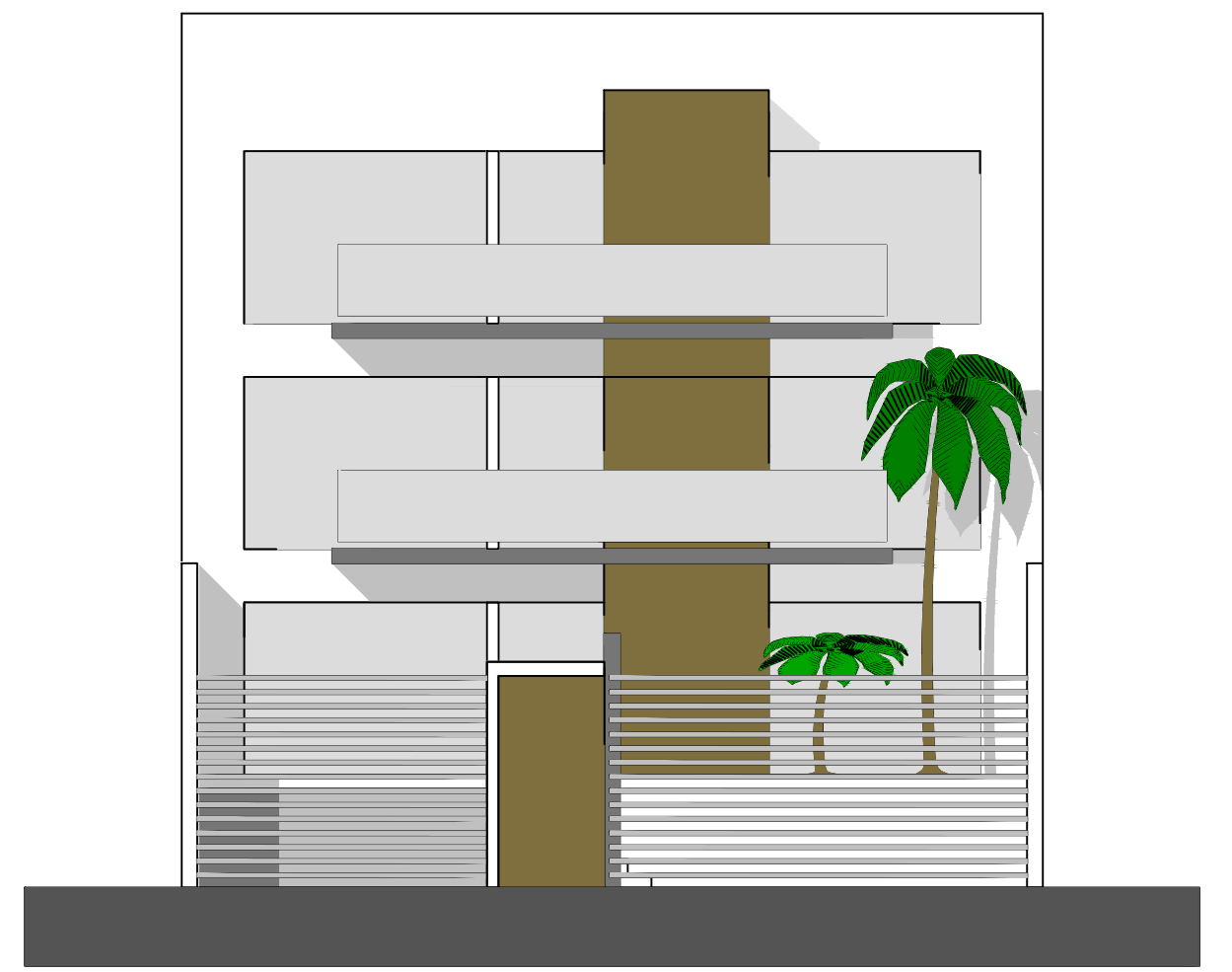
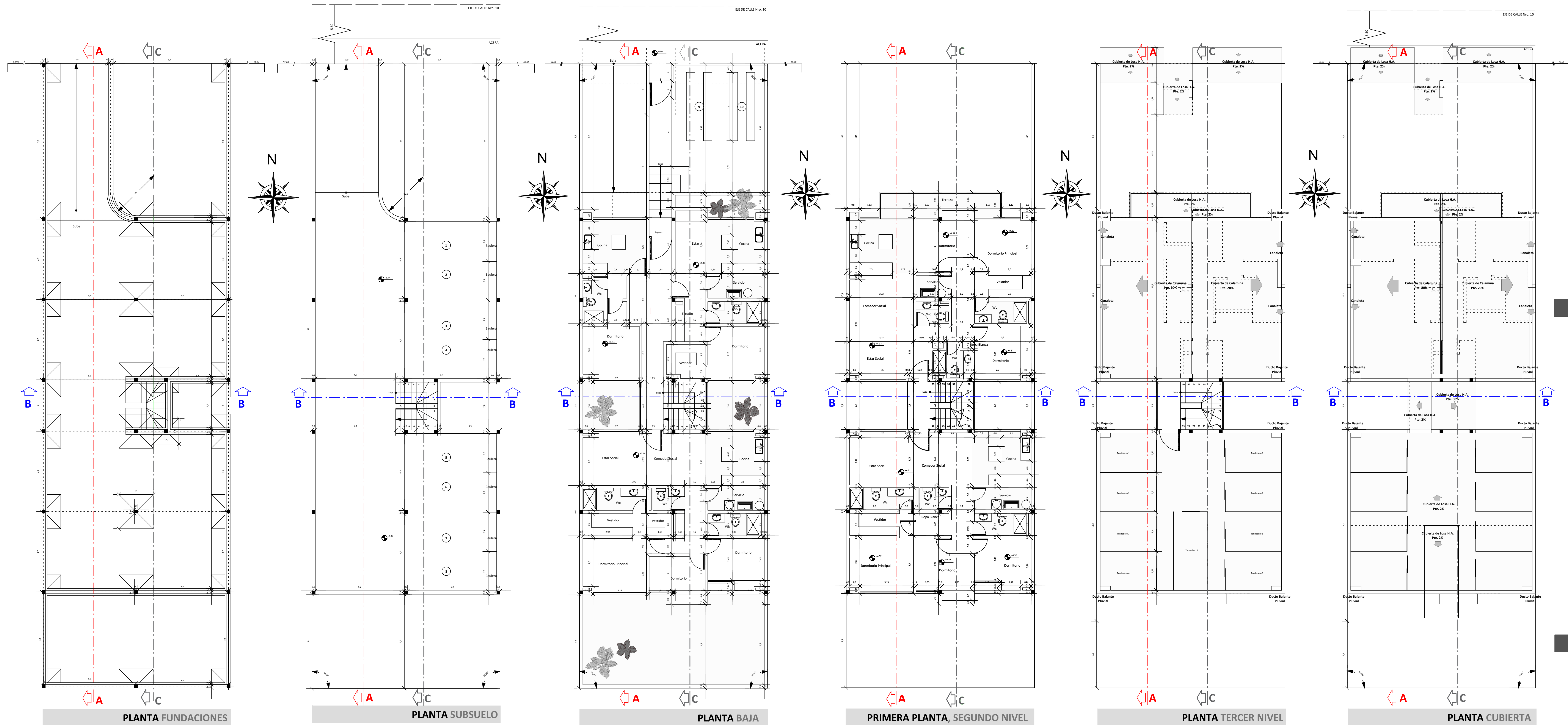
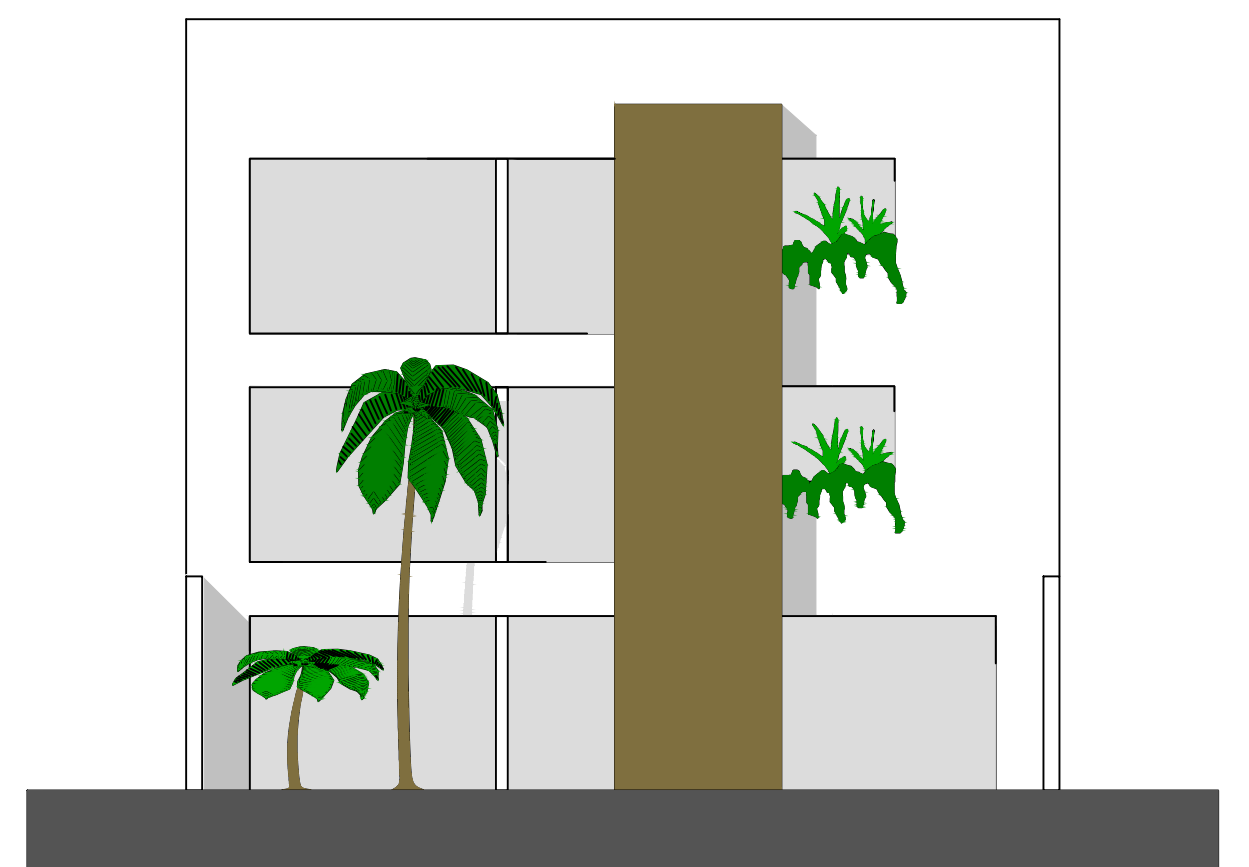
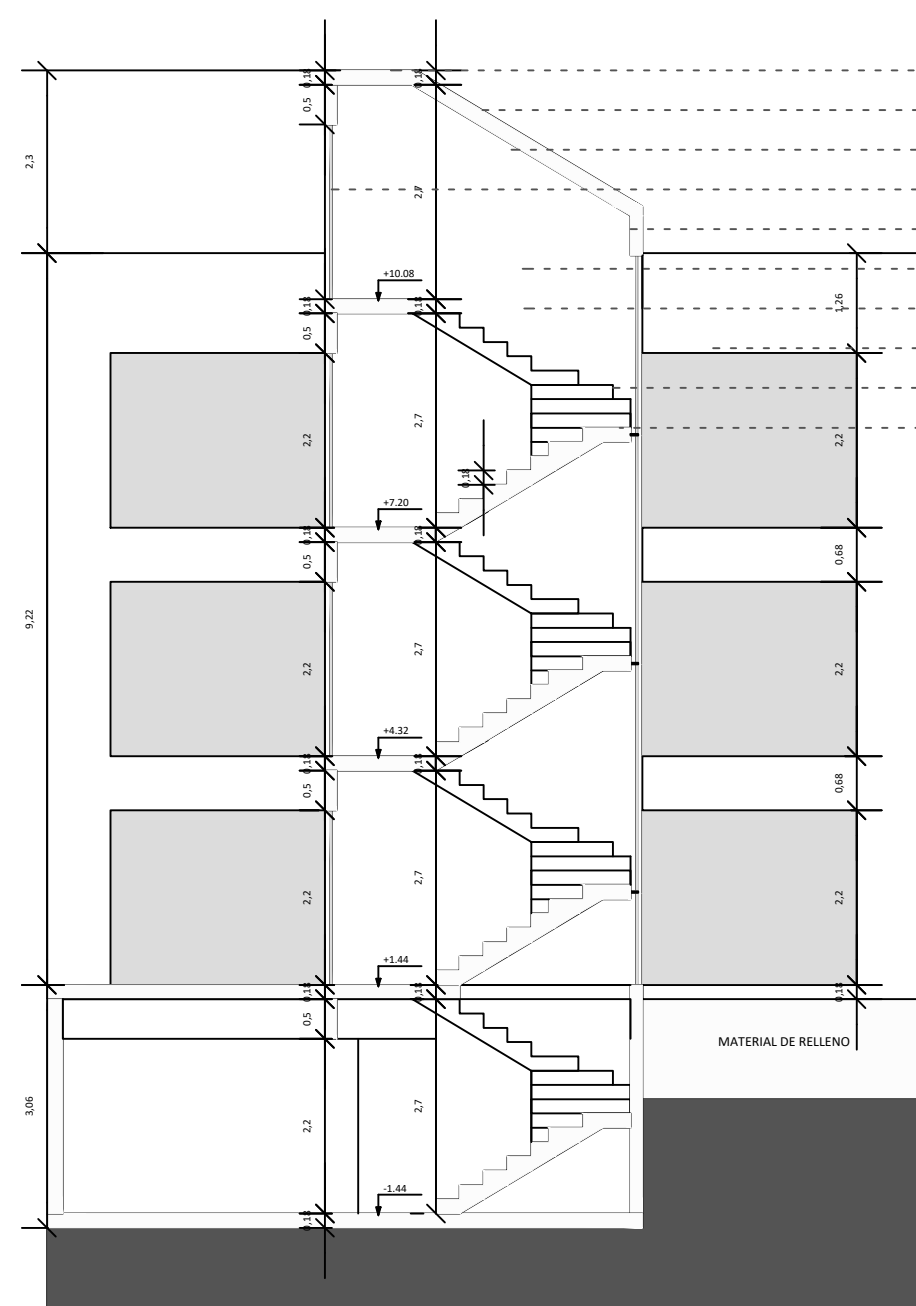




ELEVACION FRONTAL



ELEVACION POSTERIOR

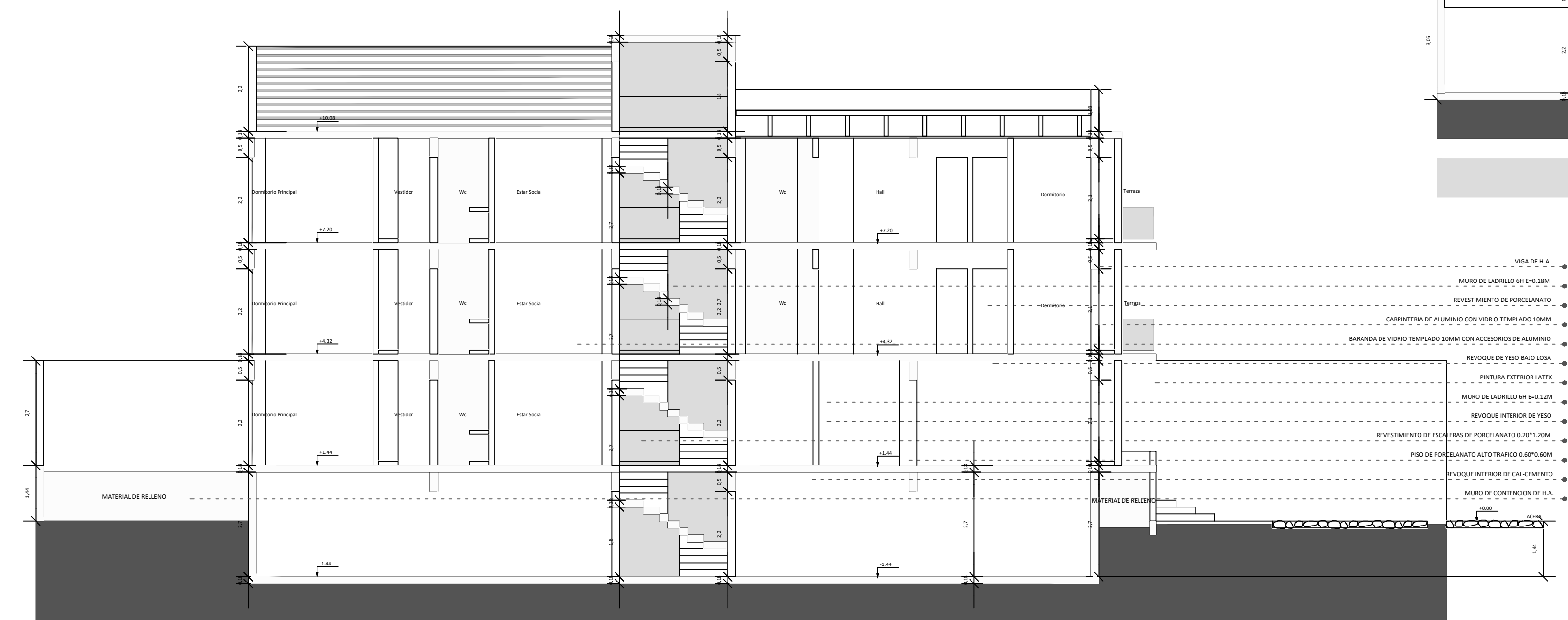


CORTE B

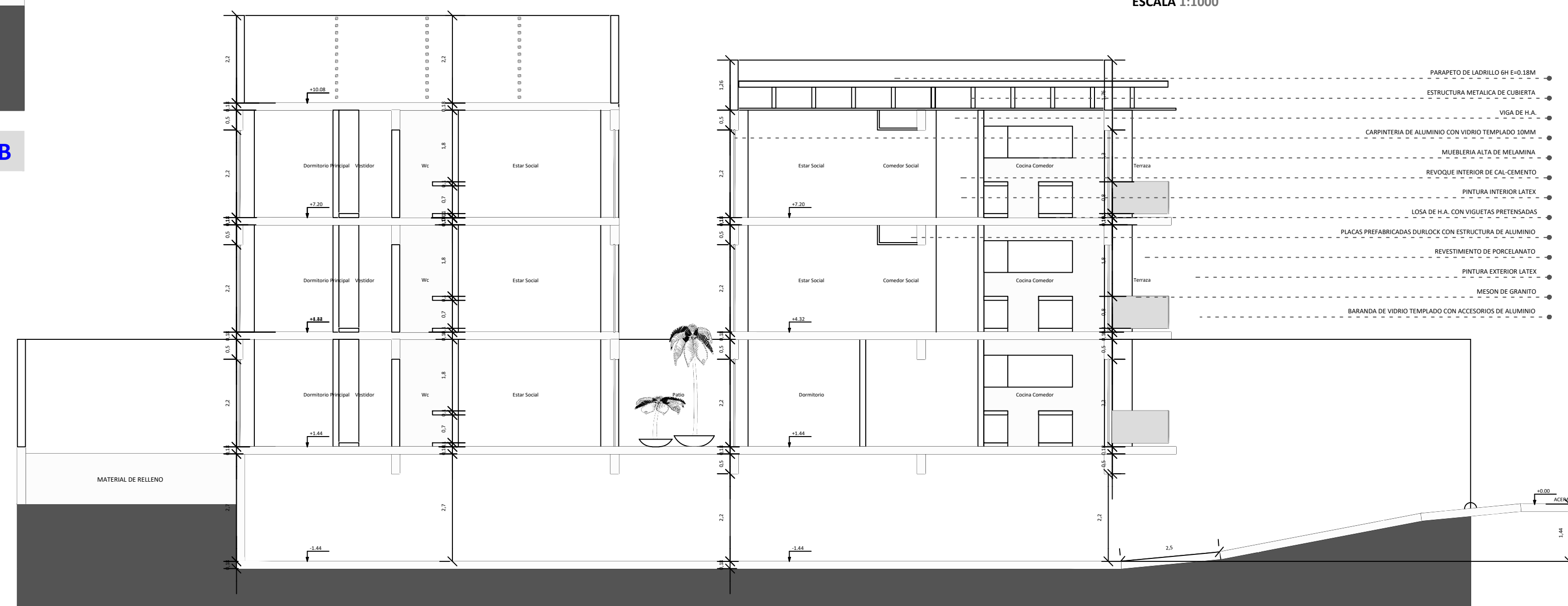


UBICACION EN EL MANZANO

ESCALA 1:1000



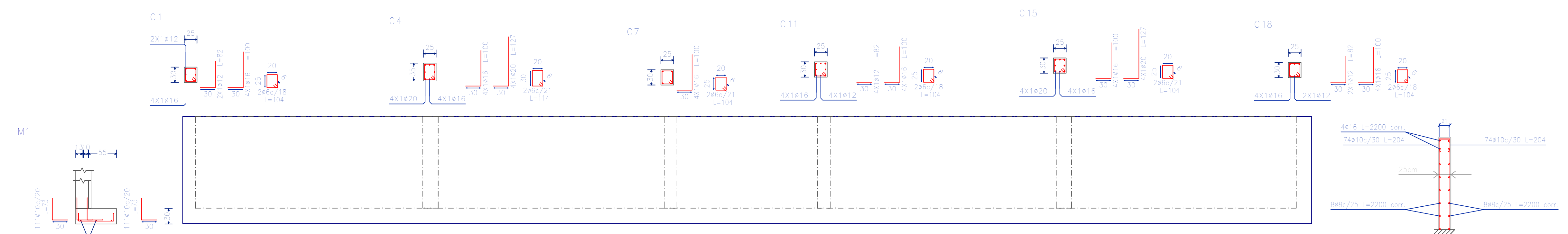
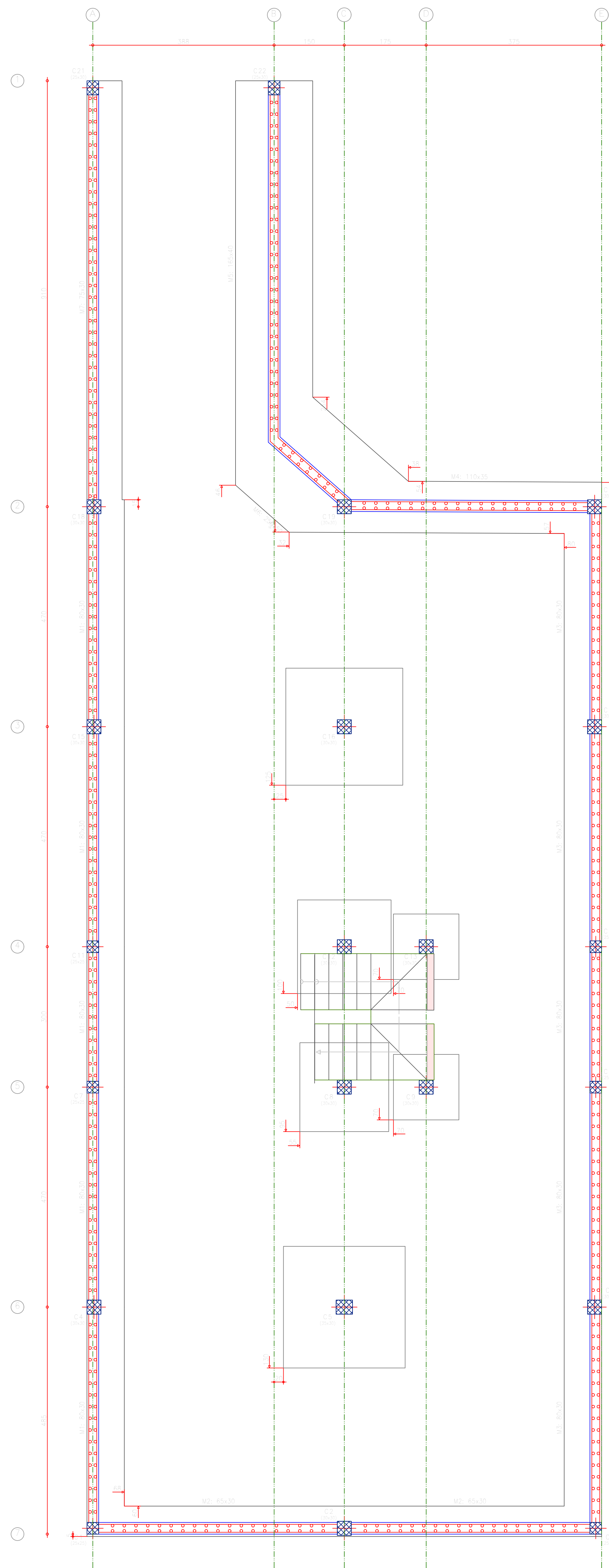
CORTE C



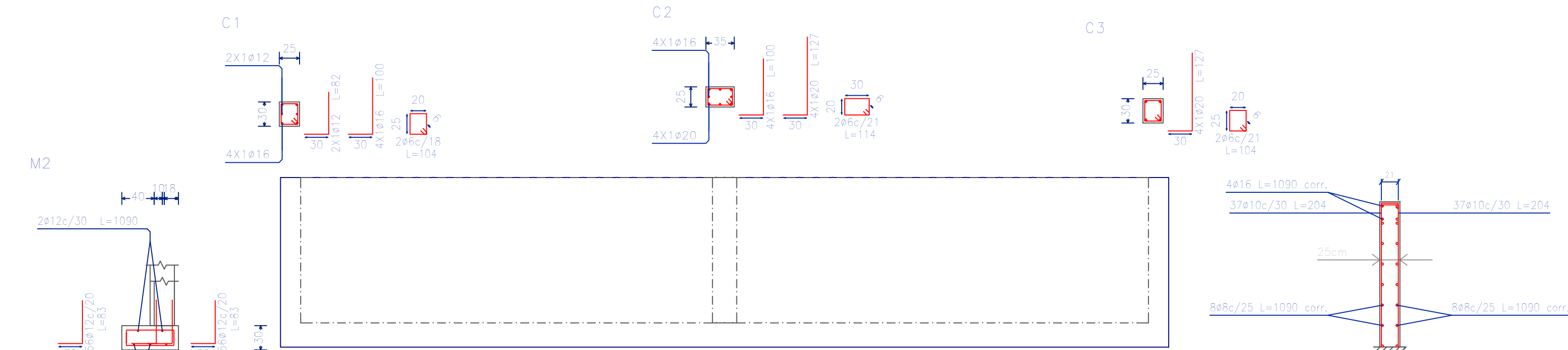
CORTE A

DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR

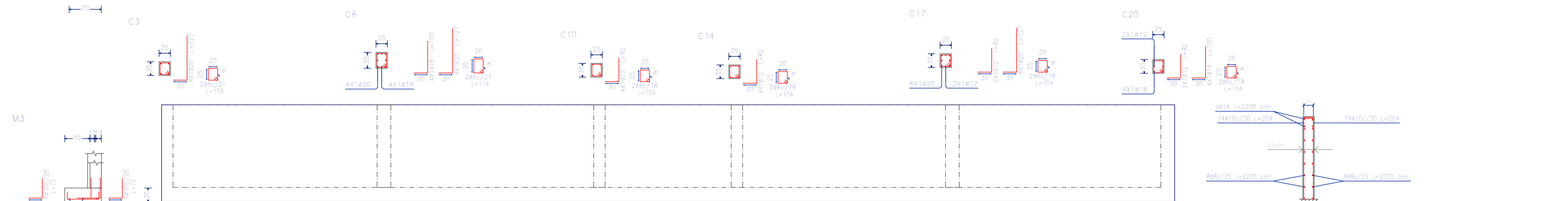
Fundación Replanteo Esc. 1:50



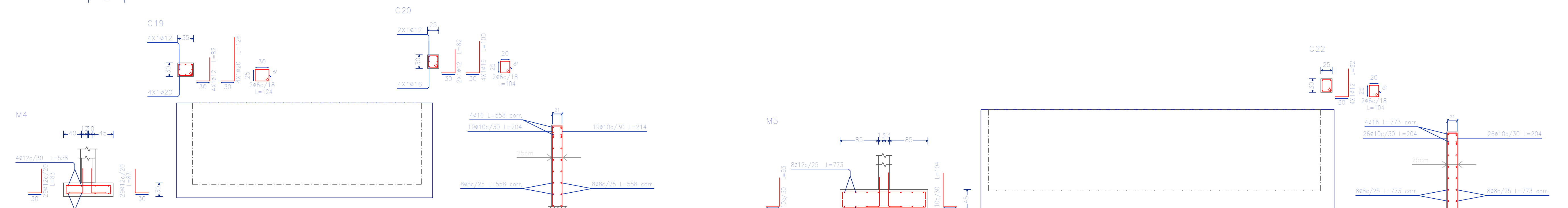
M1 Sub Suelo Esc. 1:50



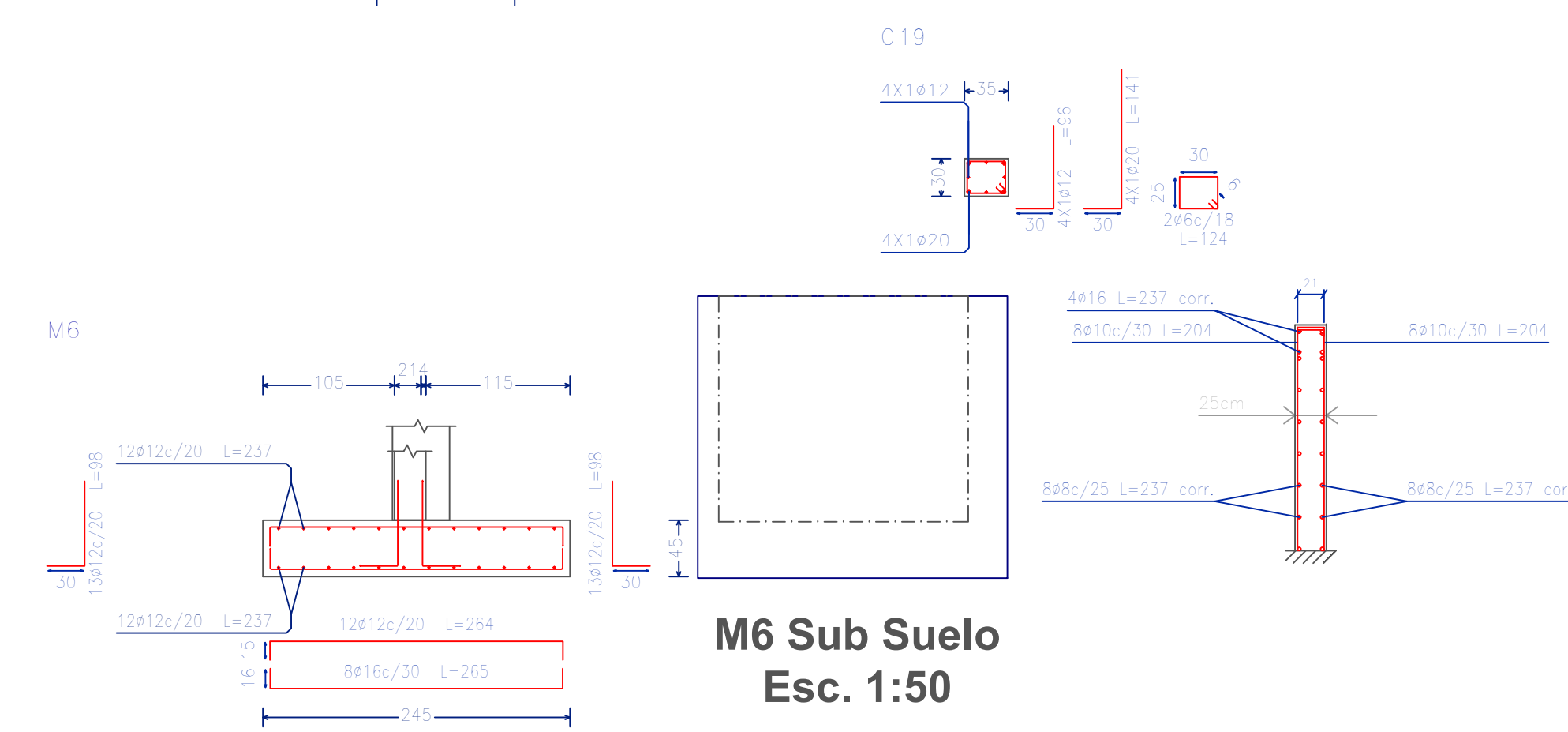
M2 Sub Suelo Esc. 1:50



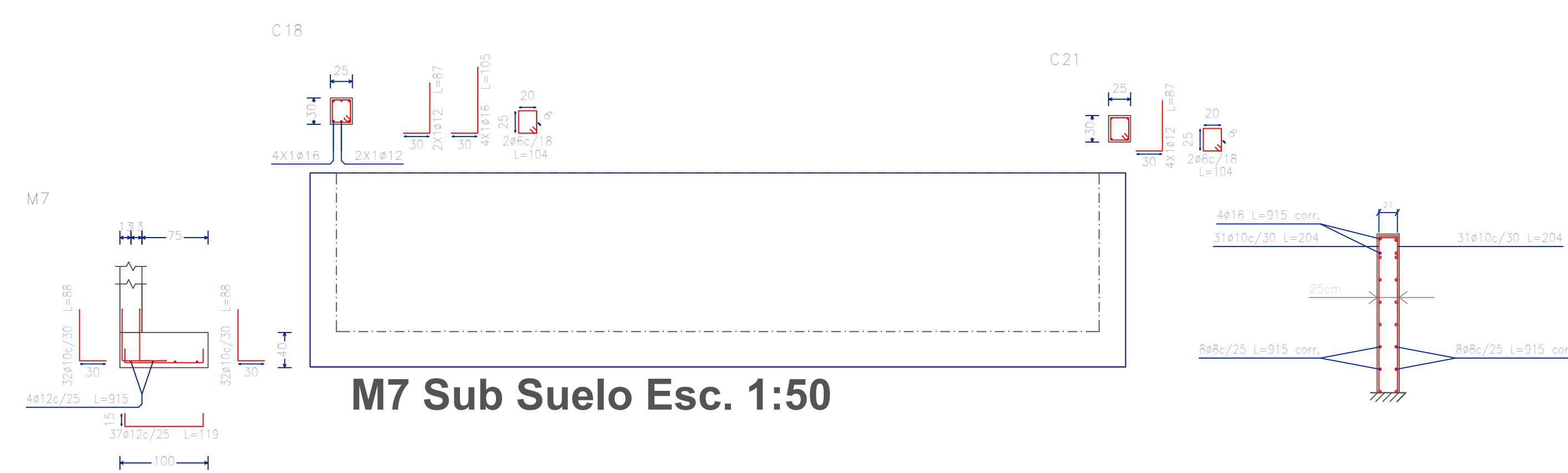
M3 Sub Suelo Esc. 1:50



M5 Sub Suelo Esc. 1:50



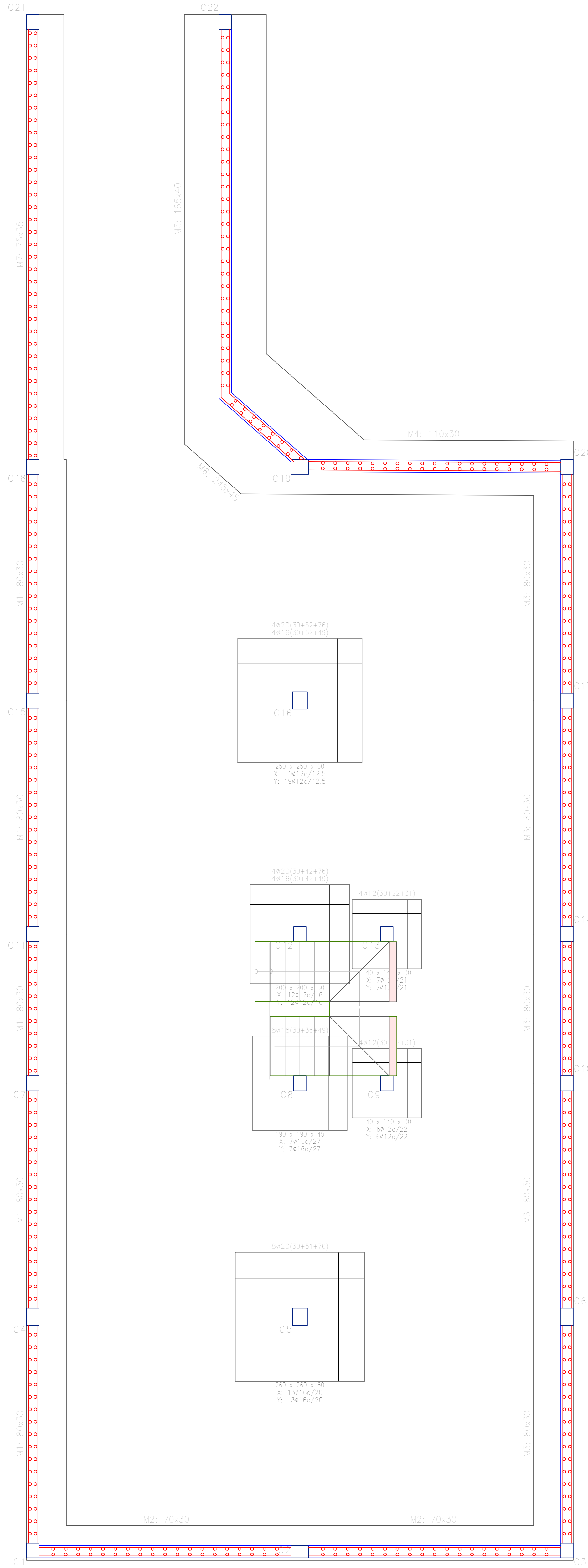
M6 Sub Suelo
Esc. 1:50



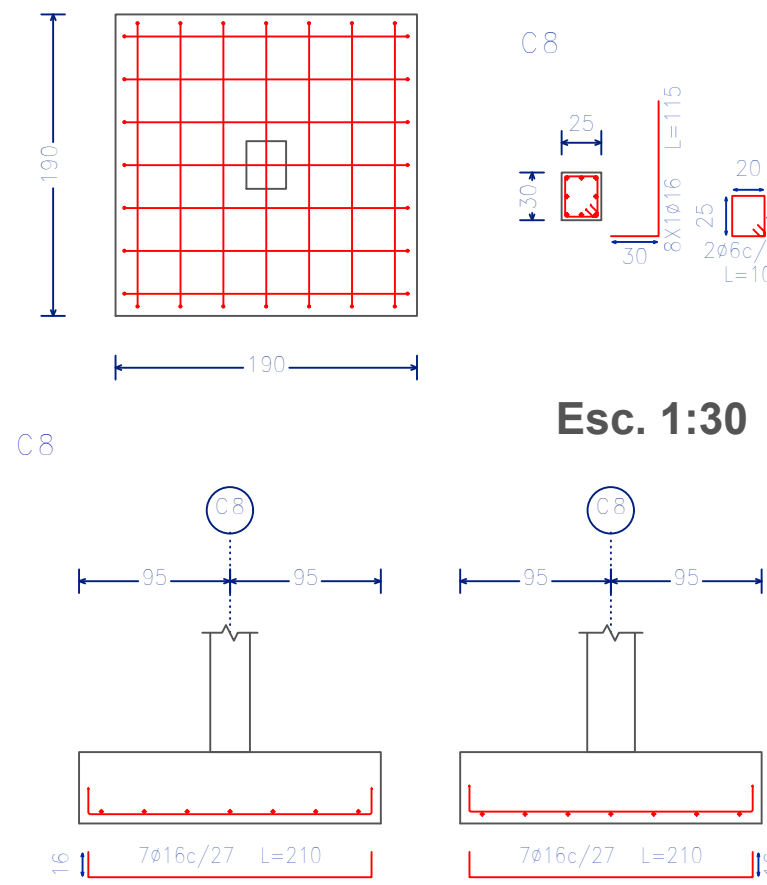
M7 Sub Suelo Esc. 1:50

Resumen Acero Muros de hormigón armado	Long. total (m)	Peso+10% (kg)	Total
AH-500CN	356,4	87	
Ø6	1354,5	568	
Ø10	1554,1	1054	
Ø12	397,1	368	2113

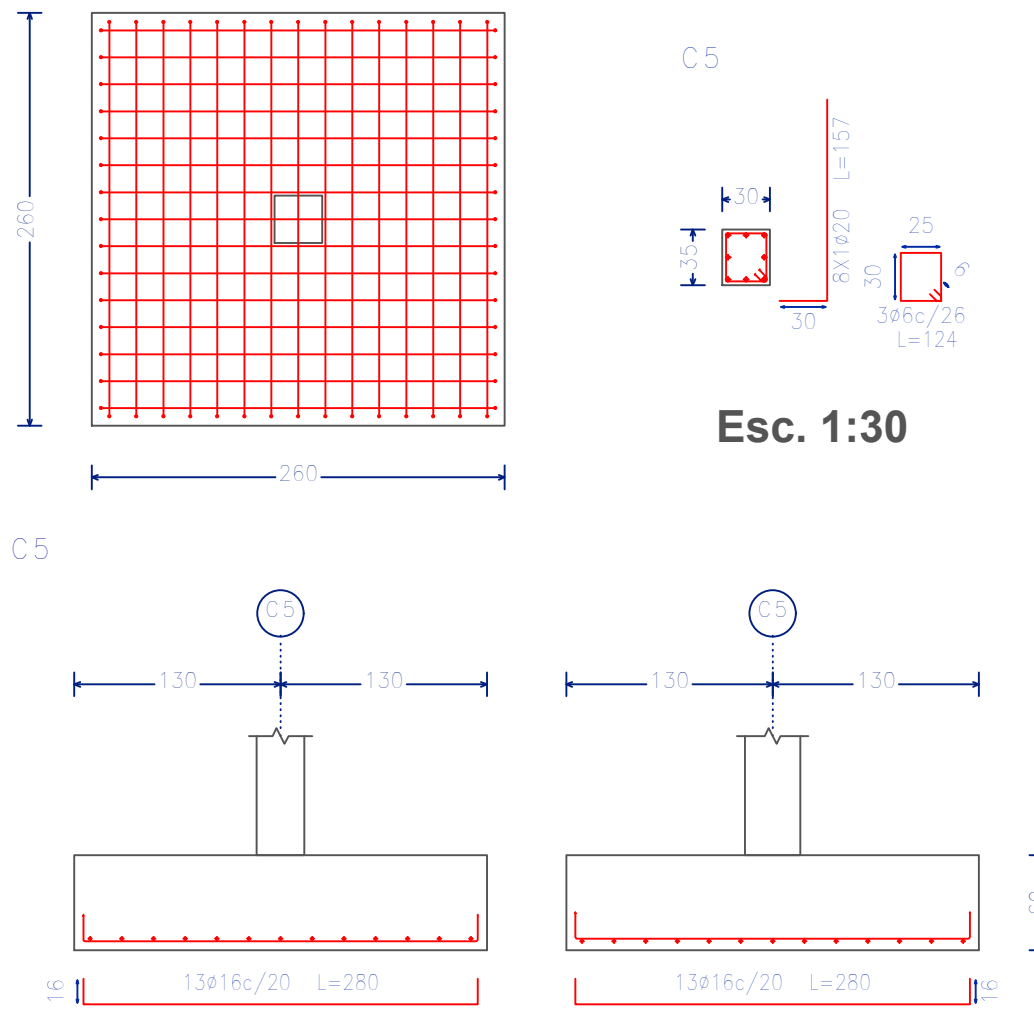
DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR



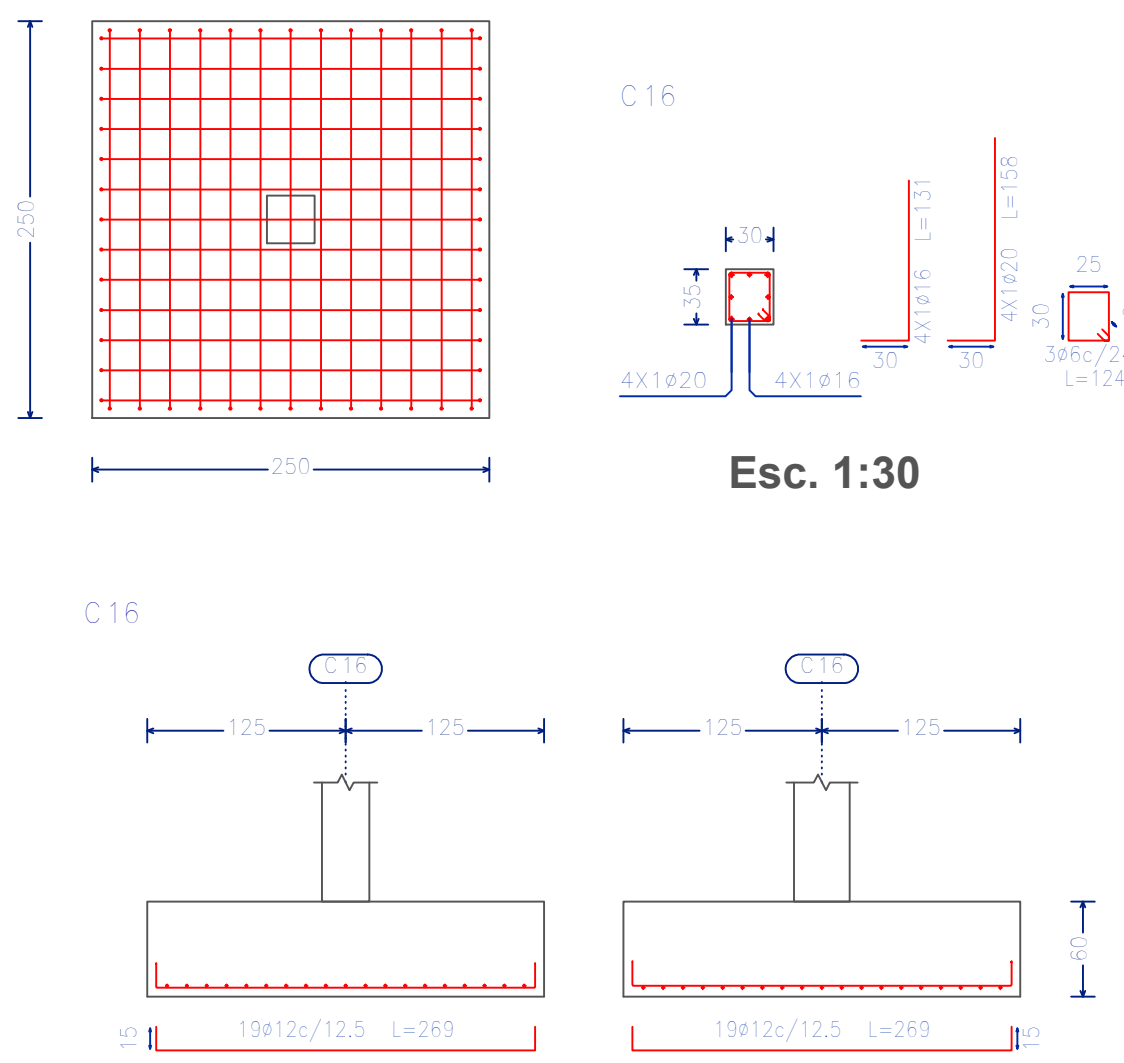
Resumen Acero Fundación		Long. total (m)	Peso+10% (kg)	Total
AH-400C N	Ø6	75.0	18	
	Ø8	223.6	97	
	Ø10	608.7	413	
	Ø12	797.6	779	
	Ø16	808.6	1404	
	Ø20	56.9	154	
	Ø25	140.3	595	3460



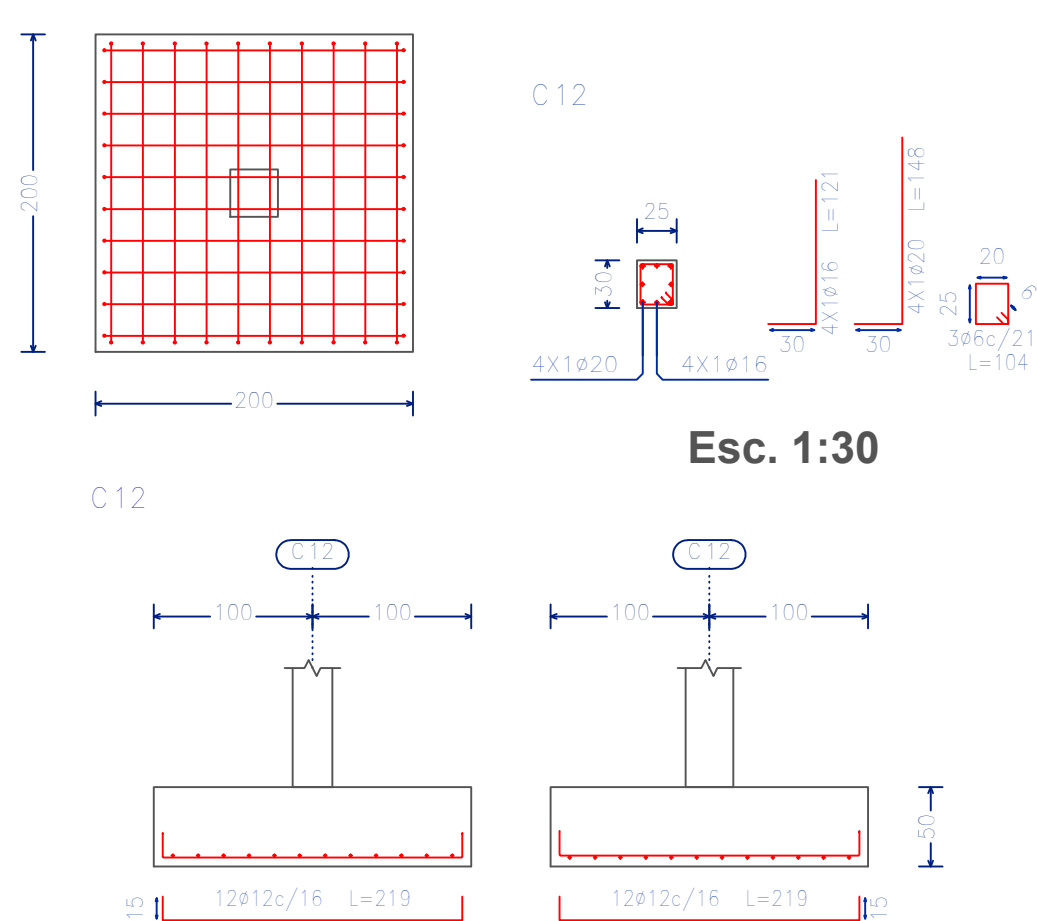
Zapata C8 Esc. 1:50



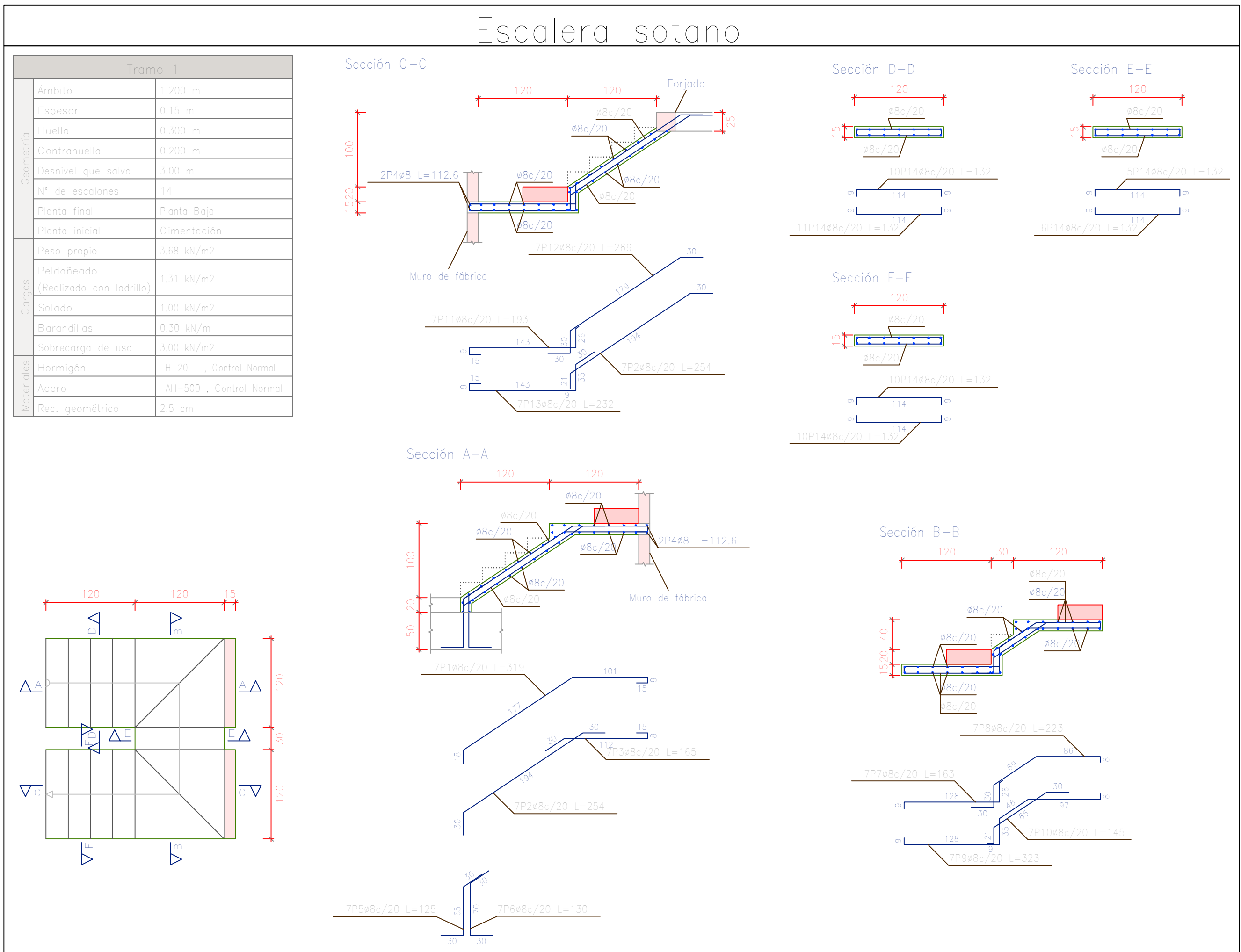
Zapata C5 Esc. 1:50



Zapata C16 Esc. 1:50

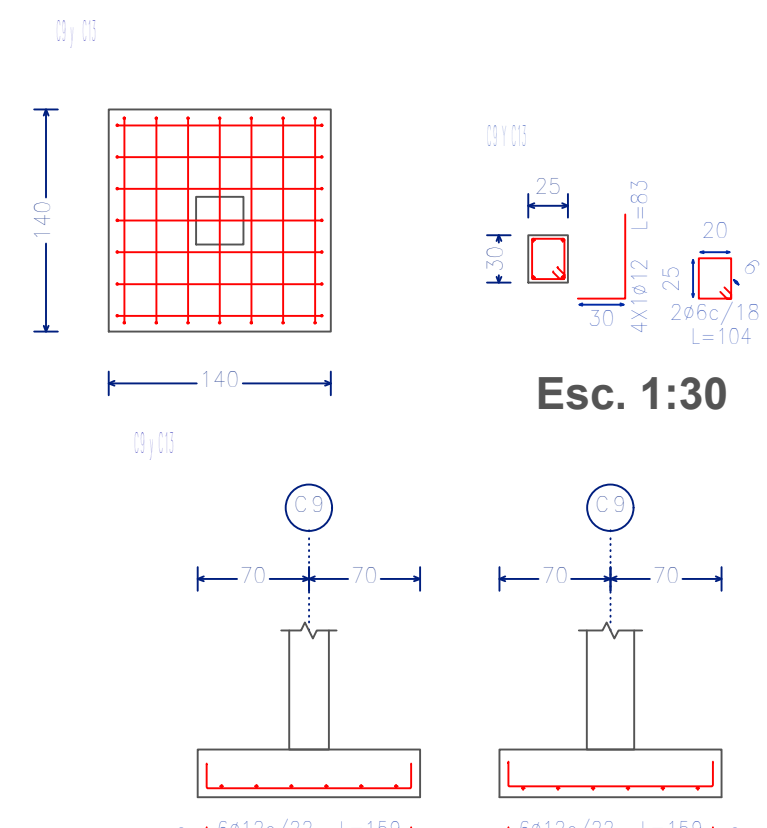


Zapata C12 Esc. 1:50



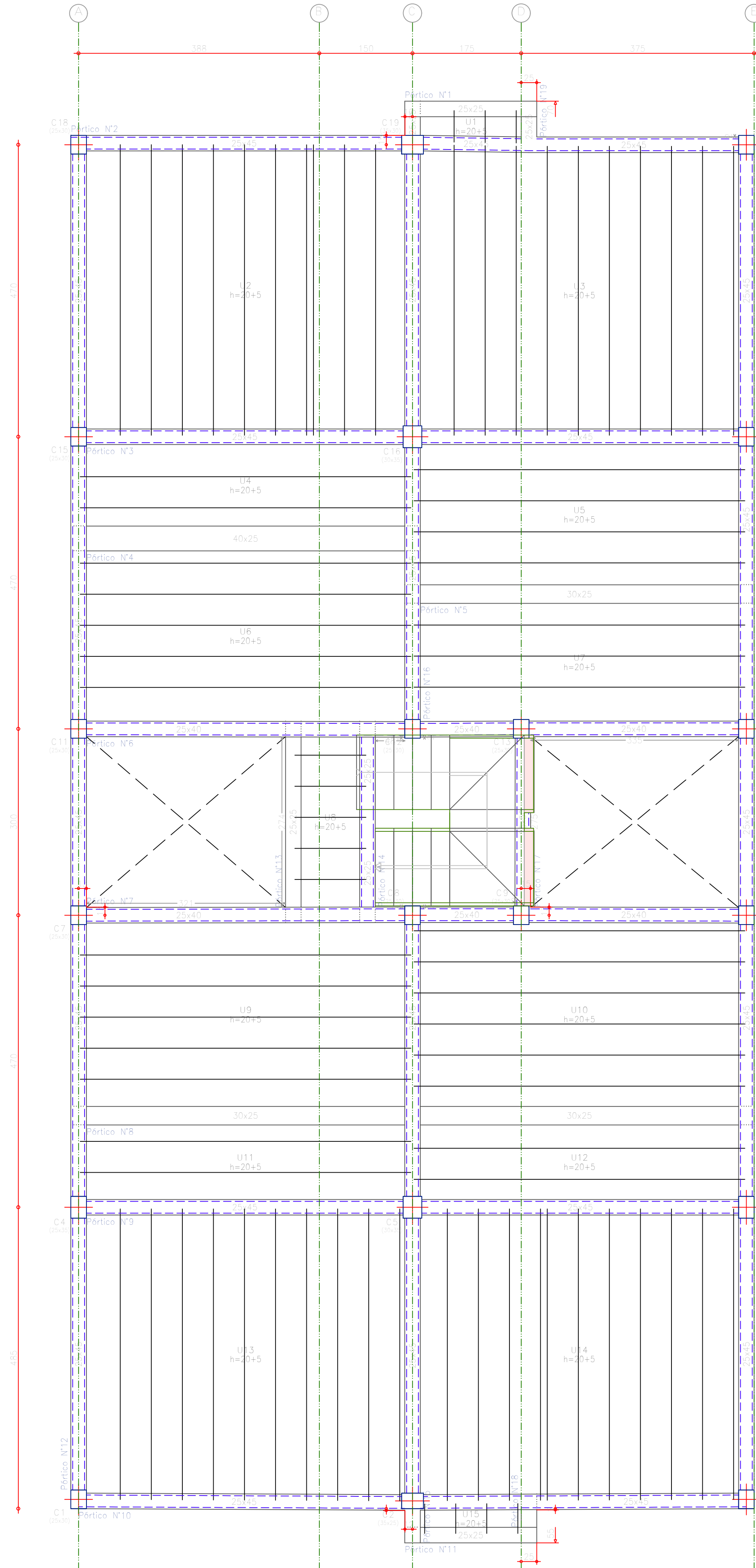
Escalera Sótano Esc. 1:50

CUADRO DE ELEMENTOS DE CIMENTACIÓN				
Referencias	Dimensiones (cm)	Canto (cm)	Armado inf. X	Armado inf. Y
C5	260x260	60	13ø16c/20	13ø16c/20
C8	190x190	45	7ø16c/27	7ø16c/27
C9	140x140	30	6ø12c/22	6ø12c/22
C12	200x200	50	12ø12c/16	12ø12c/16
C13	140x140	30	7ø12c/21	7ø12c/21
C16	250x250	60	19ø12c/12.5	19ø12c/12.5



Zapata C9 y C13 Esc. 1:50

DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR



Replanteo Planta Baja Esc. 1:50

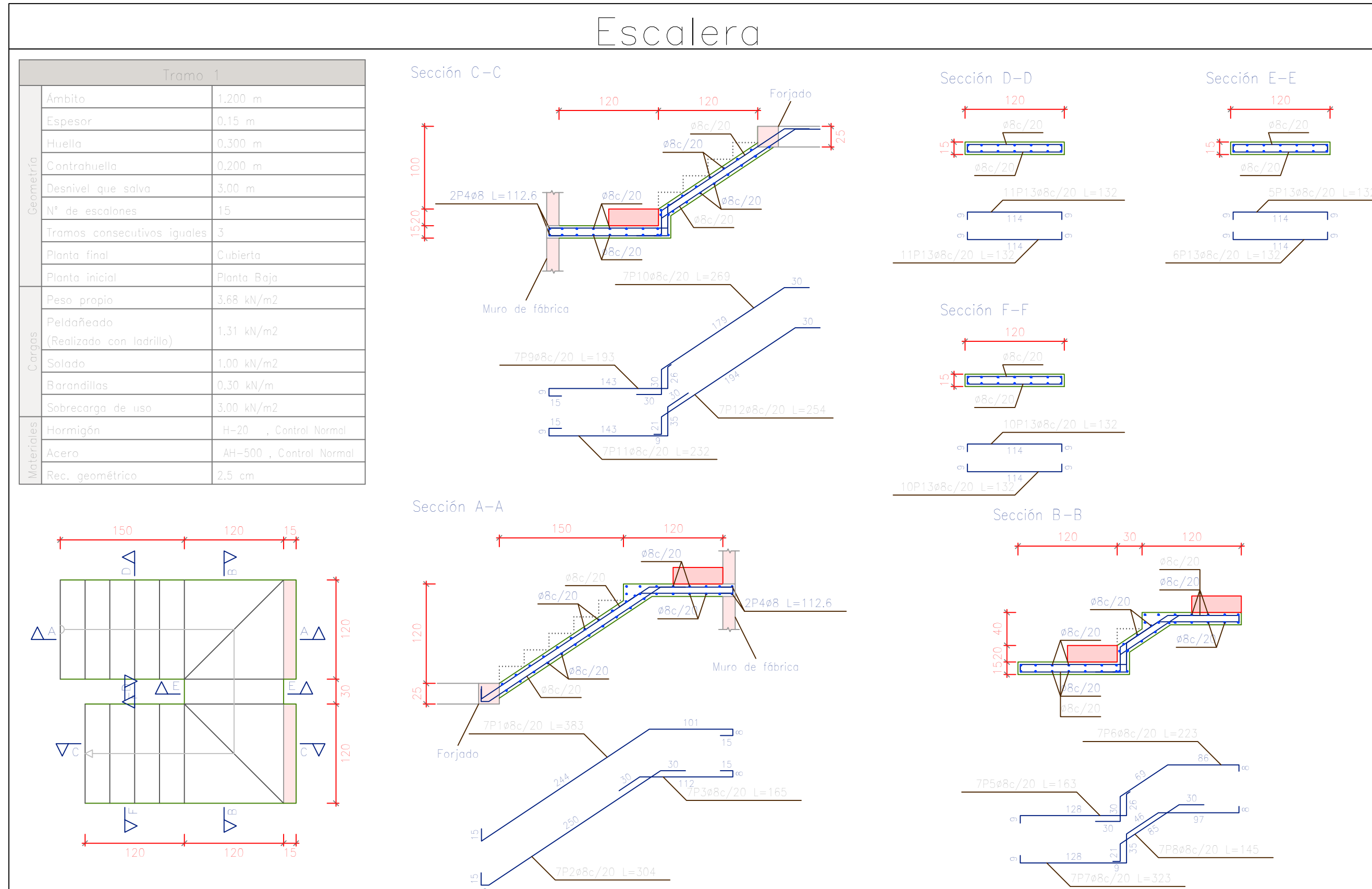
Elemento	Pos.	Pos.	Pos.	Pos.	Pos.	Pos.	Pos.
	1	2	3	4	5	6	7
Elemento 1	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 2	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 3	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 4	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 5	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 6	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 7	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 8	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 9	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 10	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 11	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 12	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 13	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 14	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 15	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 16	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 17	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 18	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 19	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
Elemento 20	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7
	1	2	3	4	5	6	7

Elemento	Pos.	Diám. (m)	Long. (m)	Ang. (grados)	Dist. (m)	Alt. (m)
Punto A-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto B-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto C-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto D-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto E-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto F-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto G-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto H-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto I-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto J-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto K-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto L-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0
Punto M-1	1	4.0	1.0	100	180	1.0
	2	4.0	1.0	100	180	1.0
	3	4.0	1.0	100	180	1.0
	4	4.0	1.0	100	180	1.0
	5	4.0	1.0	100	180	1.0

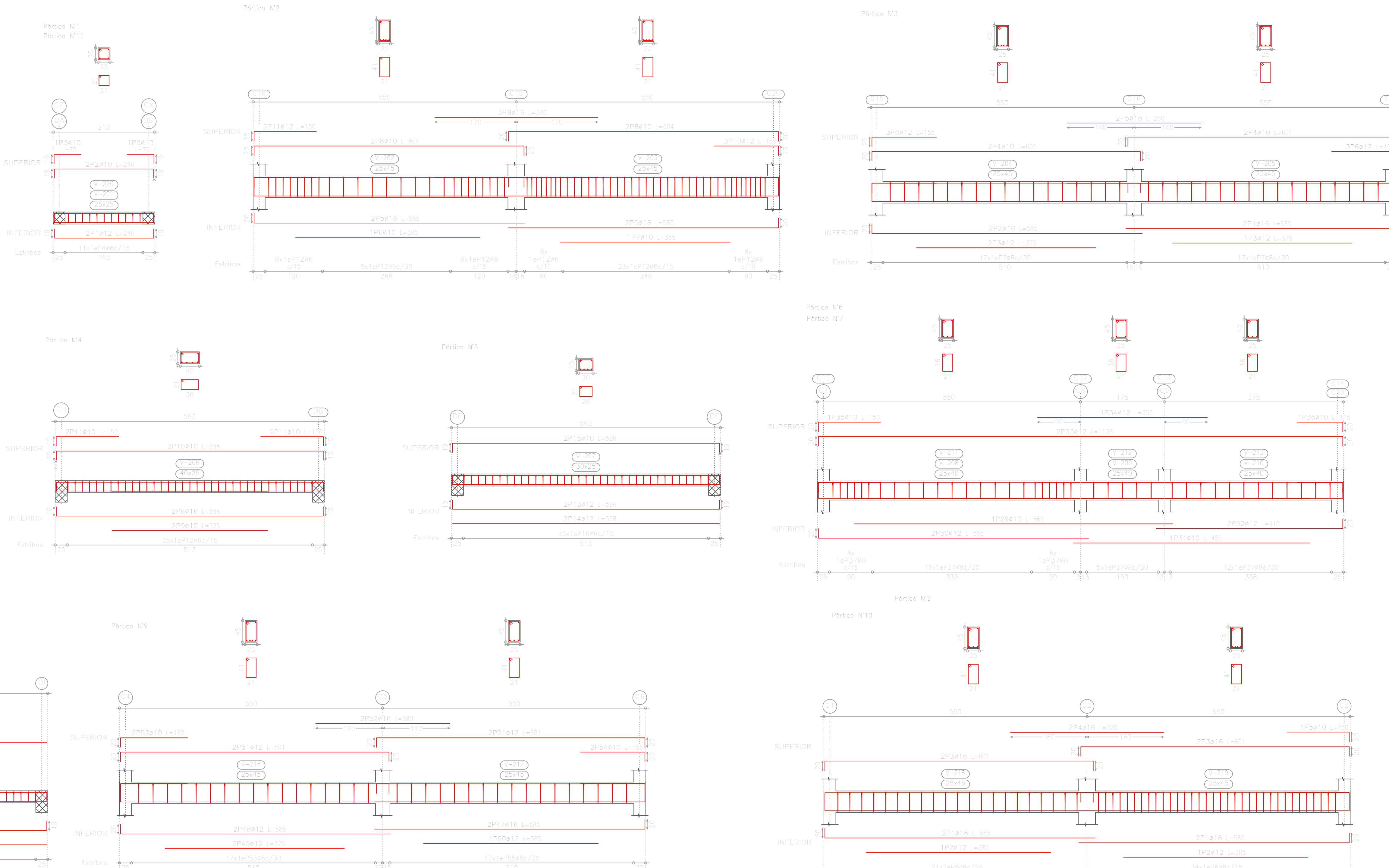
Planta Baja
Despiece de vigas
Hormigón: H-20 , Control Normal
Acero: AH-500 , Control Normal
Escala: 1-50

Elemento	Superficie (m ²)	Volumen (m ³)	Pisos
Fregadero	191,78	21,00	2
Vajos	37,03	16,12	15
Incluido lateral	71,20		
Piezas (Sup. Incluido)	58,20	3,94	5
Escotillas	11,12	1,20	1
Total	569,33	42,25	25

FORJADO DE VIGUETAS DE HORMIGÓN
 Corte de boveda: 20 cm
 Espesor capa compresible: 5 cm
 Intereje: 50 cm
 Bovedilla: De poliestireno
 Ancho del nervio: 11 cm
 Volumen de hormigón: 0,109 m³/m²
 Peso propio: 2,665 kN/m²
 Nota: Consulte los detalles representados e enlaces con
 forjado de la estructura principal y de los Zonas

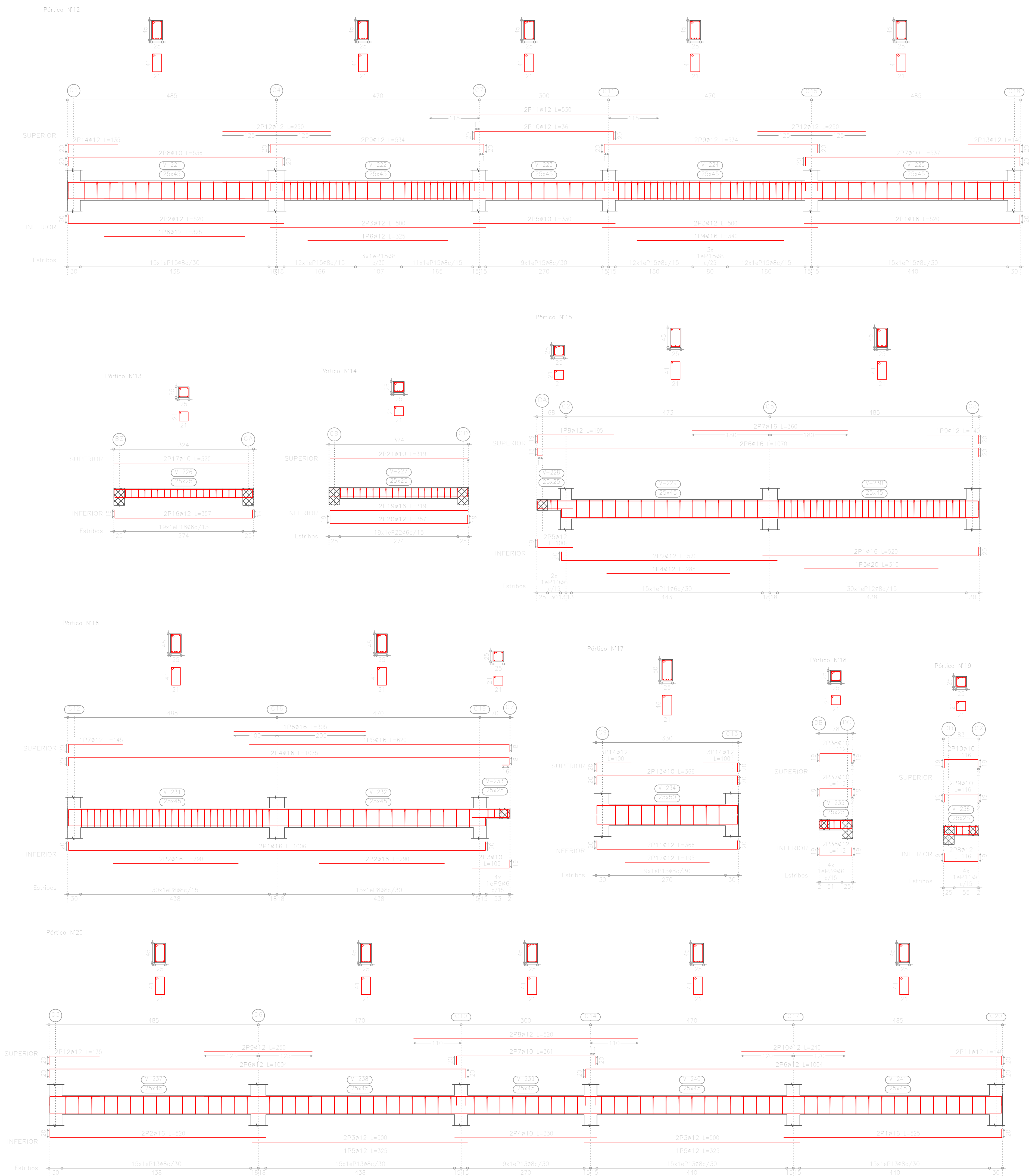


Escalera Esc. 1:50



Despiece de vigas Planta Baja Esc. 1:50

DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR

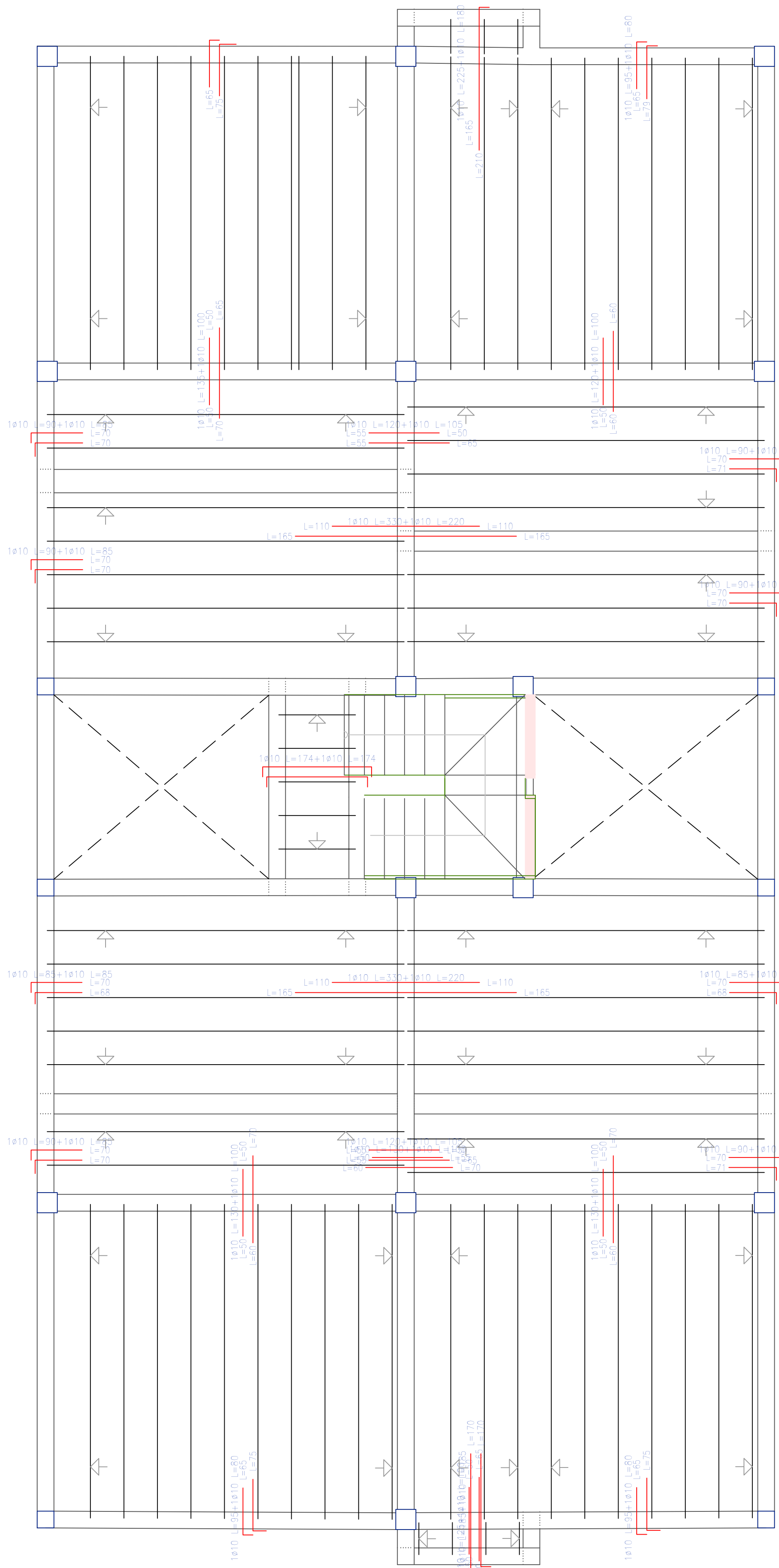


Despiece de vigas Planta Baja Esc. 1:50

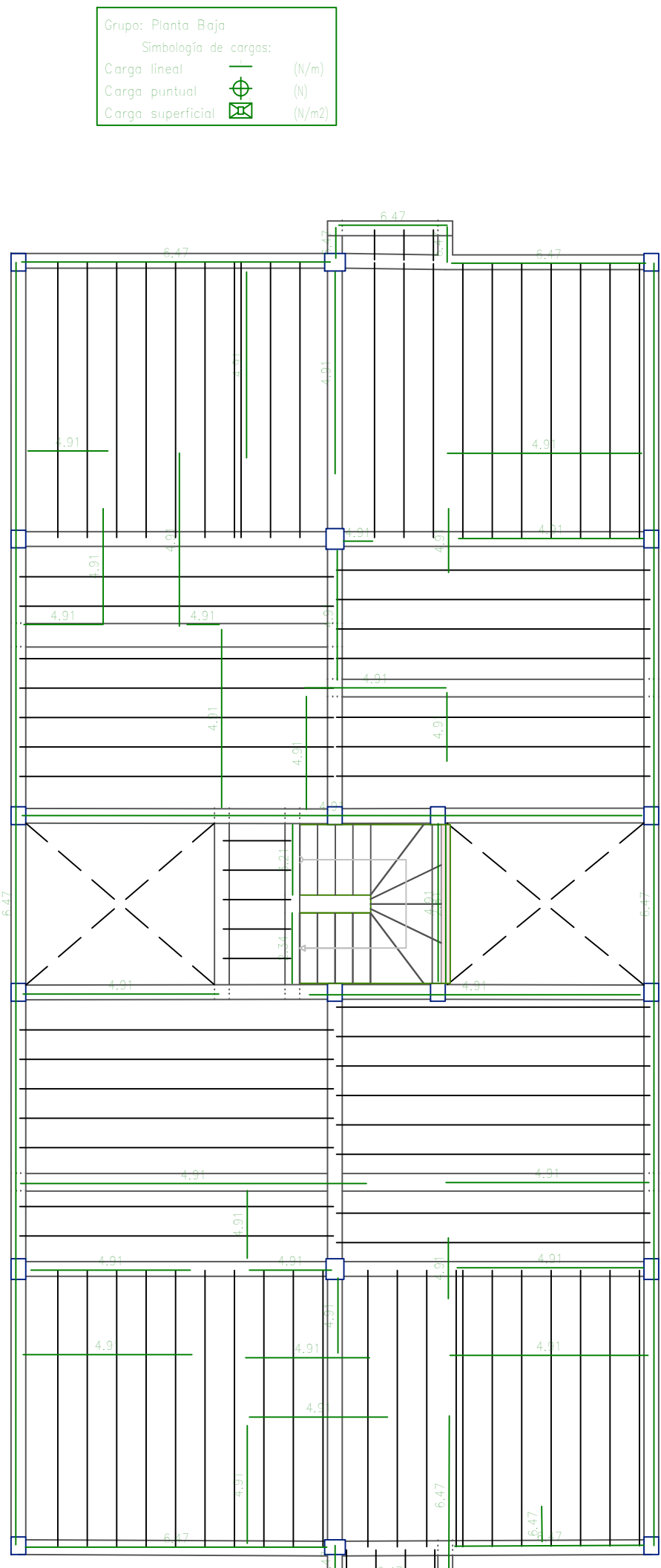
Elemento	Barra	Long. (m)	Vol. (m³)	Peso (kg)	Peso (kg/m³)
Viga N°12	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
Viga N°13	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000

Elemento	Barra	Long. (m)	Vol. (m³)	Peso (kg)	Peso (kg/m³)
Viga N°14	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
Viga N°15	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000
	2P14x12	1.2	0.001	1.2	1000

Resumen Acero	Long. (m)	Peso (kg)	Peso (kg/m³)
Acero N°12	1.2	1.2	1000
Acero N°13	1.2	1.2	1000
Acero N°14	1.2	1.2	1000
Acero N°15	1.2	1.2	1000
Acero N°16	1.2	1.2	1000
Acero N°17	1.2	1.2	1000
Acero N°18	1.2	1.2	1000
Acero N°19	1.2	1.2	1000
Acero N°20	1.2	1.2	1000

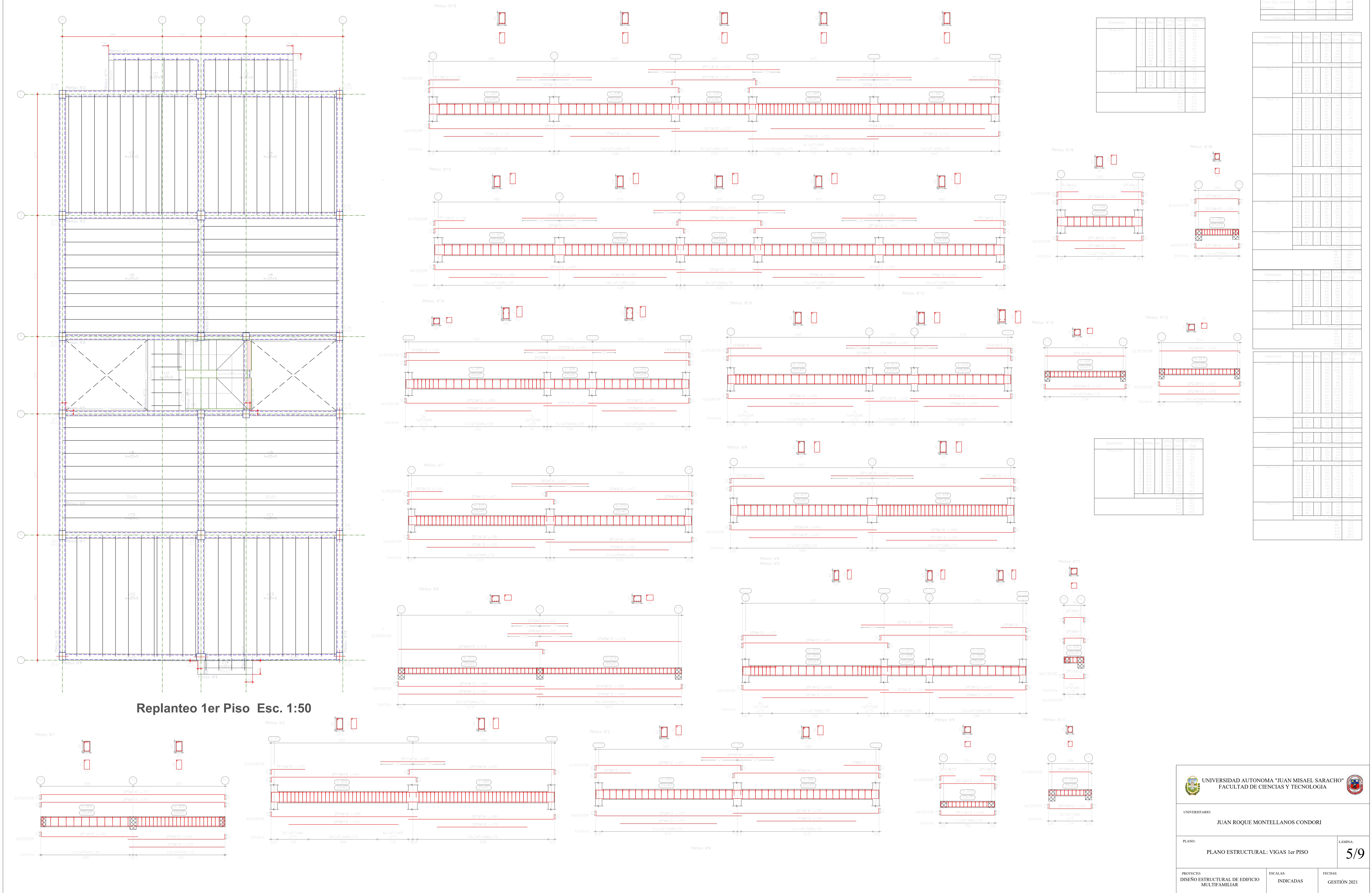


Armadura superior Losa de viguetas Planta Baja Esc. 1:50

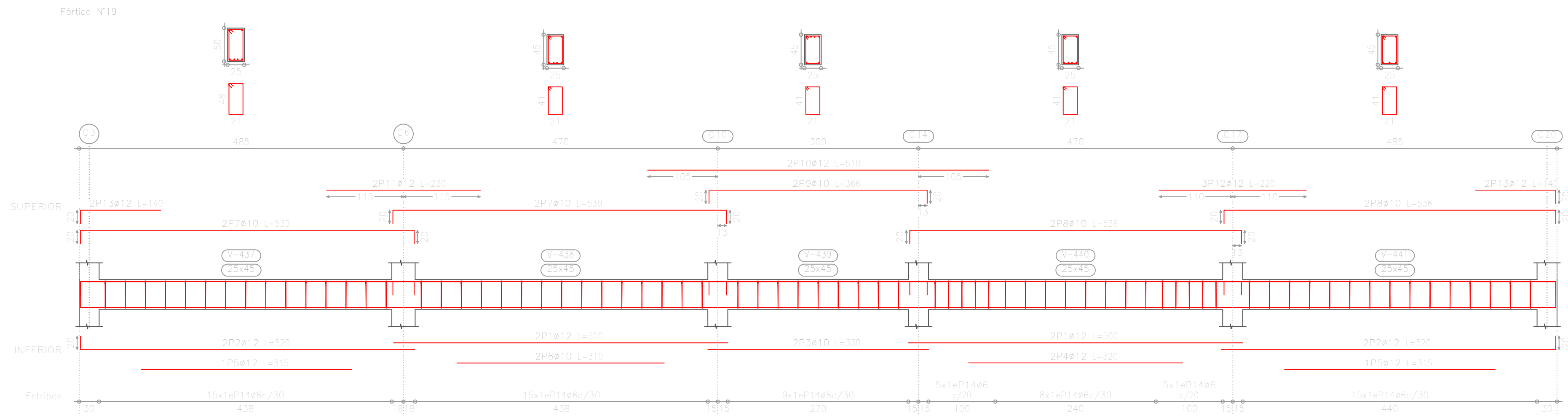


Cargas permanentes

DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR



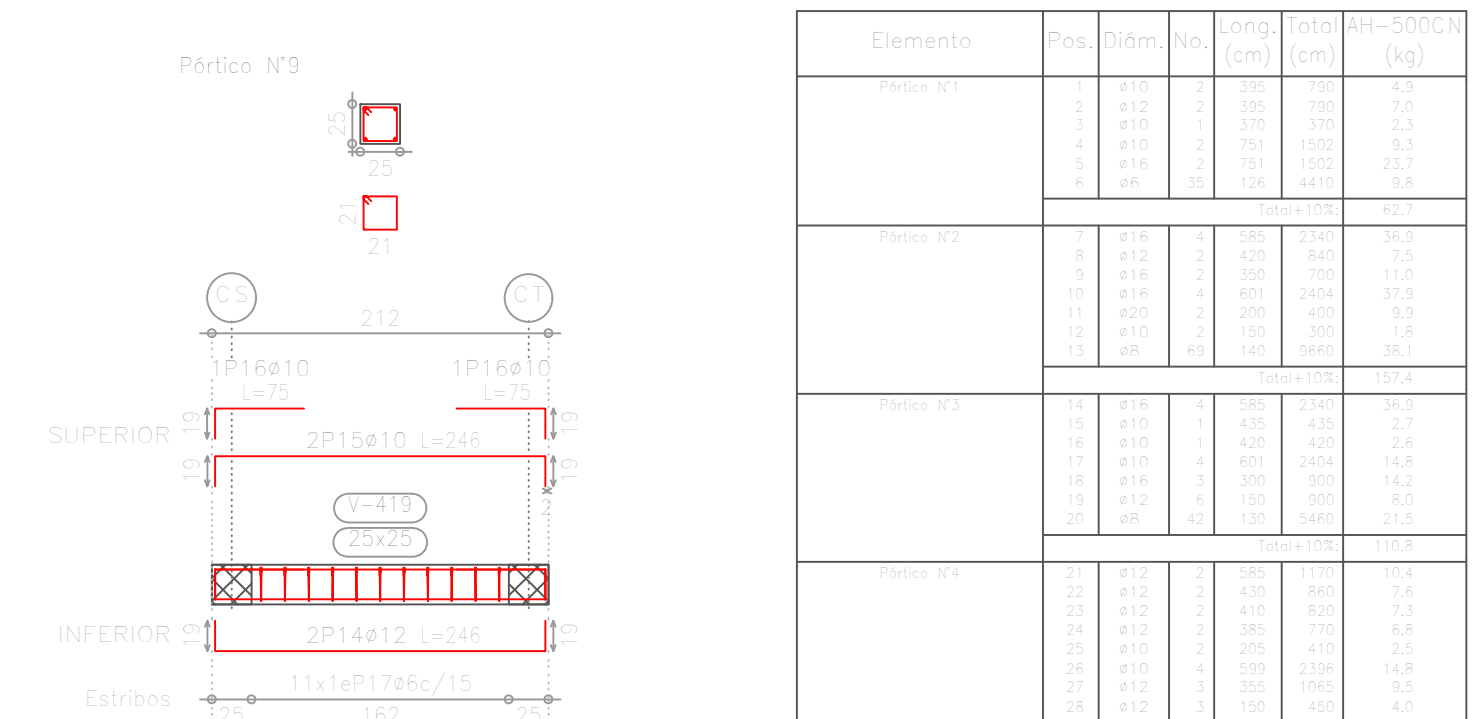
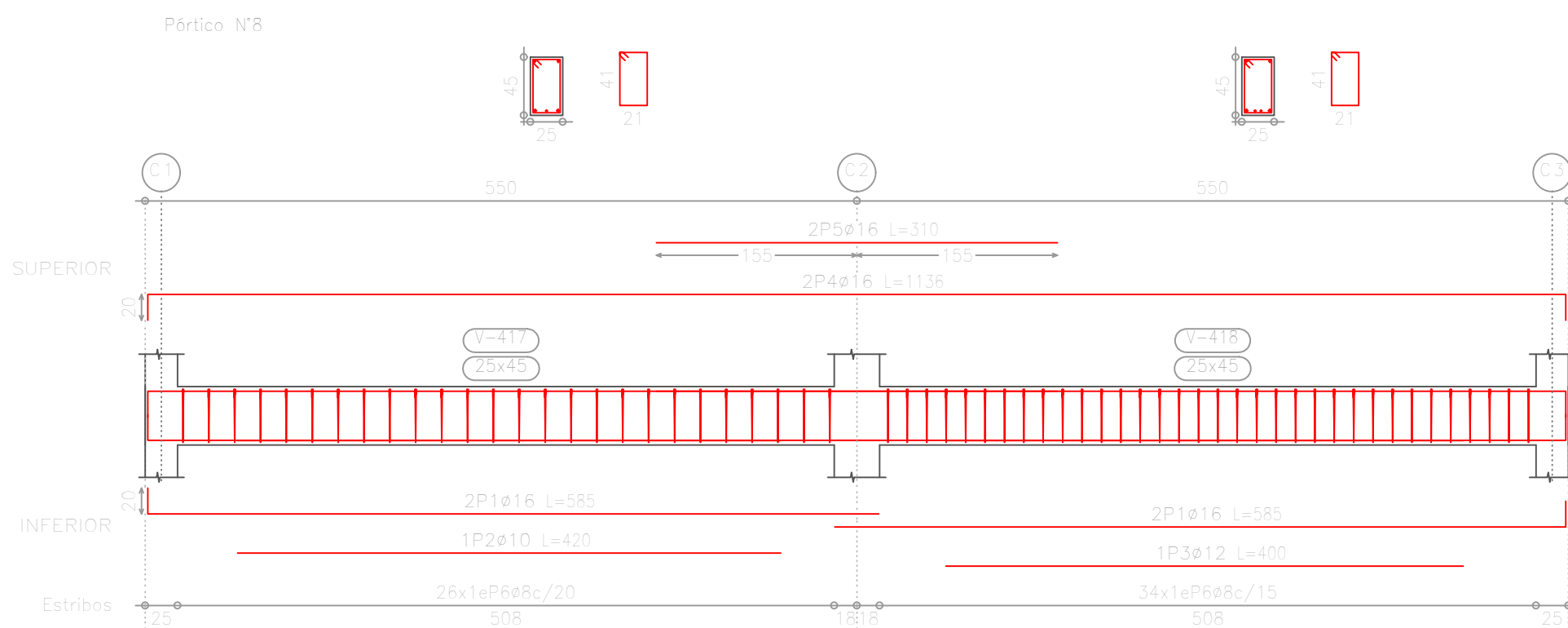
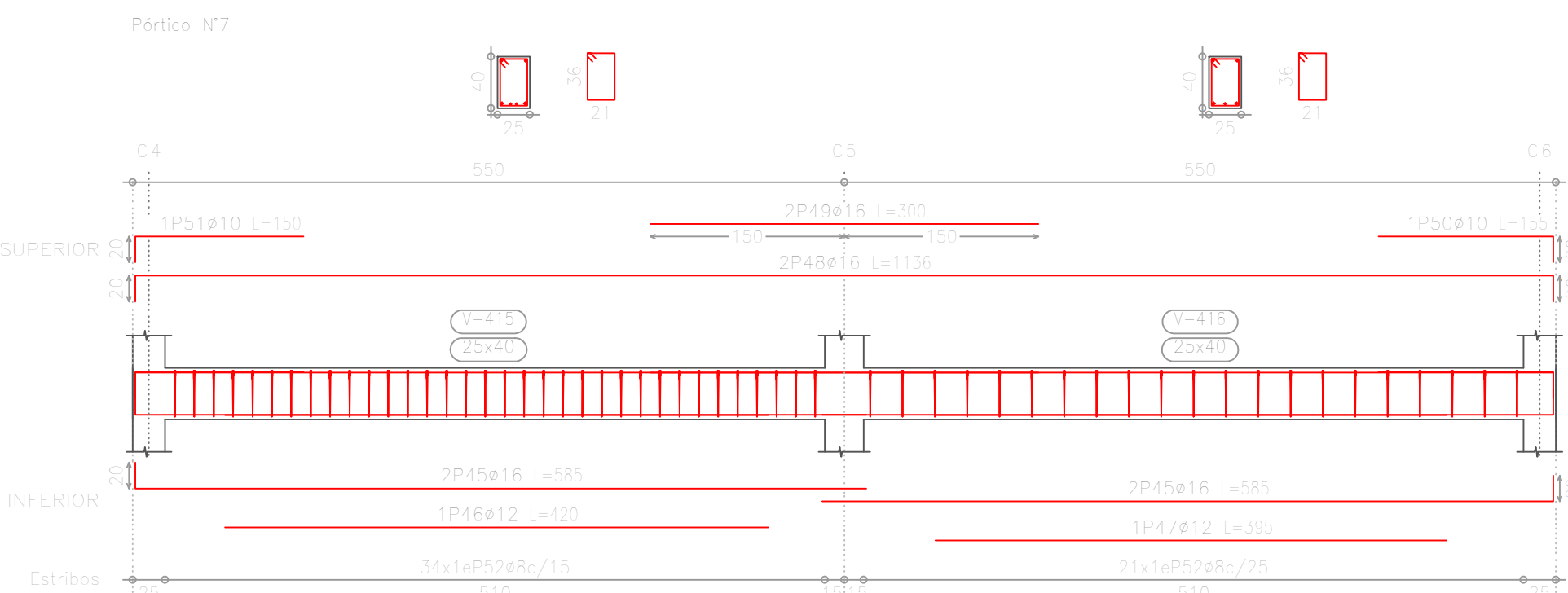
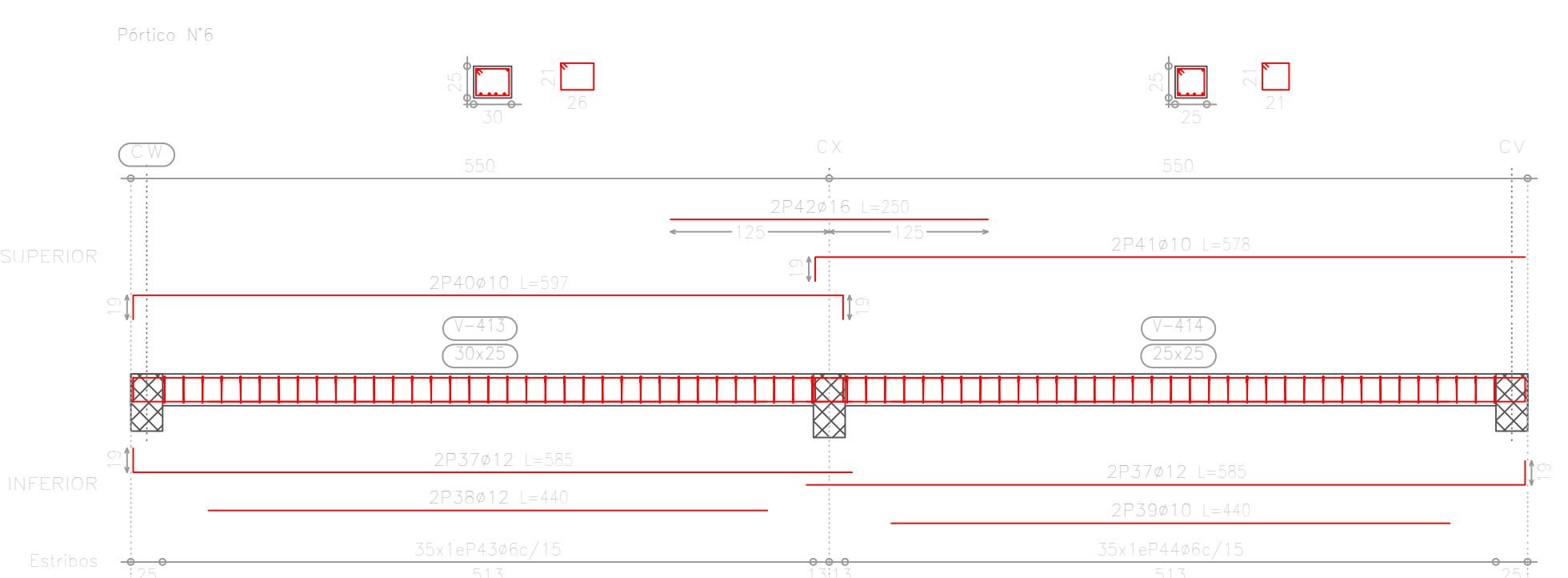
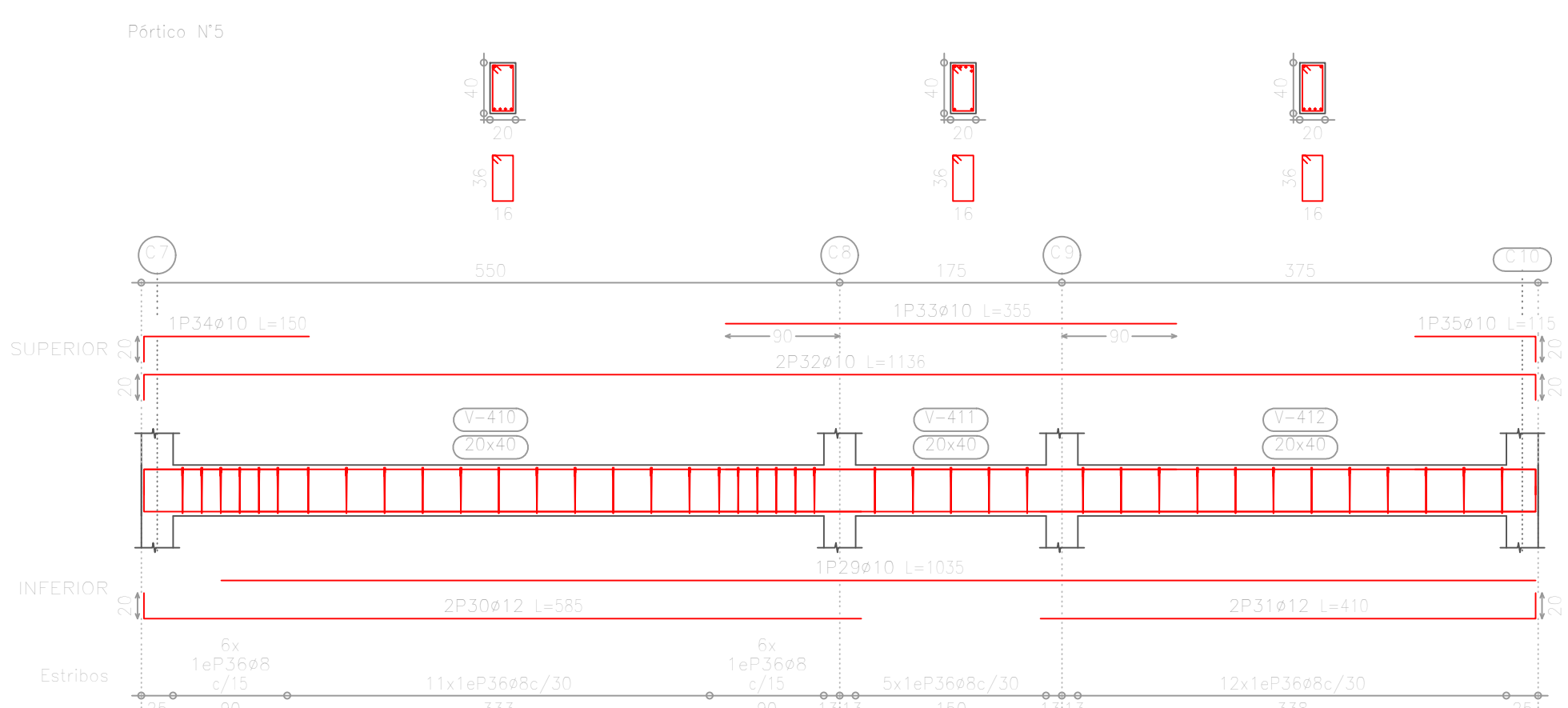
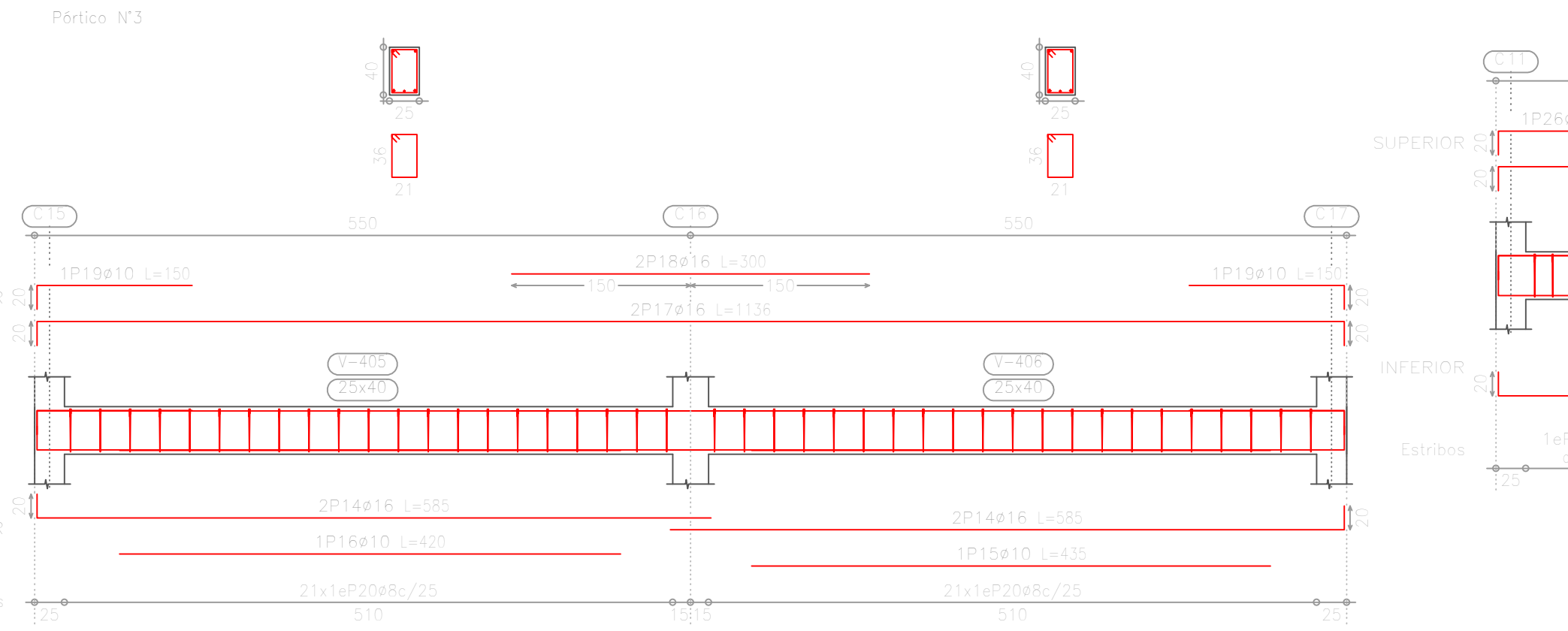
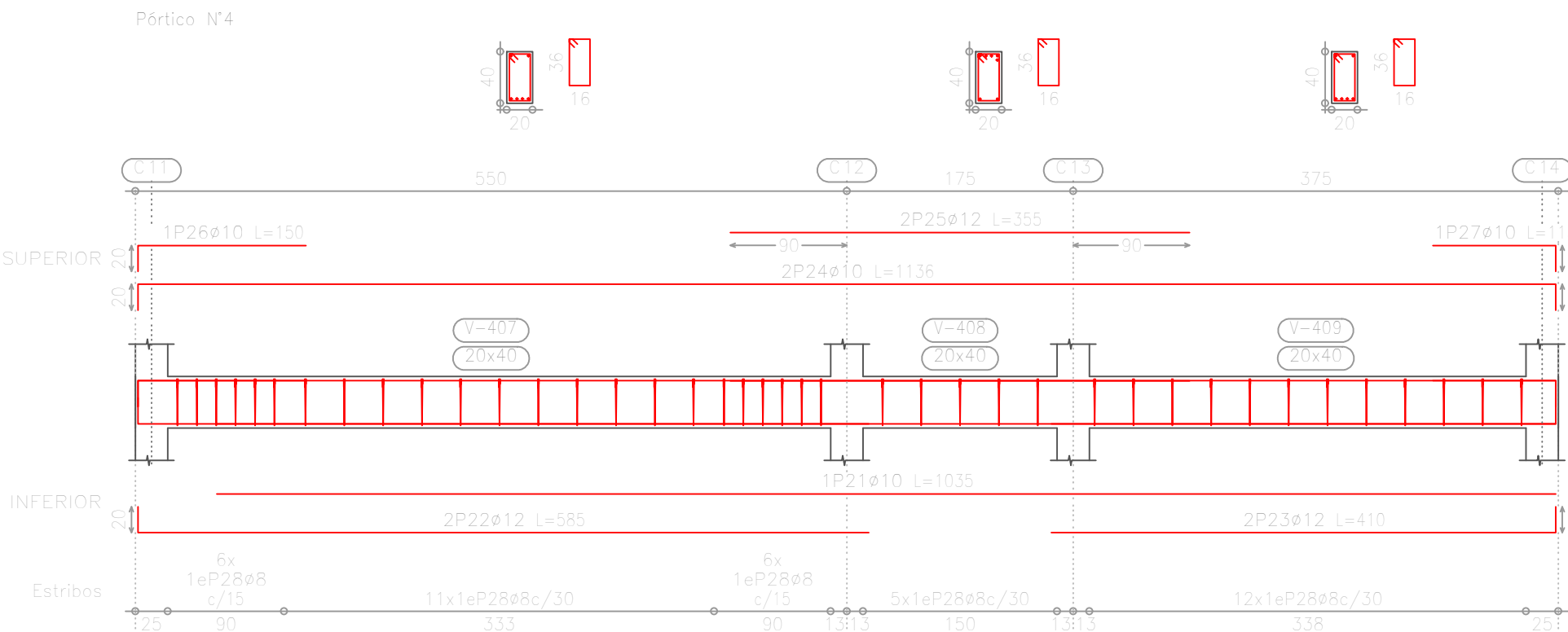
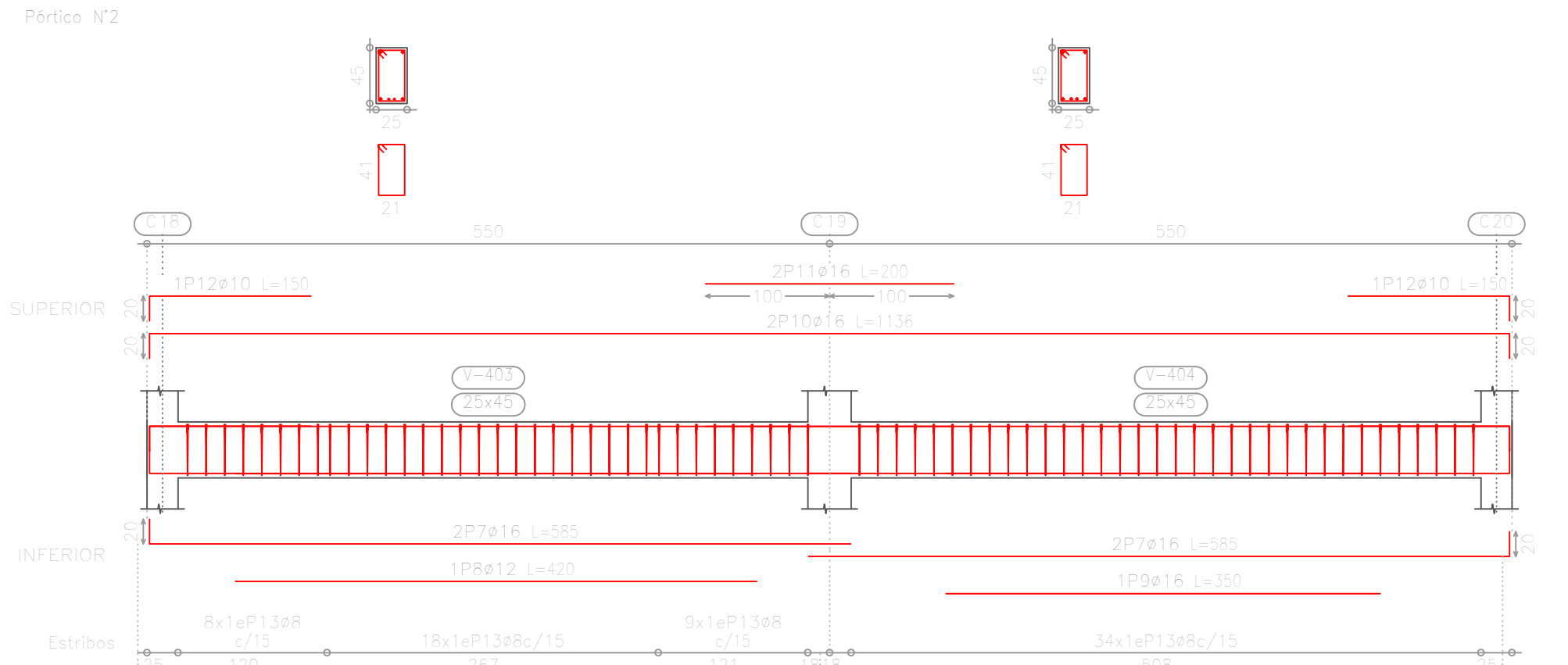
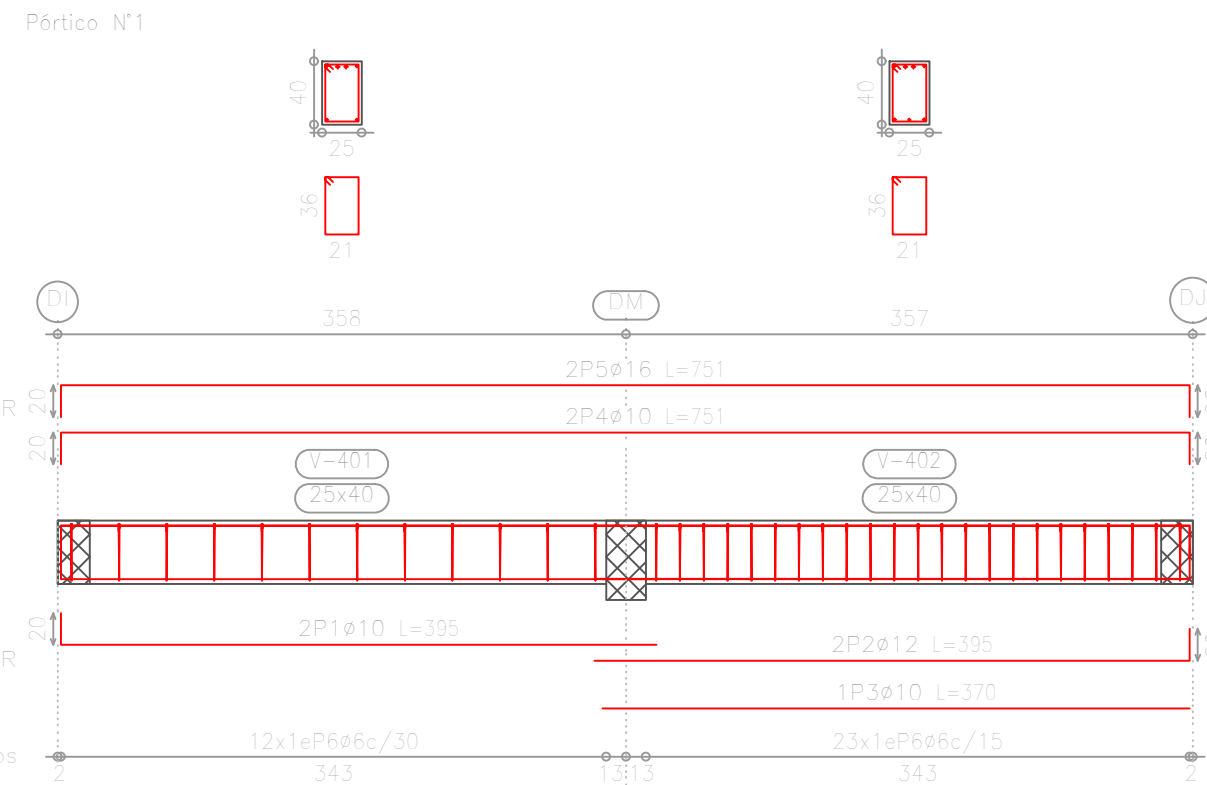
DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR



Despiece de vigas 1er Piso Esc. 1:50

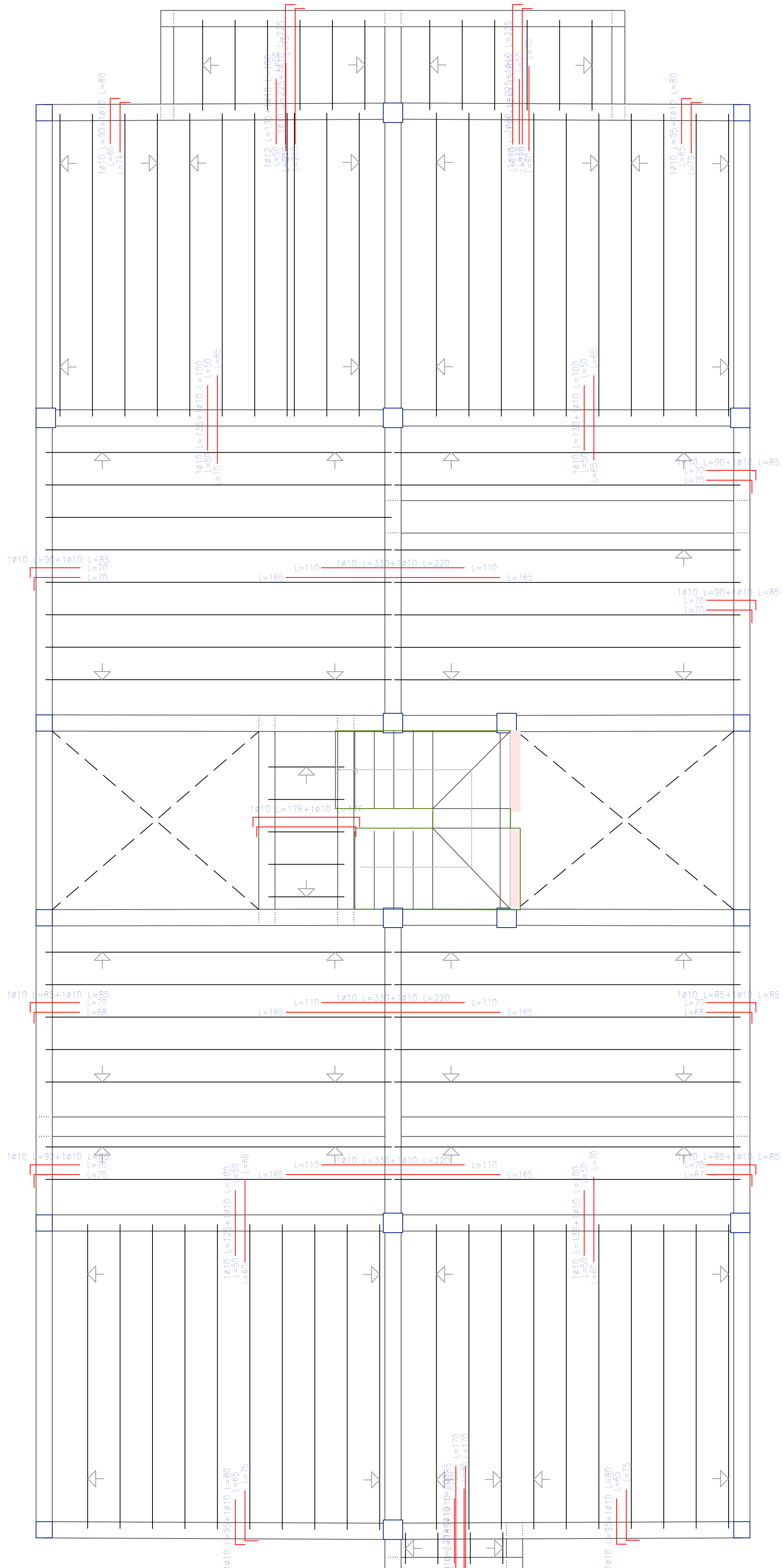
Elemento	Res.	Dim.	No.	Long.	Vol. de H.	Vol. de A.
1er Piso	20	20x25	10	10.00	0.10	0.10
2do Piso	20	20x25	10	10.00	0.10	0.10
3er Piso	20	20x25	10	10.00	0.10	0.10
4to Piso	20	20x25	10	10.00	0.10	0.10
5to Piso	20	20x25	10	10.00	0.10	0.10
6to Piso	20	20x25	10	10.00	0.10	0.10
7to Piso	20	20x25	10	10.00	0.10	0.10
8to Piso	20	20x25	10	10.00	0.10	0.10
9to Piso	20	20x25	10	10.00	0.10	0.10
10to Piso	20	20x25	10	10.00	0.10	0.10

Elemento	Res.	Dim.	No.	Long.	Vol. de H.	Vol. de A.
1er Piso	20	20x25	10	10.00	0.10	0.10
2do Piso	20	20x25	10	10.00	0.10	0.10
3er Piso	20	20x25	10	10.00	0.10	0.10
4to Piso	20	20x25	10	10.00	0.10	0.10
5to Piso	20	20x25	10	10.00	0.10	0.10
6to Piso	20	20x25	10	10.00	0.10	0.10
7to Piso	20	20x25	10	10.00	0.10	0.10
8to Piso	20	20x25	10	10.00	0.10	0.10
9to Piso	20	20x25	10	10.00	0.10	0.10
10to Piso	20	20x25	10	10.00	0.10	0.10

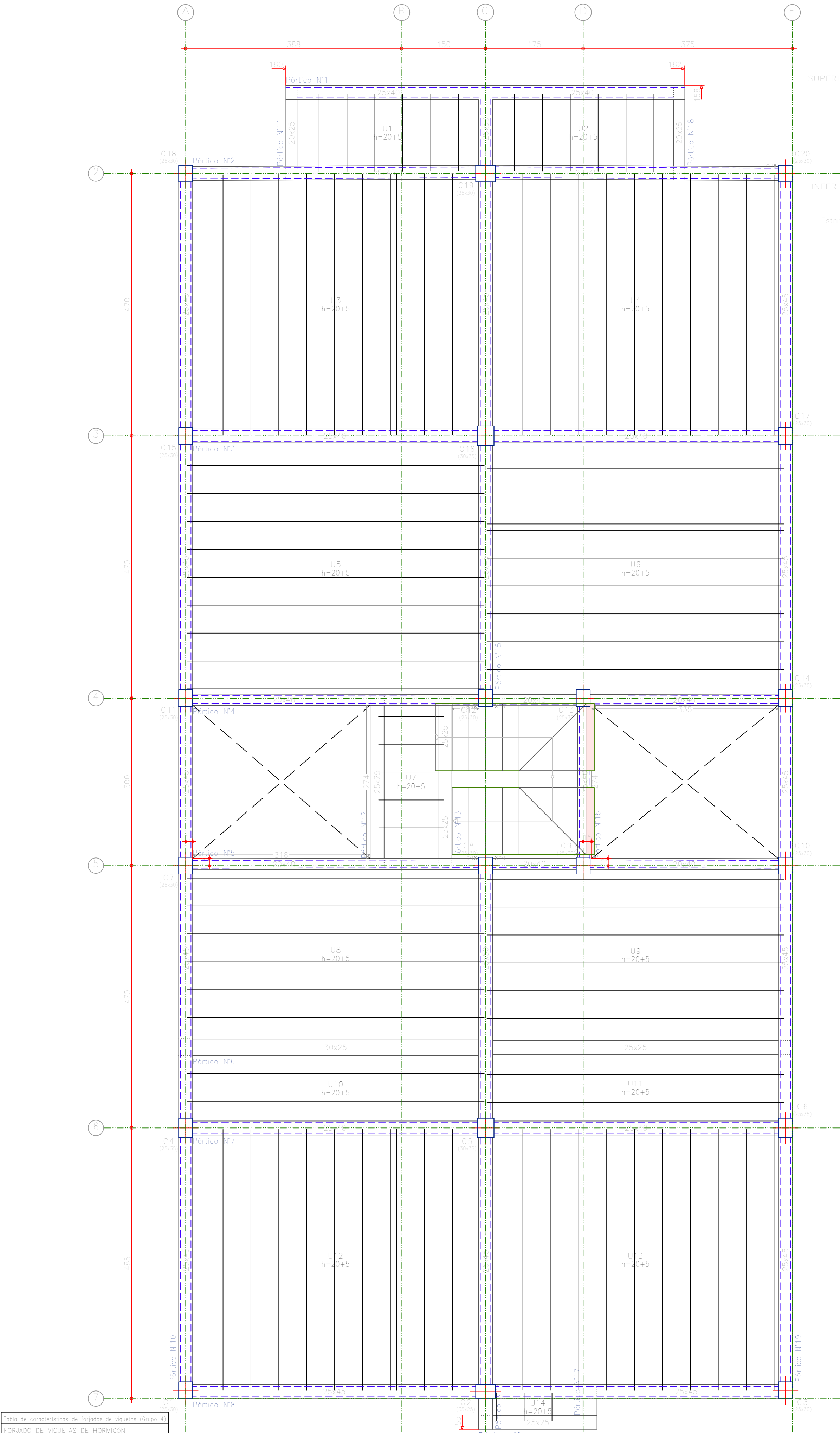


Elemento	Res.	Dim.	No.	Long.	Vol. de H.	Vol. de A.
1er Piso	20	20x25	10	10.00	0.10	0.10
2do Piso	20	20x25	10	10.00	0.10	0.10
3er Piso	20	20x25	10	10.00	0.10	0.10
4to Piso	20	20x25	10	10.00	0.10	0.10
5to Piso	20	20x25	10	10.00	0.10	0.10
6to Piso	20	20x25	10	10.00	0.10	0.10
7to Piso	20	20x25	10	10.00	0.10	0.10
8to Piso	20	20x25	10	10.00	0.10	0.10
9to Piso	20	20x25	10	10.00	0.10	0.10
10to Piso	20	20x25	10	10.00	0.10	0.10

Elemento	Res.	Dim.	No.	Long.	Vol. de H.	Vol. de A.
1er Piso	20	20x25	10	10.00	0.10	0.10
2do Piso	20	20x25	10	10.00	0.10	0.10
3er Piso	20	20x25	10	10.00	0.10	0.10
4to Piso	20	20x25	10	10.00	0.10	0.10
5to Piso	20	20x25	10	10.00	0.10	0.10
6to Piso	20	20x25	10	10.00	0.10	0.10
7to Piso	20	20x25	10	10.00	0.10	0.10
8to Piso	20	20x25	10	10.00	0.10	0.10
9to Piso	20	20x25	10	10.00	0.10	0.10
10to Piso	20	20x25	10	10.00	0.10	0.10



Armadura superior Losa de viguetas 1er Piso Esc. 1:50



Replanteo 2do Piso Esc. 1:50

Despiece de vigas 2do Piso Esc. 1:50

DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR

[illegible]

Element	Pos. (km)	Alt. (m)	Depth (m)	Dist. to 5000 m (km)
PACIFIC OCEAN	1	105	2	1000
	2	105	2	1000
	3	105	2	1000
	4	112	4	1000
	5	112	4	1000
	6	112	4	1000
	7	112	4	1000
	8	112	4	1000
	9	112	4	1000
	10	112	4	1000
PACIFIC OCEAN	11	105	2	1000
	12	105	2	1000
	13	105	2	1000
	14	105	2	1000
	15	105	2	1000
	16	105	2	1000
	17	105	2	1000
	18	105	2	1000
	19	105	2	1000
	20	105	2	1000
PACIFIC OCEAN	21	105	2	1000
	22	105	2	1000
	23	105	2	1000
	24	105	2	1000
	25	105	2	1000
	26	105	2	1000
	27	105	2	1000
	28	105	2	1000
	29	105	2	1000
	30	105	2	1000

Elemento	Pos.	Idem.	Alt.	Comp.	Totale	SH-5000C
					(kg)	(kg)
Piston 4/19	1	812	2	120	108	9,2
	2	812	1	960	108	9,2
	3	812	2	536	1012	9,2
	4	812	1	28	456	9,2
	5	812	2	340	480	8,0
	6	812	1	336	440	8,0
	7	812	2	300	456	8,0
	8	812	1	320	316	8,0
	9	812	2	536	1012	9,2
	10	812	1	28	456	9,2
	11	812	2	340	480	8,0
	12	812	1	336	440	8,0
	13	812	2	300	456	8,0
	14	812	1	320	316	8,0
Cilindro 4/19	15	88	2	120	224	8,0
	16	88	1	120	224	8,0
	17	88	1	120	224	8,0
	18	88	1	120	224	8,0
						SH-5000C
						88
						224
						812
						480
						536
						1012

FORJADO DE VIGUETAS DE HORMIGÓN

Ceño de bovedilla: 20 cm

Espesor capa compresión: 5 cm

Interje: 50 cm

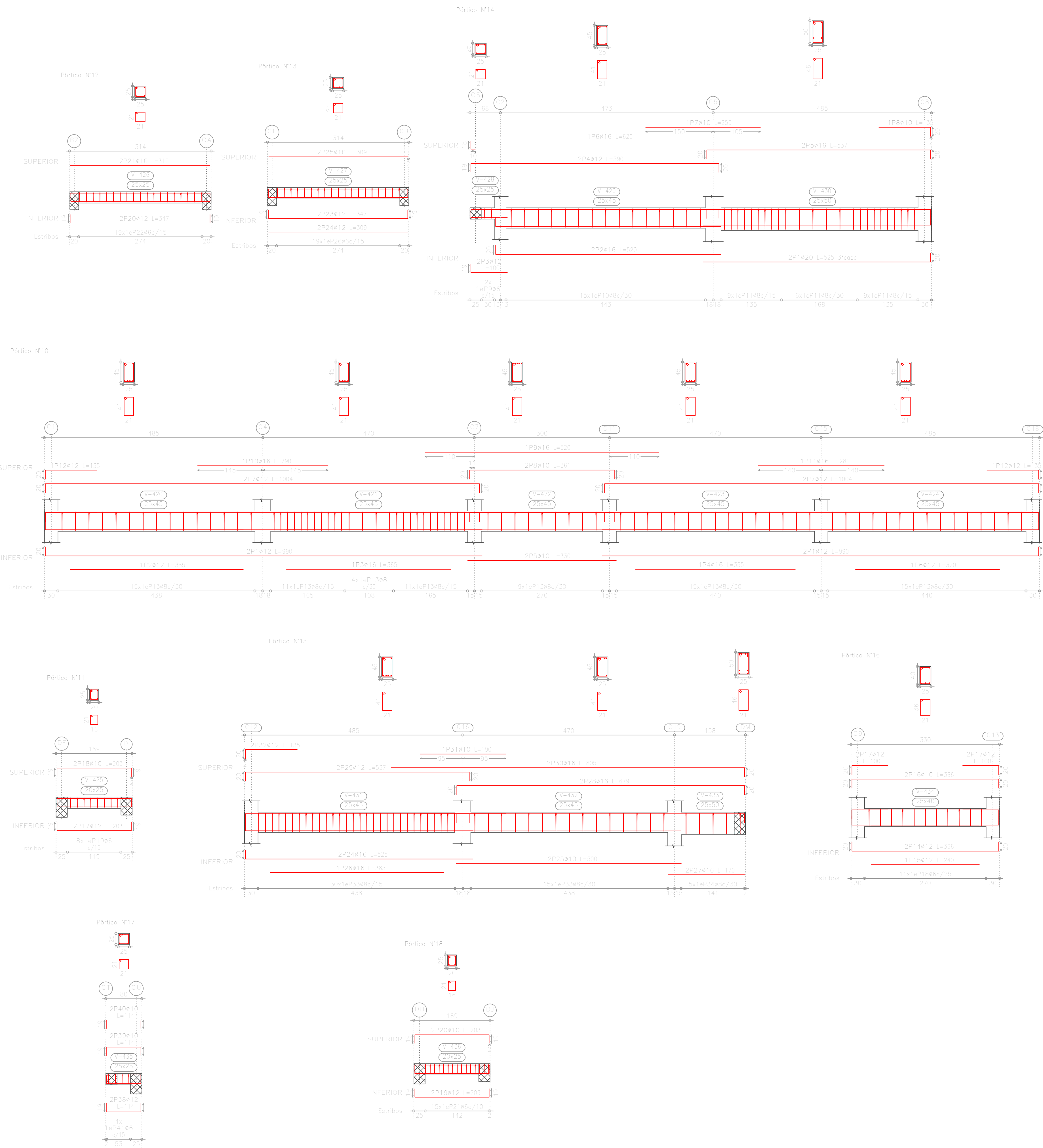
Bovedilla: De poliestireno

Ancho del nervio: 11 cm

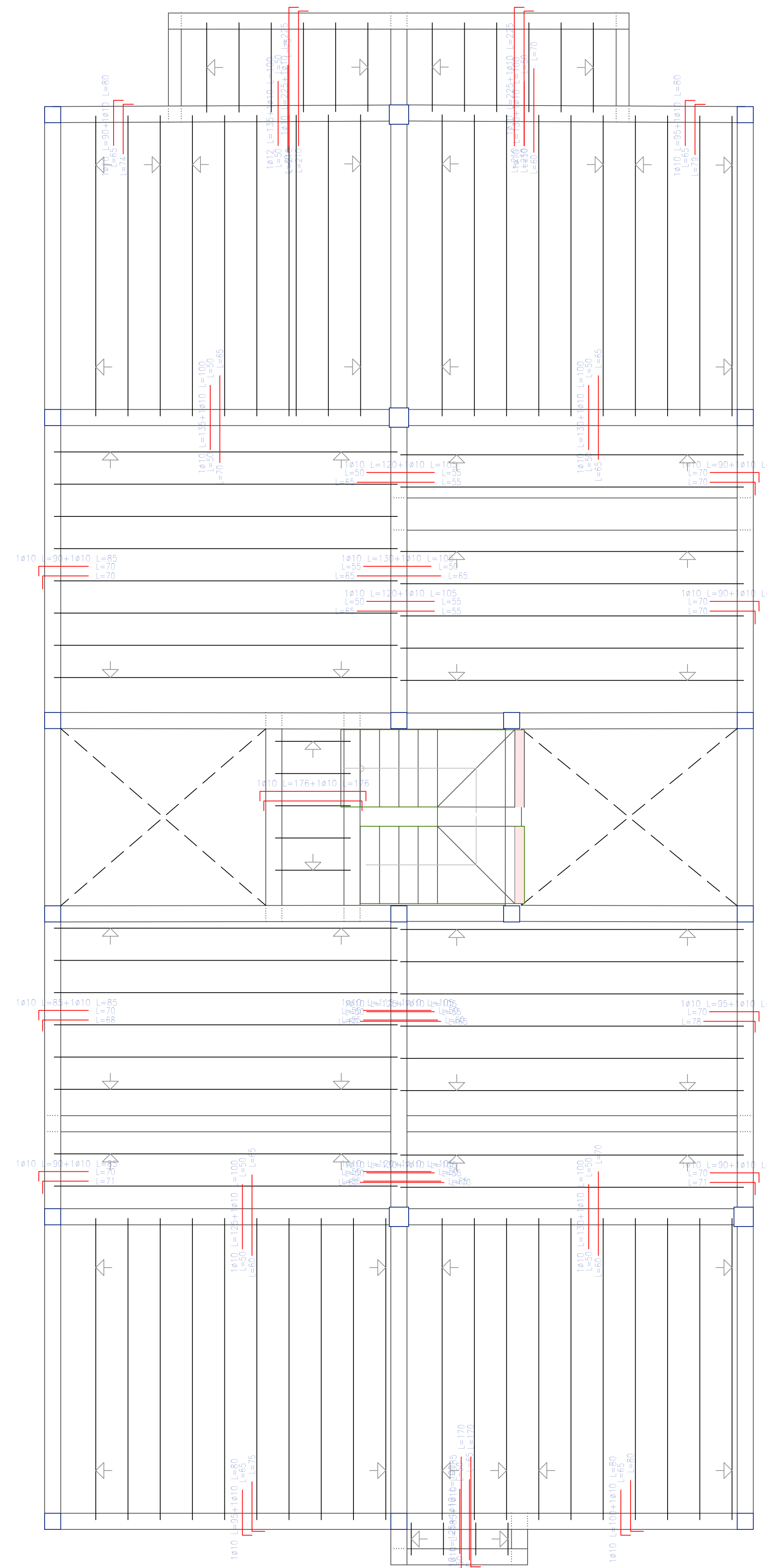
Volumen de hormigón: 0,100 m³/m²

Peso propio: 2,865 kN/m²

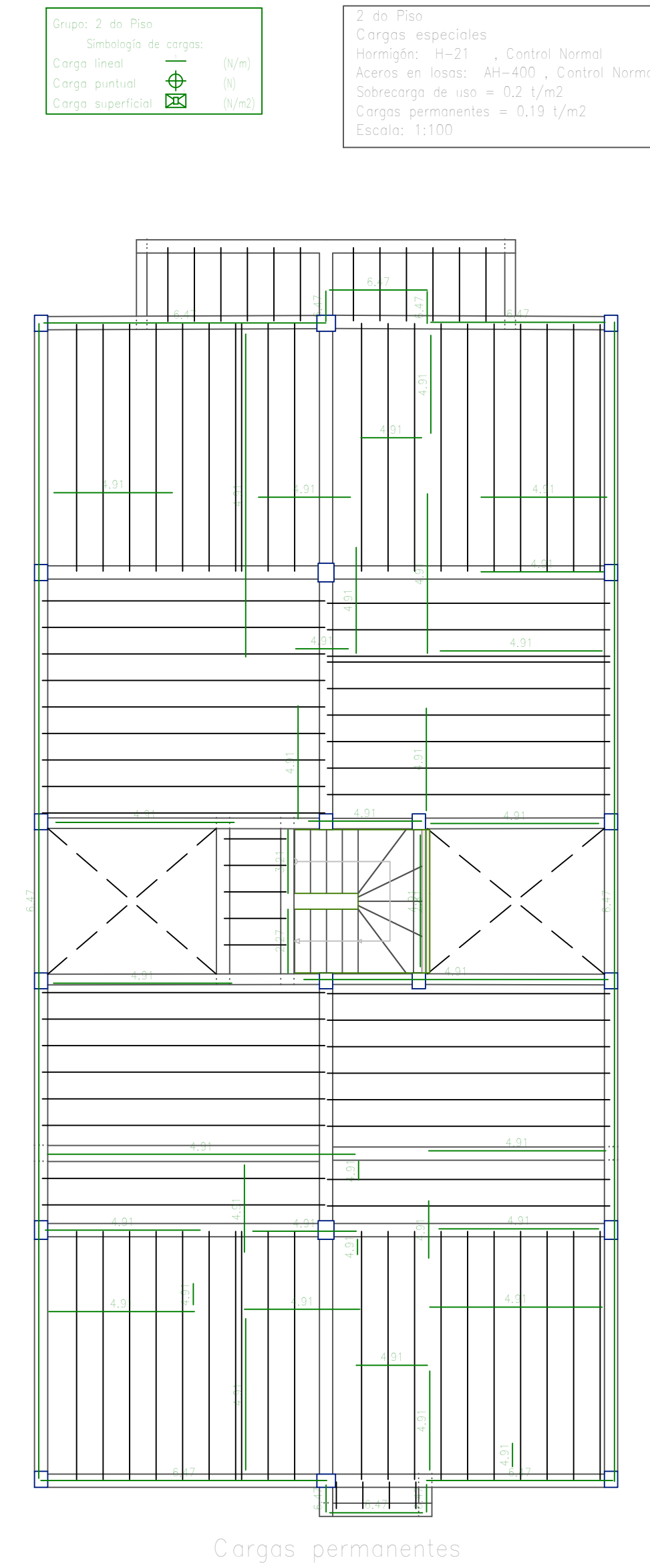
Nota: Consulte los detalles referentes a uniones con
terrazas de la estructura principal y de las zonas
molduradas.



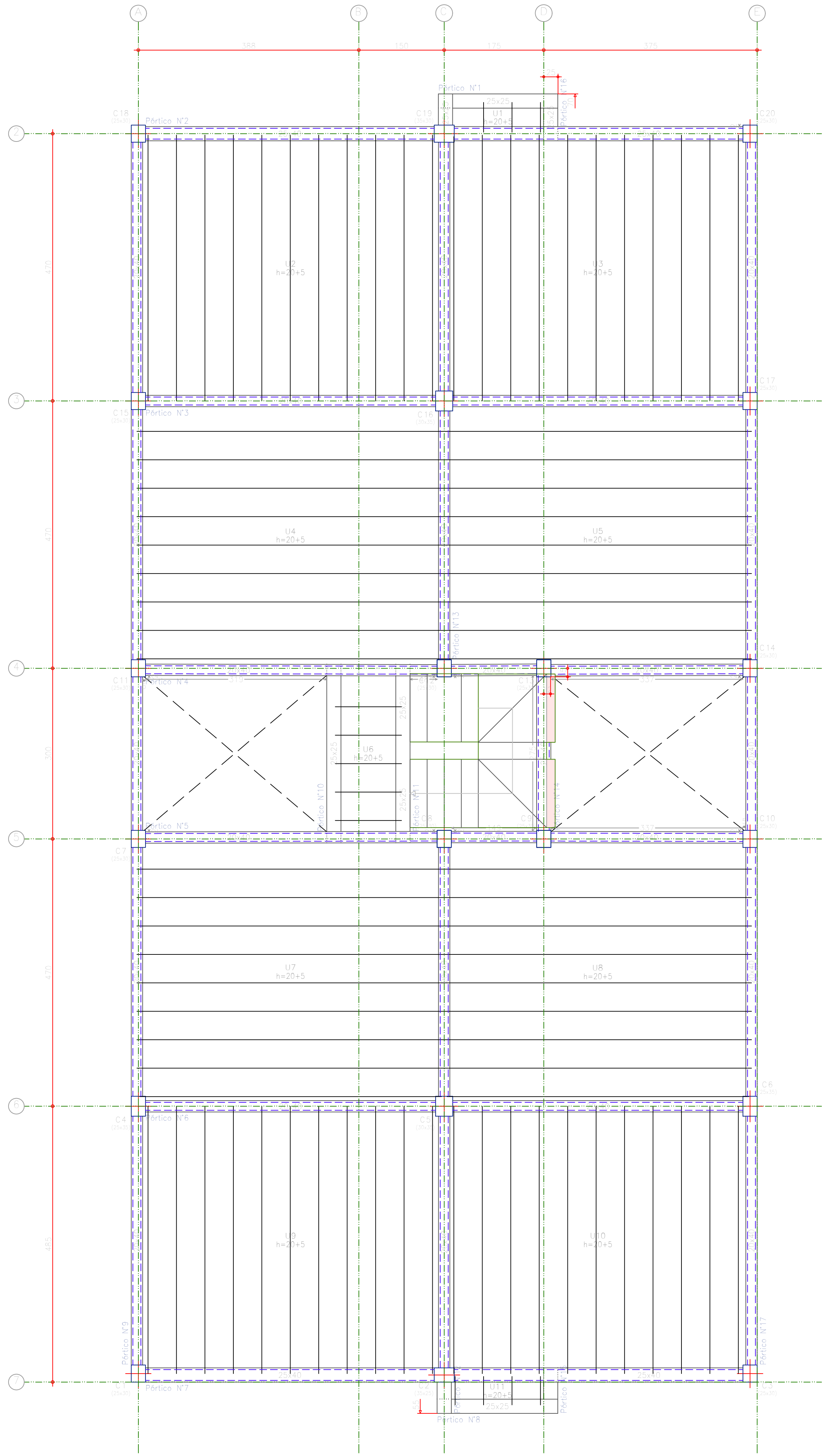
Despiece de vigas 2do Piso Esc. 1:50



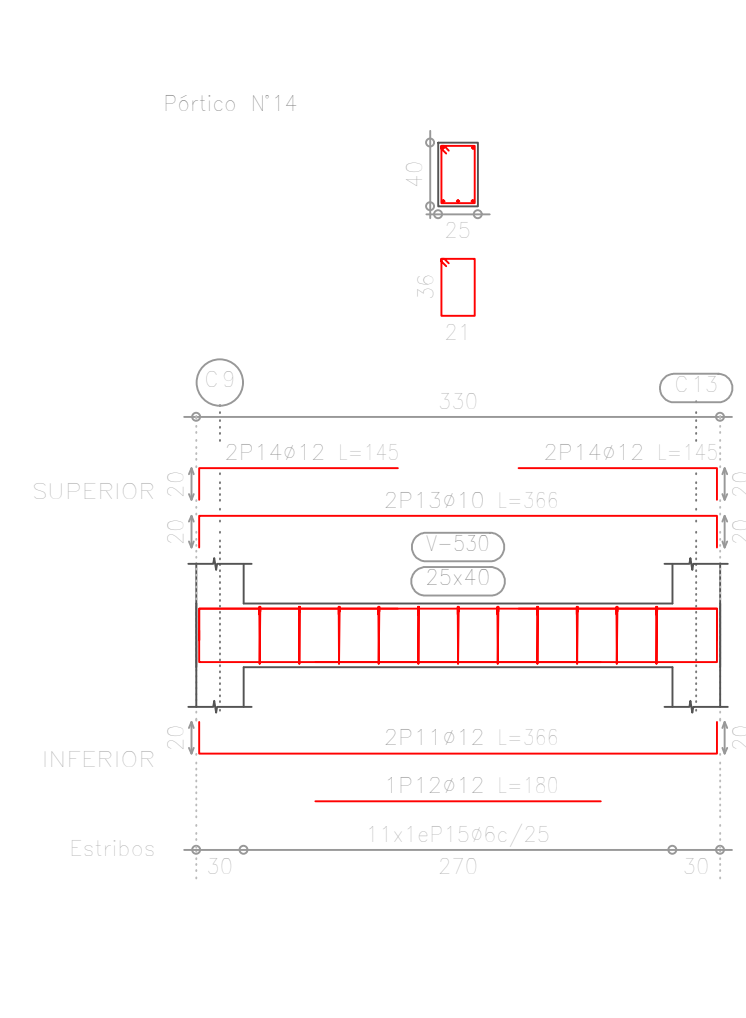
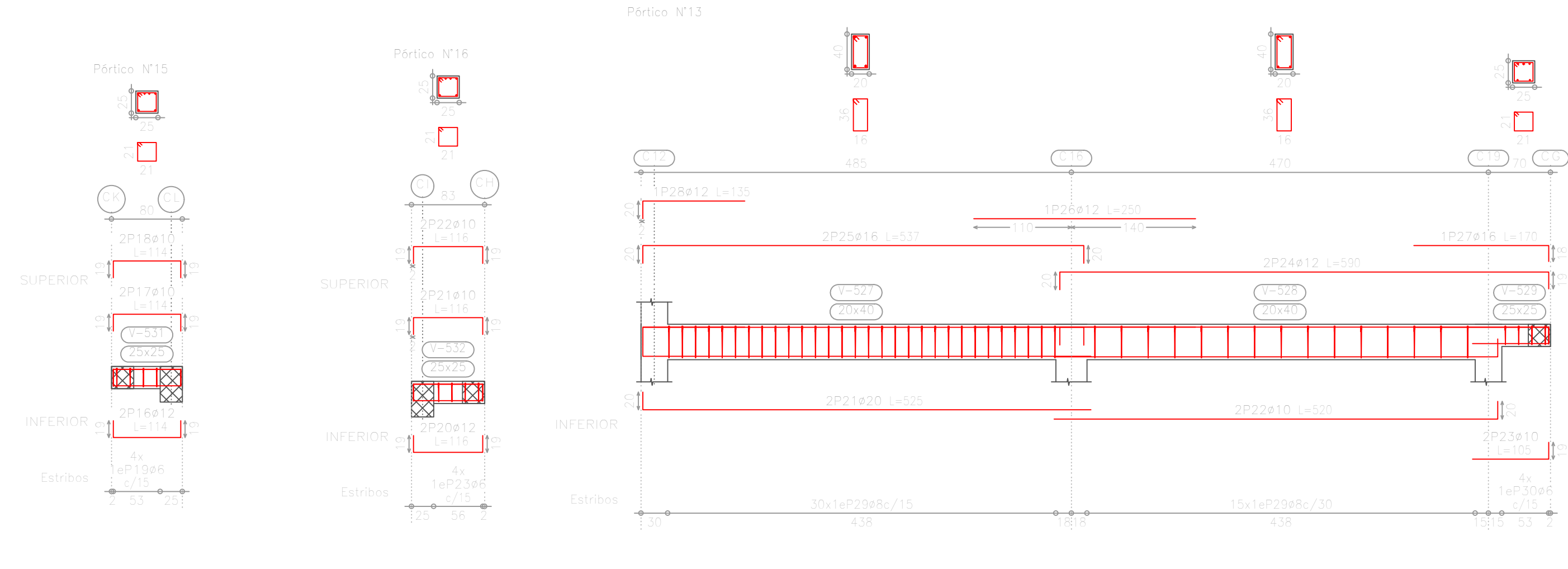
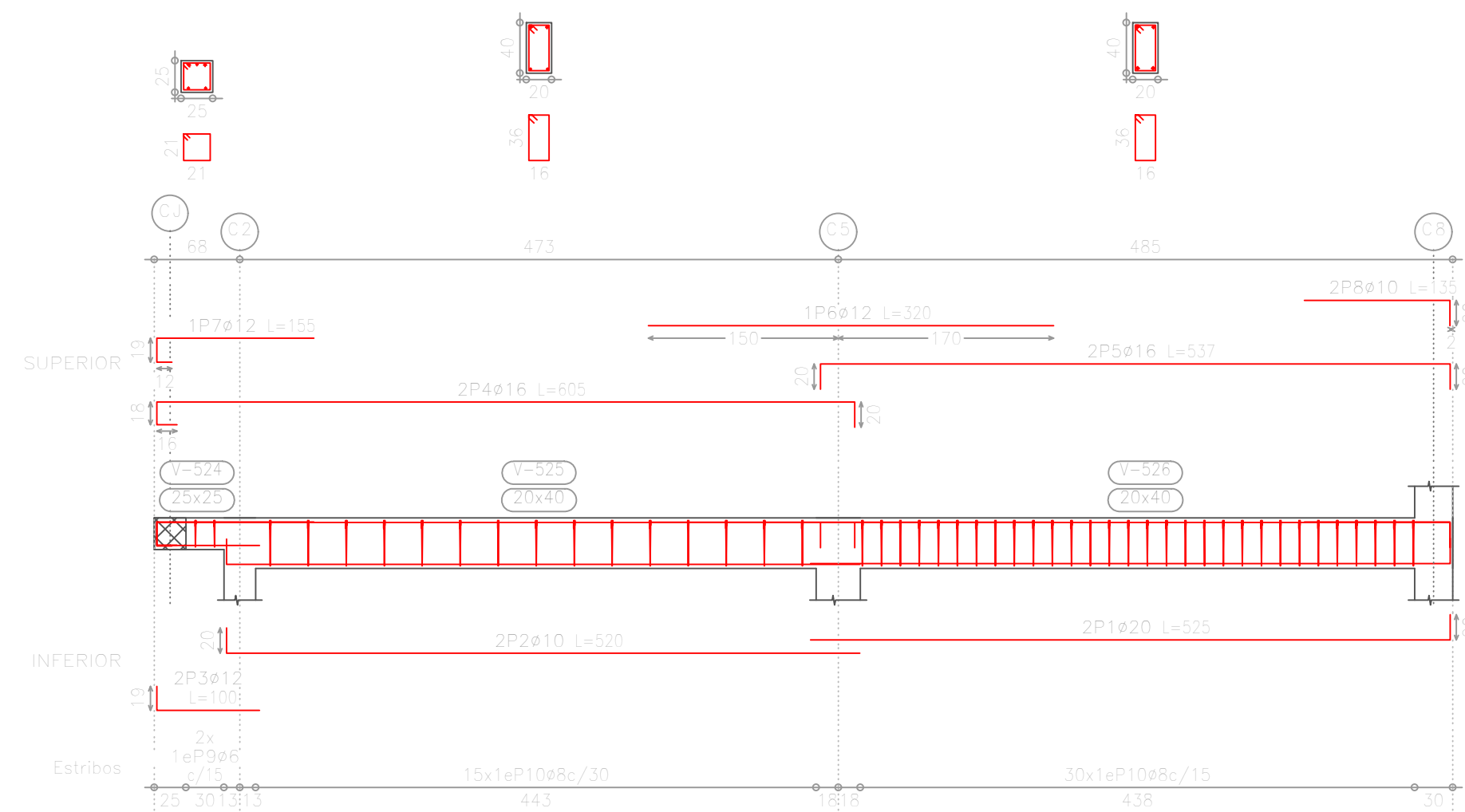
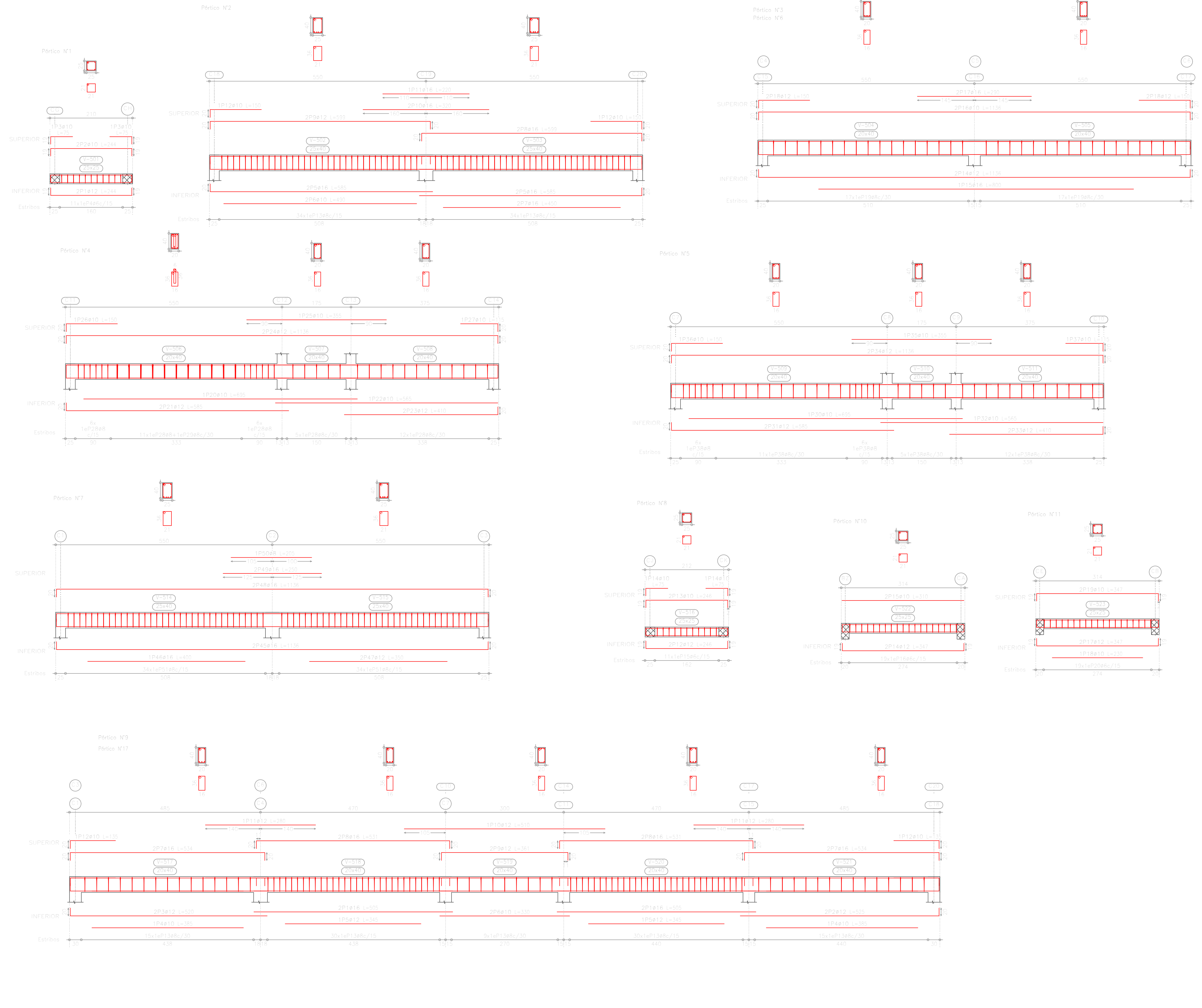
Armadura superior Losa de viguetas 2do Piso
Esc. 1:50



DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR

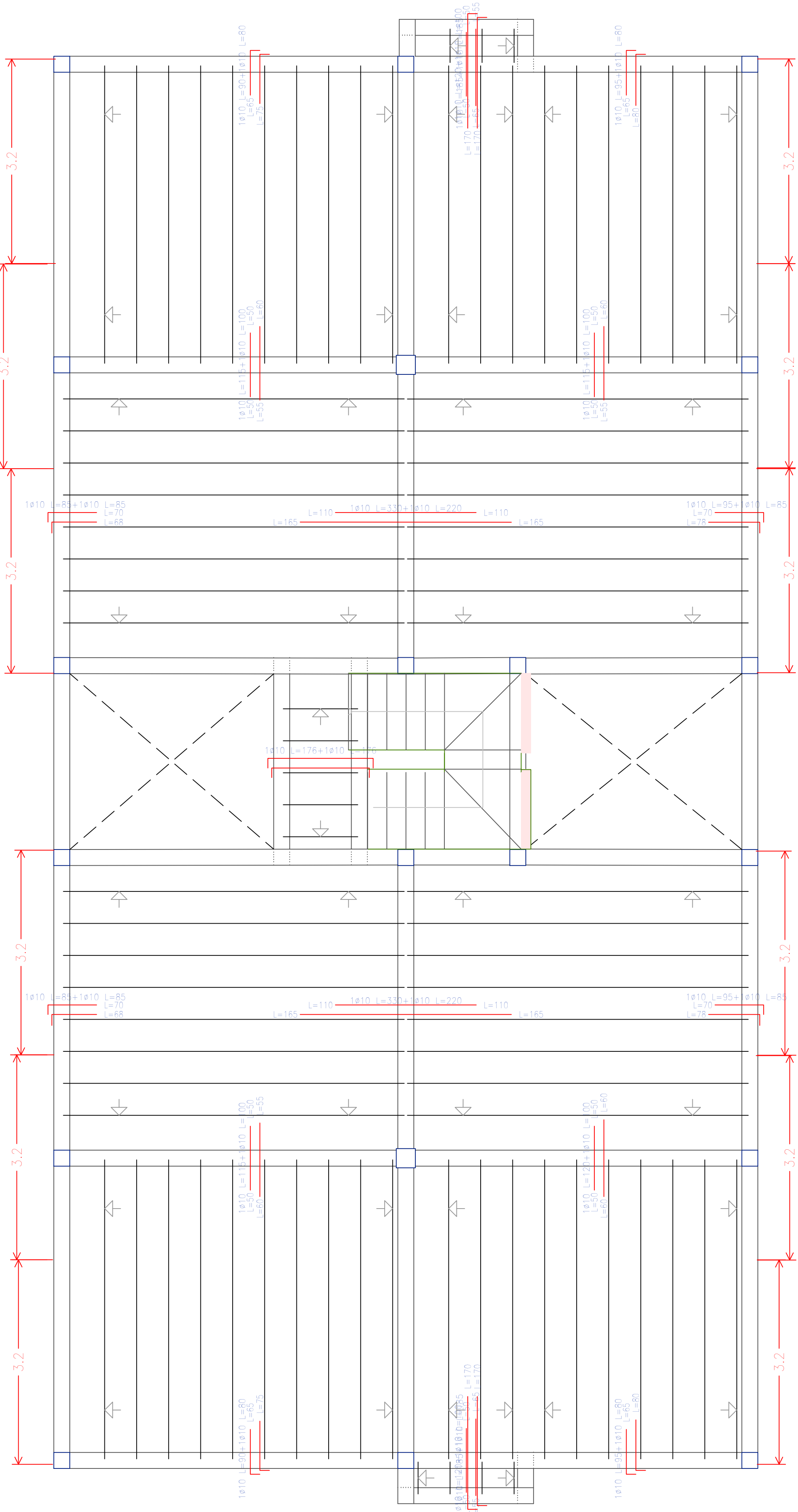


Replanteo Cubierta Esc. 1:50

[illegible][illegible][illegible]

Ciemento	Pos.	Intm.	Long. [cm]	Total [cm]	Wt-500°C [kg]
Pavimento	1	414	1	262	20,8
	2	414	1	320	9,3
	3	414	1	320	10,8
	4	414	1	320	17,5
	5	414	1	320	10,8
	6	414	1	320	10,8
	7	414	1	320	10,8
	8	414	1	320	10,8
	9	414	1	320	10,8
	10	414	1	320	10,8
	11	414	1	320	10,8
	12	414	1	320	10,8
Cimentación	13	414	90	130	23,0
	14	414	90	130	23,0
	15	414	90	130	23,0
	16	414	90	130	23,0

DISEÑO ESTRUCTURAL EDIFICIO MULTIFAMILIAR



Cuadro de pilares
Hormigón: H-20 , Control Normal
Acero: AH-500 , Control Normal
Escala: 1:50

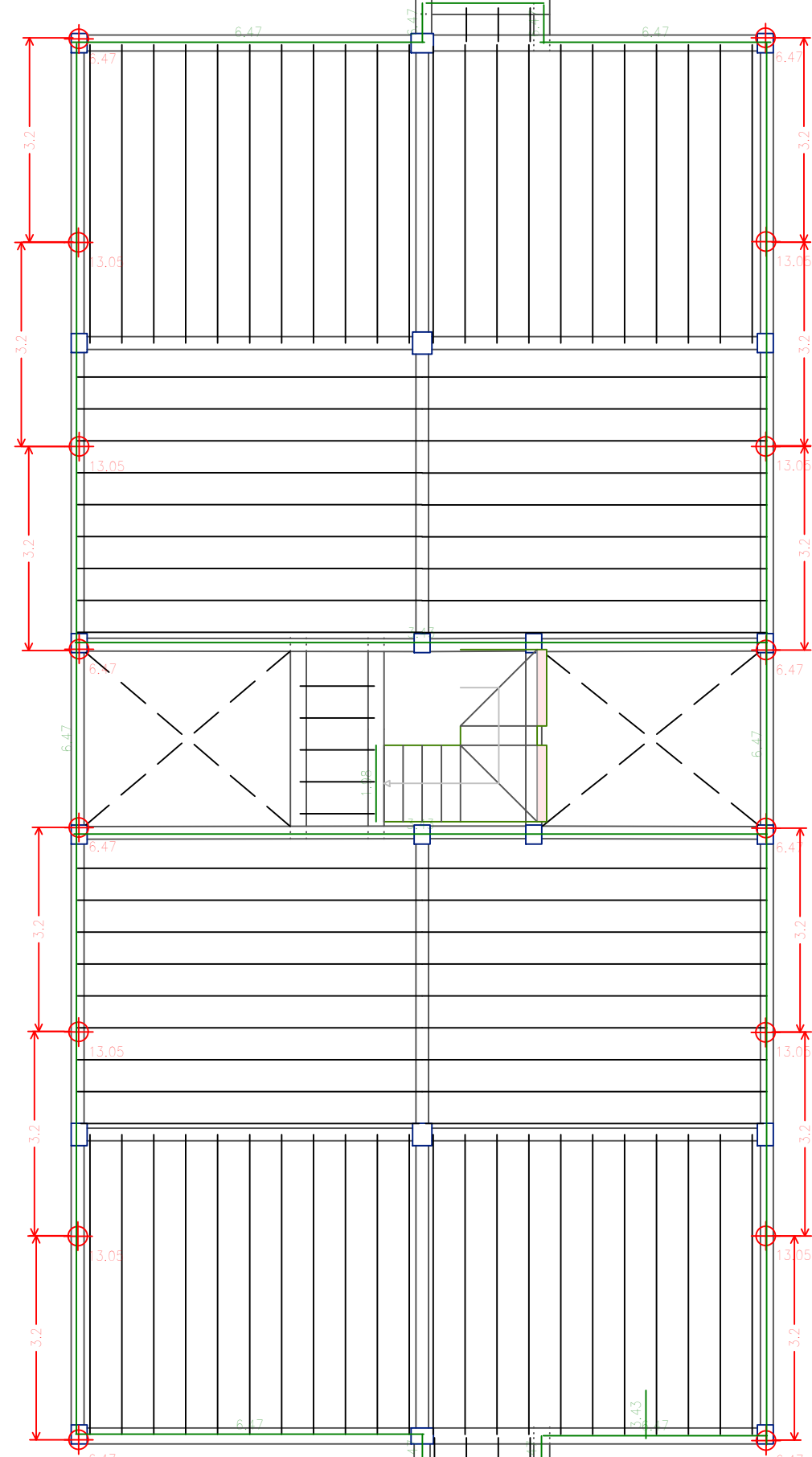
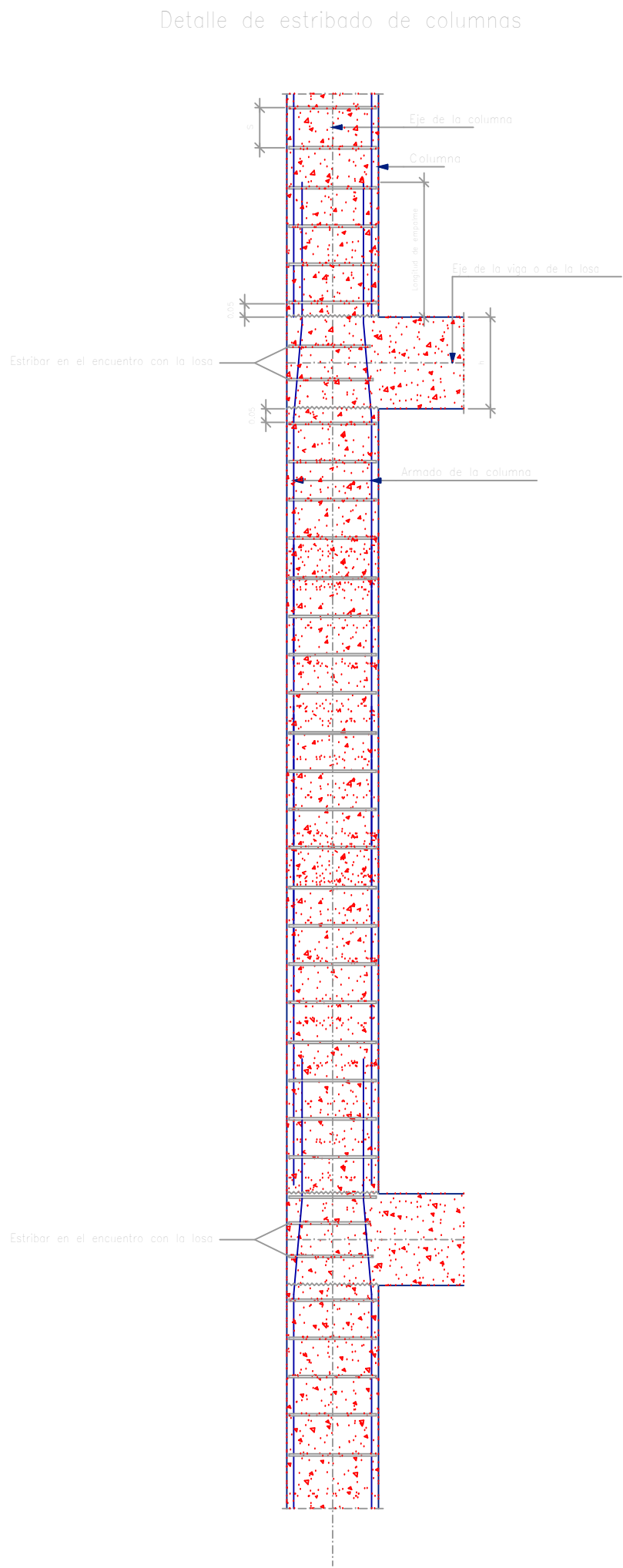
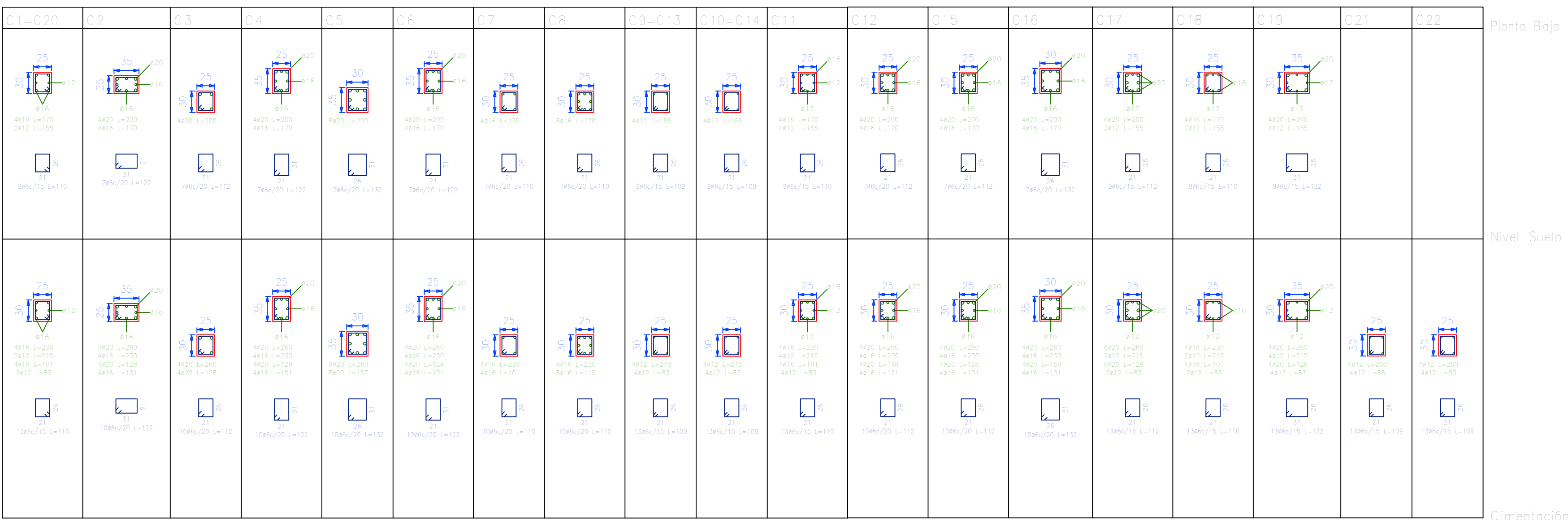
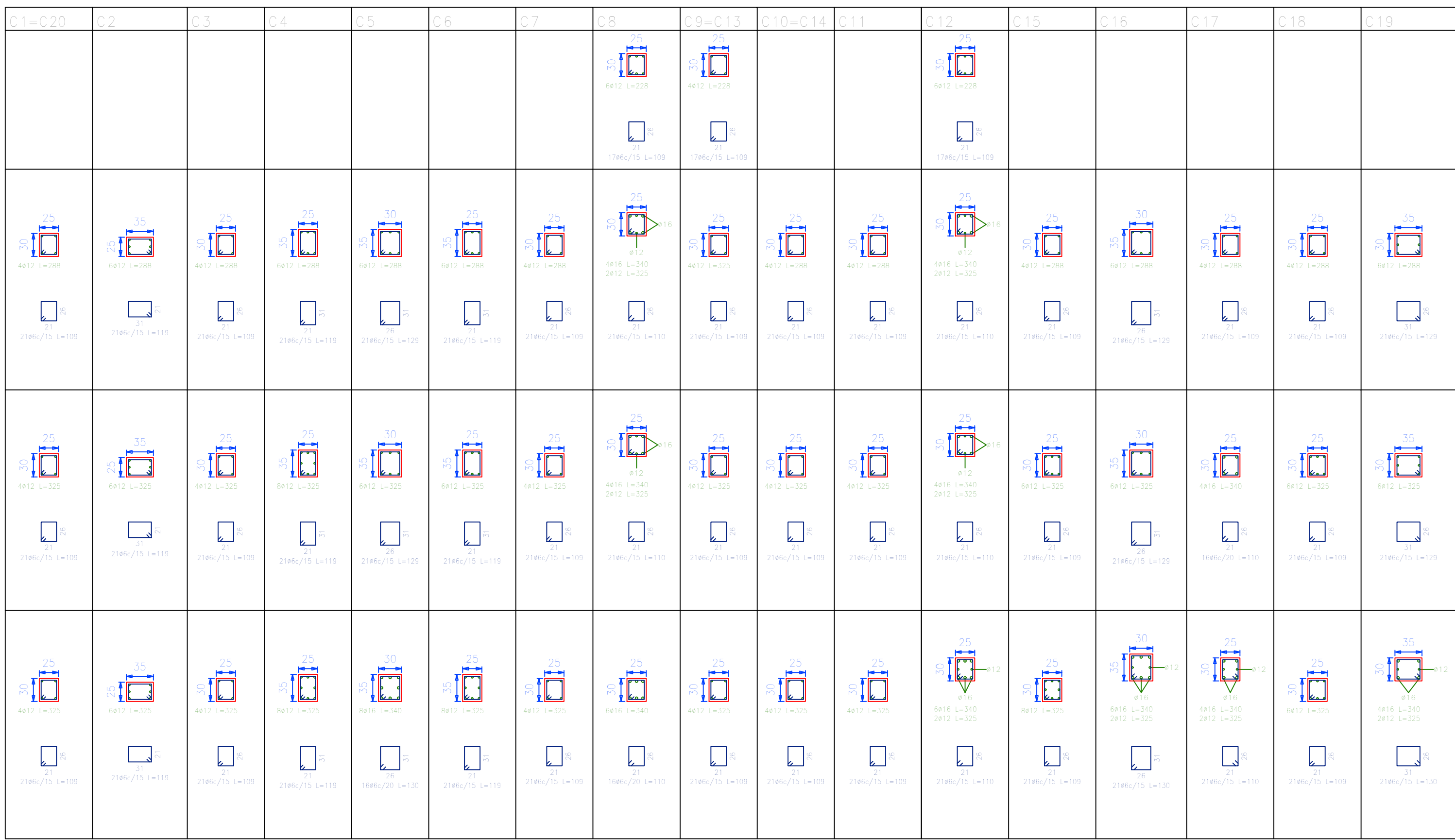


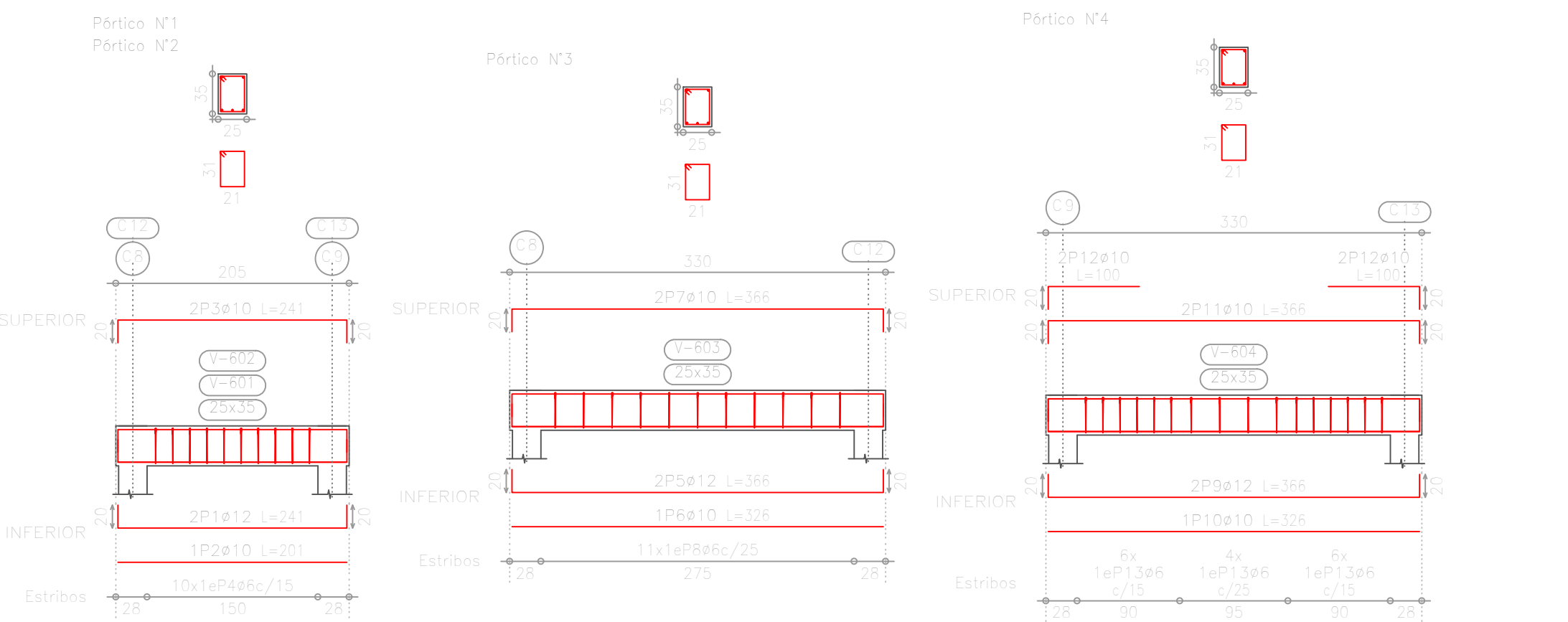
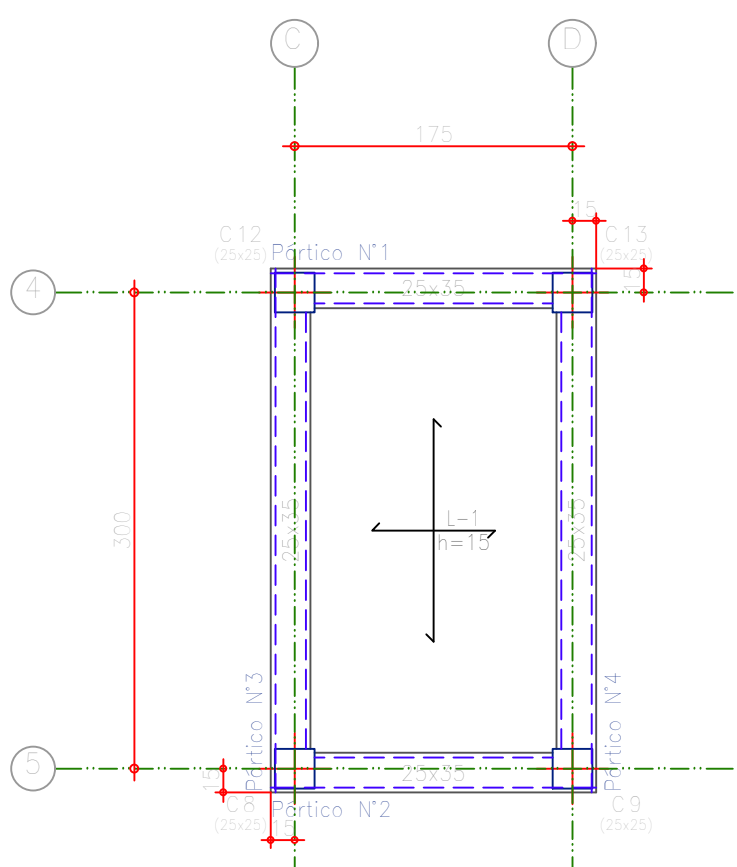
Tabla de características de la losa de viguetas
LOSA DE VIGUETAS DE HORMIGÓN
Altura de bovedilla: 20 cm
Espesor capa compresor: 5 cm
Interje: 50 cm
Bovedillo: De poliestireno
Ancho del nervio: 11 cm
Volumen de hormigón: 0,109 m3/m2
Peso propio: 0,272 t/m2
Nota: Consulte los detalles referentes a uniones con losas de la estructura principal y de las zonas macizadas.



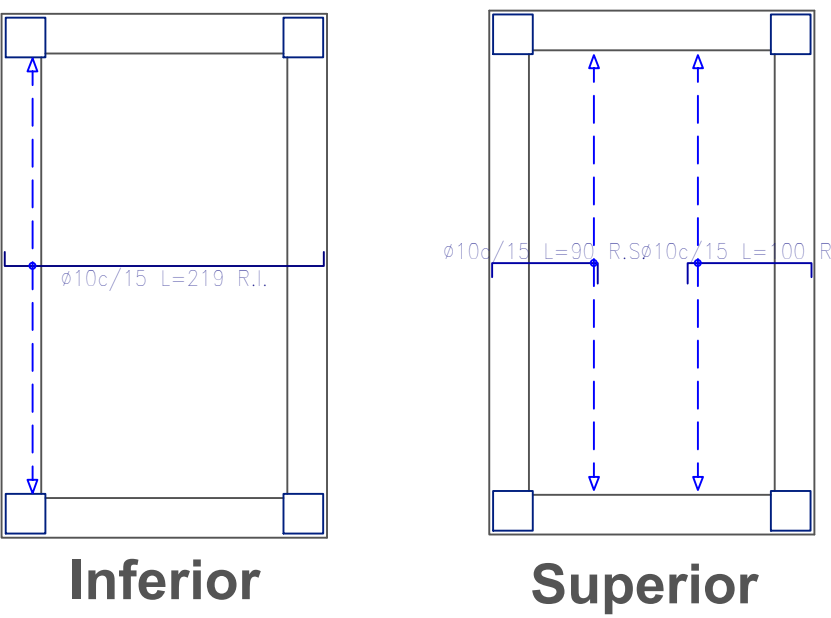
Resumen Acero	Long. total	Peso x 100	
Planta Baja	1365.4	680	
Nivel Suelo	1024.0	1000	
	447.2	776	
	274.8	140	

Cuadro de Columnas Esc. 1:50

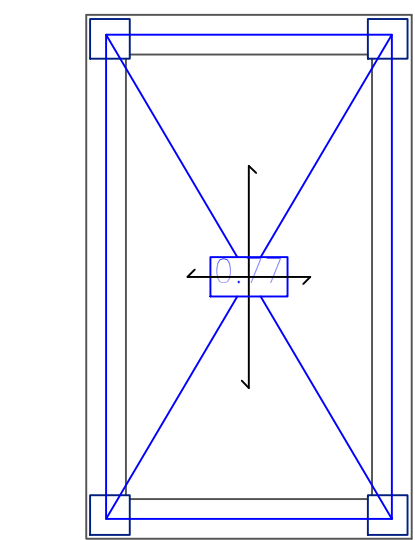
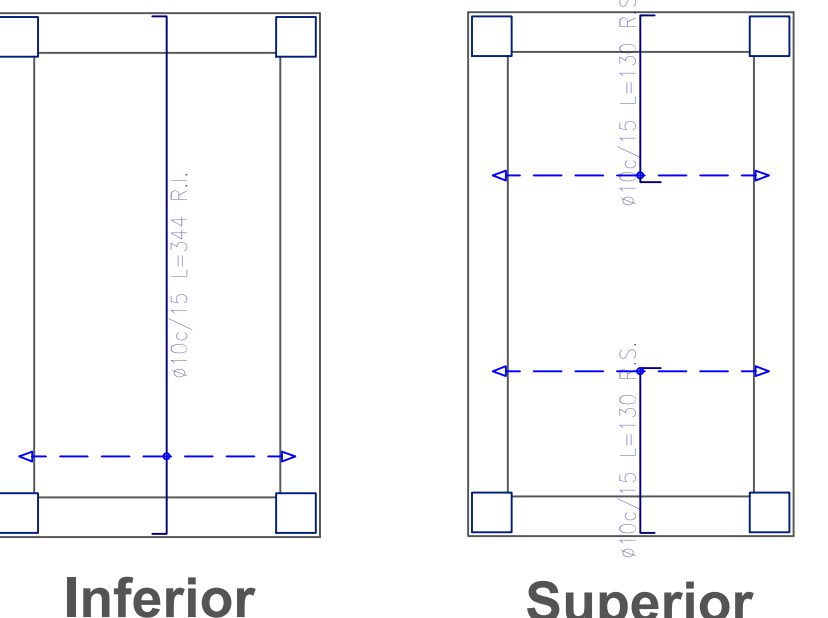
Armadura superior Losa de viguetas Cubierta
Esc. 1:50



Armadura transversal Esc 1:50



Armadura longitudinal Esc 1:50



Sobrecarga de uso

Resumen Acero	Long. total	Peso x 100
Tanque Elevado	41.0	47.4
Armadura transversal superior		
Pl-5000-N		28

Resumen Acero	Long. total	Peso x 100
Tanque Elevado	41.0	47.4
Armadura transversal inferior		
Pl-5000-N		28

Resumen Acero	Long. total	Peso x 100
Tanque Elevado	41.0	47.4
Armadura longitudinal superior		
Pl-5000-N		21

Tanque Elevado	Resumen de vigas	Resumen de pilares
Hormigón: H-20 , Control Normal		
Acero: AH-500 , Control Normal		
Escala: 1:50		

Grupo Tanque Elevado	Resumen de vigas	Resumen de pilares
Hormigón: H-20 , Control Normal		
Acero: AH-500 , Control Normal		
Escala: 1:50		

Resumen Acero	Long. total	Peso x 100
Tanque Elevado	41.0	47.4
Armadura transversal superior		
Pl-5000-N		28

Resumen Acero	Long. total	Peso x 100
Tanque Elevado	41.0	47.4
Armadura transversal inferior		
Pl-5000-N		28

Resumen Acero	Long. total	Peso x 100
Tanque Elevado	41.0	47.4
Armadura transversal superior		
Pl-5000-N		28