |
| C3+C13+C22 C29+C34+C39 | 10 | Ø12 | 7 | 100 | 100 | 100 | 100 | 7.5 | |
| | 11 | Ø12 | 6 | 30 | 47 | 177 | 442 | 4.1 | |
| | 12 | Ø12 | 4 | 30 | 47 | 177 | 442 | 4.1 | |
| Total+10% | | | | | | | | | 25.9 |
| C4+C7 | 14 | Ø12 | 11 | 140 | 140 | 140 | 140 | 13.7 | |
| | 15 | Ø16 | 4 | 30 | 58 | 88 | 352 | 0.6 | |
| | 17 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 37.2 |
| C5+C6+C11 | 18 | Ø12 | 11 | 140 | 140 | 140 | 140 | 13.7 | |
| | 20 | Ø12 | 4 | 30 | 47 | 177 | 442 | 2.7 | |
| | 21 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 36.0 |
| C8+C15+C17+C18 | 25 | Ø12 | 10 | 140 | 140 | 140 | 140 | 12.4 | |
| | 26 | Ø12 | 4 | 30 | 47 | 177 | 442 | 2.7 | |
| | 29 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 36.0 |
| C9 | 28 | Ø12 | 10 | 100 | 100 | 100 | 100 | 13.3 | |
| | 29 | Ø12 | 11 | 140 | 140 | 140 | 140 | 13.3 | |
| | 30 | Ø12 | 2 | 30 | 52 | 82 | 154 | 1.5 | |
| Total+10% | | | | | | | | | 38.1 |
| C10+C32+C37 | 31 | Ø12 | 6 | 100 | 100 | 100 | 100 | 6.4 | |
| | 32 | Ø12 | 6 | 30 | 47 | 177 | 442 | 4.1 | |
| | 38 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 19.5 |
| C12 | 35 | Ø12 | 12 | 100 | 100 | 100 | 100 | 19.0 | |
| | 36 | Ø12 | 11 | 140 | 140 | 140 | 140 | 19.0 | |
| | 38 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 49.5 |
| C14 | 39 | Ø12 | 11 | 140 | 140 | 140 | 140 | 13.7 | |
| | 40 | Ø12 | 12 | 100 | 100 | 100 | 100 | 13.3 | |
| | 42 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 36.5 |
| C16+C21+C23 C24+C25+C26 C28+C30+C36+C38 | 43 | Ø12 | 6 | 100 | 100 | 100 | 100 | 6.4 | |
| | 44 | Ø12 | 6 | 30 | 47 | 177 | 442 | 4.1 | |
| | 48 | Ø12 | 3 | 30 | 47 | 177 | 442 | 2.7 | |
| Total+10% | | | | | | | | | 17.5 |
| C19 | 47 | Ø12 | 16 | 100 | 100 | 100 | 100 | 179.0 | |
| | 48 | Ø12 | 16 | 100 | 100 | 100 | 100 | 179.0 | |
| | 51 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 358.9 |
| C27+C31+C33+C35+C40 | 52 | Ø12 | 5 | 100 | 100 | 100 | 100 | 6.4 | |
| | 53 | Ø12 | 5 | 30 | 47 | 177 | 442 | 5.3 | |
| | 55 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 17.5 |
| C41+C43+C44 | 56 | Ø12 | 7 | 100 | 100 | 100 | 100 | 7.5 | |
| | 57 | Ø12 | 7 | 30 | 47 | 177 | 442 | 6.2 | |
| | 59 | Ø12 | 3 | 30 | 47 | 177 | 442 | 0.9 | |
| Total+10% | | | | | | | | | 17.5 |
| C42 | 60 | Ø12 | 9 | 100 | 100 | 100 | 100 | 15.9 | |
| | 61 | Ø12 | 7 | 30 | 47 | 177 | 442 | 6.2 | |
| | 63 | Ø12 | 3 | 30 | 47 | 177 | 442 | 2.7 | |
| Total+10% | | | | | | | | | 39.3 |
| DN: 37.2 | | | | | | | | | |
| DN: 807.5 | | | | | | | | | |
| DN: 106.6 | | | | | | | | | |
| Total: 1124.4 | | | | | | | | | |

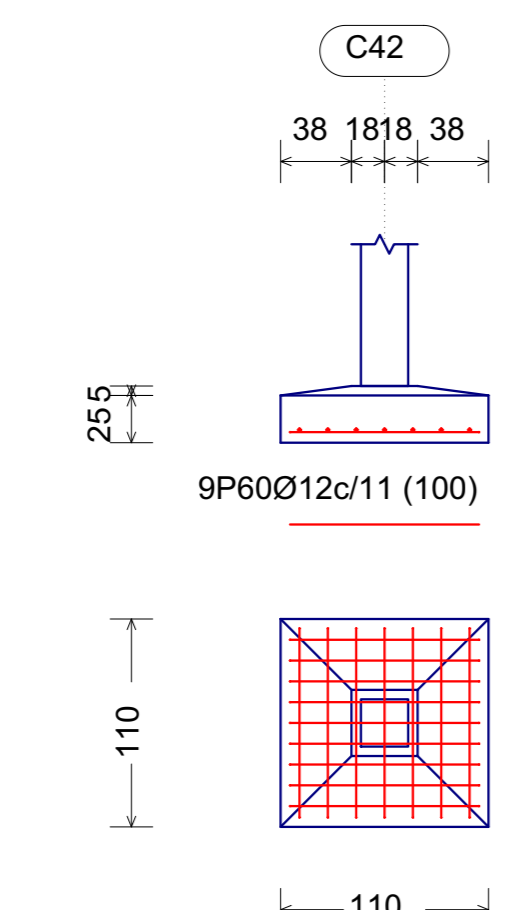
REPLANTEO DE ZAPATAS ESC. 1:75



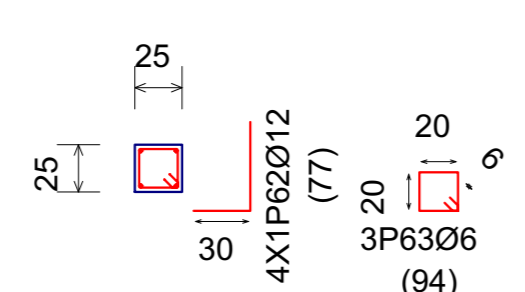
C3, C13, C22, C29, C34 y C39



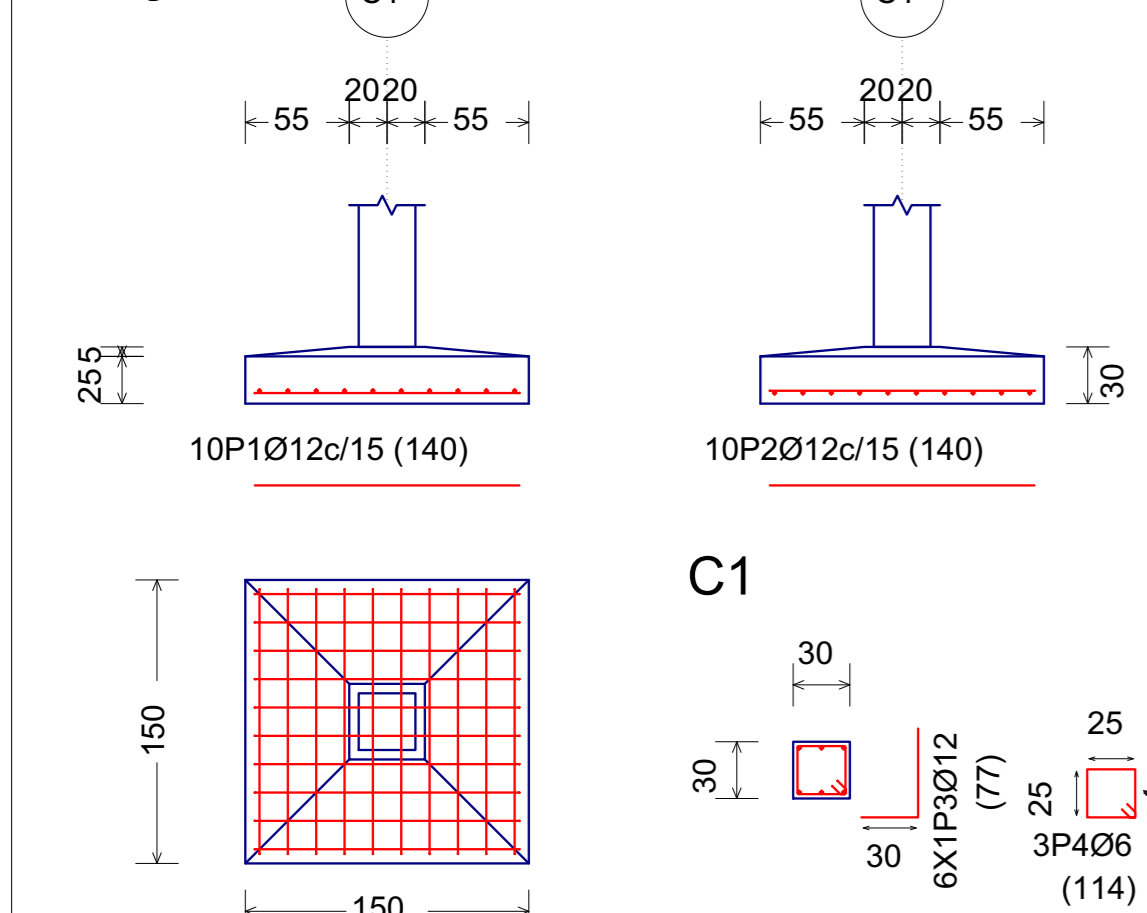
C42



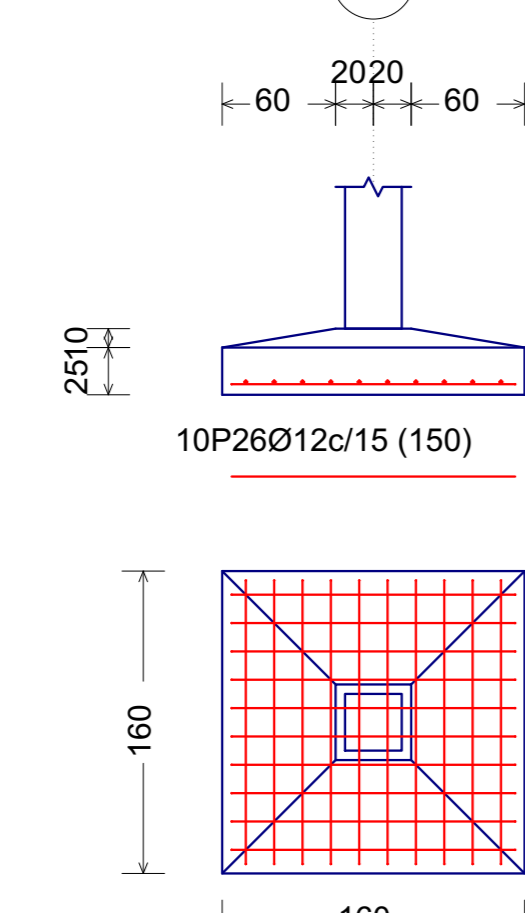
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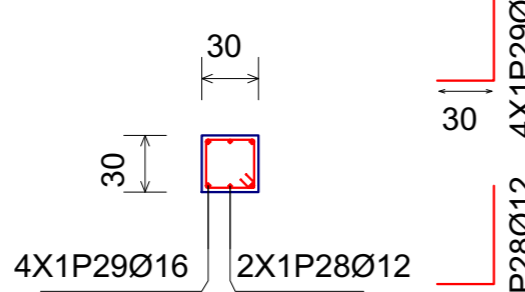
C1 y C20



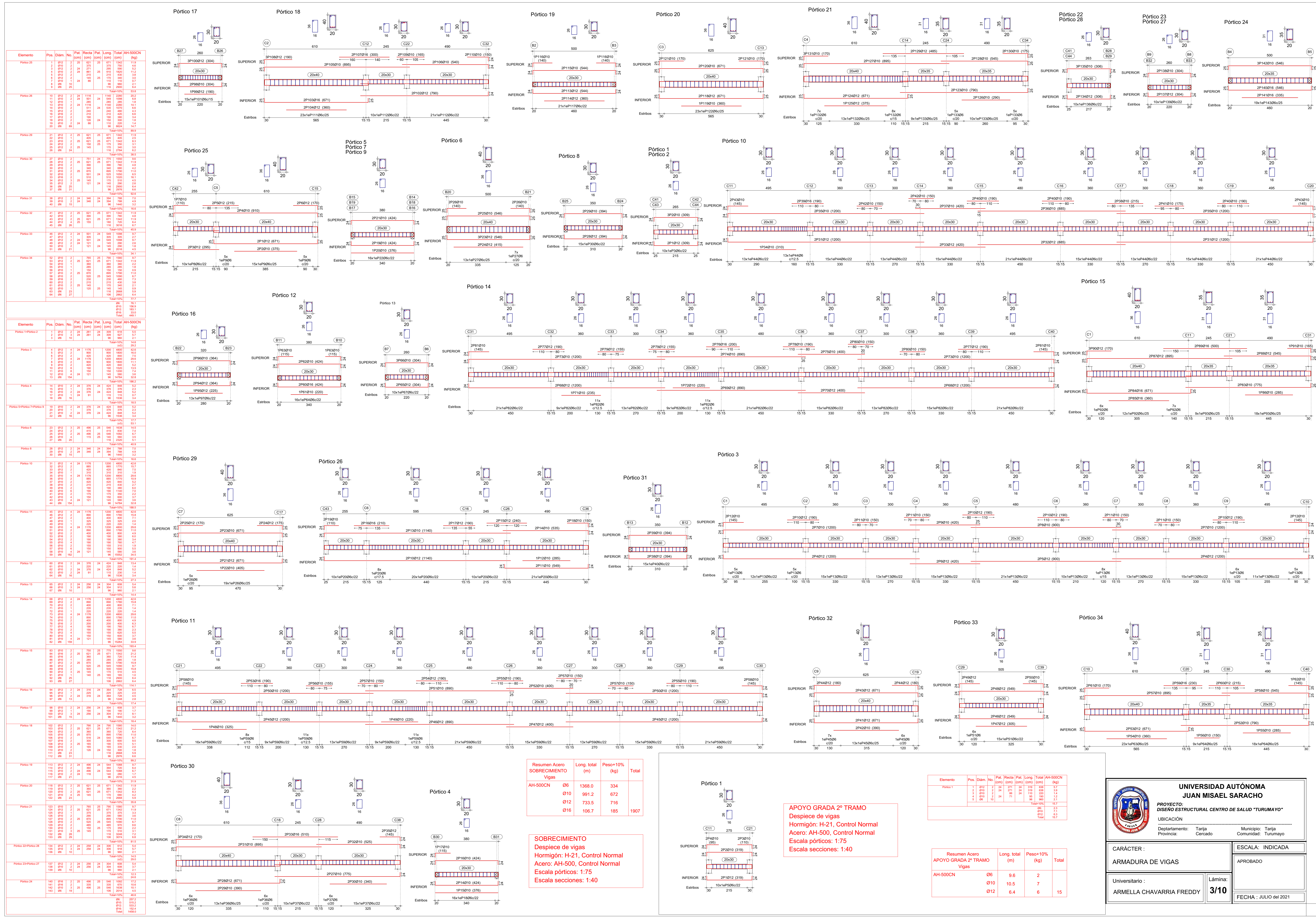
C9



C9



UNIVERSIDAD AUTÓNOMA JUAN MISAEL SARACHO
 PROYECTO: DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO"
 UBICACIÓN: Tarja Cercado, Tarja Turumayo
 CARÁCTER: ARMADURA DE ZAPATAS
 UNIVERSITARIO: ARMELLA CHAVARRIA FREDDY
 LÁMINA: 1/10
 ESCALA: 1:40
 APROBADO
 FECHA: JULIO del 2021



| Elemento | Pos. | Diam. | No. | Pat. | Recta | Pat. | Long. | Total | AH-500CN |
|------------|------|-------|-----|------|-------|------|-------|-------|----------|
| | | | | | (cm) | (cm) | (cm) | (cm) | (kg) |
| Pórtico 25 | 1 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 2 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 3 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 4 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 5 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 6 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 7 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 8 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 9 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 10 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| Total-10% | | | | | | | | | 52.9 |

| Elemento | Pos. | Diam. | No. | Pat. | Recta | Pat. | Long. | Total | AH-500CN |
|-----------|------|-------|-----|------|-------|------|-------|-------|----------|
| | | | | | (cm) | (cm) | (cm) | (cm) | (kg) |
| Pórtico 1 | 1 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 2 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 3 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 4 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 5 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 6 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 7 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 8 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 9 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 10 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| Total-10% | | | | | | | | | 52.9 |

| Elemento | Pos. | Diam. | No. | Pat. | Recta | Pat. | Long. | Total | AH-500CN |
|-----------|------|-------|-----|------|-------|------|-------|-------|----------|
| | | | | | (cm) | (cm) | (cm) | (cm) | (kg) |
| Pórtico 2 | 1 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 2 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 3 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 4 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 5 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 6 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 7 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 8 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 9 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 10 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| Total-10% | | | | | | | | | 52.9 |

| Elemento | Pos. | Diam. | No. | Pat. | Recta | Pat. | Long. | Total | AH-500CN |
|-----------|------|-------|-----|------|-------|------|-------|-------|----------|
| | | | | | (cm) | (cm) | (cm) | (cm) | (kg) |
| Pórtico 3 | 1 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 2 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 3 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 4 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 5 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 6 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 7 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 8 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 9 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 10 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| Total-10% | | | | | | | | | 52.9 |

| Resumen Acero SOBRECIMIENTO Vigas | Long. total (m) | Peso+10% (kg) | Total |
|-----------------------------------|-----------------|---------------|-------|
| AH-500CN Ø16 | 1368.0 | 334 | |
| Ø10 | 991.2 | 672 | |
| Ø12 | 733.5 | 716 | |
| Ø16 | 106.7 | 185 | 1907 |

SOBRECIMIENTO
 Despiece de vigas
 Hormigón: H-21, Control Normal
 Acero: AH-500, Control Normal
 Escala pórticos: 1:75
 Escala secciones: 1:40

APOYO GRADA 2º TRAMO
 Despiece de vigas
 Hormigón: H-21, Control Normal
 Acero: AH-500, Control Normal
 Escala pórticos: 1:75
 Escala secciones: 1:40

| Elemento | Pos. | Diam. | No. | Pat. | Recta | Pat. | Long. | Total | AH-500CN |
|-----------|------|-------|-----|------|-------|------|-------|-------|----------|
| | | | | | (cm) | (cm) | (cm) | (cm) | (kg) |
| Pórtico 1 | 1 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 2 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 3 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 4 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 5 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 6 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 7 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 8 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 9 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| | 10 | Ø12 | 2 | 34 | 261 | 24 | 209 | 618 | 5.3 |
| Total-10% | | | | | | | | | 52.9 |

| Resumen Acero APOYO GRADA 2º TRAMO Vigas | Long. total (m) | Peso+10% (kg) | Total |
|--|-----------------|---------------|-------|
| AH-500CN Ø16 | 9.6 | 2 | |
| Ø10 | 10.5 | 7 | |
| Ø12 | 6.4 | 6 | 15 |

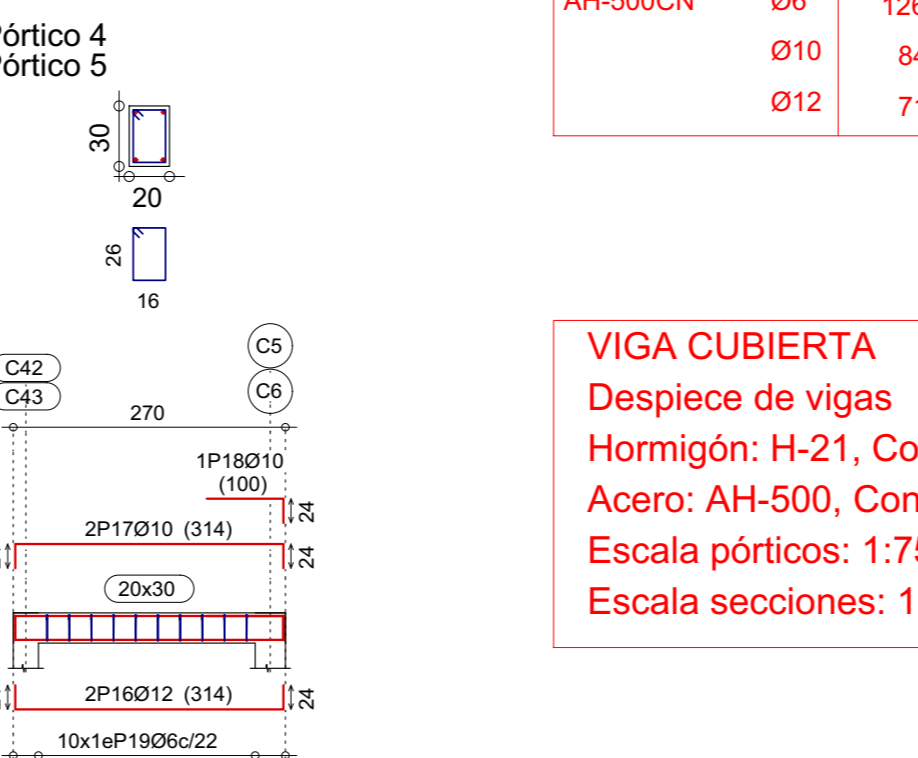
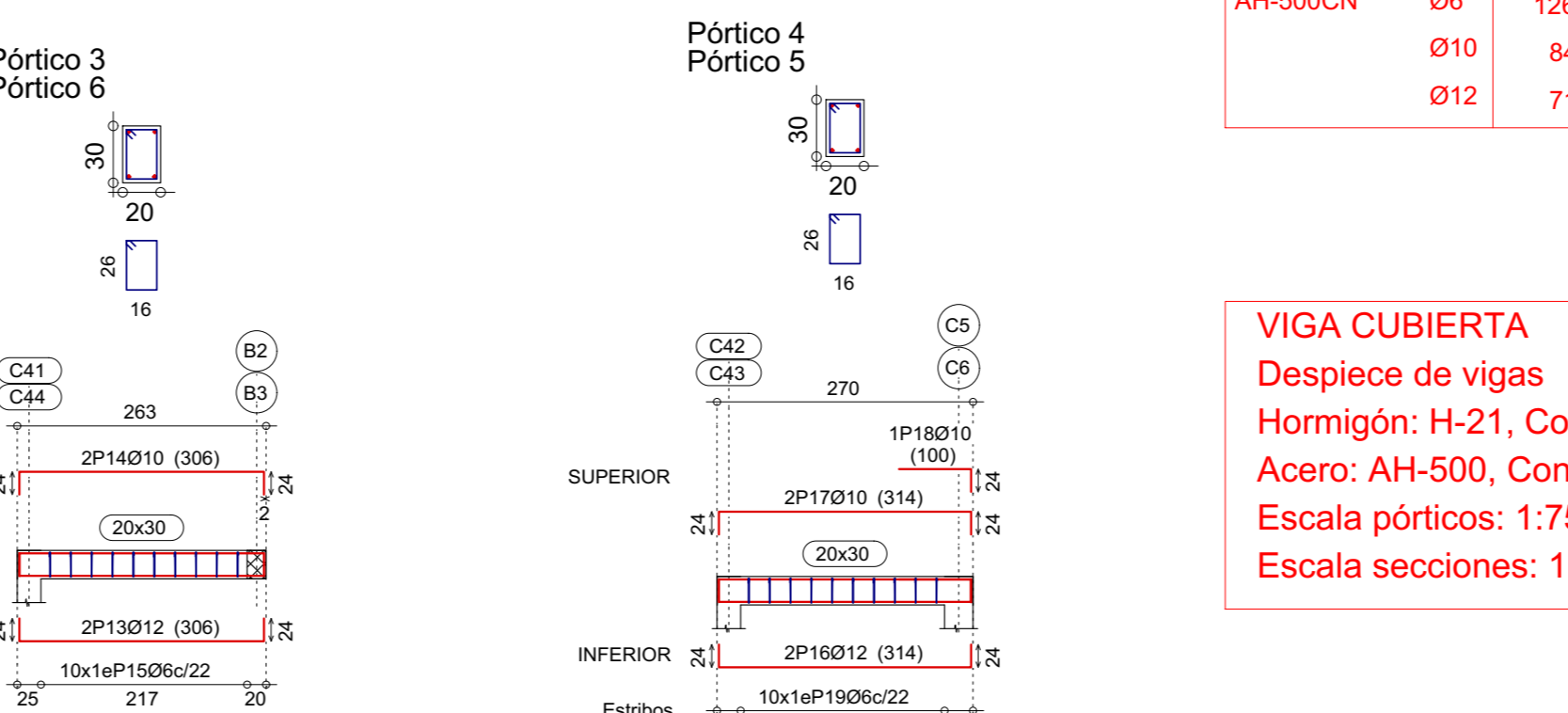
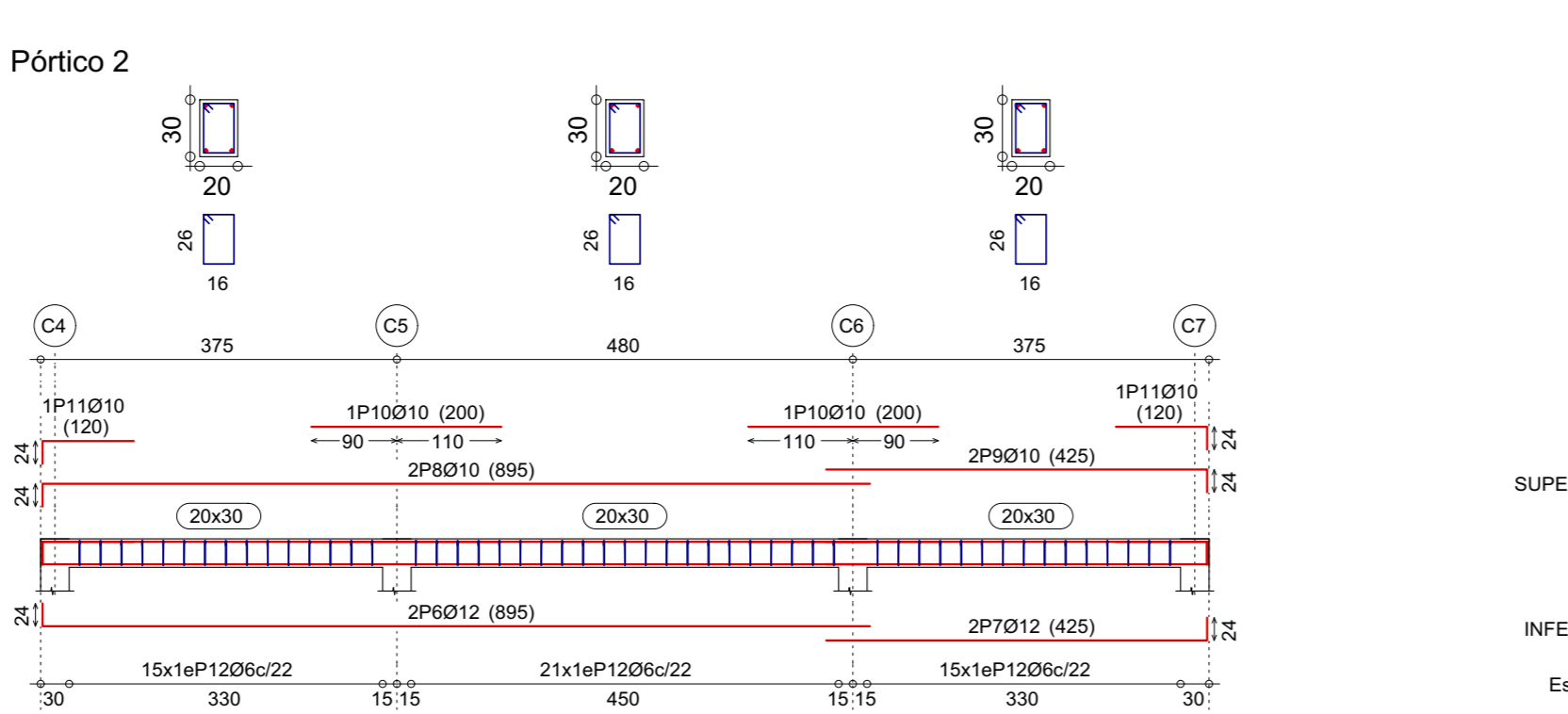
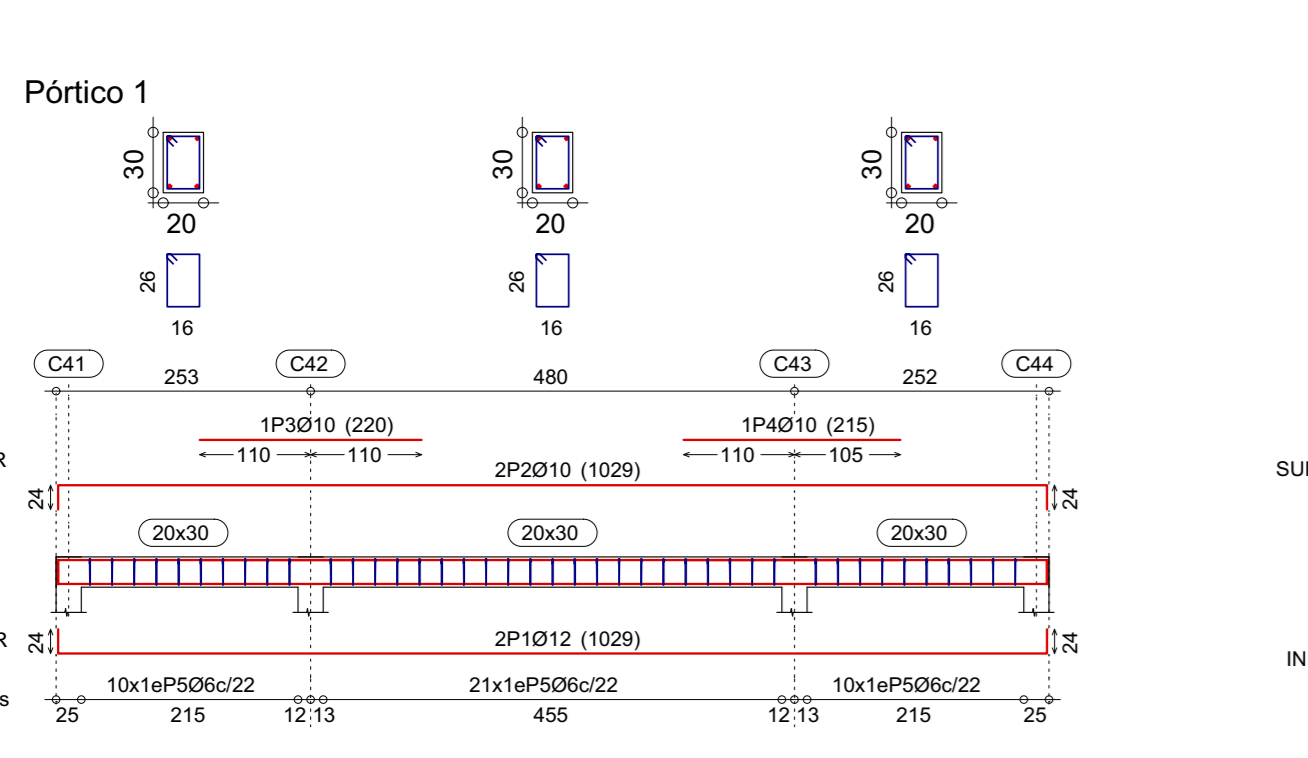
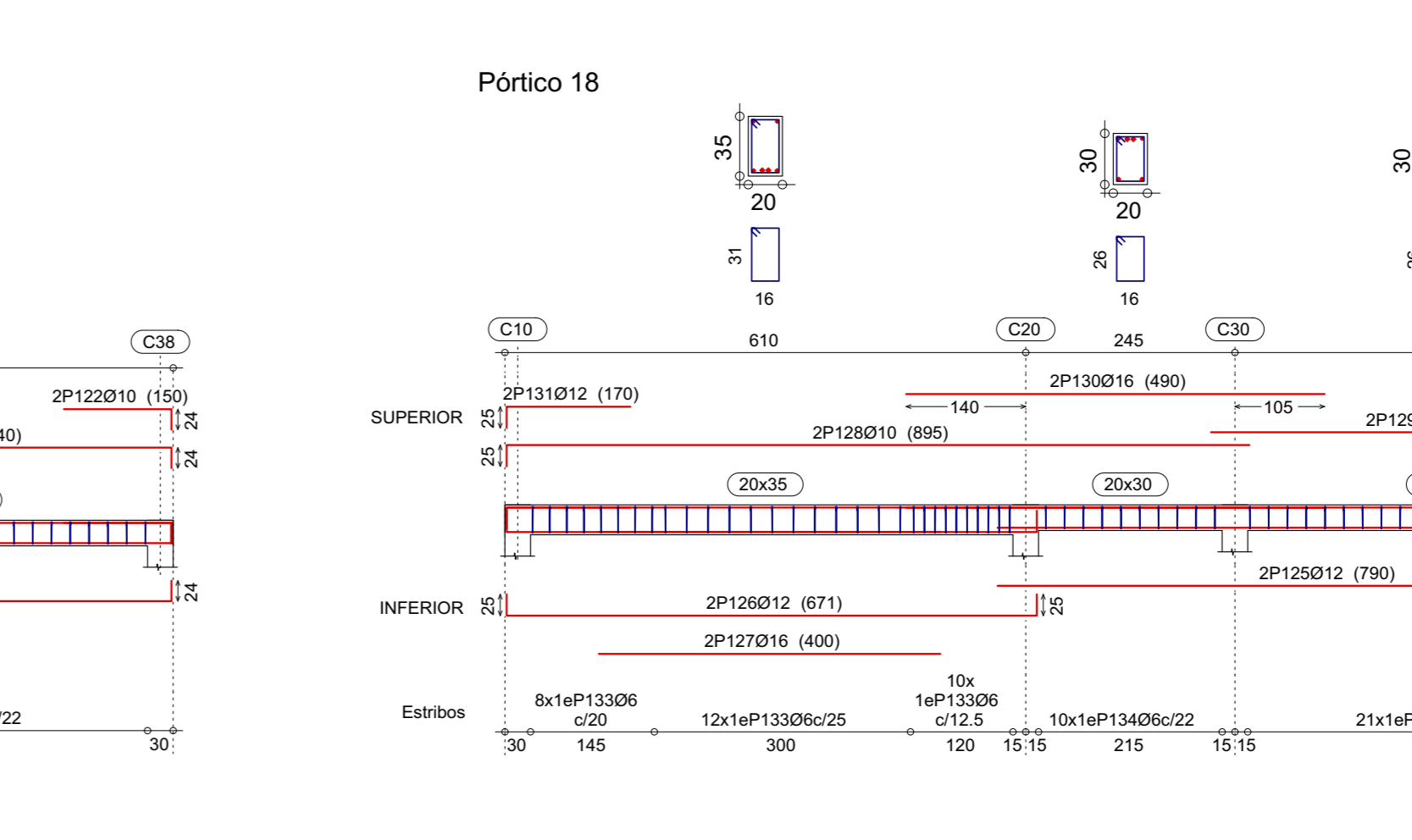
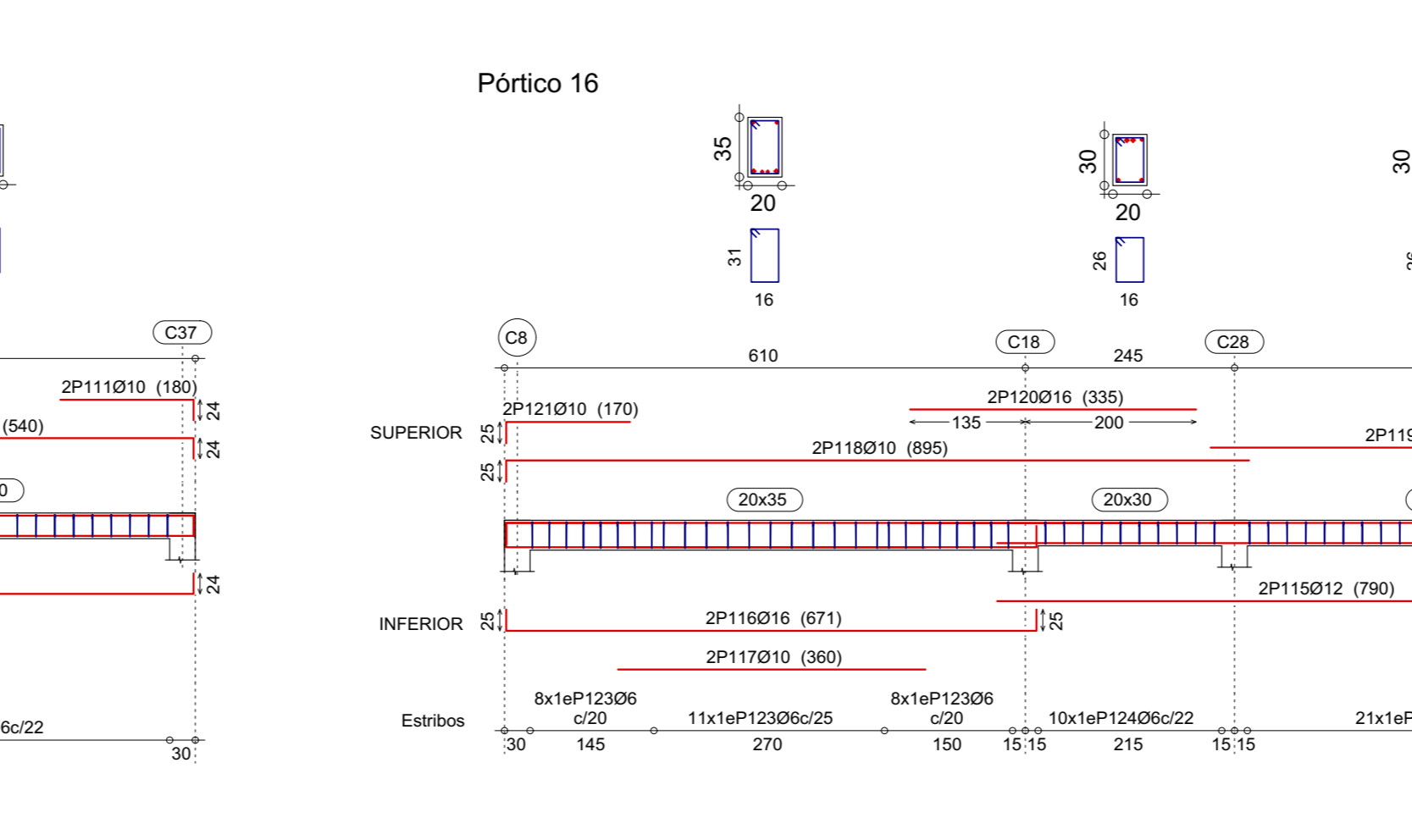
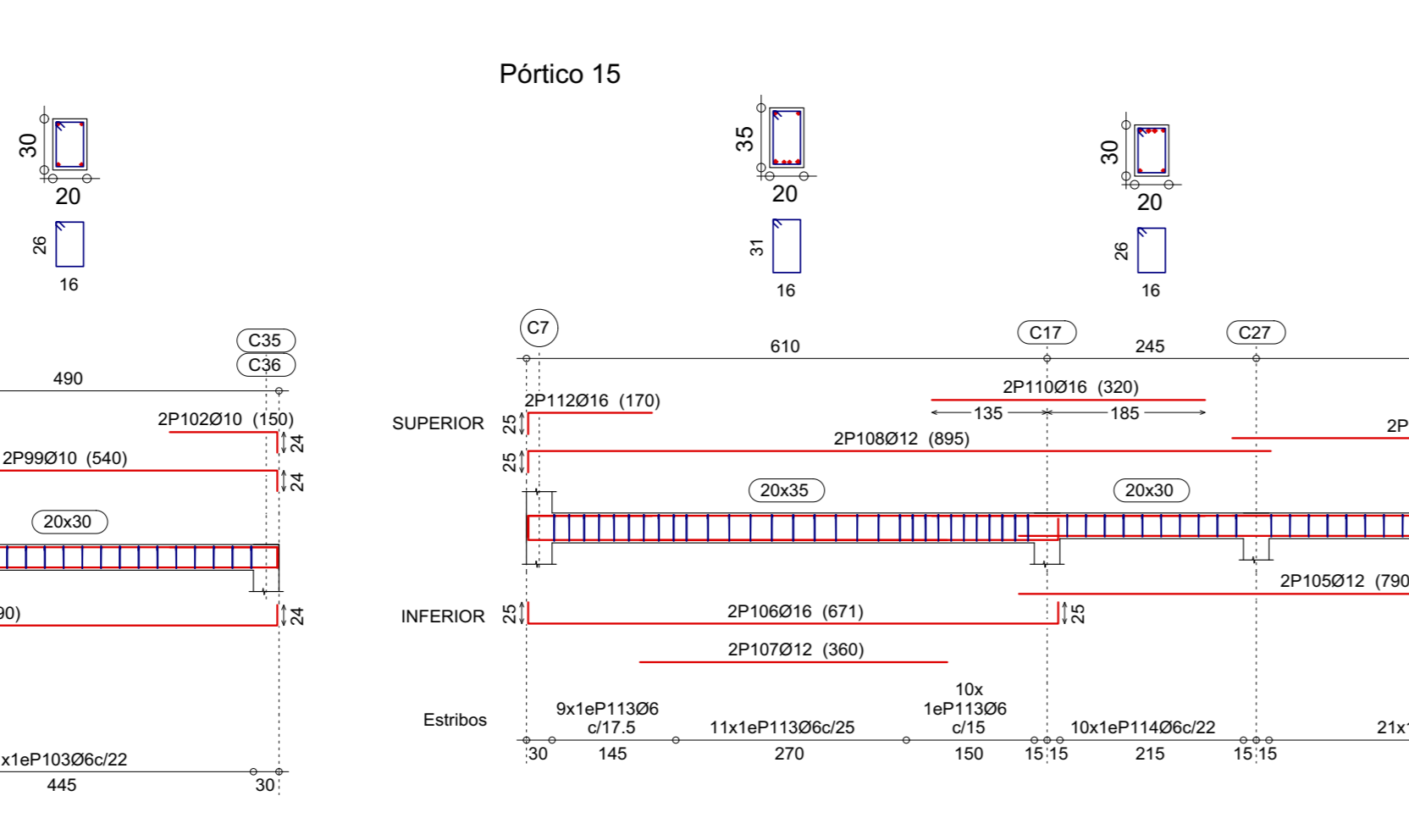
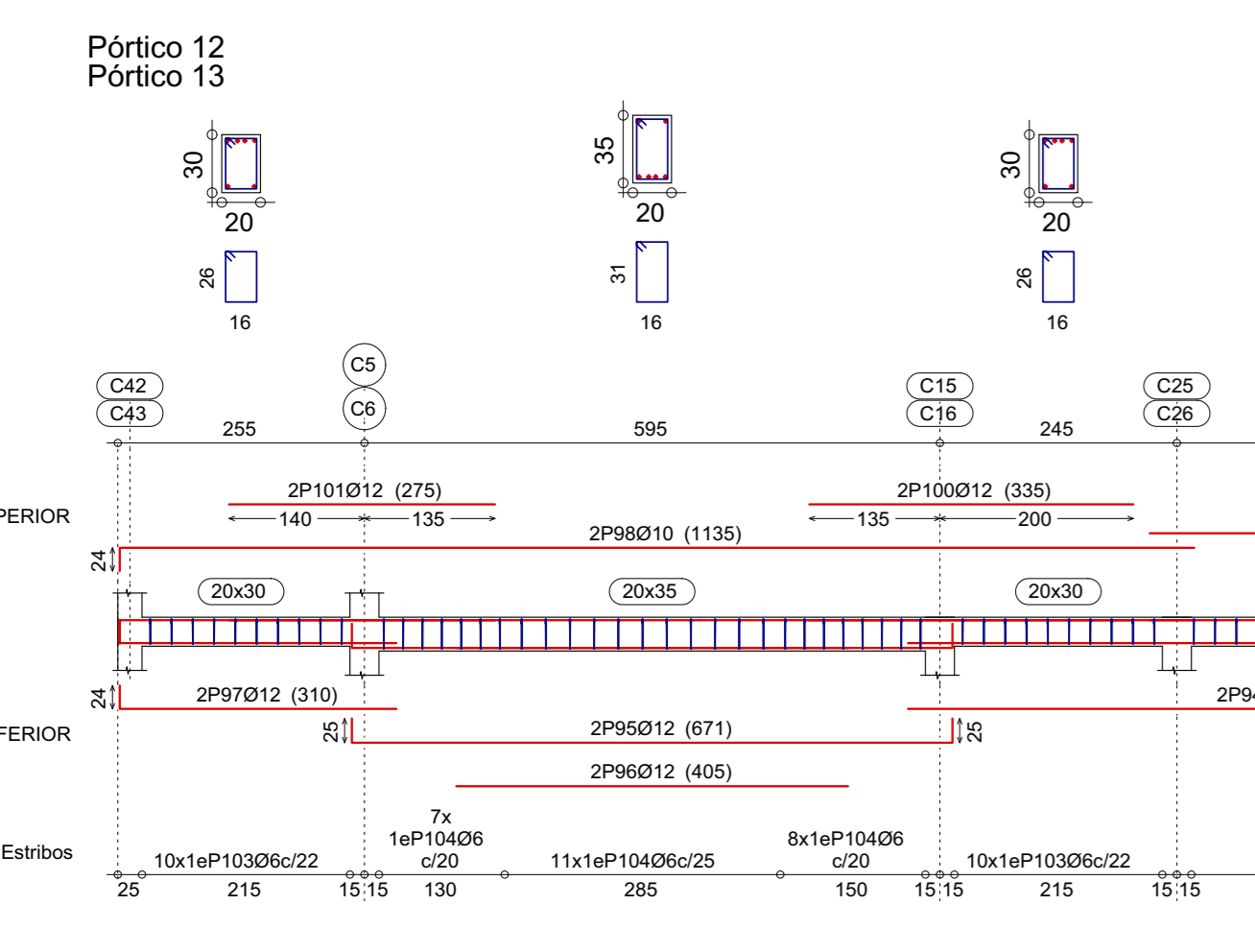
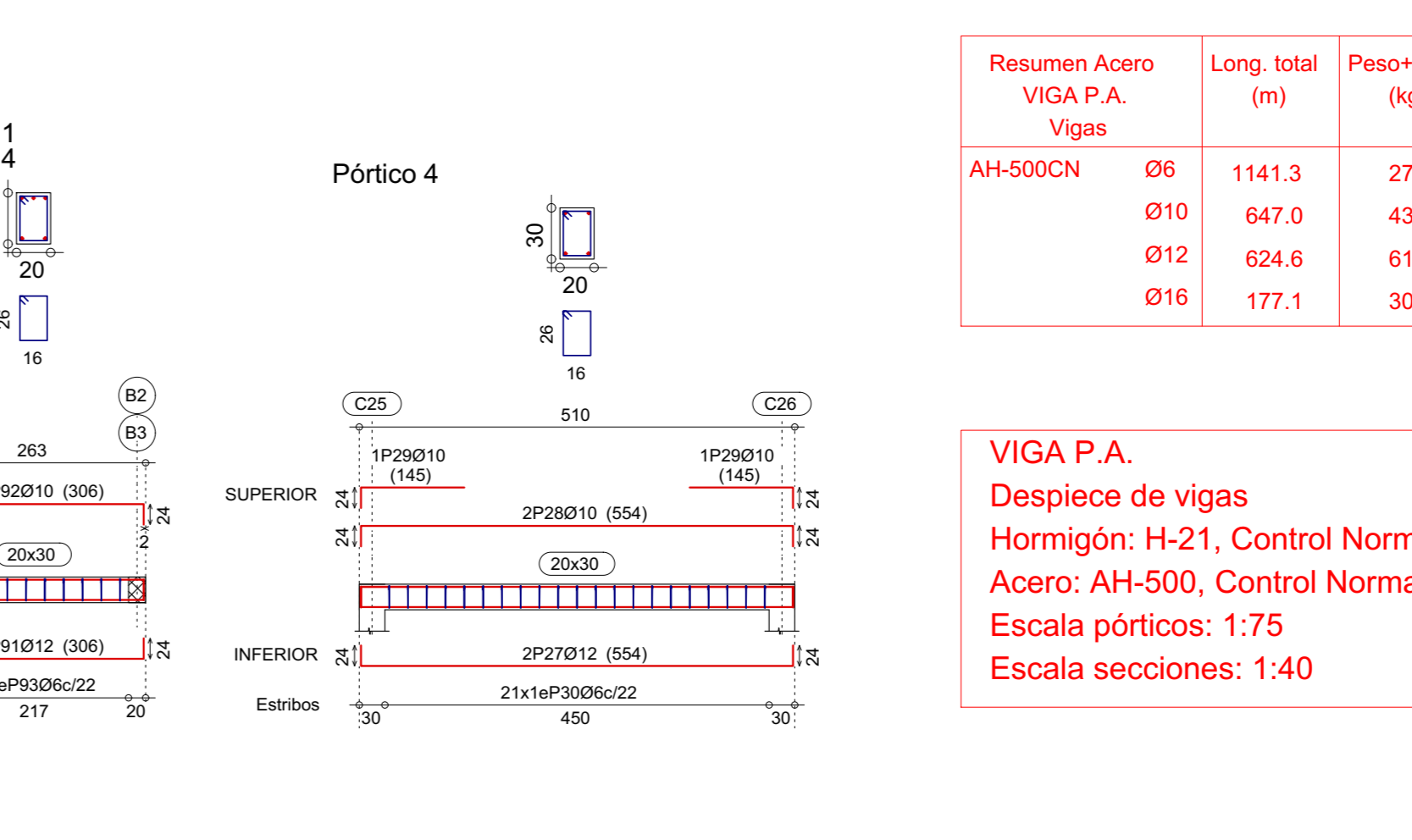
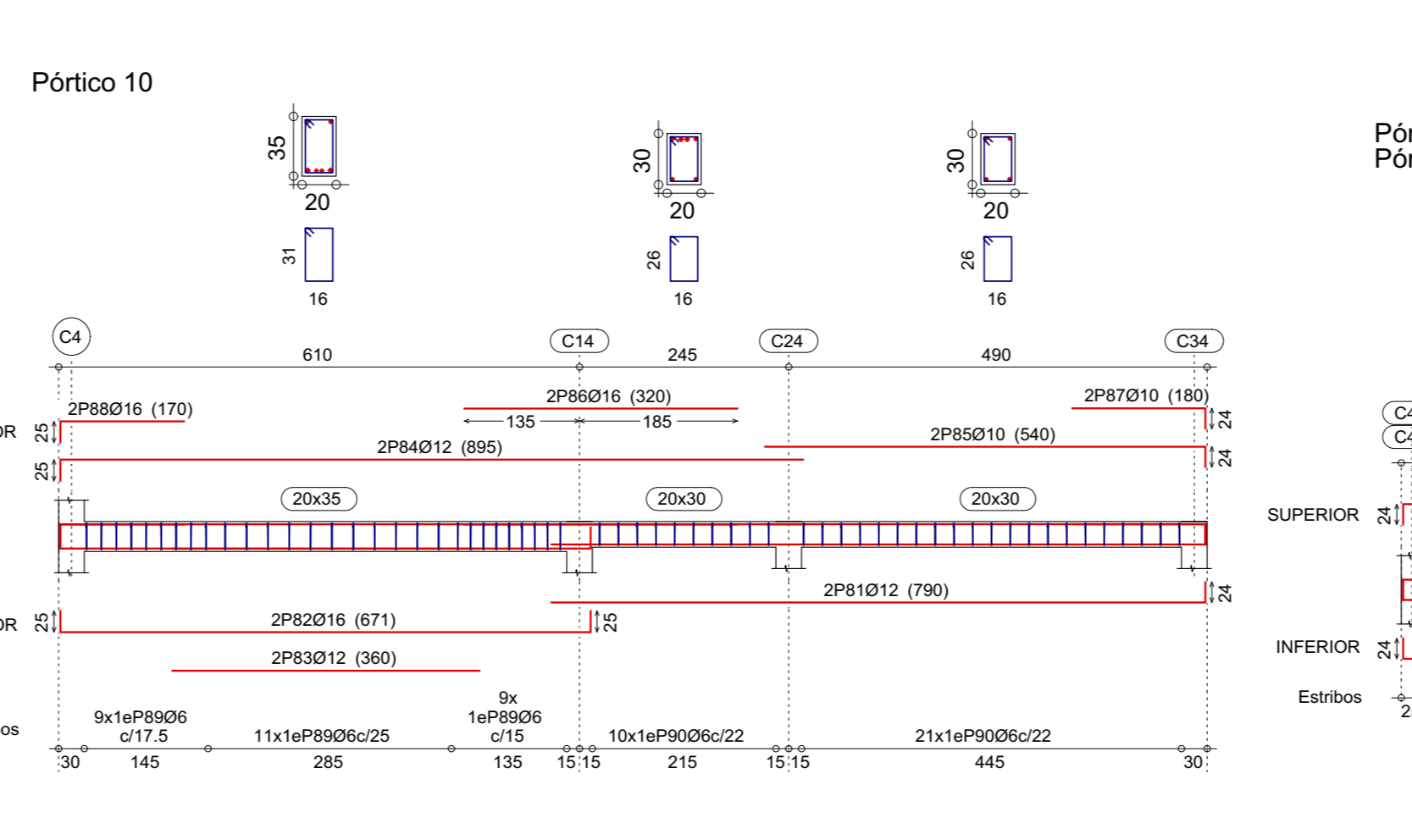
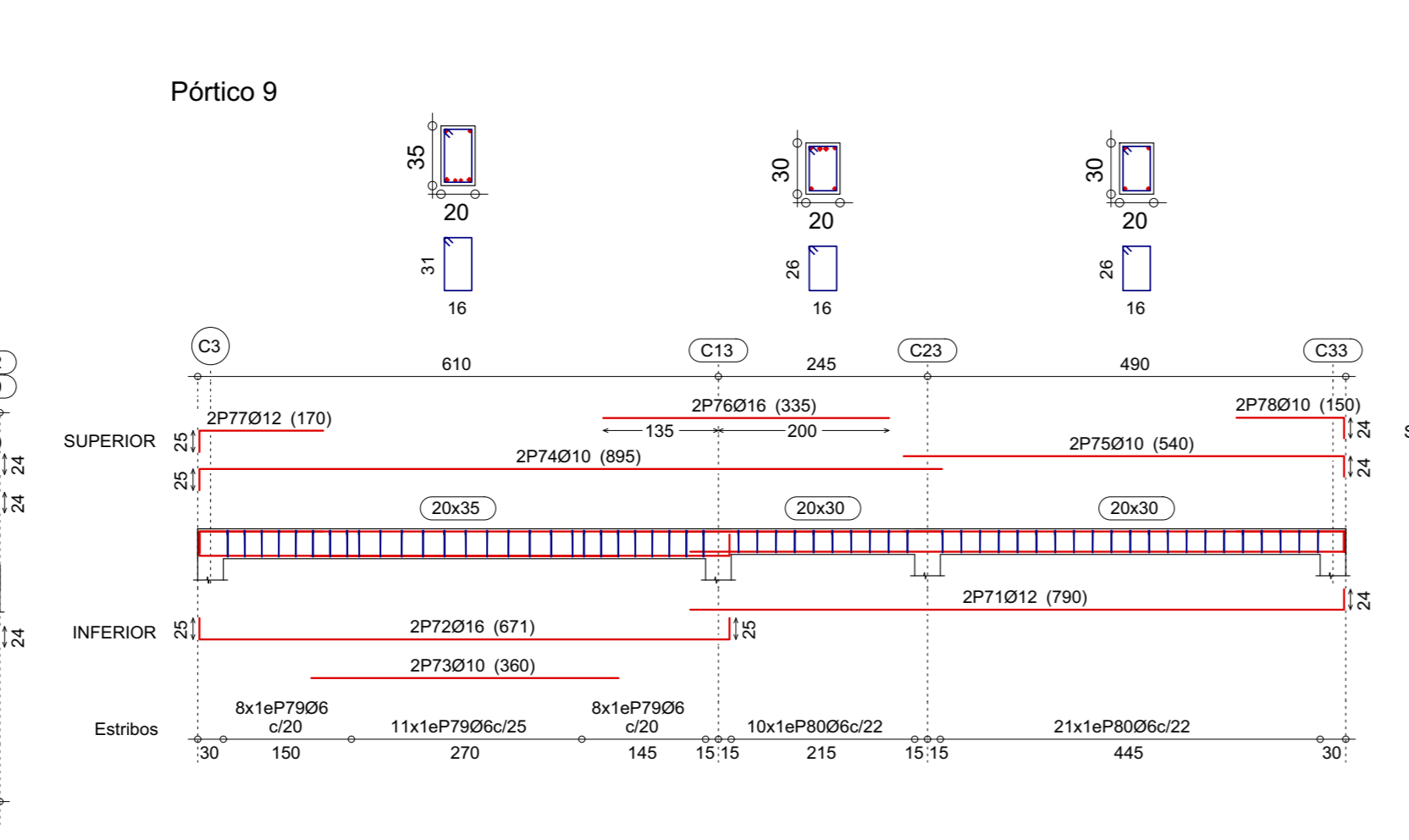
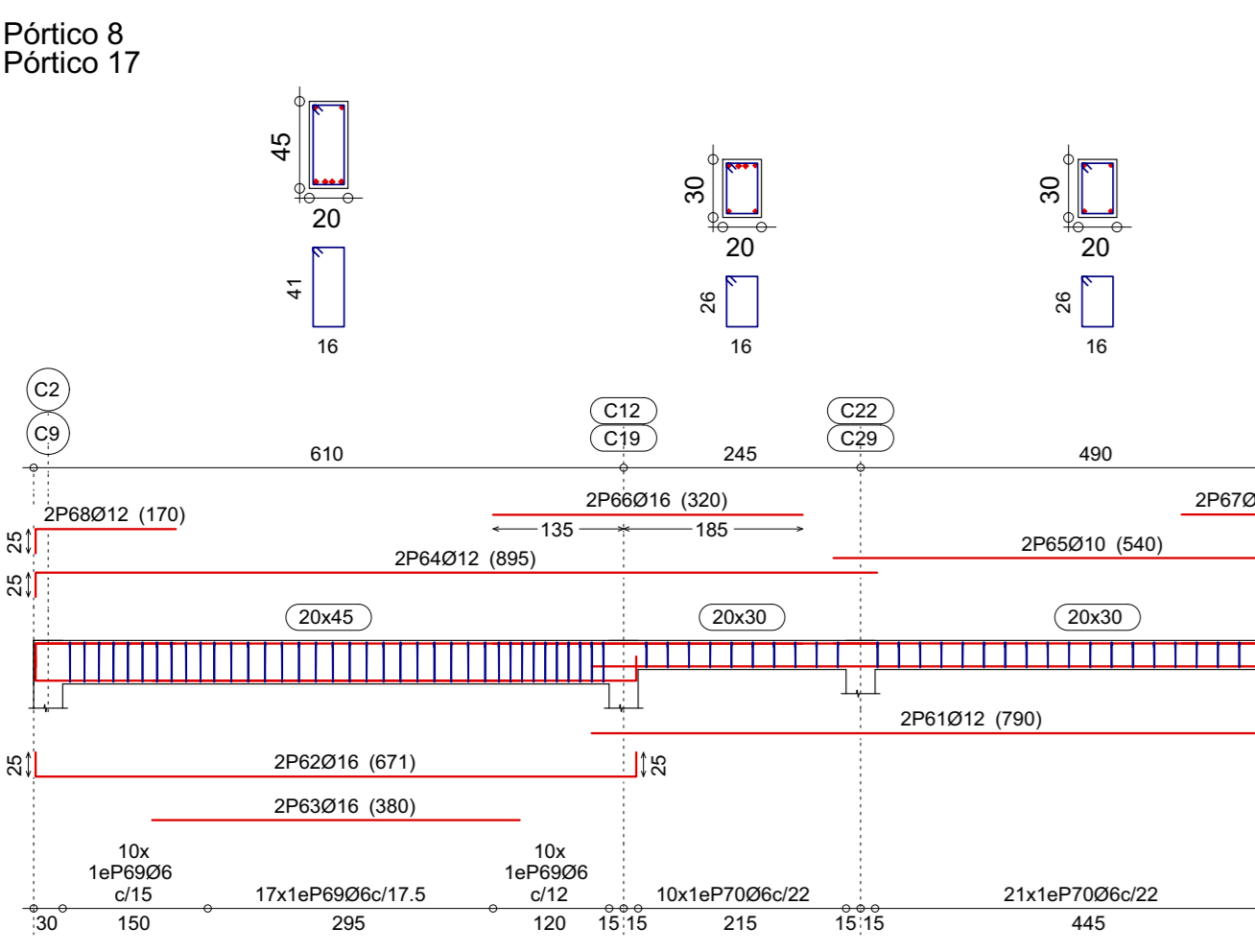
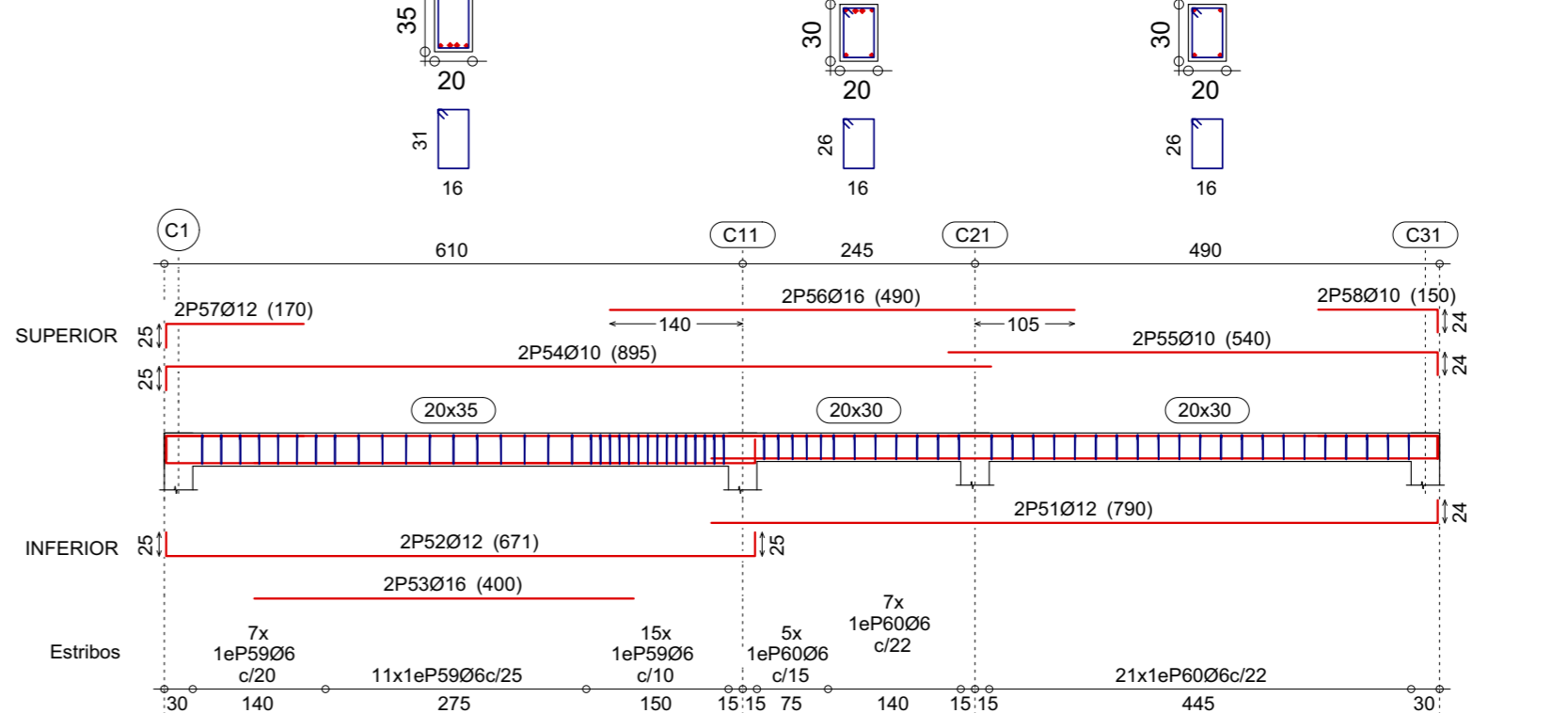
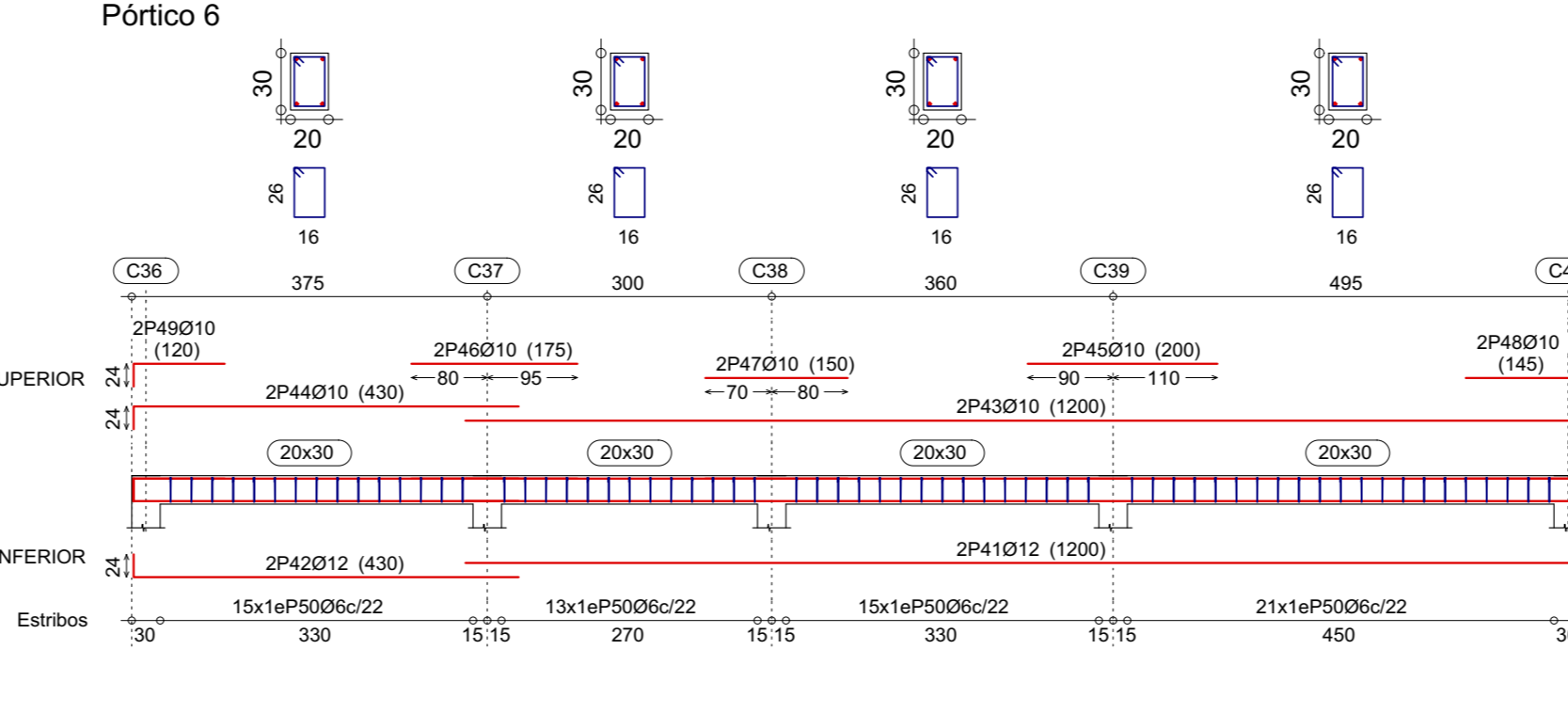
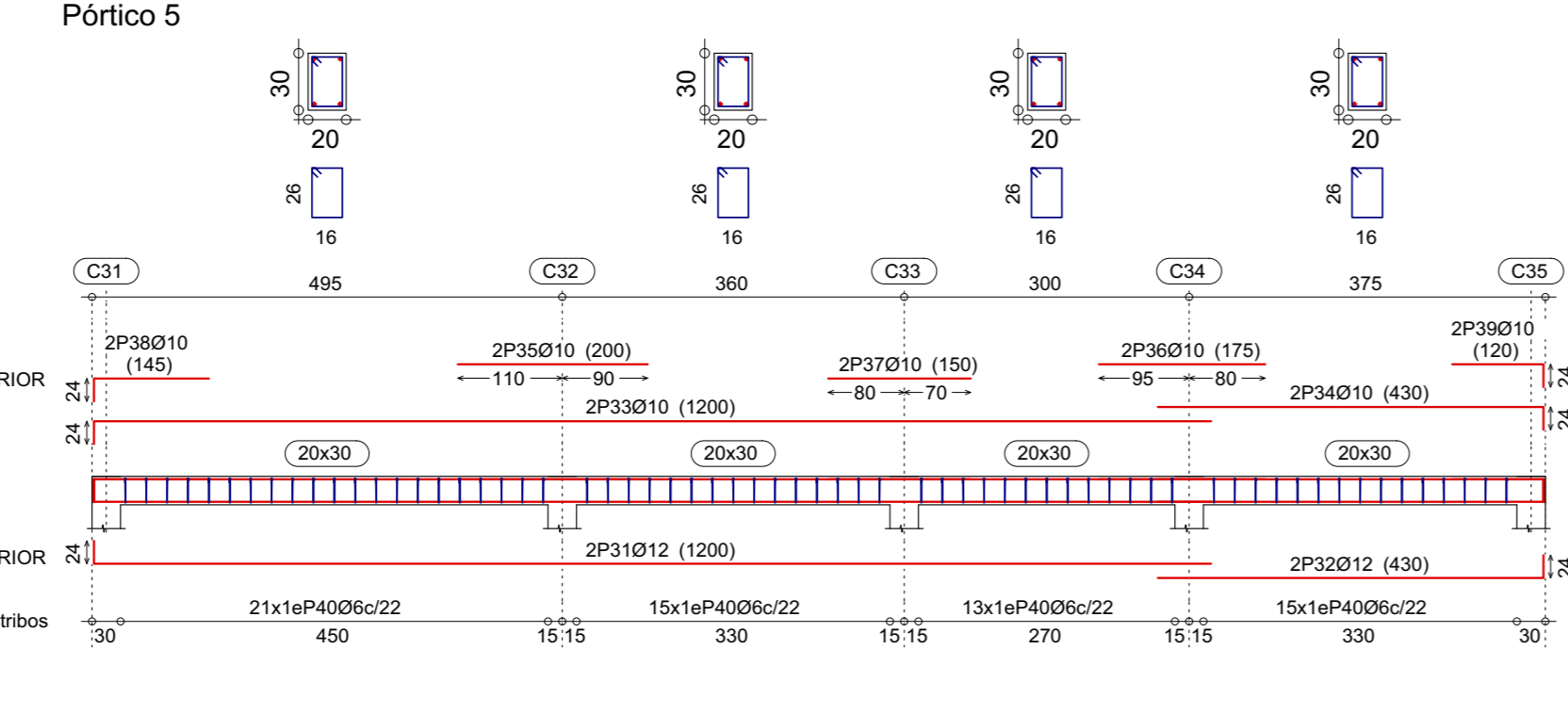
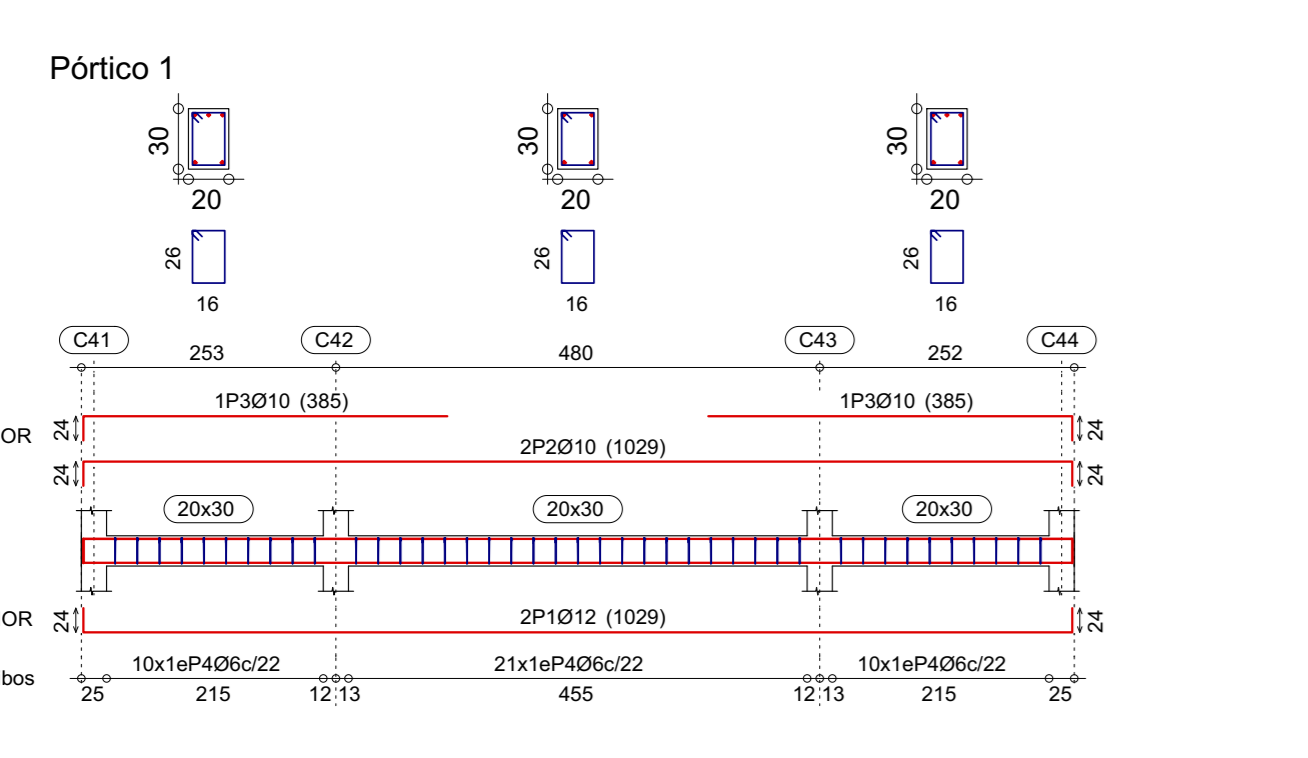
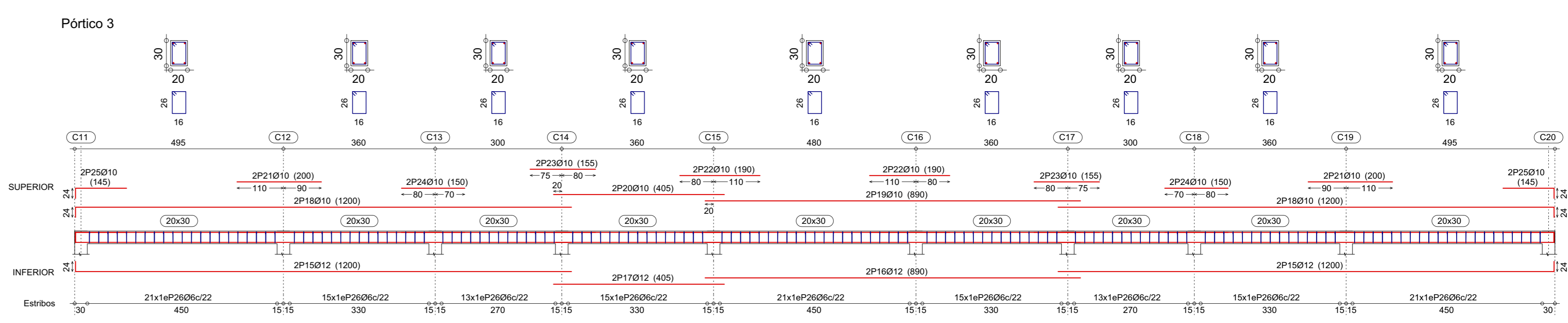
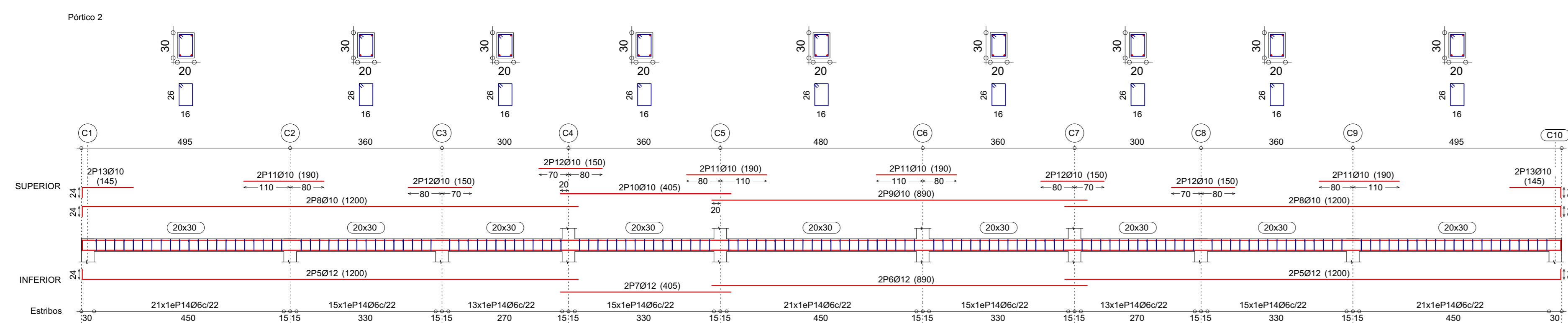


**UNIVERSIDAD AUTÓNOMA
 JUAN MISAE SARACHO**

PROYECTO:
DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO"

UBICACIÓN:
 Departamento: Tarja Municipio: Tarja
 Provincia: Cercedo Comunidad: Turumayo

| | |
|--|-----------------------|
| CARÁCTER: ARMADURA DE VIGAS | ESCALA: INDICADA |
| Universitario: ARMELLA CHAVARRIA FREDDY | APROBADO |
| Lámina: 3/10 | FECHA: JULIO del 2021 |



| Resumen Acero | Long. total (m) | Peso+10% (kg) | Total |
|---------------------|-----------------|---------------|-------|
| VIGA CUBIERTA Vigas | | | |
| AH-500CN Ø6 | 126.7 | 31 | |
| Ø10 | 84.5 | 57 | |
| Ø12 | 71.8 | 70 | 158 |

VIGA CUBIERTA
Despiece de vigas
Hormigón: H-21, Control Normal
Acero: AH-500, Control Normal
Escala pórticos: 1:75
Escala secciones: 1:40

| Elemento | Pos. | Diam. | No. | Pat. (cm) | Recta (cm) | Pat. (cm) | Long. (cm) | Total (cm) | AH-500CN (kg) | |
|-----------|------|-------|-----|-----------|------------|-----------|------------|------------|---------------|------|
| Pórtico 1 | 1 | Ø12 | 24 | 961 | 24 | 1029 | 2058 | 16.3 | | |
| | 2 | Ø10 | 24 | 961 | 24 | 1029 | 2058 | 12.7 | | |
| | 3 | Ø10 | 1 | 220 | 220 | 220 | 220 | 1.4 | | |
| | 4 | Ø10 | 41 | 215 | 215 | 215 | 8715 | 62.2 | | |
| Total+10% | | | | | | | | | | 74.6 |

| Elemento | Pos. | Diam. | No. | Pat. (cm) | Recta (cm) | Pat. (cm) | Long. (cm) | Total (cm) | AH-500CN (kg) | |
|-----------|------|-------|-----|-----------|------------|-----------|------------|------------|---------------|------|
| Pórtico 2 | 5 | Ø12 | 24 | 1176 | 24 | 1200 | 2400 | 18.3 | | |
| | 6 | Ø10 | 24 | 1176 | 24 | 1200 | 2400 | 14.2 | | |
| | 7 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 8 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 9 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 10 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 11 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 12 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 13 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 14 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 15 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 16 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 17 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| | 18 | Ø10 | 2 | 400 | 400 | 400 | 400 | 2.6 | | |
| Total+10% | | | | | | | | | | 46.8 |



UNIVERSIDAD AUTÓNOMA
JUAN MISAEI SARACHO

PROYECTO: **DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO"**

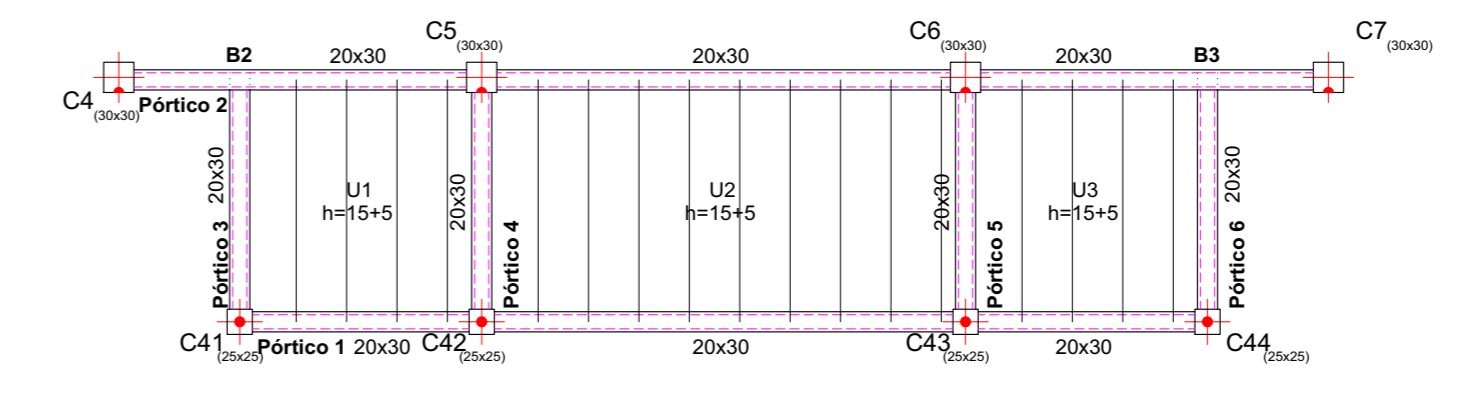
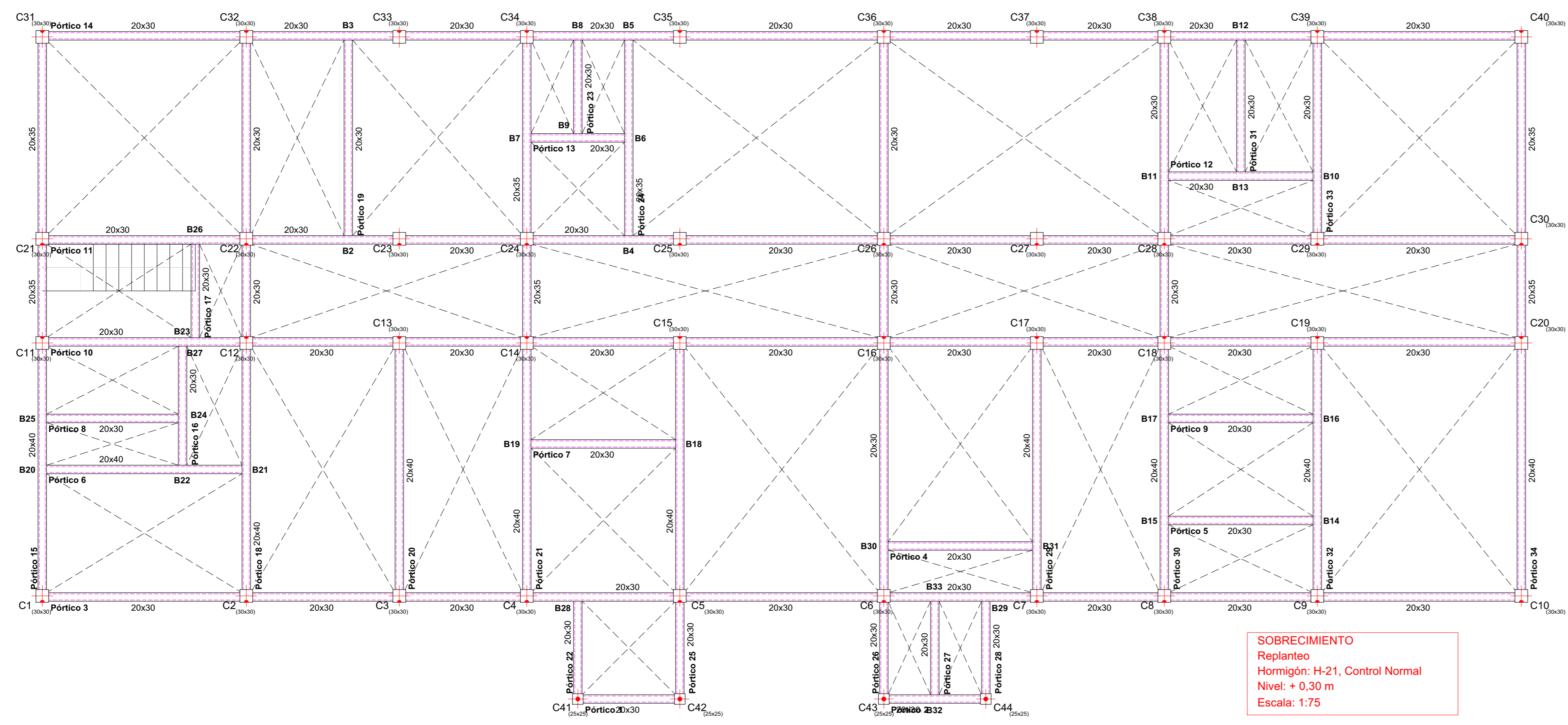
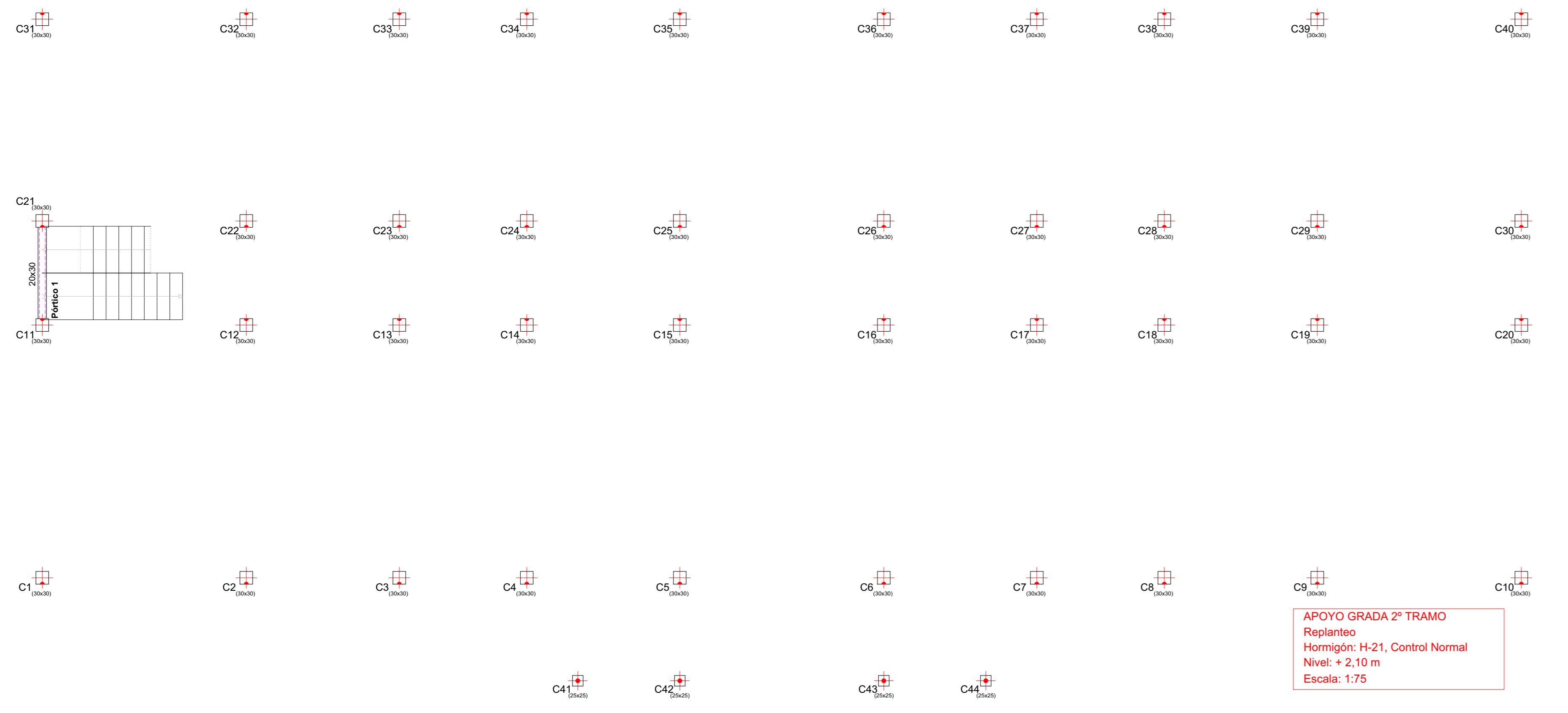
UBICACIÓN: **Tarja Cercado**

Departamento: **Tarja** Municipio: **Tarja**

Provincia: **Cercado** Comunidad: **Turumayo**

| | |
|---|-------------------------|
| CARÁCTER: ARMADURA DE VIGAS | ESCALA: INDICADA |
| Universitario: ARMELLA CHAVARRIA FREDDY | Lámina: 5/10 |
| FECHA: JULIO del 2021 | |

APROBADO

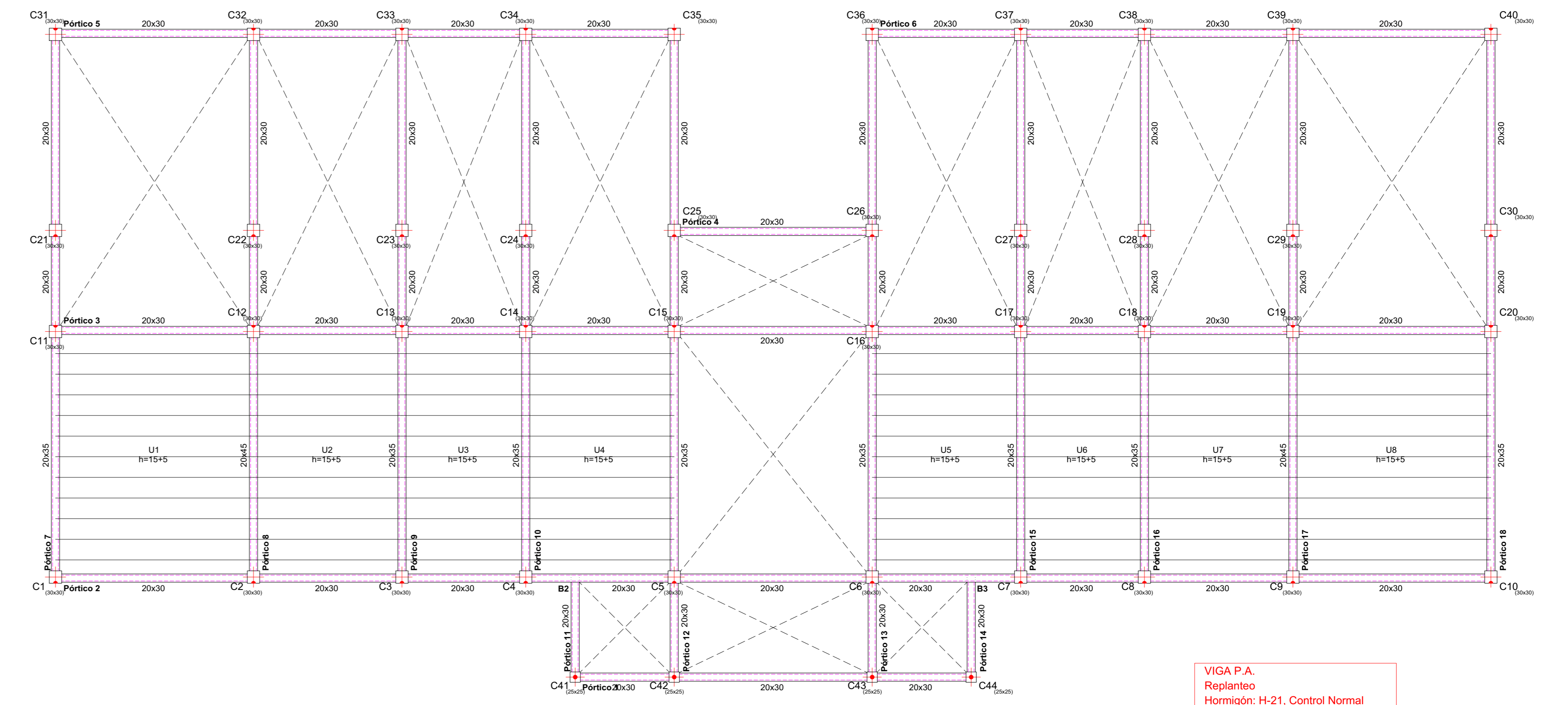


VIGA CUBIERTA
 Replanteo
 Hormigón: H-21, Control Normal
 AH-500, Control Normal
 Nivel: + 8,98 m
 Escala: 1:75

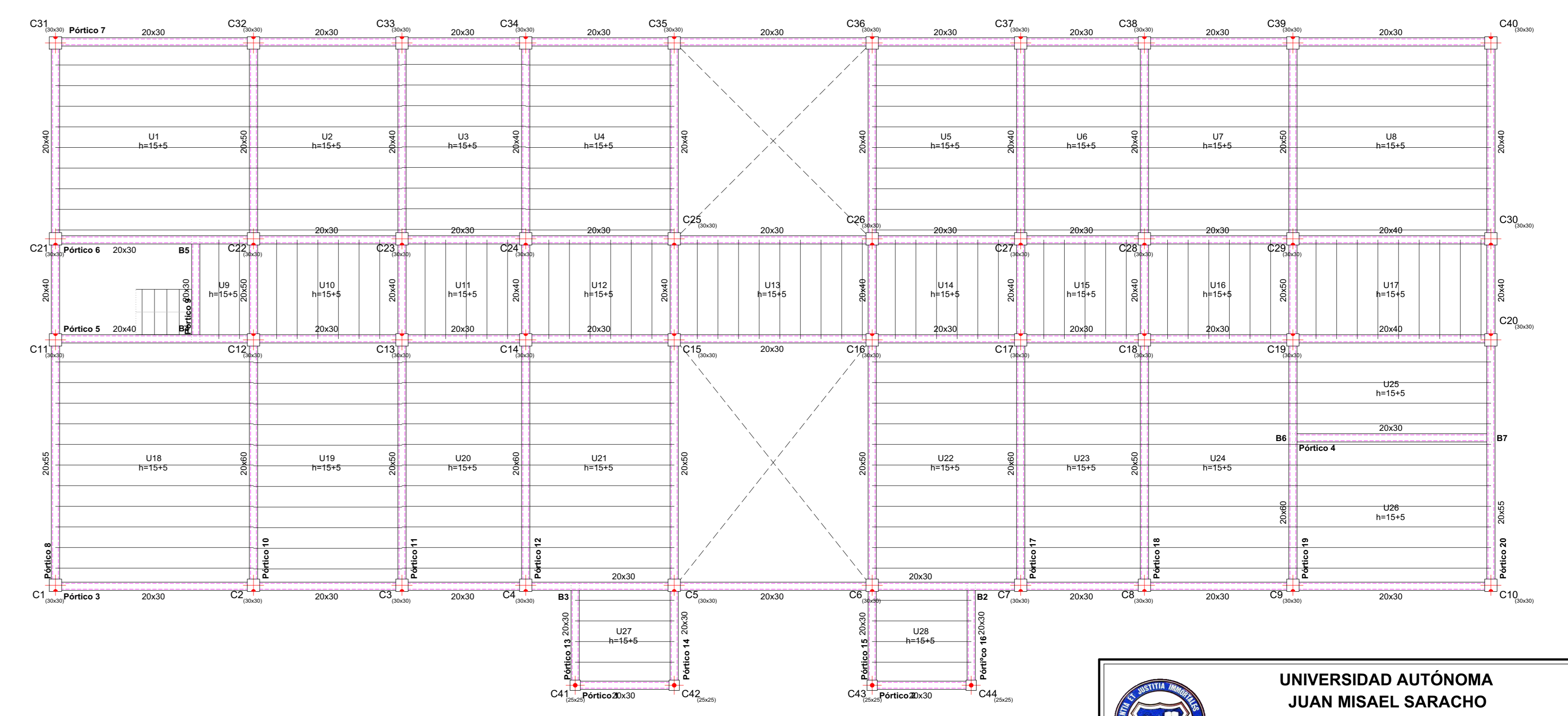
APOYO GRADA 2º TRAMO
 Replanteo
 Hormigón: H-21, Control Normal
 Nivel: + 2,10 m
 Escala: 1:75

SOBRECIMIENTO
 Replanteo
 Hormigón: H-21, Control Normal
 Nivel: + 0,30 m
 Escala: 1:75

Orientación
 Replanteo
 Hormigón: H-21, Control Normal
 Nivel: - 2,00 m
 Escala: 1:75



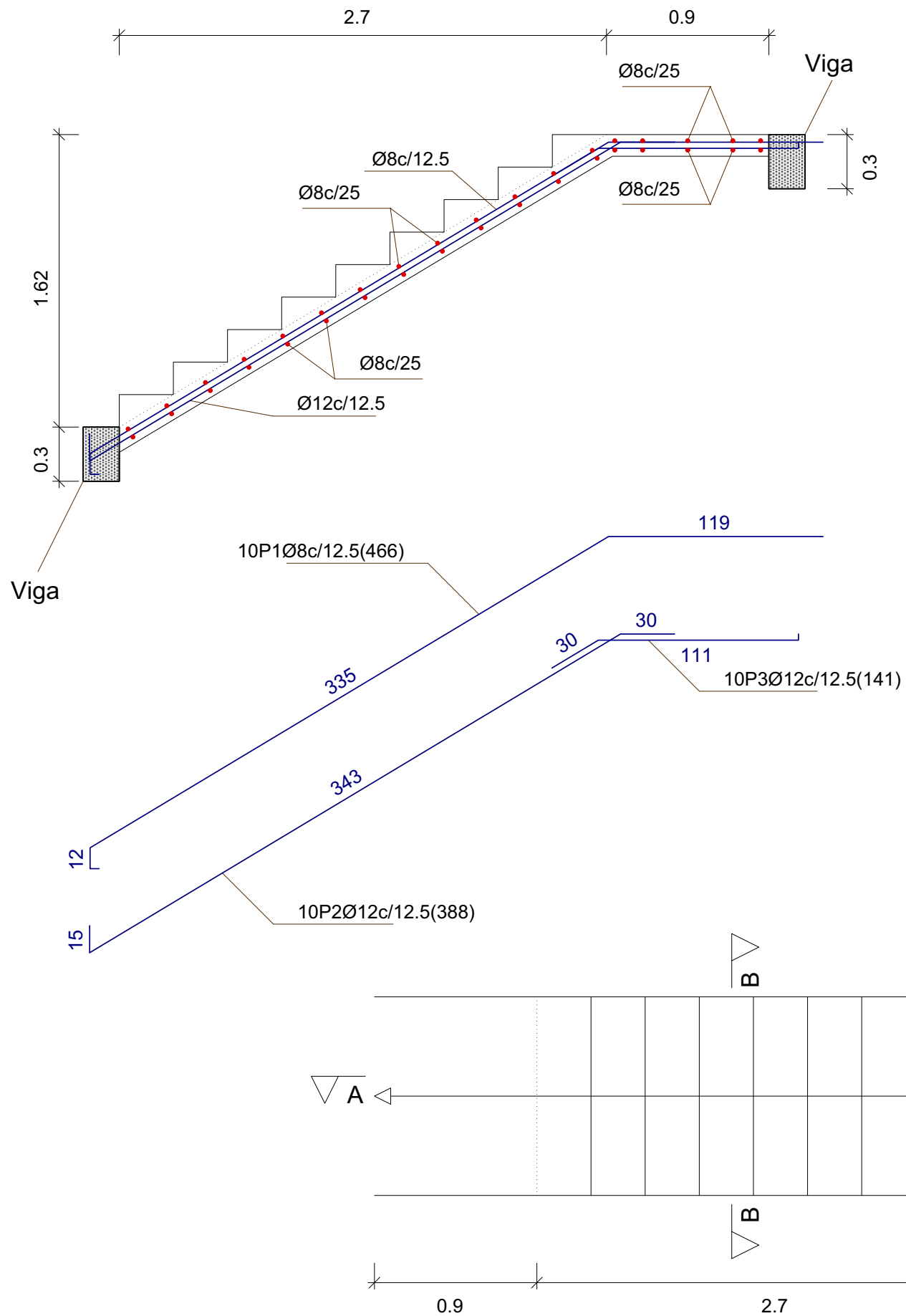
VIGA P.A.
 Replanteo
 Hormigón: H-21, Control Normal
 AH-500, Control Normal
 Nivel: + 5,78 m
 Escala: 1:75



VIGA P.B.
 Replanteo
 Hormigón: H-21, Control Normal
 AH-500, Control Normal
 Nivel: + 3,54 m
 Escala: 1:75

| | | | |
|---|--|--|--|
|  | | UNIVERSIDAD AUTÓNOMA JUAN MISAEI SARACHO | |
| | | PROYECTO: DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO" UBICACIÓN: Departamento: Tarja Municipio: Tarja Provincia: Cercado Comunidad: Turumayo | |
| CARÁCTER: REPLANTEO DE VIGAS | | ESCALA: 1:75 APROBADO | |
| Universitario: ARMELLA CHAVARRIA FREDDY | | Lámina: 6/10 FECHA: JULIO del 2021 | |

Sección A-A

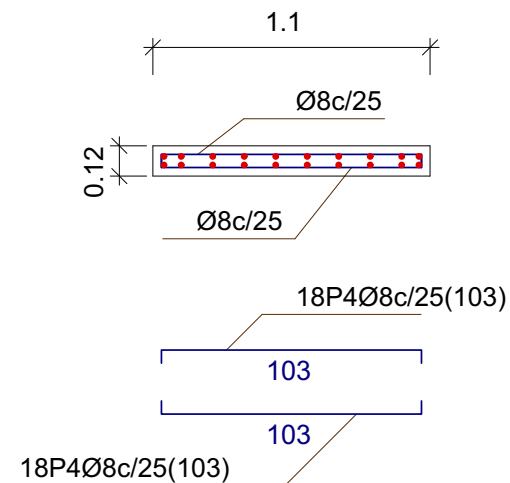


Escalera 1

| Resumen Acero Escalera 1 | Long. total (m) | Peso+10% (kg) | Total |
|--------------------------|-----------------|---------------|-------|
| AH-400CN Ø8 | 93.0 | 40 | 102 |
| Ø12 | 63.5 | 62 | |

| Tramo 1 | |
|--------------------------------------|------------------------|
| Geometría | |
| Ámbito | 1.100 m |
| Espesor | 0.12 m |
| Huella | 0.300 m |
| Contrahuella | 0.180 m |
| Desnivel que salva | 1.62 m |
| Nº de escalones | 9 |
| Planta final | APOYO GRADA 2º TRAMO |
| Planta inicial | SOBRECIMIENTO |
| Cargas | |
| Peso propio | 0.300 t/m2 |
| Peldañoado (Hormigonado con la losa) | 0.193 t/m2 |
| Solado | 0.050 t/m2 |
| Barandillas | 0.200 t/m |
| Sobrecarga de uso | 0.300 t/m2 |
| Materiales | |
| Hormigón | H-21, Control Normal |
| Acero | AH-500, Control Normal |
| Rec. geométrico | 3.0 cm |

Sección B-B



| Elemento | Pos. | Diám. | No. | Pat. (cm) | Recta (cm) | Pat. (cm) | Long. (cm) | Total (cm) | AH-500CN (kg) |
|--------------------|------|-------|-----|-----------|------------|-----------|------------|------------|---------------|
| Escalera 1-Tramo 1 | 1 | Ø8 | 10 | | 466 | | 466 | 5592 | 22.1 |
| | 2 | Ø12 | 10 | | 388 | | 388 | 4656 | 41.3 |
| | 3 | Ø12 | 10 | | 141 | | 141 | 1692 | 15.0 |
| | 4 | Ø8 | 36 | | 103 | | 103 | 3708 | 14.6 |
| Total+10%: | | | | | | | | | 102.3 |
| Escalera 3-Tramo 2 | 5 | Ø10 | 10 | | 196 | | 196 | 2352 | 11.3 |
| | 6 | Ø10 | 10 | | 348 | | 348 | 4176 | 21.5 |
| | 7 | Ø12 | 10 | | 456 | | 456 | 5472 | 48.6 |
| | 8 | Ø8 | 32 | | 103 | | 103 | 3296 | 13.0 |
| Total+10%: | | | | | | | | | 103.8 |
| | | | | | | | | | Ø8: 53.6 |
| | | | | | | | | | Ø10: 36.1 |
| | | | | | | | | | Ø12: 115.3 |
| | | | | | | | | | Total: 205.0 |



UNIVERSIDAD AUTÓNOMA JUAN MISAEL SARACHO

PROYECTO:
DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO"

UBICACIÓN

Departamento: Tarija Municipio: Tarija
Provincia: Cercado Comunidad: Turumayo

CARÁCTER :
ARMADURA DE GRADA_TRAMO 1

Universitario :
ARMELLA CHAVARRIA FREDDY

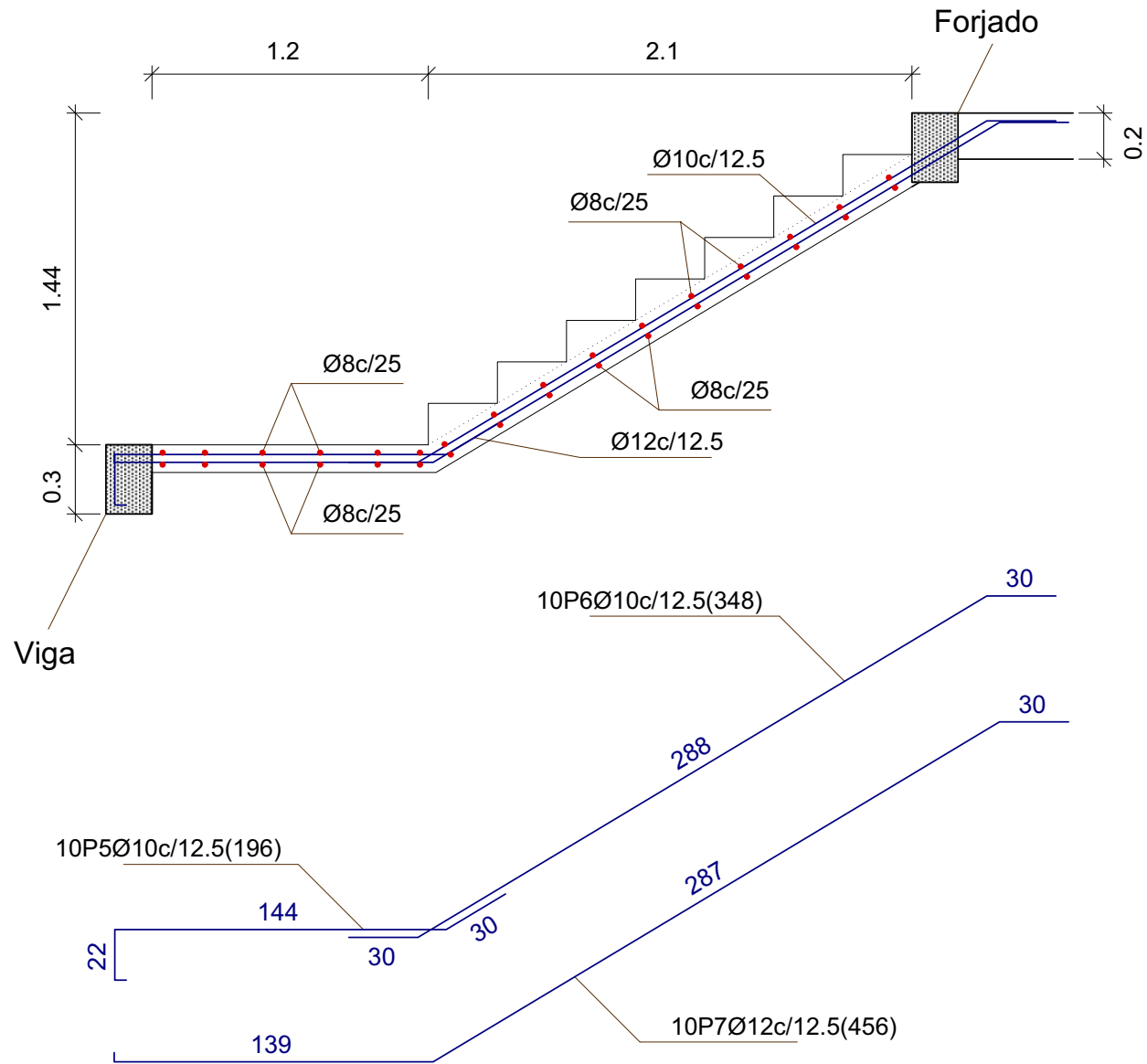
Lámina:
8/10

ESCALA: 1:30

APROBADO

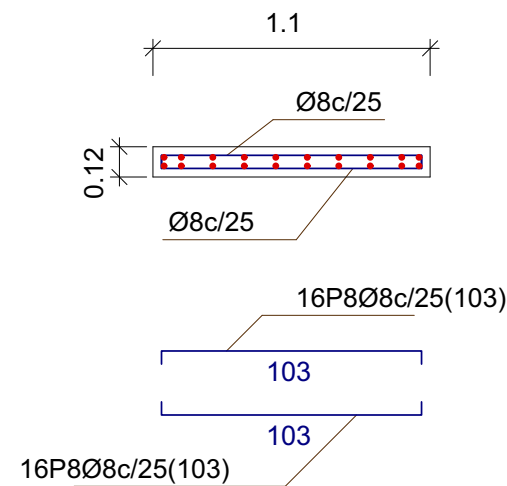
FECHA : JULIO del 2021

Sección A-A



Escalera 2

Sección B-B

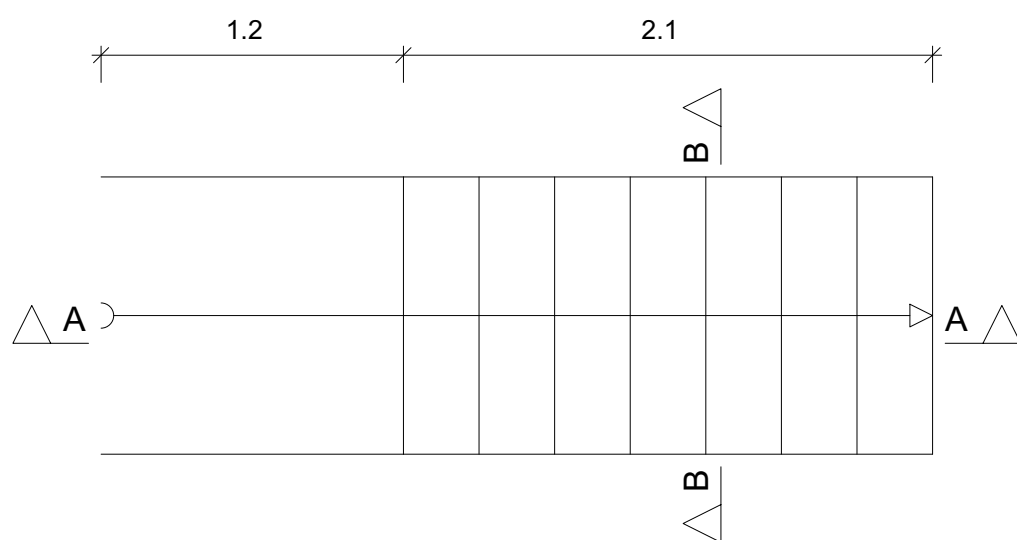


| Resumen Acero Escalera 2 | | Long. total (m) | Peso+10% (kg) | Total |
|--------------------------|-----|-----------------|---------------|-------|
| AH-500CN | Ø8 | 33.0 | 13 | 105 |
| | Ø10 | 65.3 | 33 | |
| | Ø12 | 54.7 | 49 | |

Tramo 2

| Geometría | |
|--------------------------------------|------------------------|
| Ámbito | 1.100 m |
| Espesor | 0.12 m |
| Huella | 0.300 m |
| Contrahuella | 0.180 m |
| Desnivel que salva | 1.44 m |
| Nº de escalones | 8 |
| Planta final | VIGA P.B. |
| Planta inicial | APOYO GRADA 2º TRAMO |
| Cargas | |
| Peso propio | 0.300 t/m2 |
| Peldañeado (Hormigonado con la losa) | 0.193 t/m2 |
| Solado | 0.050 t/m2 |
| Barandillas | 0.200 t/m |
| Sobrecarga de uso | 0.300 t/m2 |
| Materiales | |
| Hormigón | H-21, Control Normal |
| Acero | AH-500, Control Normal |
| Rec. geométrico | 3.0 cm |

| Elemento | Pos. | Diám. | No. | Pat. (cm) | Recta (cm) | Pat. (cm) | Long. (cm) | Total (cm) | AH-500CN (kg) | |
|--------------------|------|-------|-----|-----------|------------|-----------|------------|------------|---------------|-------|
| Escalera 1-Tramo 1 | 1 | Ø8 | 10 | | 466 | | 466 | 5592 | 22.1 | |
| | 2 | Ø12 | 10 | | 388 | | 388 | 4656 | 41.3 | |
| | 3 | Ø12 | 10 | | 141 | | 141 | 1692 | 15.0 | |
| | 4 | Ø8 | 36 | | 103 | | 103 | 3708 | 14.6 | |
| Total+10%: | | | | | | | | | 102.3 | |
| Escalera 3-Tramo 2 | 5 | Ø10 | 10 | | 196 | | 196 | 2352 | 11.3 | |
| | 6 | Ø10 | 10 | | 348 | | 348 | 4176 | 21.5 | |
| | 7 | Ø12 | 10 | | 456 | | 456 | 5472 | 48.6 | |
| | 8 | Ø8 | 32 | | 103 | | 103 | 3296 | 13.0 | |
| Total+10%: | | | | | | | | | 103.8 | |
| | | | | | | | | | Ø8: | 53.6 |
| | | | | | | | | | Ø10: | 36.1 |
| | | | | | | | | | Ø12: | 115.3 |
| | | | | | | | | | Total: | 205.0 |



UNIVERSIDAD AUTÓNOMA JUAN MISAEL SARACHO



PROYECTO:
DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO"

UBICACIÓN

Departamento: Tarija
Provincia: Cercado

Municipio: Tarija
Comunidad: Turumayo

CARÁCTER :

ARMADURA DE GRADA_TRAMO 3

ESCALA: 1:30

APROBADO

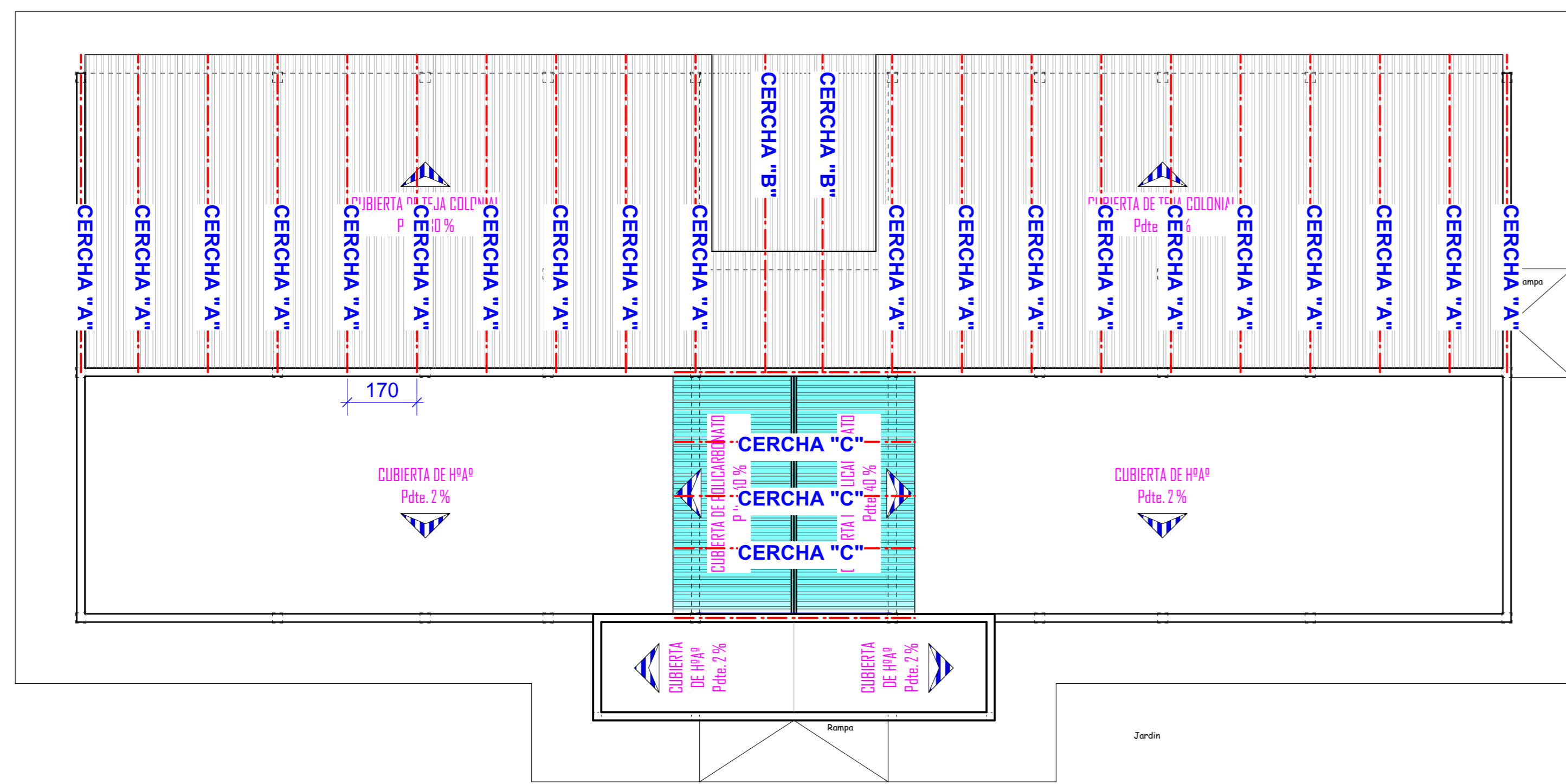
Universitario :

ARMELLA CHAVARRIA FREDDY

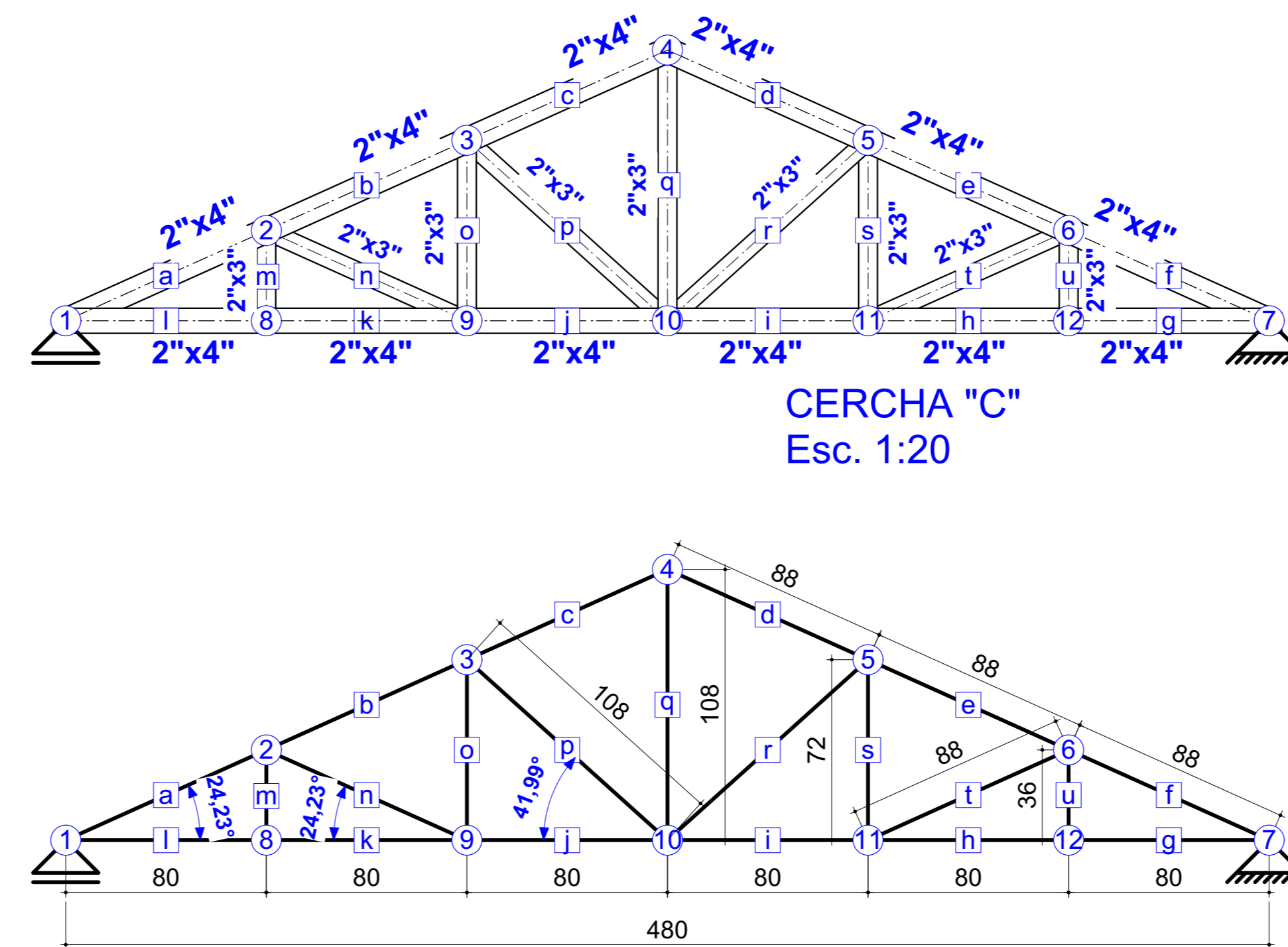
Lámina:

9/10

FECHA : JULIO del 2021

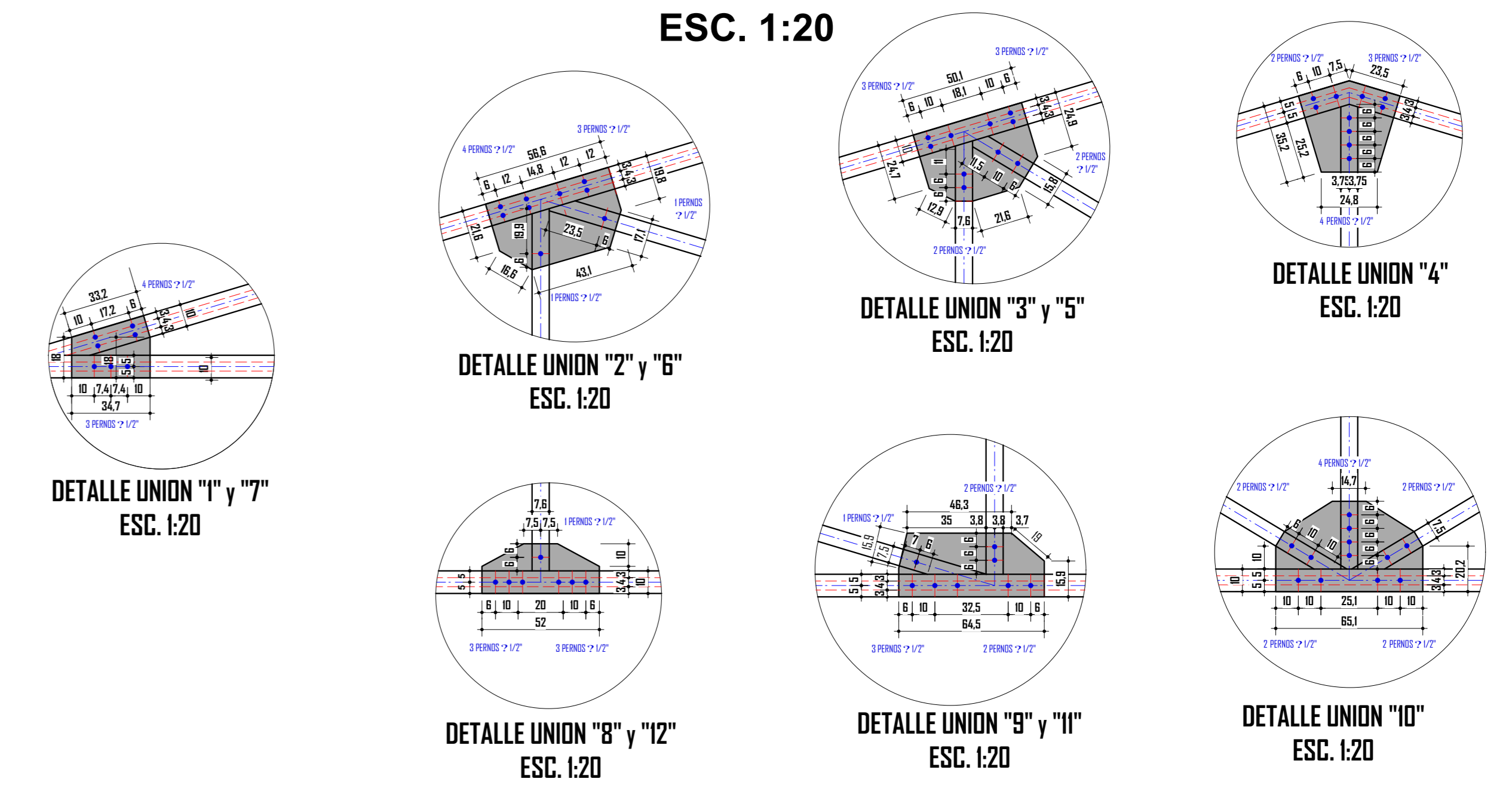


PLANO DE UBICACION DE LAS CERCHAS
ESCALA 1 : 100



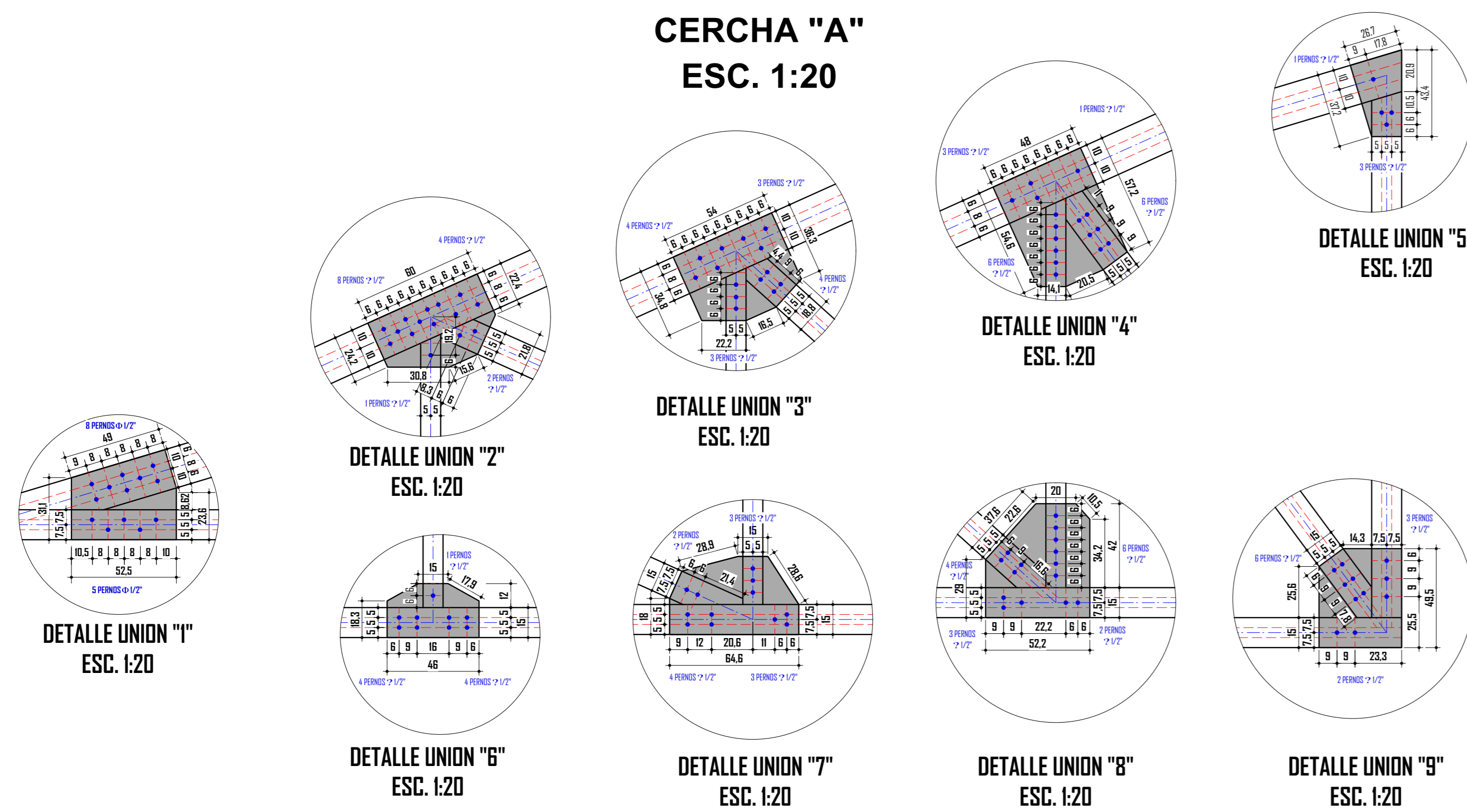
NOTA: UNIDADES EN CENTIMETROS
CERCHA "C"
Esc. 1:20

DETALLE DE UNIONES
CERCHA "C"
ESC. 1:20



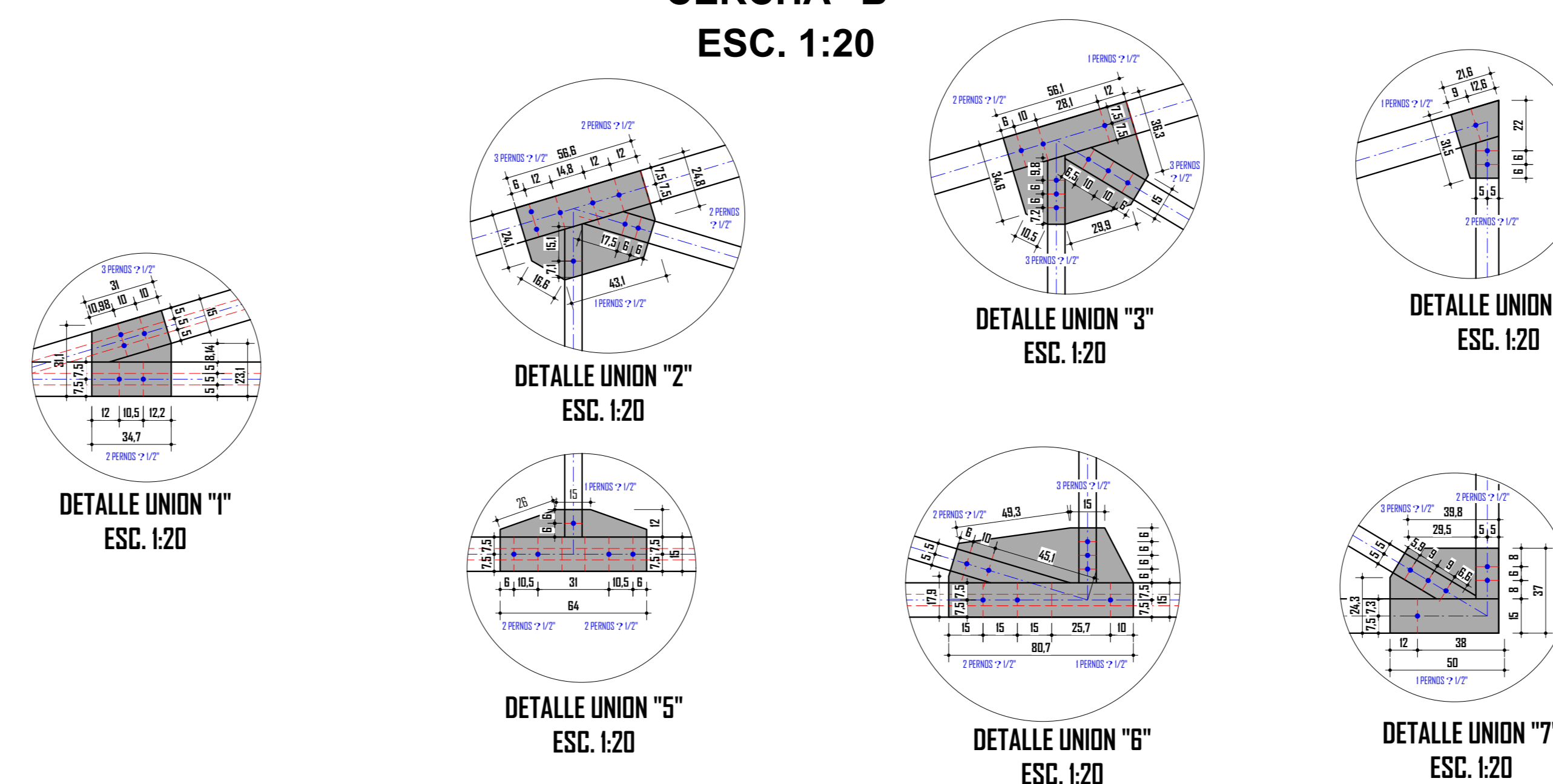
NOTA: UNIDADES EN CENTIMETROS

DETALLE DE UNIONES
CERCHA "A"
ESC. 1:20

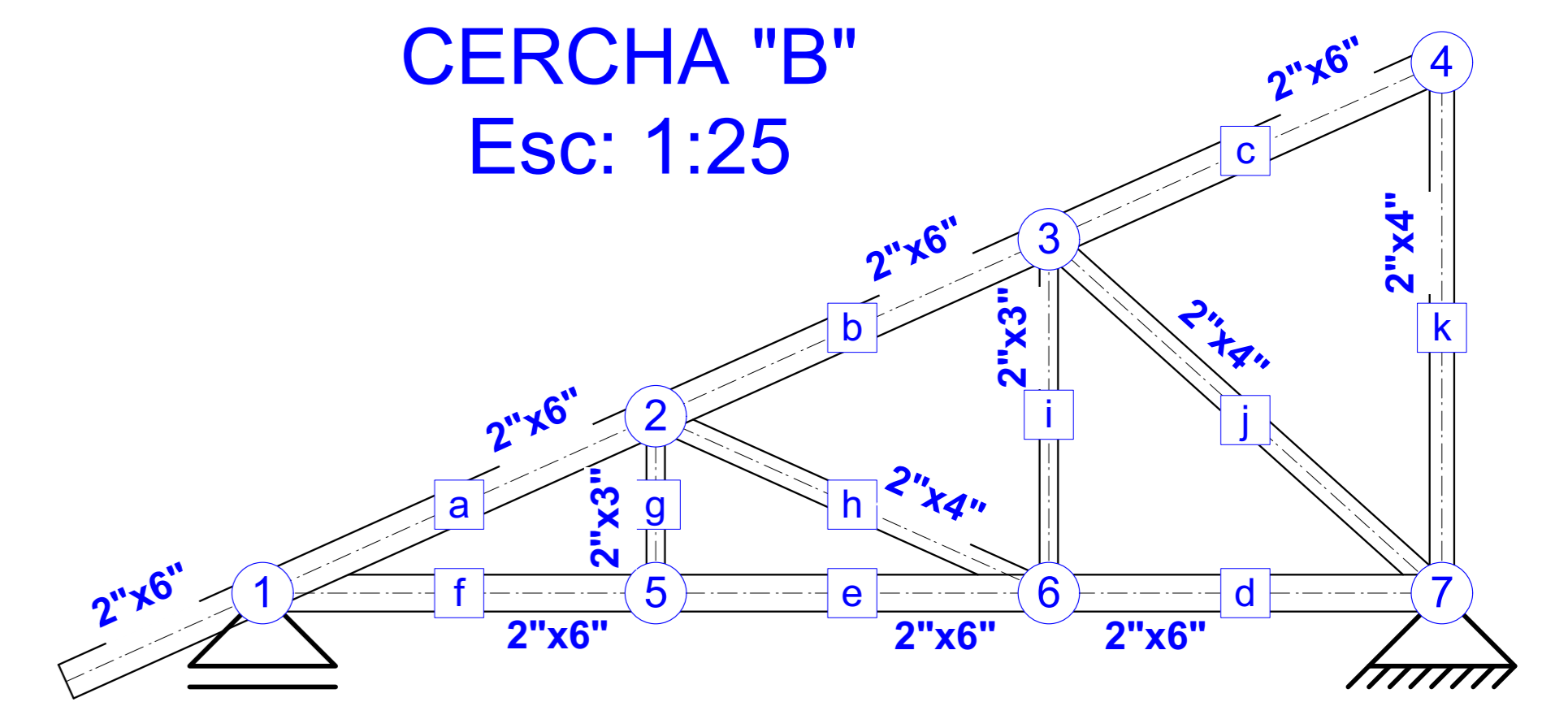


NOTA: UNIDADES EN CENTIMETROS

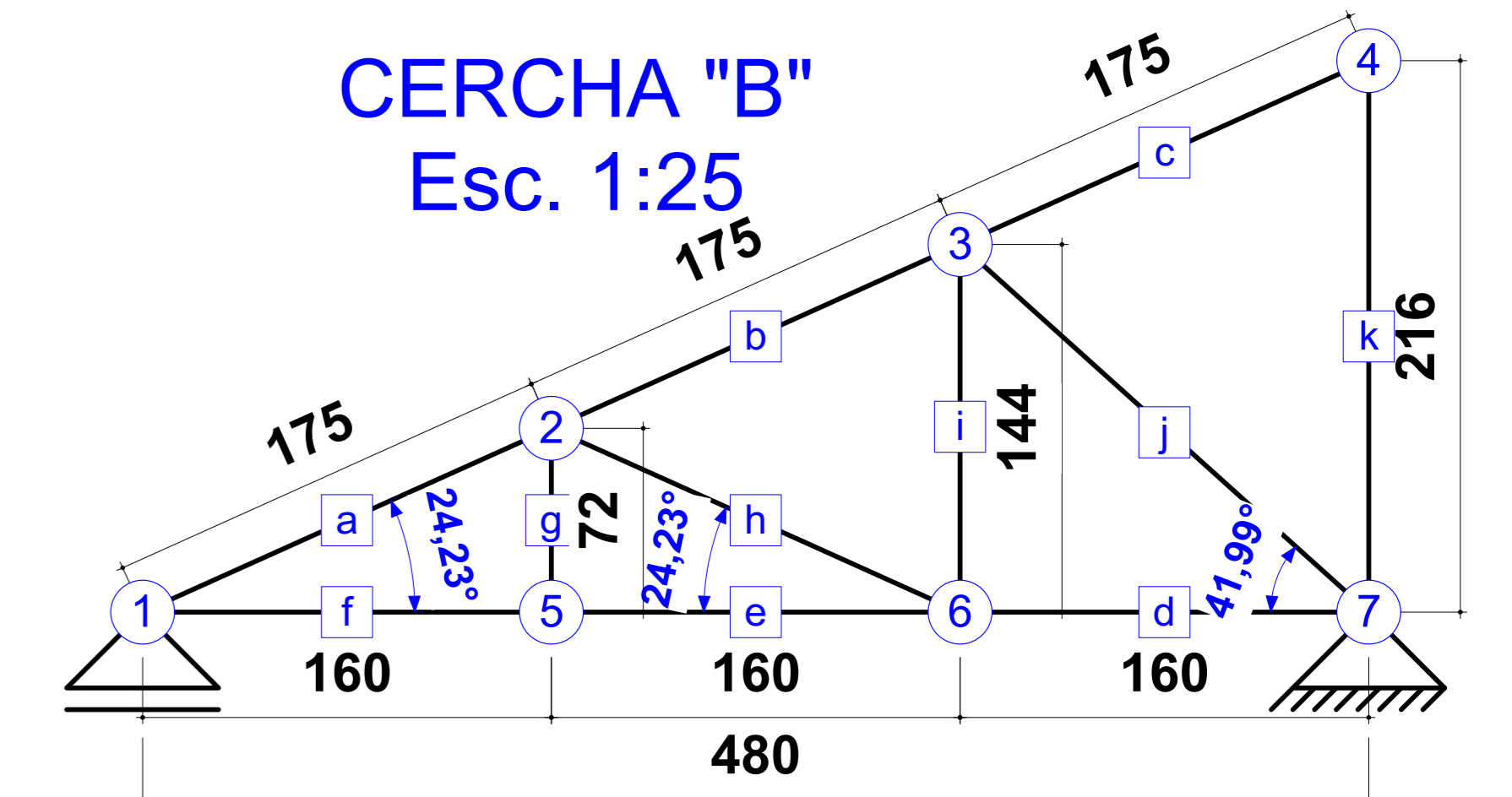
DETALLE DE UNIONES
CERCHA "B"
ESC. 1:20



NOTA: UNIDADES EN CENTIMETROS

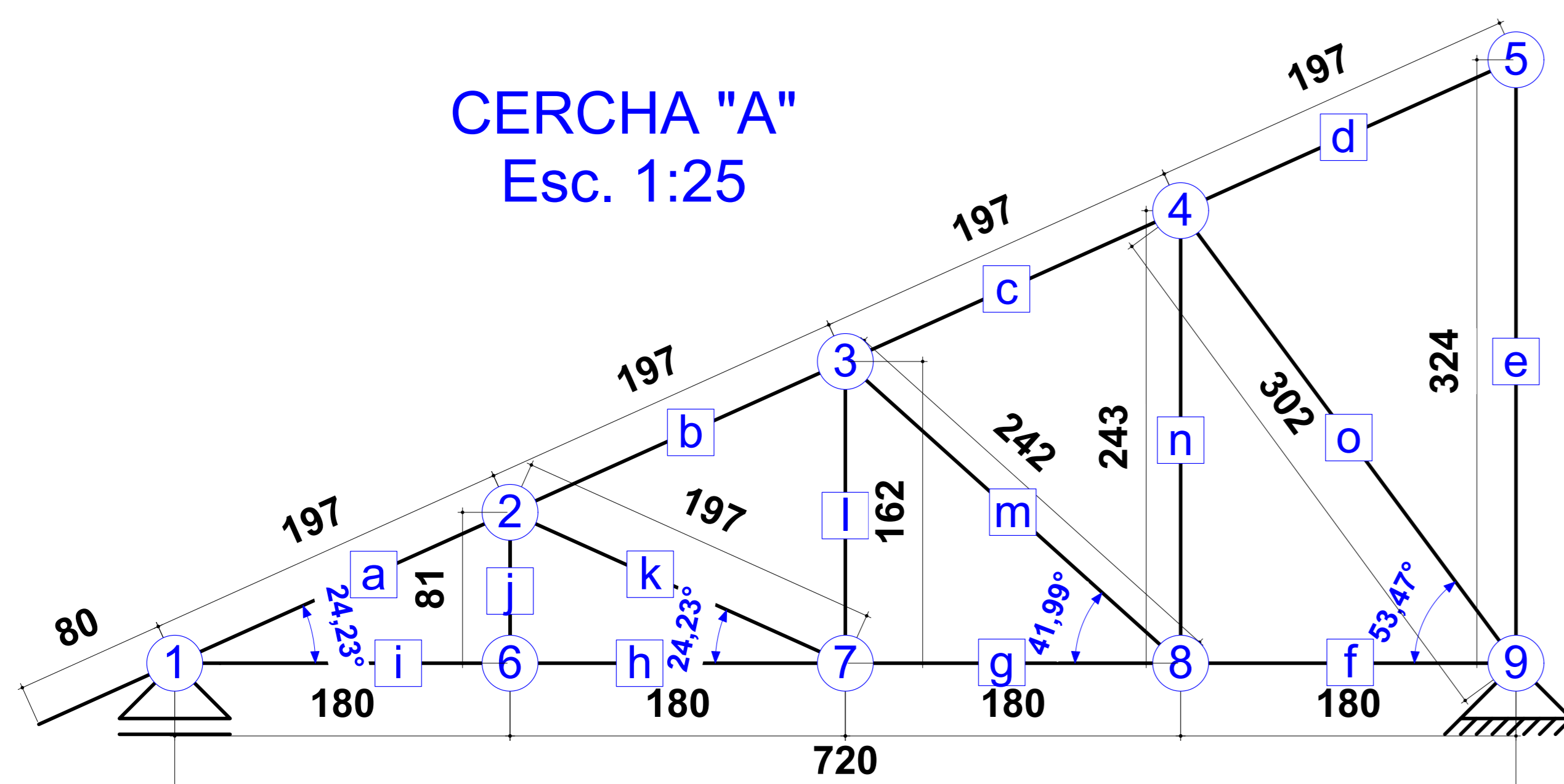


CERCHA "B"
Esc: 1:25



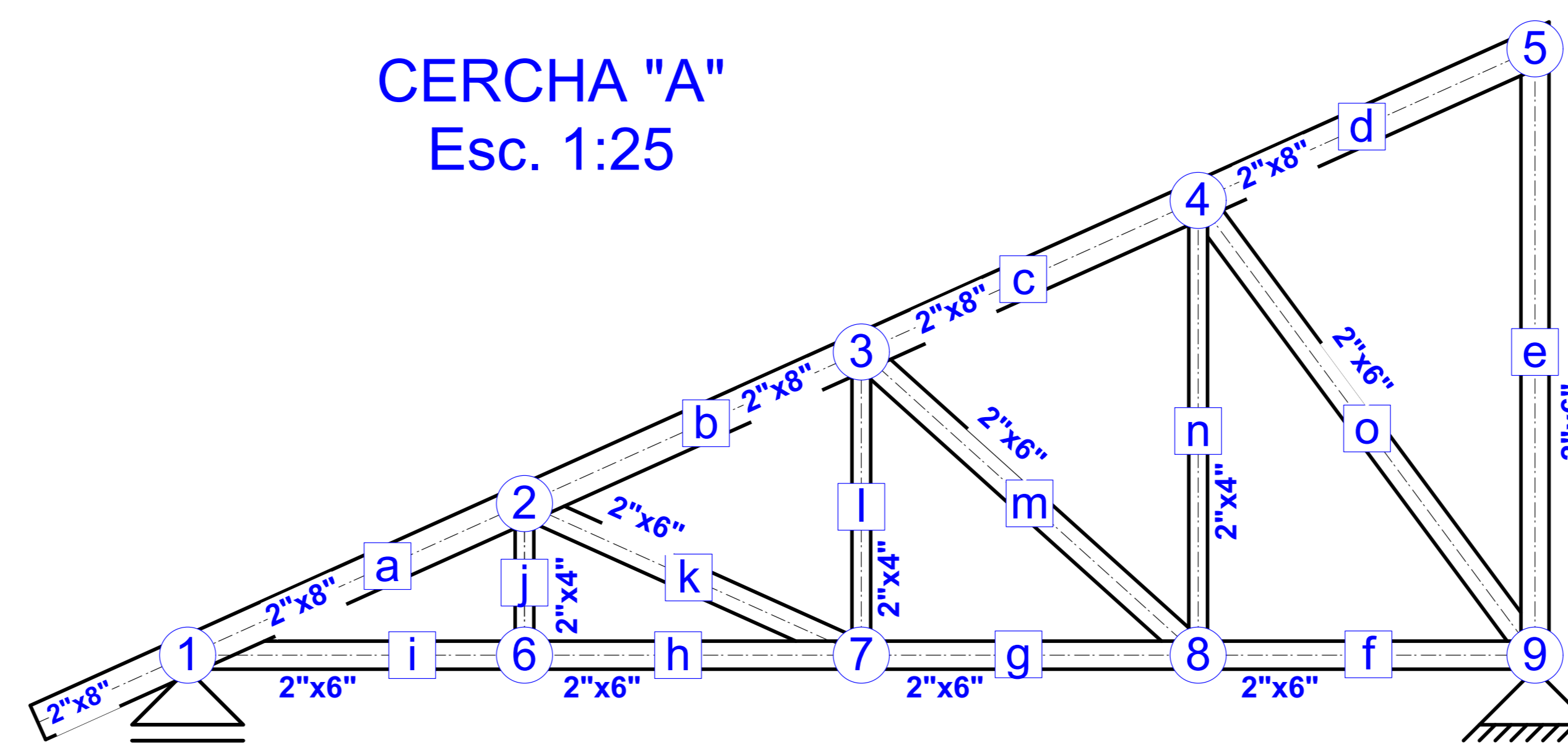
NOTA: UNIDADES EN CENTIMETROS

CERCHA "A"
Esc. 1:25



NOTA: UNIDADES EN CENTIMETROS

CERCHA "A"
Esc. 1:25



NOTA: UNIDADES EN CENTIMETROS

| | | | |
|---|--|--|--|
|  <p>UNIVERSIDAD AUTÓNOMA JUAN MISAEL SARACHO</p> | | PROYECTO: DISEÑO ESTRUCTURAL CENTRO DE SALUD "TURUMAYO" | |
| | | UBICACIÓN: Departamento: Tarja Municipio: Tarja Provincia: Cercado Comunidad: Turumayo | |
| CARÁCTER: CERCHAS Y DETALLE DE UNIONES | | ESCALA: INDICADA APROBADO | |
| Universitario: ARMELLA CHAVARRIA FREDDY | | Lámina: 10/10 FECHA: JULIO del 2021 | |