



Reg. No.: 61709



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HIDDEN RIDGE  
 RESIDENTIAL SUBDIVISION  
 DUNHAM ROAD

SITE  
 DETAILS

**C107D**  
 Project No. 2014-226

**METAL PIPE END TREATMENT 'A' W/ ANCHOR BOLT OPTION**

**METAL PIPE END TREATMENT 'B' W/ ANCHOR BOLT OPTION**

CIRCULAR				PIPE ARCH				PIPE ARCH						
D	W	H	T	CONC.	SPAN	RISE	T	CONC.	SPAN	RISE	H	T	CONC.	
12"	3'-0"	3'-0"	0"	0.21										
15"	3'-0"	3'-0"	0"	0.27	17'	13'	3'-0"	0"	0.21	31'	6'	13'-0"	5'-7"	2.34
18"	3'-0"	3'-0"	0"	0.33	21'	15'	3'-0"	0"	0.35	35'	8'	14'-0"	5'-9"	3.14
24"	3'-0"	3'-0"	0"	0.59	24'	18'	4'-0"	3'-0"	0.43	103'	7'	15'-0"	5'-11"	3.54
30"	3'-0"	3'-0"	0"	0.68	26'	20'	4'-0"	3'-0"	0.48	108'	7'	16'-0"	6'-1"	3.96
36"	3'-0"	3'-0"	0"	0.80	28'	22'	4'-0"	3'-0"	0.51	113'	7'	17'-0"	6'-2"	4.39
42"	3'-0"	3'-0"	0"	0.94	30'	24'	4'-0"	3'-0"	0.55	118'	7'	18'-0"	6'-3"	4.83
48"	3'-0"	3'-0"	0"	1.10	32'	26'	4'-0"	3'-0"	0.59	123'	7'	19'-0"	6'-4"	5.28
54"	3'-0"	3'-0"	0"	1.28	34'	28'	4'-0"	3'-0"	0.63	128'	7'	20'-0"	6'-5"	5.74
60"	3'-0"	3'-0"	0"	1.48	36'	30'	4'-0"	3'-0"	0.68	133'	7'	21'-0"	6'-6"	6.21
66"	3'-0"	3'-0"	0"	1.70	38'	32'	4'-0"	3'-0"	0.73	138'	7'	22'-0"	6'-7"	6.69
72"	3'-0"	3'-0"	0"	1.95	40'	34'	4'-0"	3'-0"	0.78	143'	7'	23'-0"	6'-8"	7.18
78"	3'-0"	3'-0"	0"	2.23	42'	36'	4'-0"	3'-0"	0.84	148'	7'	24'-0"	6'-9"	7.68
84"	3'-0"	3'-0"	0"	2.54	44'	38'	4'-0"	3'-0"	0.91	153'	7'	25'-0"	6'-10"	8.19
90"	3'-0"	3'-0"	0"	2.88	46'	40'	4'-0"	3'-0"	0.98	158'	7'	26'-0"	6'-11"	8.71
96"	3'-0"	3'-0"	0"	3.25	48'	42'	4'-0"	3'-0"	1.06	163'	7'	27'-0"	6'-12"	9.24
102"	3'-0"	3'-0"	0"	3.65	50'	44'	4'-0"	3'-0"	1.15	168'	7'	28'-0"	6'-13"	9.78
108"	3'-0"	3'-0"	0"	4.08	52'	46'	4'-0"	3'-0"	1.25	173'	7'	29'-0"	6'-14"	10.33
114"	3'-0"	3'-0"	0"	4.54	54'	48'	4'-0"	3'-0"	1.36	178'	7'	30'-0"	6'-15"	10.89
120"	3'-0"	3'-0"	0"	5.03	56'	50'	4'-0"	3'-0"	1.48	183'	7'	31'-0"	6'-16"	11.46
126"	3'-0"	3'-0"	0"	5.55	58'	52'	4'-0"	3'-0"	1.61	188'	7'	32'-0"	6'-17"	12.04
132"	3'-0"	3'-0"	0"	6.11	60'	54'	4'-0"	3'-0"	1.75	193'	7'	33'-0"	6'-18"	12.63
138"	3'-0"	3'-0"	0"	6.70	62'	56'	4'-0"	3'-0"	1.90	198'	7'	34'-0"	6'-19"	13.23
144"	3'-0"	3'-0"	0"	7.33	64'	58'	4'-0"	3'-0"	2.06	203'	7'	35'-0"	6'-20"	13.84
150"	3'-0"	3'-0"	0"	8.00	66'	60'	4'-0"	3'-0"	2.24	208'	7'	36'-0"	6'-21"	14.46
156"	3'-0"	3'-0"	0"	8.71	68'	62'	4'-0"	3'-0"	2.43	213'	7'	37'-0"	6'-22"	15.09
162"	3'-0"	3'-0"	0"	9.46	70'	64'	4'-0"	3'-0"	2.64	218'	7'	38'-0"	6'-23"	15.73
168"	3'-0"	3'-0"	0"	10.25	72'	66'	4'-0"	3'-0"	2.86	223'	7'	39'-0"	6'-24"	16.38
174"	3'-0"	3'-0"	0"	11.08	74'	68'	4'-0"	3'-0"	3.10	228'	7'	40'-0"	6'-25"	17.04
180"	3'-0"	3'-0"	0"	11.95	76'	70'	4'-0"	3'-0"	3.35	233'	7'	41'-0"	6'-26"	17.71
186"	3'-0"	3'-0"	0"	12.86	78'	72'	4'-0"	3'-0"	3.62	238'	7'	42'-0"	6'-27"	18.39
192"	3'-0"	3'-0"	0"	13.81	80'	74'	4'-0"	3'-0"	3.91	243'	7'	43'-0"	6'-28"	19.08
198"	3'-0"	3'-0"	0"	14.80	82'	76'	4'-0"	3'-0"	4.21	248'	7'	44'-0"	6'-29"	19.78
204"	3'-0"	3'-0"	0"	15.83	84'	78'	4'-0"	3'-0"	4.53	253'	7'	45'-0"	6'-30"	20.49
210"	3'-0"	3'-0"	0"	16.90	86'	80'	4'-0"	3'-0"	4.87	258'	7'	46'-0"	6'-31"	21.21
216"	3'-0"	3'-0"	0"	18.01	88'	82'	4'-0"	3'-0"	5.23	263'	7'	47'-0"	6'-32"	21.94
222"	3'-0"	3'-0"	0"	19.16	90'	84'	4'-0"	3'-0"	5.61	268'	7'	48'-0"	6'-33"	22.68
228"	3'-0"	3'-0"	0"	20.35	92'	86'	4'-0"	3'-0"	6.01	273'	7'	49'-0"	6'-34"	23.43
234"	3'-0"	3'-0"	0"	21.59	94'	88'	4'-0"	3'-0"	6.43	278'	7'	50'-0"	6'-35"	24.19
240"	3'-0"	3'-0"	0"	22.87	96'	90'	4'-0"	3'-0"	6.87	283'	7'	51'-0"	6'-36"	24.96
246"	3'-0"	3'-0"	0"	24.20	98'	92'	4'-0"	3'-0"	7.33	288'	7'	52'-0"	6'-37"	25.74
252"	3'-0"	3'-0"	0"	25.58	100'	94'	4'-0"	3'-0"	7.81	293'	7'	53'-0"	6'-38"	26.53
258"	3'-0"	3'-0"	0"	27.01	102'	96'	4'-0"	3'-0"	8.31	298'	7'	54'-0"	6'-39"	27.33
264"	3'-0"	3'-0"	0"	28.49	104'	98'	4'-0"	3'-0"	8.83	303'	7'	55'-0"	6'-40"	28.14
270"	3'-0"	3'-0"	0"	29.99	106'	100'	4'-0"	3'-0"	9.37	308'	7'	56'-0"	6'-41"	28.96
276"	3'-0"	3'-0"	0"	31.54	108'	102'	4'-0"	3'-0"	9.93	313'	7'	57'-0"	6'-42"	29.79
282"	3'-0"	3'-0"	0"	33.14	110'	104'	4'-0"	3'-0"	10.51	318'	7'	58'-0"	6'-43"	30.63
288"	3'-0"	3'-0"	0"	34.79	112'	106'	4'-0"	3'-0"	11.11	323'	7'	59'-0"	6'-44"	31.48
294"	3'-0"	3'-0"	0"	36.49	114'	108'	4'-0"	3'-0"	11.73	328'	7'	60'-0"	6'-45"	32.34
300"	3'-0"	3'-0"	0"	38.24	116'	110'	4'-0"	3'-0"	12.37	333'	7'	61'-0"	6'-46"	33.21
306"	3'-0"	3'-0"	0"	40.04	118'	112'	4'-0"	3'-0"	13.03	338'	7'	62'-0"	6'-47"	34.09
312"	3'-0"	3'-0"	0"	41.89	120'	114'	4'-0"	3'-0"	13.71	343'	7'	63'-0"	6'-48"	34.98
318"	3'-0"	3'-0"	0"	43.79	122'	116'	4'-0"	3'-0"	14.41	348'	7'	64'-0"	6'-49"	35.88
324"	3'-0"	3'-0"	0"	45.74	124'	118'	4'-0"	3'-0"	15.13	353'	7'	65'-0"	6'-50"	36.79
330"	3'-0"	3'-0"	0"	47.74	126'	120'	4'-0"	3'-0"	15.87	358'	7'	66'-0"	6'-51"	37.71
336"	3'-0"	3'-0"	0"	49.79	128'	122'	4'-0"	3'-0"	16.63	363'	7'	67'-0"	6'-52"	38.64
342"	3'-0"	3'-0"	0"	51.89	130'	124'	4'-0"	3'-0"	17.41	368'	7'	68'-0"	6'-53"	39.58
348"	3'-0"	3'-0"	0"	54.04	132'	126'	4'-0"	3'-0"	18.21	373'	7'	69'-0"	6'-54"	40.53
354"	3'-0"	3'-0"	0"	56.24	134'	128'	4'-0"	3'-0"	19.03	378'	7'	70'-0"	6'-55"	41.49
360"	3'-0"	3'-0"	0"	58.49	136'	130'	4'-0"	3'-0"	19.87	383'	7'	71'-0"	6'-56"	42.46
366"	3'-0"	3'-0"	0"	60.79	138'	132'	4'-0"	3'-0"	20.73	388'	7'	72'-0"	6'-57"	43.44
372"	3'-0"	3'-0"	0"	63.14	140'	134'	4'-0"	3'-0"	21.61	393'	7'	73'-0"	6'-58"	44.43
378"	3'-0"	3'-0"	0"	65.54	142'	136'	4'-0"	3'-0"	22.51	398'	7'	74'-0"	6'-59"	45.43
384"	3'-0"	3'-0"	0"	68.00	144'	138'	4'-0"	3'-0"	23.43	403'	7'	75'-0"	6'-60"	46.44
390"	3'-0"	3'-0"	0"	70.51	146'	140'	4'-0"	3'-0"	24.37	408'	7'	76'-0"	6'-61"	47.46
396"	3'-0"	3'-0"	0"	73.07	148'	142'	4'-0"	3'-0"	25.33	413'	7'	77'-0"	6'-62"	48.49
402"	3'-0"	3'-0"	0"	75.69	150'	144'	4'-0"	3'-0"	26.31	418'	7'	78'-0"	6'-63"	49.53
408"	3'-0"	3'-0"	0"	78.36	152'	146'	4'-0"	3'-0"	27.31	423'	7'	79'-0"	6'-64"	50.58
414"	3'-0"	3'-0"	0"	81.09	154'	148'	4'-0"	3'-0"	28.33	428'	7'	80'-0"	6'-65"	51.64
420"	3'-0"	3'-0"	0"	83.87	156'	150'	4'-0"	3'-0"	29.37	433'	7'	81'-0"	6'-66"	52.71
426"	3'-0"	3'-0"	0"	86.71	158'	152'	4'-0"	3'-0"	30.43	438'	7'	82'-0"	6'-67"	53.79
432"	3'-0"	3'-0"	0"	89.61	160'	154'	4'-0"	3'-0"	31.51	443'	7'	83'-0"	6'-68"	54.88
438"	3'-0"	3'-0"	0"	92.57	162'	156'	4'-0"	3'-0"	32.61	448'	7'	84'-0"	6'-69"	55.98
444"	3'-0"	3'-0"	0"	95.59	164'	158'	4'-0"	3'-0"	33.73	453'	7'	85'-0"	6'-70"	57.09
450"	3'-0"	3'-0"	0"	98.67	166'	160'	4'-0"	3'-0"	34.87	458'	7'	86'-0"	6'-71"	58.21
456"	3'-0"	3'-0"	0"	101.81	168'	162'	4'-0"	3'-0"	36.03	463'	7'	87'-0"	6'-72"	59.34
462"	3'-0"	3'-0"	0"	105.01	170'	164'	4'-0"	3'-0"	37.21	468'	7'	88'-0"	6'-73"	60.48
468"	3'-0"	3'-0"	0"	108.27	172'	166'	4'-0"	3'-0"	38.41	473'	7'	89'-0"	6'-74"	61.63
474"	3'-0"	3'-0"	0"	111.60	174'	168'	4'-0"	3'-0"	39.63	478'	7'	90'-0"	6'-75"	62.79
480"	3'-0"	3'-0"	0"	115.00	176'	170'	4'-0"	3'-0"	40.87	483'	7'	91'-0"	6'-76"	63.96
486"	3'-0"	3'-0"	0"	118.47	178'	172'	4'-0"	3'-0"	42.13	488'	7'	92'-0"	6'-77"	65.14
492"	3'-0"	3'-0"	0"	122.01	180'	174'	4'-0"	3'-0"	43.41	493'	7'	93'-0"	6'-78"	66.33
498"	3'-0"	3'-0"	0"	125.62	182'	176'	4'-0"	3'-0"	44.71	498'	7'	94'-0"	6'-79"	67.53
504"	3'-0"	3'-0"	0"	129.29	184'	178'	4'-0"	3'-0"	46.03	503'	7'	95'-0"	6'-80"	68.74
510"	3'-0"	3'-0"	0"	133.03	186'	180'	4'-0"	3'-0"	47.37	508'	7'	96'-0"	6'-81"	69.96
516"	3'-0"	3'-0"	0"	136.84	188'	182'	4'-0"	3'-0"	48.73	513'	7'	97'-0"	6'-82"	71.19
522"	3'-0"	3'-0"	0"	140.71	190'	184'	4'-0"	3'-0"	50.11	518'	7'	98'-0"	6'-83"	72.43
528"	3'-0"	3'-0"	0"	144.65	192'	186'	4'-0"	3'-0"	51.51	523'	7'	99'-0"	6'-84"	73.68
534"	3'-0"	3'-0"	0"	148.66	194'	188'	4'-0"	3'-0"	52.93	528'</				