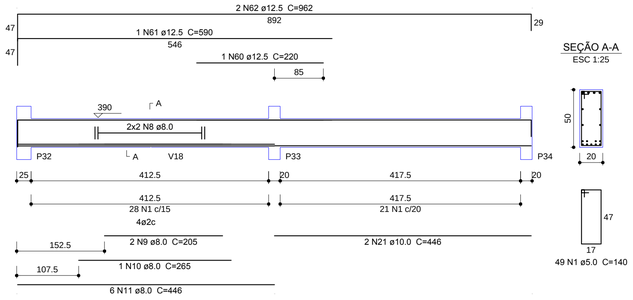
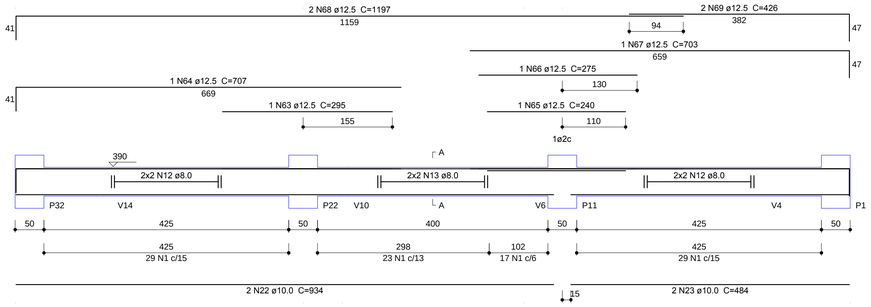
V15
ESC 1:50

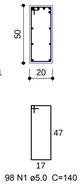


SEÇÃO A-A
ESC 1:25

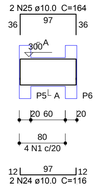
V17
ESC 1:50



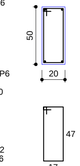
SEÇÃO A-A
ESC 1:25



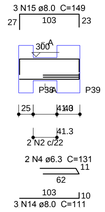
V24
ESC 1:50



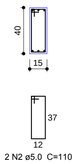
SEÇÃO A-A
ESC 1:25



V27
ESC 1:50



SEÇÃO A-A
ESC 1:25

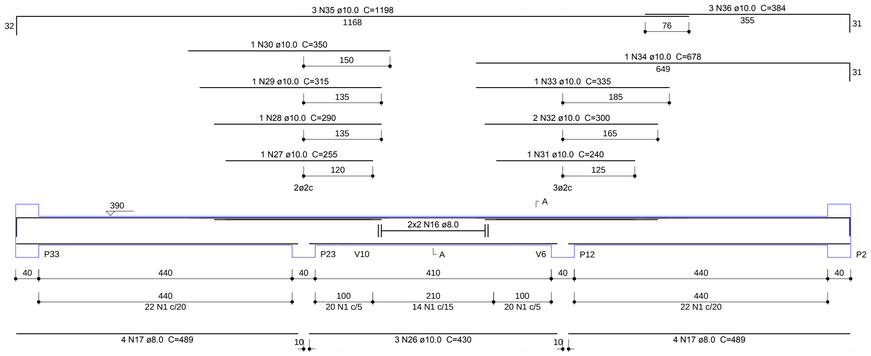


Relação do aço

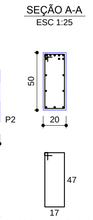
V15	V17	V20
V22	V23	V24
V25	V27	V28
V30	V31	V33
V34	V35	V36
V37		

AÇO	N	DIAM (mm)	QUANT (Barras)	UNIT (cm)	C.TOTAL (cm)
CA60	1	5.0	520	140	72800
	2	5.0	9	110	990
	3	5.0	2	165	330
CA50	4	6.3	2	131	262
	5	6.3	1	96	96
	6	6.3	1	136	136
	7	6.3	5	91	455
	8	8.0	4	CORR	1652
	9	8.0	2	205	410
	10	8.0	1	265	265
	11	8.0	6	446	2676
	12	8.0	8	CORR	3400
	13	8.0	4	CORR	1600
	14	8.0	3	111	333
	15	8.0	3	149	447
	16	8.0	4	CORR	1640
	17	8.0	8	489	3912
	18	8.0	4	CORR	1380
	19	8.0	4	430	1720
	20	8.0	4	118	472
	21	10.0	2	446	892
	22	10.0	2	934	1868
	23	10.0	2	484	968
	24	10.0	2	116	232
	25	10.0	2	164	328
	26	10.0	3	430	1290
	27	10.0	1	255	255
	28	10.0	1	290	290
	29	10.0	1	315	315
	30	10.0	1	350	350
	31	10.0	1	240	240
	32	10.0	2	300	600
	33	10.0	1	335	335
	34	10.0	1	678	678
	35	10.0	3	1198	3594
	36	10.0	3	384	1152
	37	10.0	2	834	1668
	38	10.0	2	270	540
	39	10.0	2	664	1328
	40	10.0	1	684	684
	41	10.0	2	764	1528
	42	10.0	6	489	2934
	43	10.0	4	499	1996
	44	10.0	2	939	1878
	45	10.0	1	265	265
	46	10.0	2	305	610
	47	10.0	1	699	699
	48	10.0	1	719	719
	49	10.0	2	779	1558
	50	10.0	2	173	346
	51	10.0	4	160	640
	52	10.0	2	113	226
	53	10.0	2	170	340
	54	10.0	2	143	286
	55	10.0	2	200	400
	56	10.0	4	132	528
	57	10.0	4	199	796
	58	10.0	4	139	556
	59	10.0	4	196	784
	60	12.5	1	220	220
	61	12.5	1	590	590
	62	12.5	2	962	1924
	63	12.5	1	295	295
	64	12.5	1	707	707
	65	12.5	1	240	240
	66	12.5	1	275	275
	67	12.5	1	703	703
	68	12.5	2	1197	2394
	69	12.5	2	426	852
	70	12.5	3	503	1509
	71	12.5	2	168	336
	72	16.0	1	810	810
	73	16.0	2	1196	2392
	74	16.0	2	465	930
	75	16.0	1	380	380
	76	16.0	2	590	1180
	77	20.0	2	576	1152
	78	20.0	2	370	740
	79	20.0	1	450	450
	80	20.0	1	535	535
	81	20.0	2	720	1440
	82	20.0	1	395	395
	83	20.0	2	635	1270

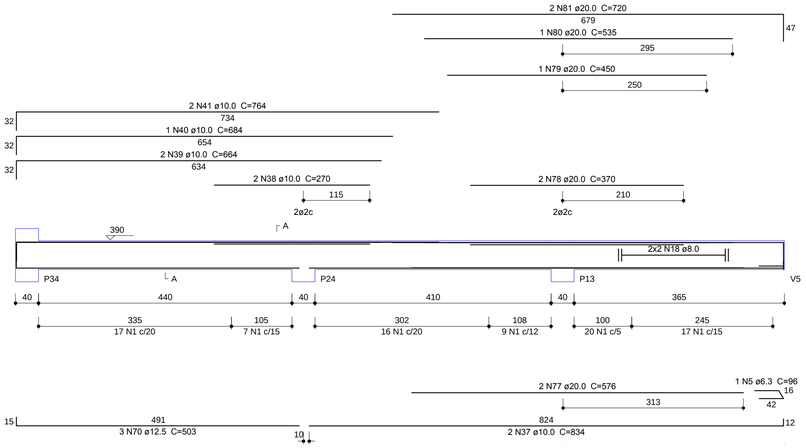
V20
ESC 1:50



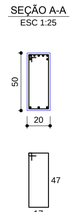
SEÇÃO A-A
ESC 1:25



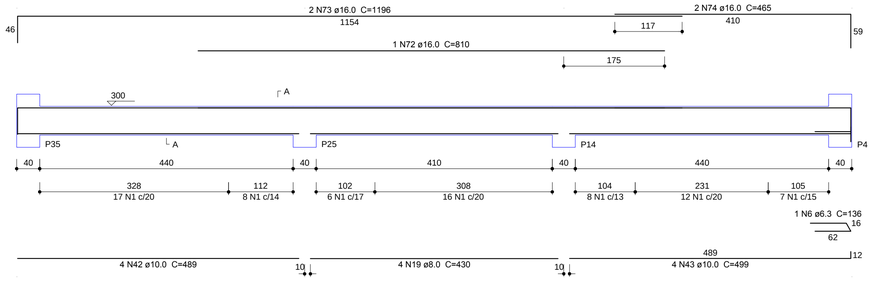
V22
ESC 1:50



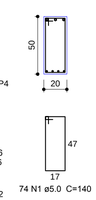
SEÇÃO A-A
ESC 1:25



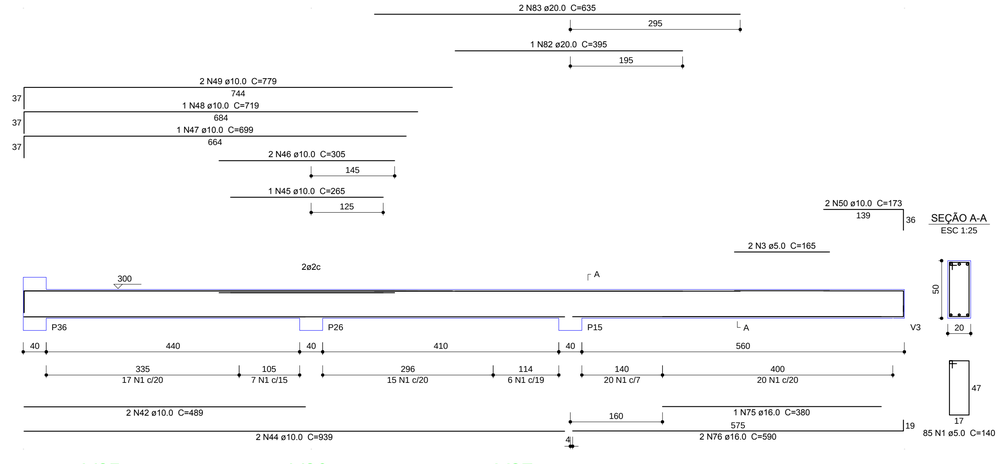
V23
ESC 1:50



SEÇÃO A-A
ESC 1:25



V25
ESC 1:50



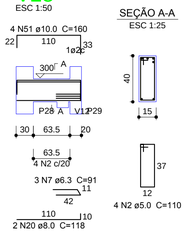
SEÇÃO A-A
ESC 1:25

Resumo do aço

AÇO	DIAM (mm)	C.TOTAL (m)	PESO + 10 % (kg)
CA50	6.3	9.5	2.6
	8.0	199.1	86.4
	10.0	347	235.3
	12.5	100.5	106.4
	16.0	57	98.8
	20.0	59.9	162.3
CA60	5.0	741.2	125.7
PESO TOTAL (kg)			
CA50	691.8		
CA60	125.7		

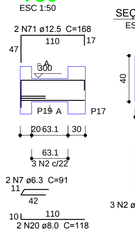
Volume de concreto (C-25) = 9.19 m³
Área de forma = 110.99 m²

V28
ESC 1:50

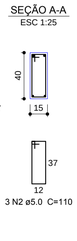


SEÇÃO A-A
ESC 1:25

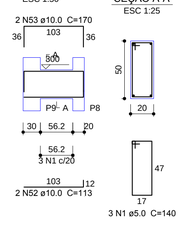
V30
ESC 1:50



SEÇÃO A-A
ESC 1:25

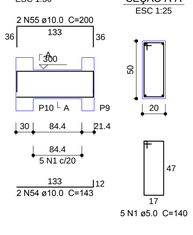


V31
ESC 1:50



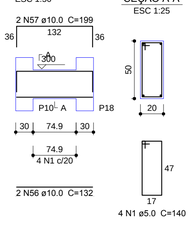
SEÇÃO A-A
ESC 1:25

V33
ESC 1:50



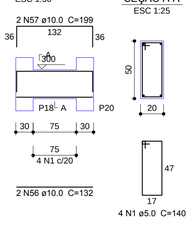
SEÇÃO A-A
ESC 1:25

V34
ESC 1:50



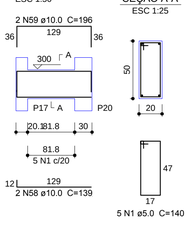
SEÇÃO A-A
ESC 1:25

V35
ESC 1:50



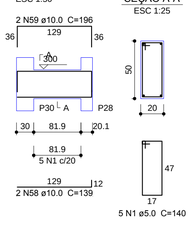
SEÇÃO A-A
ESC 1:25

V36
ESC 1:50



SEÇÃO A-A
ESC 1:25

V37
ESC 1:50



SEÇÃO A-A
ESC 1:25

PROJETO:
PROJETO ESTRUTURAL
CRECHE DE COXILHA

RESPONSÁVEL TÉCNICO:
PAULO FRANCISCO MORANDO
ENG. CIVIL - CREA 53822

PROPRIETÁRIO
PREFEITURA MUNICIPAL DE COXILHA

MORANDO ENGENHARIA
R. Capitão Eleutério, 610, sala 104
Fone: 3313-5454 - 9981-2306
Passo Fundo - RS.

DESENHO:	PROJETO:	ÁREA:	ESCALA:	DATA:	PRACHA:
	FERRAGEM DAS VIGAS DO 2º PAVIMENTO.	m²	1/50	JUNHO/19	08