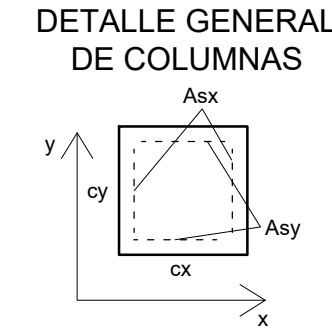
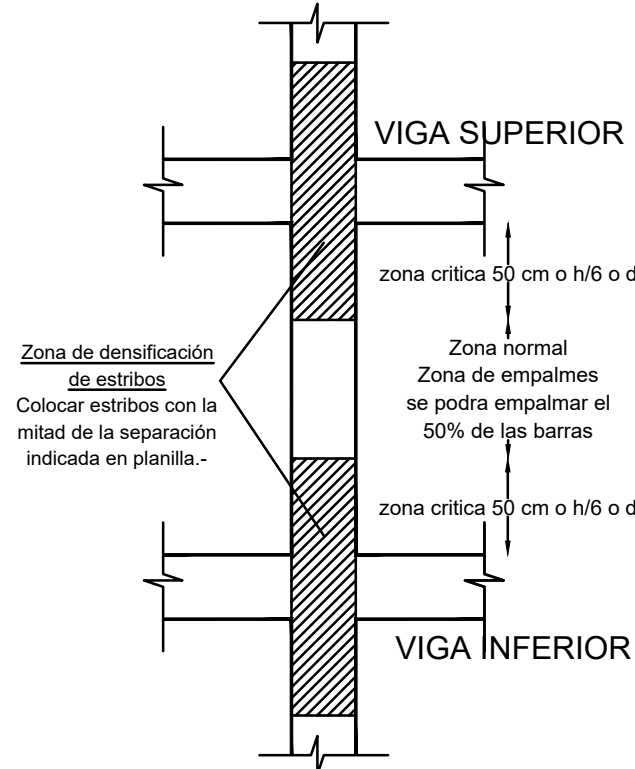


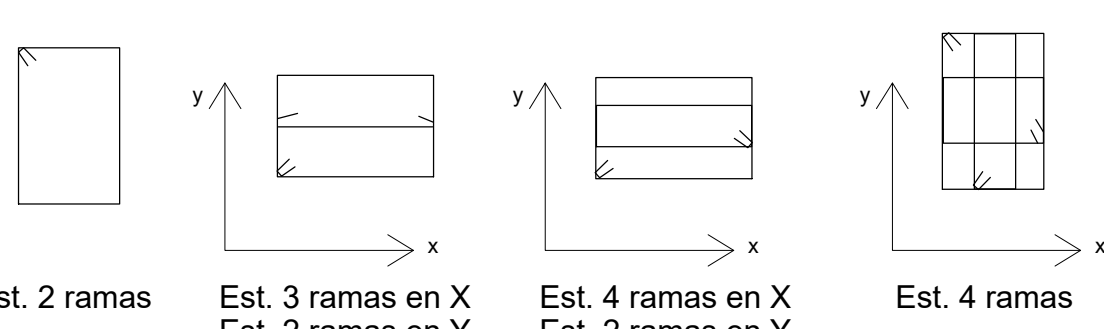
PLANILLA DE COLUMNAS																	
ADN-420 $\beta_s = 4200 \text{ Kg/cm}^2$ H-21 $\beta_r = 170 \text{ Kg/cm}^2$																	
COLUMNA	H (m)	cx (cm)	cy (cm)	Nux May (t)	Mux May (mm)	Asx / Asy	Qux Quy (t)	Asx	Estribos								
						cm ²	mm	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²		
C201	X	4.70	60	90	-12.7	34.10	15.79	5	20	16.38	7.0	8.3	4	8	15		
	Y	4.70	60	90	-9.4	24.45	13.98	5	20	11.99	5.2	7.5	4	8	15		
C202	X	4.70	50	50	-2.7	19.45	11.13	5	20	9.59	5.0	6.0	3	6	15		
	Y	4.70	50	50	-1.8	18.78	11.13	5	20	9.13	4.8	5.7	3	6	15		
C203	X	4.70	60	60	-11.9	28.05	18.94	2	3	25	22	23.62	8.4	12.0	4	8	15
	Y	4.70	60	60	-13.0	40.62	18.94	2	3	25	20	18.53	7.0	9.9	4	8	15
C204	X	4.70	50	60	-7.3	22.43	12.14	5	20	11.54	5.0	7.2	4	8	15		
	Y	4.70	50	60	-9.4	32.51	15.79	5	20	15.81	6.8	8.1	4	8	15		
C205	X	4.70	60	60	-15.1	40.26	18.94	7	20	19.84	7.1	10.1	4	8	15		
	Y	4.70	60	60	-5.1	20.57	10.20	5	20	9.16	3.3	4.7	3	6	15		
C206	X	4.70	30	50	-5.8	3.25	2.43	3	16	4.9	10.6	2.1	10	8	10		
	Y	4.70	30	50	-6.2	4.04	1.82	3	16	18.68	17.2	12.3	2	10	10		
C207	X	4.70	60	30	-17.3	27.25	11.06	2	1	25	20	12.34	8.6	6.3	2	8	10
	Y	4.70	60	30	-11.1	6.93	5.63	2	2	25	20	2.95	2.3	3.3	4	8	10
C208	X	2.70	30	30	-0.8	3.31	4.37	3	16	6.13	9.6	6.9	2	8	15		
	Y	2.70	30	30	-1.9	6.35	5.83	3	16	4.25	6.7	4.8	2	8	15		
COLUMNA	H (m)	cx (cm)	cy (cm)	Nux May (t)	Mux May (mm)	Asx / Asy	Qux Quy (t)	Asx	Estribos								
						cm ²	mm	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²		
C250	X	4.70	50	55	-2.8	17.51	11.13	4	20	8.27	3.9	5.1	4	8	15		
	Y	4.70	50	55	-0.5	33.23	12.24	4	20	10.87	5.2	6.1	4	8	15		
C251	X	4.70	60	55	-11.7	25.01	13.36	4	20	11.80	4.6	6.0	4	8	15		
	Y	4.70	60	55	-5.0	27.62	13.36	5	20	12.76	5.0	7.2	4	8	15		
C252	X	4.70	50	70	-7.9	32.18	14.17	5	20	10.41	3.9	6.5	4	8	15		
	Y	4.70	50	70	-11.8	38.49	15.58	6	20	17.20	6.2	7.4	4	8	15		
C253	X	4.70	60	70	-21.2	27.88	10.20	5	20	12.75	3.9	6.5	4	8	15		
	Y	4.70	60	70	-20.4	43.65	17.00	6	20	18.83	5.7	8.1	4	8	15		
CE	X	varios	20	20	-	-	-	2	10	-	-	-	2	6	15		
	Y	varios	20	20	-	-	-	2	10	-	-	-	2	6	15		



DETALLE COLUMNAS



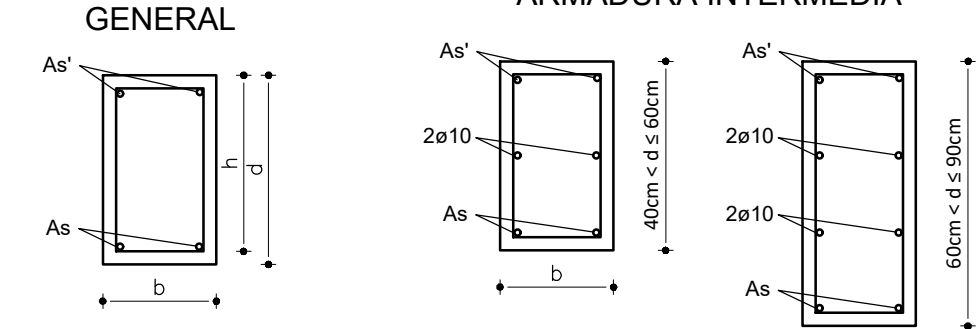
DETALLE GENERAL DE ESTRIBOS EN COLUMNAS



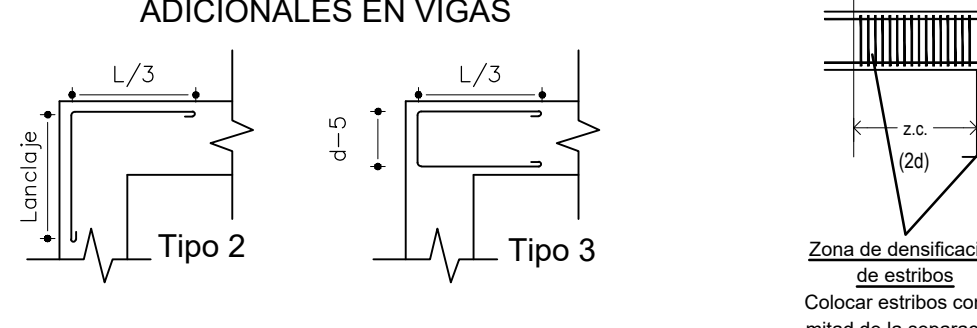
PLANILLA DE VIGAS

ADN-420 $\beta_s = 4200 \text{ Kg/cm}^2$ H-21 $\beta_r = 170 \text{ Kg/cm}^2$																				
VIGA	L (m)	b (cm)	d (cm)	Mut (mm)	As / As		Adicional A		Adicional B		Qu (t)	t ¹ (mm)	As	Estribos						
					cm ²	mm ²	mm	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²					
V201	10.00	35	90	27.0	-	3	20	-30.38	8.72	-	-	-	-	-	26.09	10.2	8.5	3	8	15
					7.71	3	20	9.37	2.62	-	-	-	-	-	-	-	-	-	-	-
V202	varios	35	65	3.4	-	2	3	16	-16.24	6.59	-	-	-	-	16.32	9.0	7.5	3	8	15
					1.33	2	3	16	-12	15.32	6.20	-	-	-	8.47	3.37	-	-	-	-
V203	10.00	35	90	29.2	-	3	20	-16	-39.18	11.38	-	-	-	-	-	42.29	12.33	-	-	-
					8.37	3	20	-0.39	0.11	-	-	-	-	-	4.54	1.26	-	-	-	-
V204	varios	35	65	5.9	-	3	20	-20.88	8.57	-	-	-	-	-	-	21.11	8.67	-	-	-
					2.34	2	3	16	-12	10.61	4.25	-	-	-	12.25	3.34	-	-	-	-
V205	varios	35	65	21.2	-	5	20	-34.68	14.61	-	-	-	-	-	-	19.31	7.90	-	-	-
					8.73	2	2	16	-24.56	10.18	-	-	-	-	12.78	6.13	-	-	-	-
V206	varios	35	65	36.6	-	2	3	16	-12	-6.19	2.45	-	-	-	-	2.00	0.78	-	-	-
					15.72	2	3	16	-20	-1.31	0.91	-	-	-	-	0.88	0.38	-	-	-
V207	varios	30	65	5.8	-	2	3	16	-29.44	12.56	-	-	-	-	-	30.99	13.29	-	-	-
					2.22	2	3	16	-23.85	9.89	-	-	-	-	28.52	12.12	-	-	-	-
V208	varios	30	65	5.8	-	10	12	14	0.84	-	-	-	-	-	-	15.27	12.22	-	-	-
V209	varios	30	65	2.4	-	0.93	3	16	1.13	0.44	-	-	-	-	-	12.24	4.94	-	-	-
					3	12	0.68	0.36	-	-	-	-	-	-	4.71	2.53	-	-	-	-
V016	varios	20	50	3.6	-	1.93	3	12	1.76	0.92	-	-	-	-	-	0.27	0.14	-	-	-
V017	varios	20	50	3.7	-	1.96	4	12	2.82	1.49	-	-	-	-	-	9.12	5.06	-	-	-
					2	12	1.48	0.74	-	-	-	-	-	-	5.94	3.22	-	-	-	-
V018	varios	20	35	0.8	-	0.80	3	12	0.94	0.73	-	-	-	-	-	1.50	1.18	-	-	-
					3	12	0.94	0.73	-	-	-	-	-	-	1.71	1.36	-	-	-	-
V019	varios	20	35	0.7	-	0.57	3	12	1.28	0.99	-	-	-	-	-	3.48	2.83	-	-	-
					3	12	1.28	0.99	-	-	-	-	-	-	2.18	1.74	-	-	-	-
VEsc	varios	20	35	2.2	-	1.78	3	12	-1.00	0.78	-	-	-	-	-	2.80	2.25	-	-	-
					1.78	3	12	0.65	0.50	-	-	-	-	-	1.70	1.34	-	-	-	-
VIGA	L (m)	b (cm)	d (cm)	Mut (mm)	As / As		Adicional A		Adicional B		Qu (t)	t ¹ (mm)	As	Estribos						
					cm ²	mm ²	mm	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²	mm ²					
V250	varias	35	65	9.9	-	2	3	16	-12	-14.07	5.68	-	-	-	-	15.32	6.20	-	-	-
					3.96	2	3	16	-12	7.86	3.13	-	-	-	-	5.86	2.32	-	-	-
V251	varias	35	65	4.5	-	1.77	2	3	16	-12	-20.98	9.61	-	-	-	20.84	8.56	-	-	-
					1.77	2	3	16	-12	14.85	6.00	-	-	-	-	14.83	6.00	-	-	-

DETALLE DE VIGAS CON ARMADURA INTERMEDIA



DETALLE DE ARMADURAS ADICIONALES EN VIGAS



ANCLAJES MÍNIMOS. (Lo (cm))

a barra	Elemento y posición	Columna
8	Viga (sup)	32
10	Viga (inf)	40
12	Viga (sup)	48
16	Viga (inf)	64
20	Viga (sup)	80
25	Viga (inf)	100

* Las longitudes de anclaje se consideran desde cara interna de apoyo.
* Se han tenido en cuenta los extremos de las barras (sin gancho).

Emplalmes (mm)

Zona I	Zona II
Columnas	B ² sup vigas
B ² inf. Vigas	
Dímetro	
8	420
10	525
12	630
16	830
20	1080
25	1350
	2025
	2531

