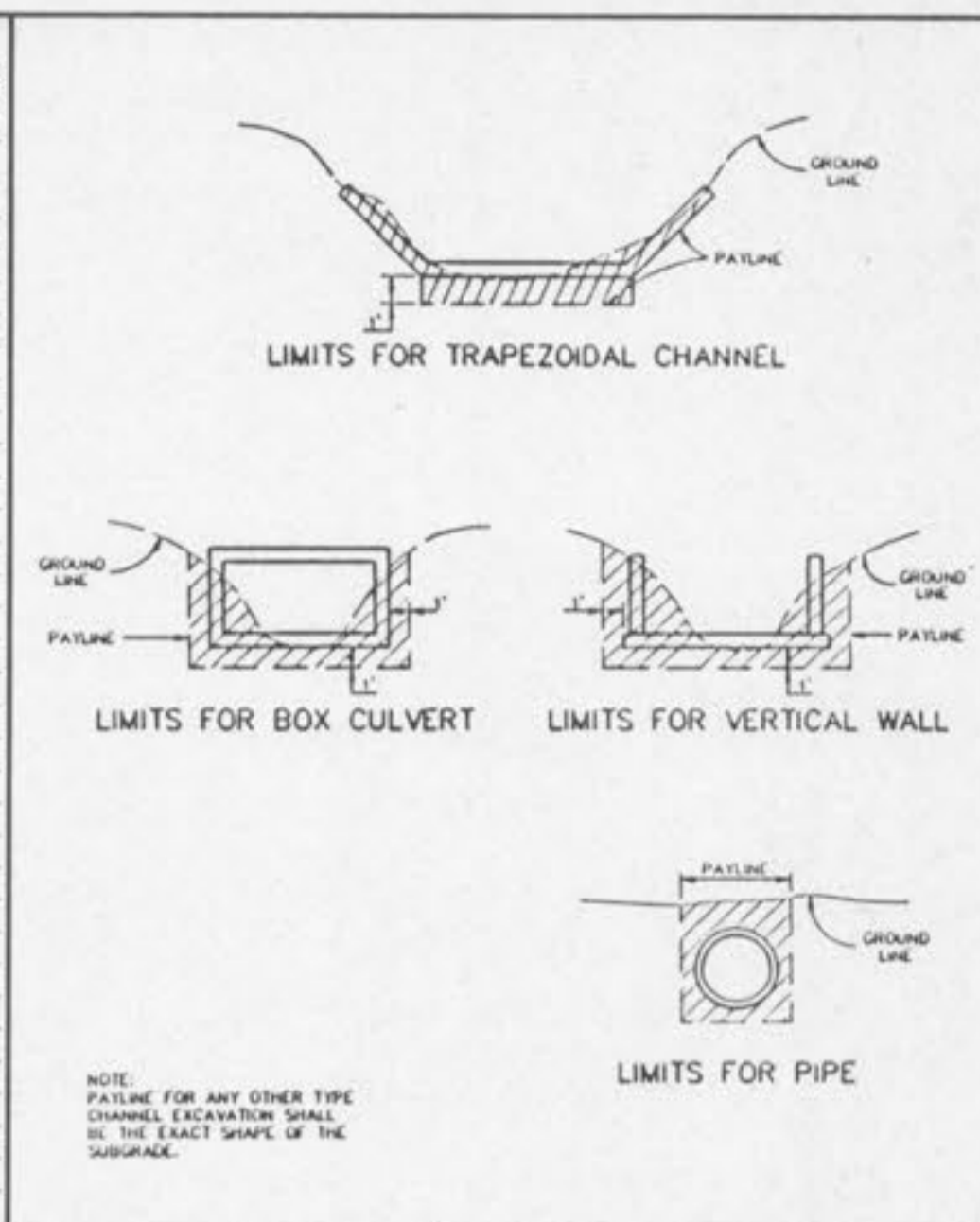
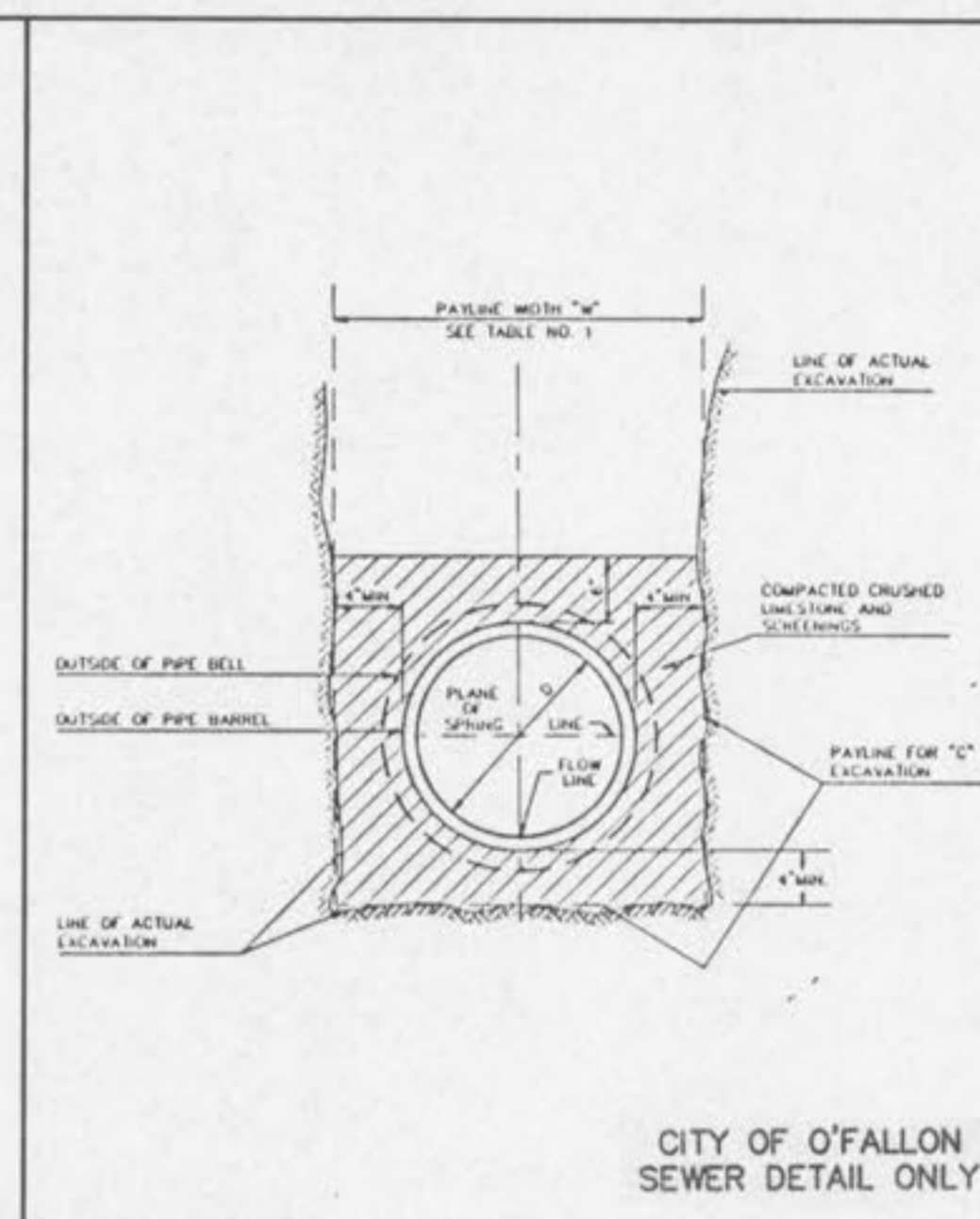


ROUND PIPE				HORIZONTAL ELLIPTICAL PIPE			
PIPE DIAMETER (INCHES)	"W" PAYLINE WIDTH OF TRENCH (INCHES)	"M" PAYLINE WIDTH OF TRENCH (FEET)	PAY-VOLUMES (CU. FT. PER FT.)	PIPE DIMENSIONS (INCHES)	"W" PAYLINE WIDTH OF TRENCH (INCHES)	"M" PAYLINE WIDTH OF TRENCH (FEET)	PAY-VOLUMES (CU. FT. PER FT.)
4	30	2.50	3.38				
6	30	2.50	3.56				
8	30	2.50	3.87				
10	30	2.50	4.09				
12	30	2.50	4.35				
15	36	3.00	5.55				
18	36	3.00	5.77	14 x 23	41	3.42	5.94
21	39	3.25	6.61				
24	42	3.50	7.39	19 x 30	49	4.68	7.68
27	45	3.75	8.18	22 x 34	53	4.42	8.61
30	48	4.00	9.30	24 x 38	58	4.83	9.70
33	53	4.42	10.53	27 x 42	62	5.17	10.71
36	56	4.67	11.43	29 x 45	66	5.50	11.72
39	59	4.92	12.33	32 x 49	71	5.92	13.14
42	63	5.25	13.38	34 x 53	75	6.25	14.05
48	70	5.83	15.67	36 x 60	83	6.92	16.18
54	77	6.42	18.15	43 x 68	92	7.87	18.81
60	84	7.00	20.73	48 x 76	101	8.42	21.59
66	91	7.58	23.45	53 x 83	109	9.08	24.35
72	98	8.17	26.37	58 x 91	118	9.83	27.45
78	105	8.75	29.39	63 x 98	126	10.50	30.50
84	112	9.33	32.57	68 x 106	135	11.25	33.91
90	119	9.92	35.90	72 x 113	143	11.92	36.99
96	126	10.50	39.37	77 x 121	152	12.67	40.69
102	133	11.08	42.99	82 x 128	160	13.33	44.45
108	140	11.67	46.75	87 x 136	168	14.00	47.79
114	147	12.25	50.66	92 x 143	176	14.67	50.70
120	154	12.83	54.72	97 x 151	185	15.42	54.01
126	161	13.42	58.92				
132	168	14.00	63.27	106 x 166	202	16.83	64.48
144	182	15.17	72.40	116 x 180	218	18.17	73.59

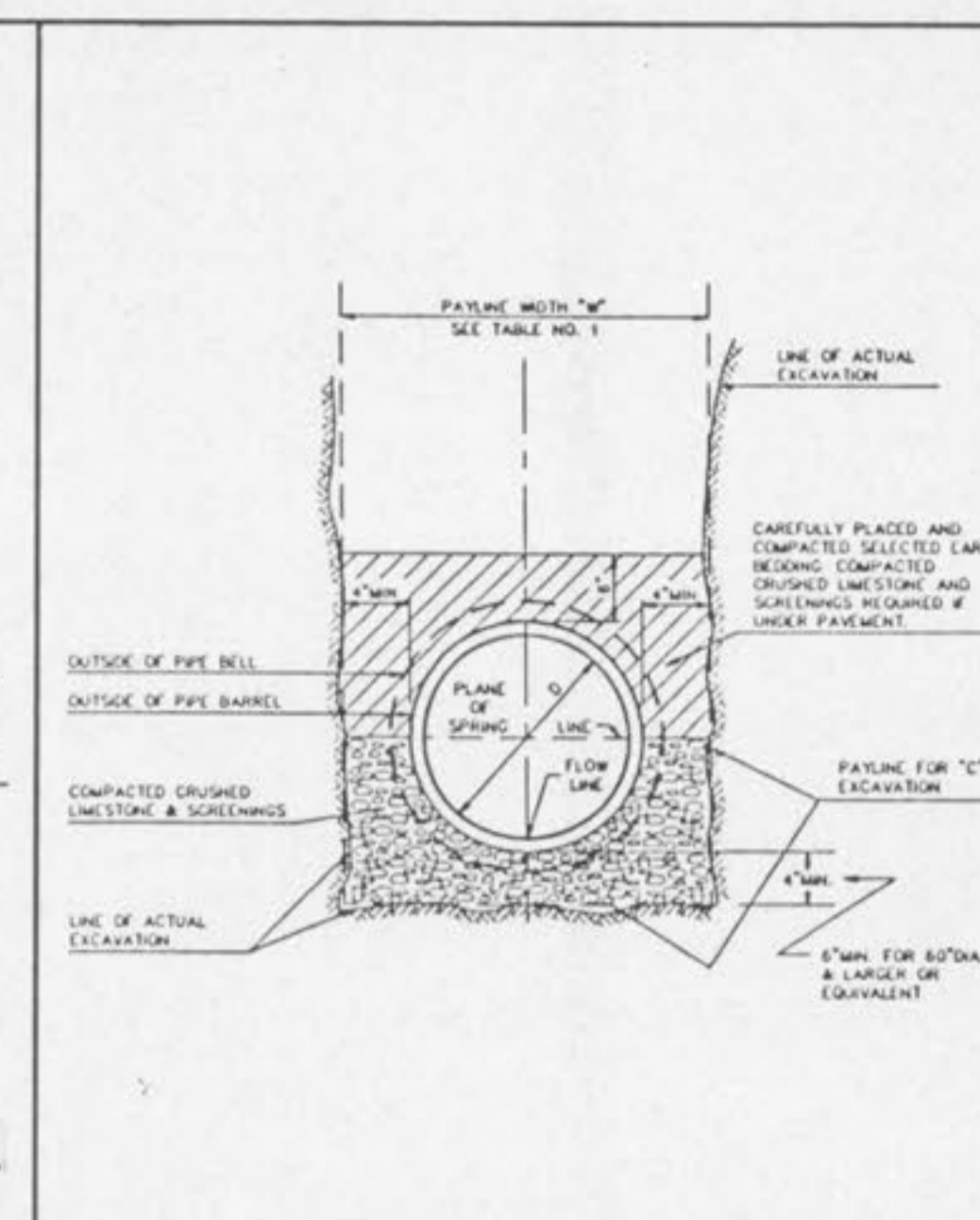
TABLE 1 PAYLINE WIDTHS OF TRENCH AND PAY-QUANTITIES OF CONCRETE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. R.C.W. Ch. J.C.K.	1992	SHEET 1
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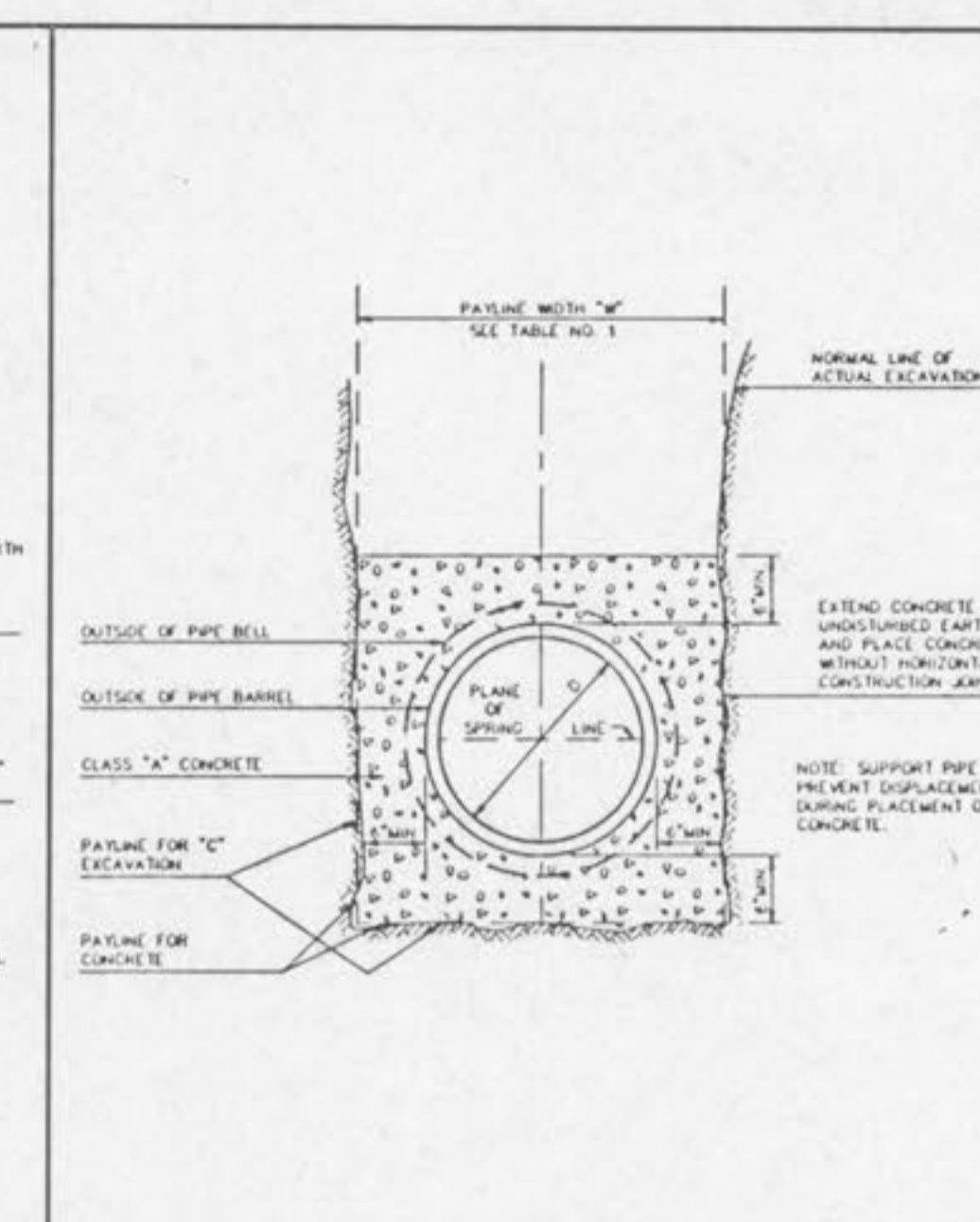
PAYLINE LIMITS FOR EXCAVATION	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 2
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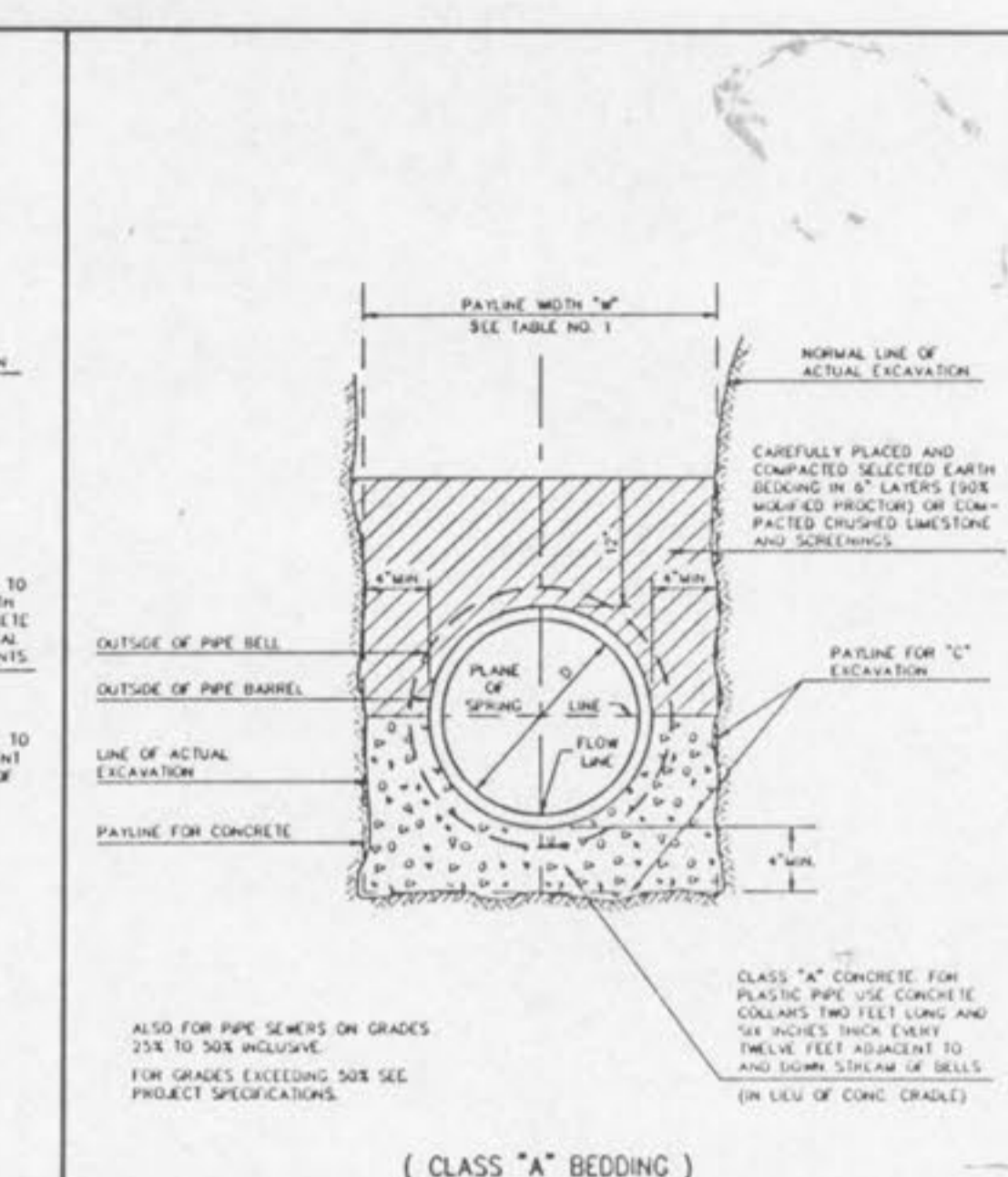
PIPE BEDDING CLASS "C" (MODIFIED FOR REINFORCED CONCRETE PIPE)	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 3
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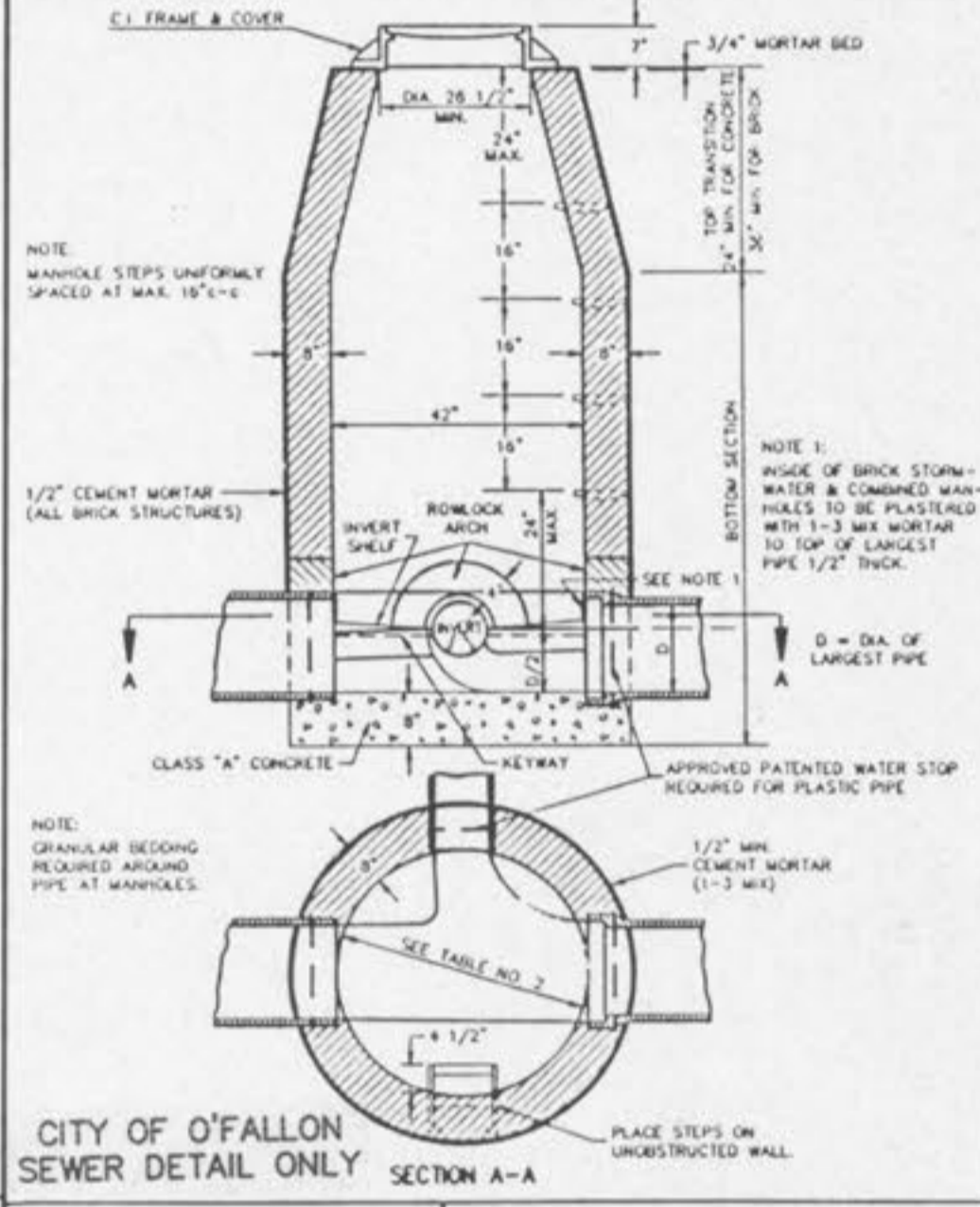
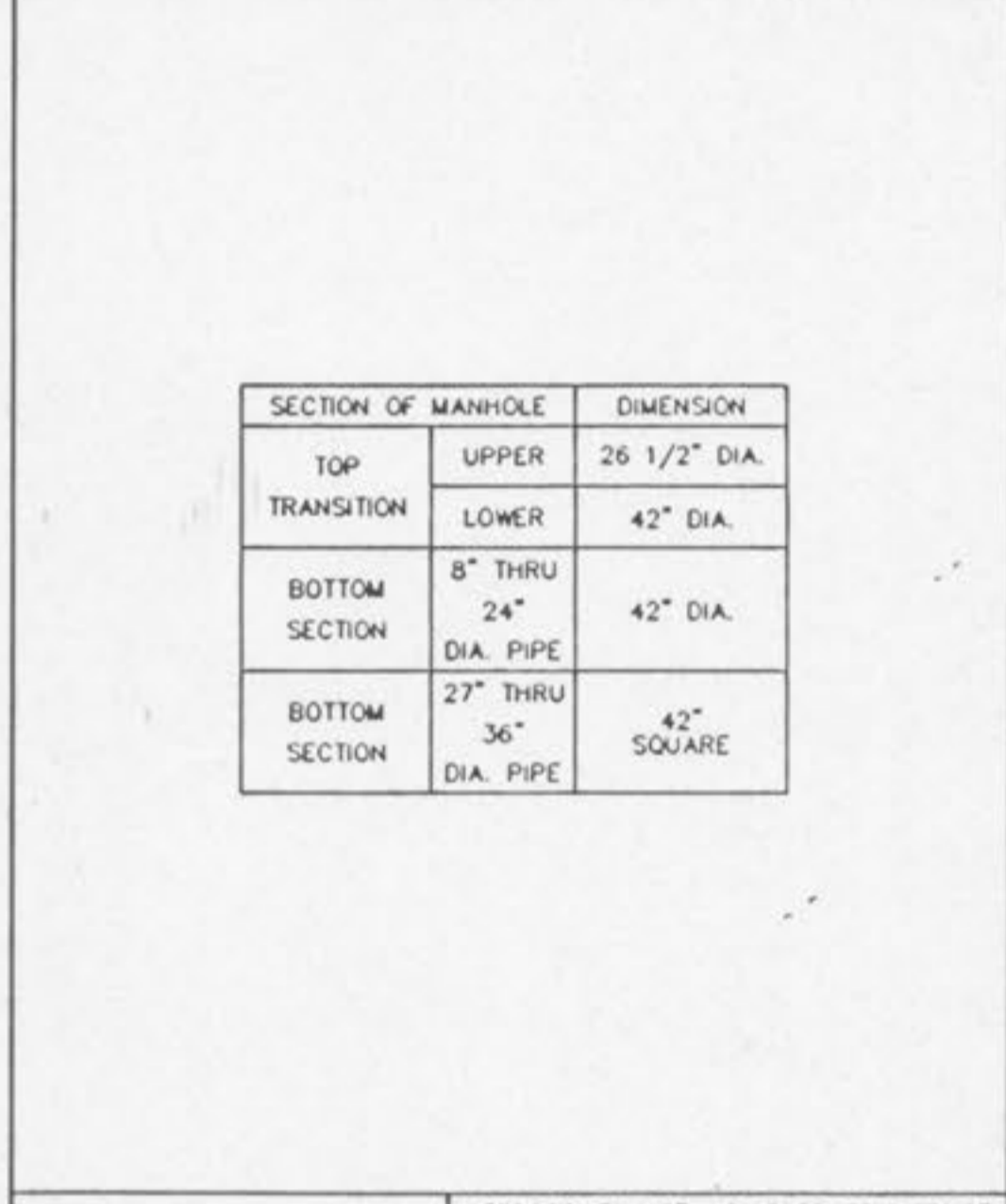
CONCRETE ENCASEMENT	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 4
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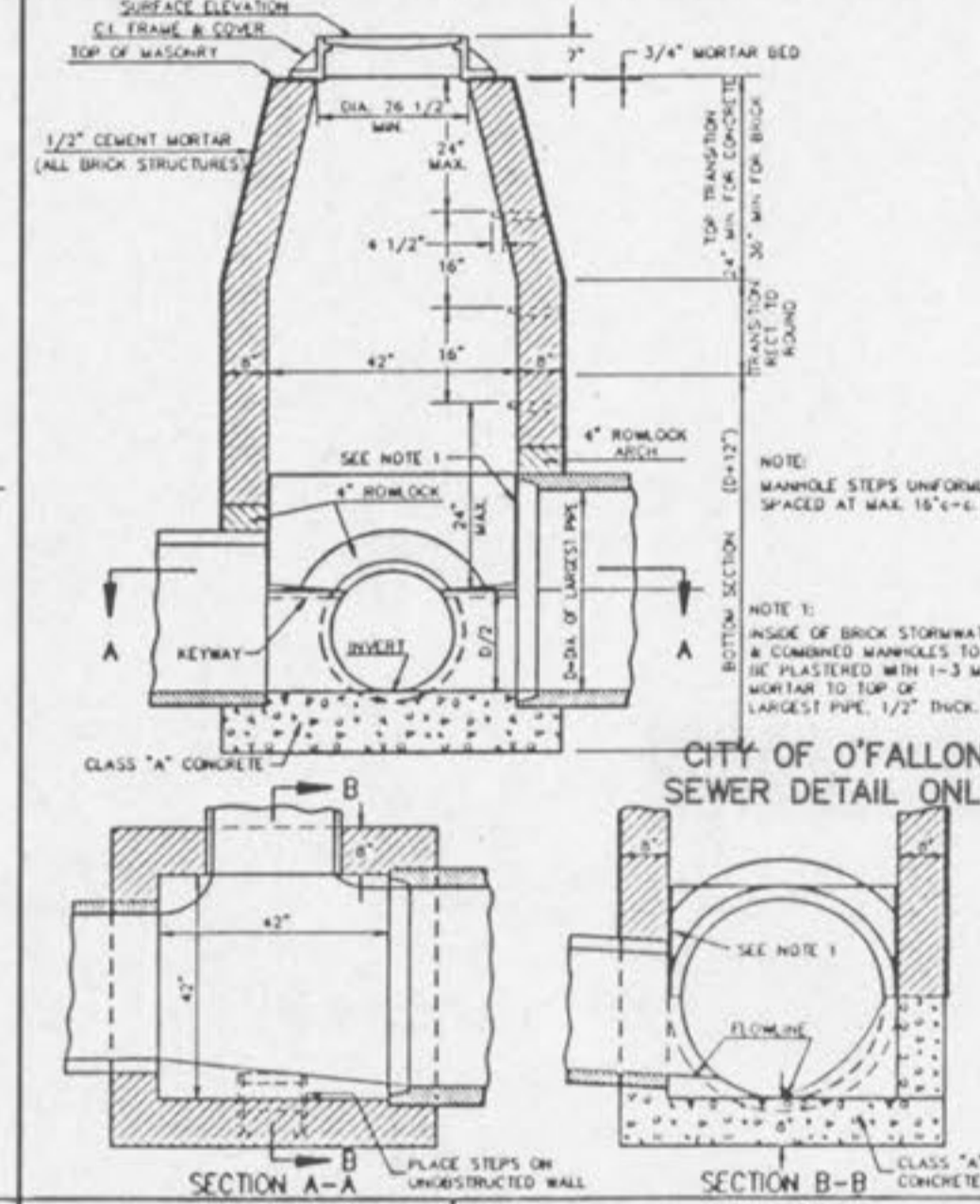
CONCRETE CRADLE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 5
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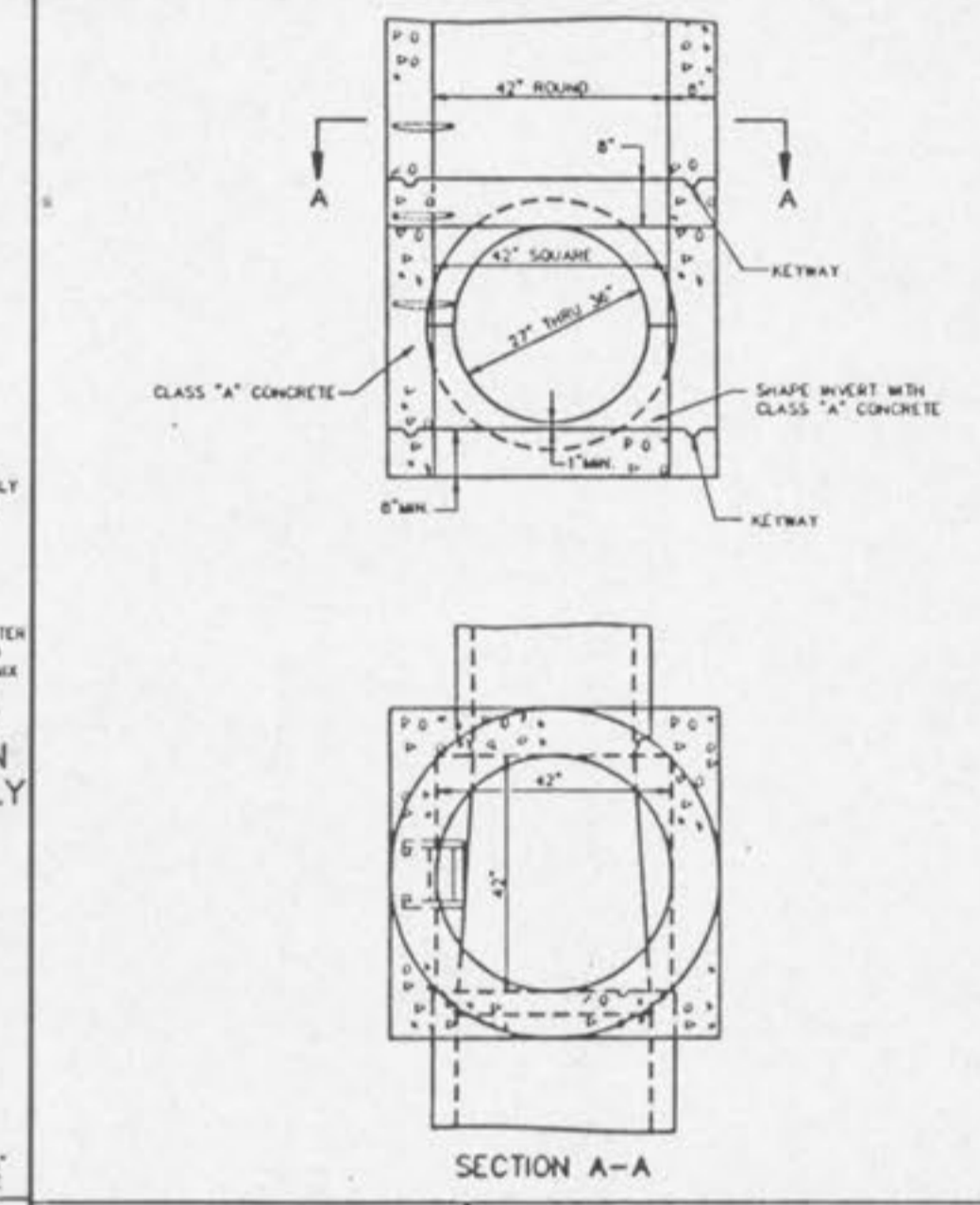
CONCRETE CRADLE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 6
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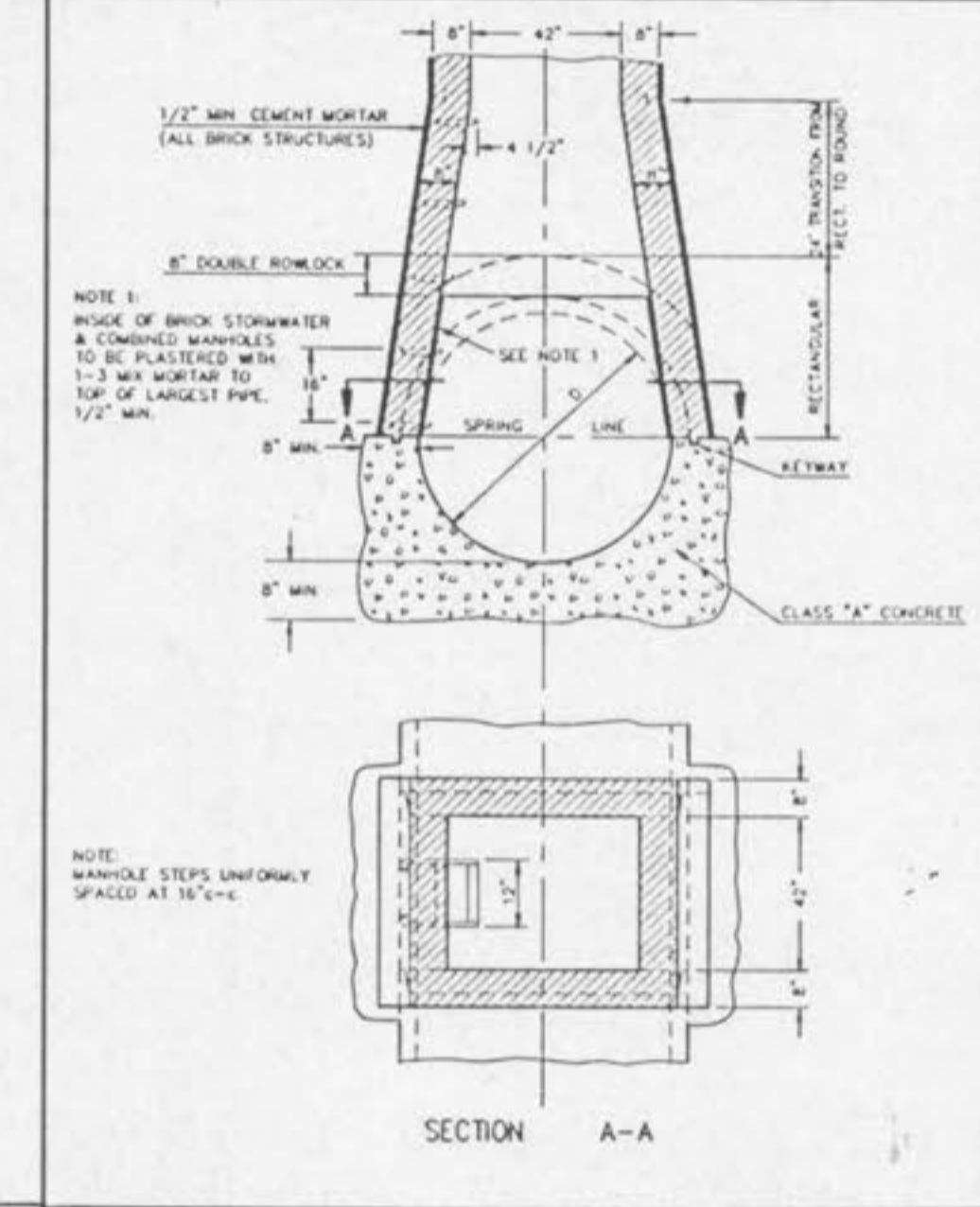
LINE MANHOLE PIPE SEWERS 8"-24" DIA.	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 8
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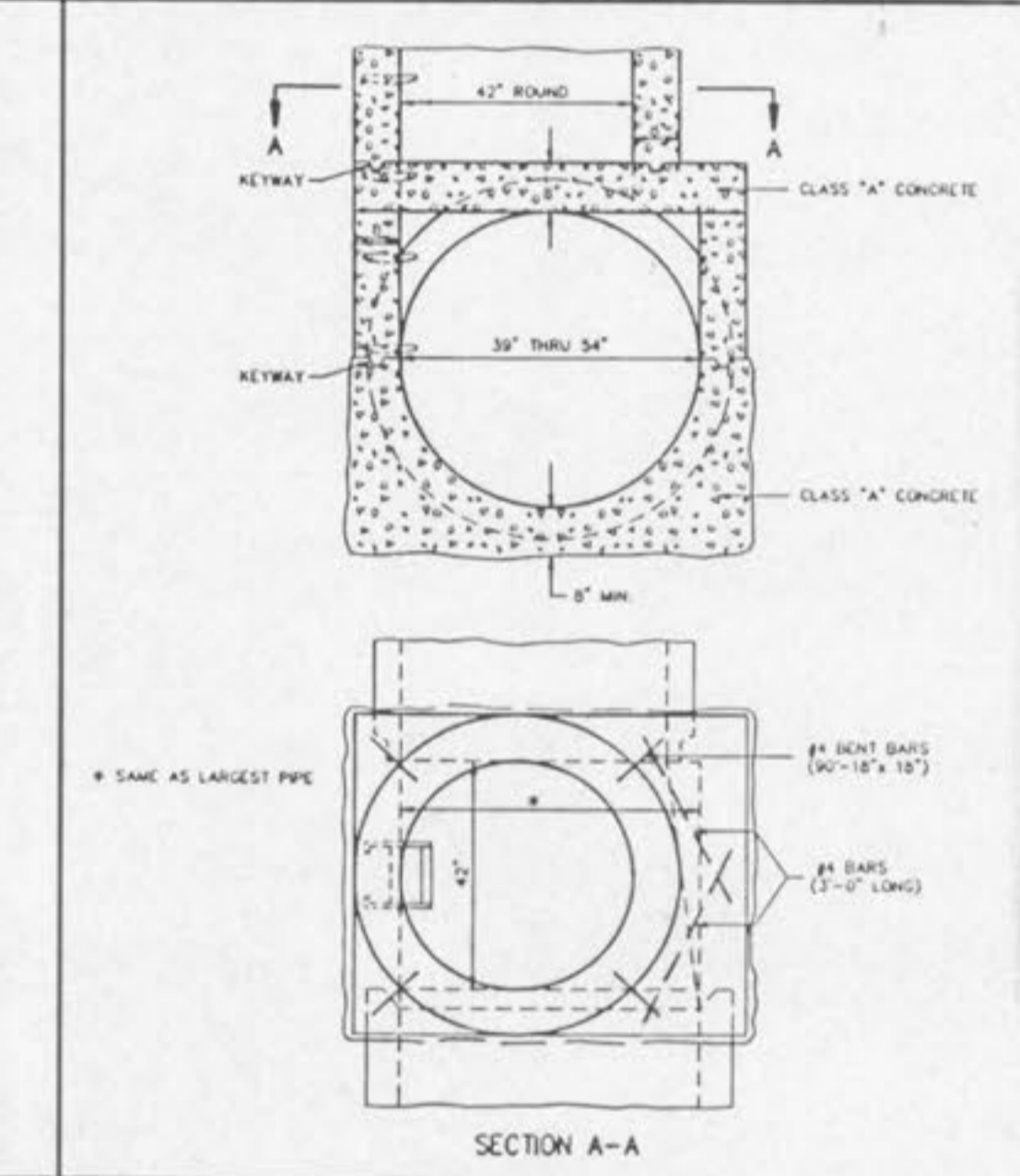
MANHOLE ON PIPE SEWER 27" THRU 36" (ALTERNATE)	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. D.A.B. Ch. J.C.K.	1992	SHEET 10
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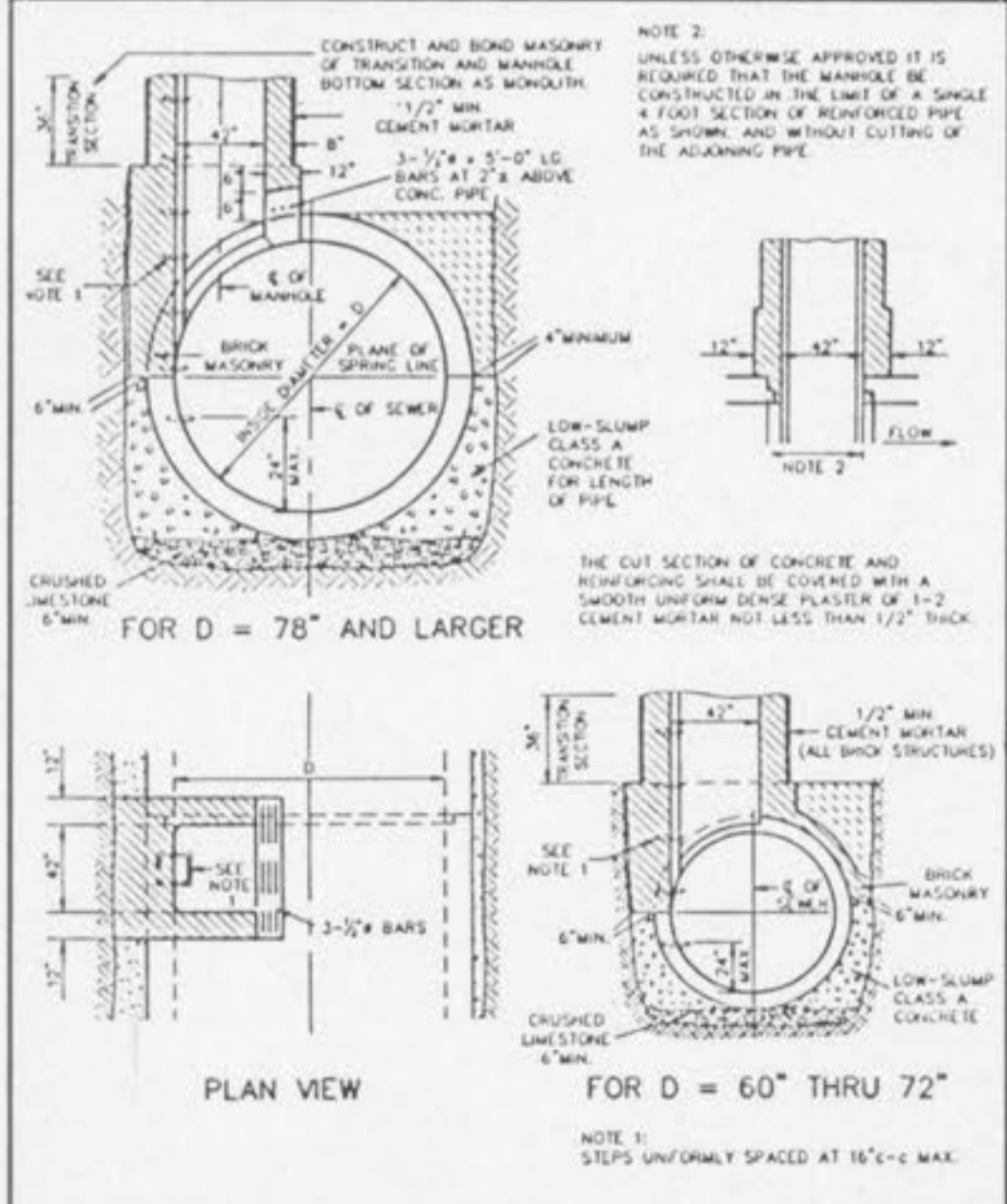
MANHOLE ON CONC. PIPE 39" THRU 54" (ALTERNATE)	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 12
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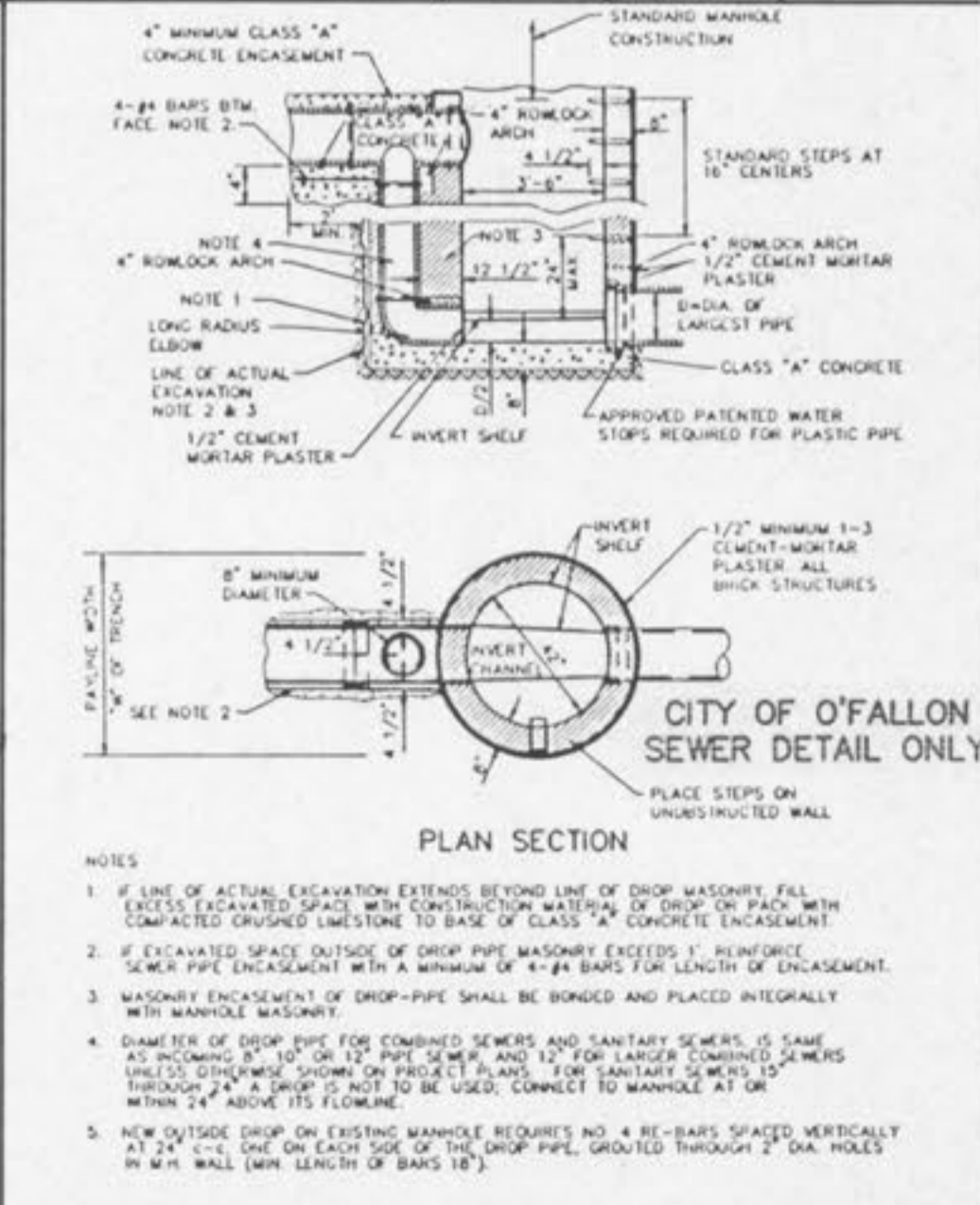
MANHOLE ON CONC. PIPE 39" THRU 54" (ALTERNATE)	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 12
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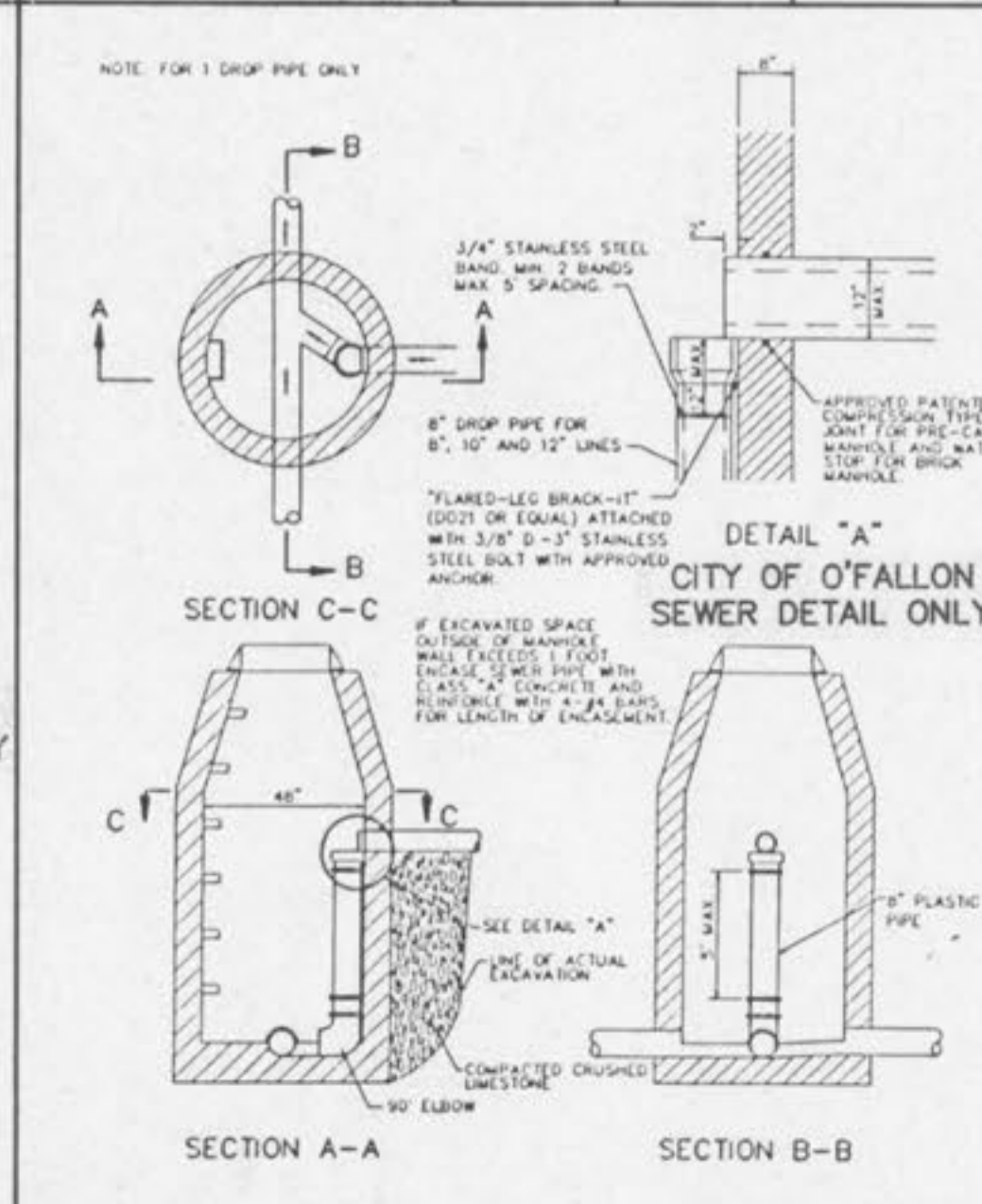
MANHOLE ON CONC. PIPE 39" THRU 54" (ALTERNATE)	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 12
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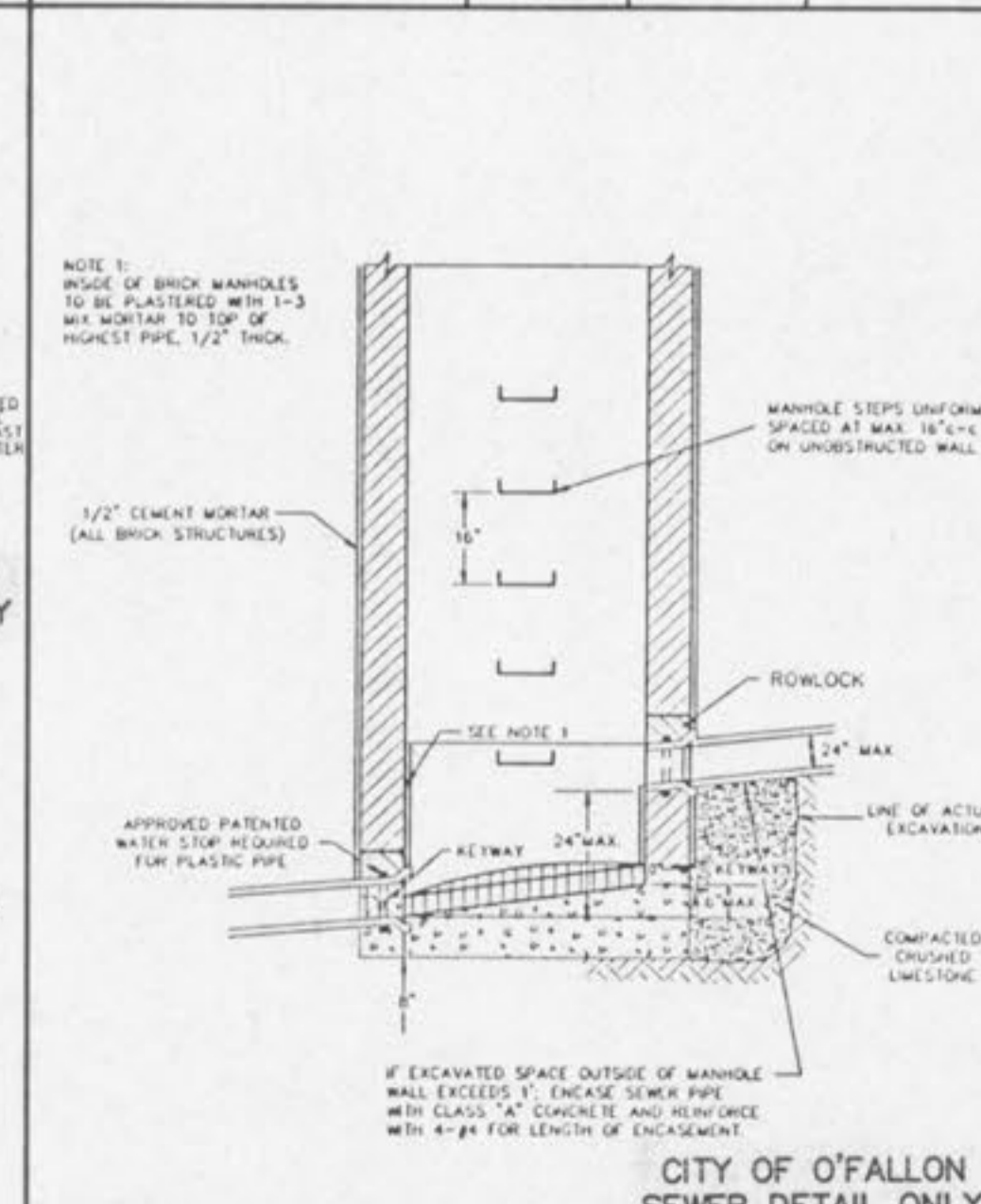
OUTSIDE FOULWATER DROP MANHOLE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. R.C.W. Ch. J.C.K.	1992	SHEET 13
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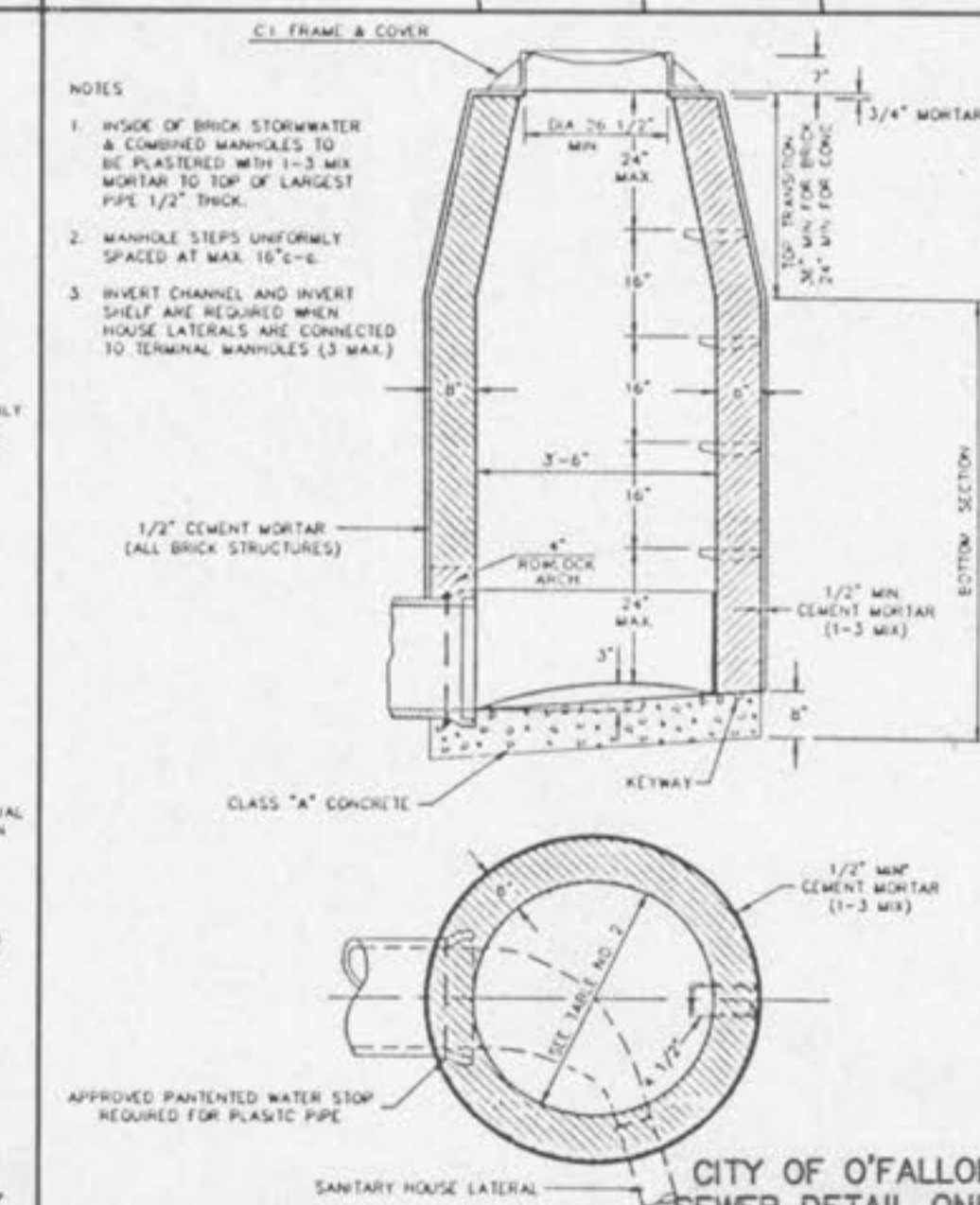
OUTSIDE FOULWATER DROP MANHOLE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. R.C.W. Ch. J.C.K.	1992	SHEET 13
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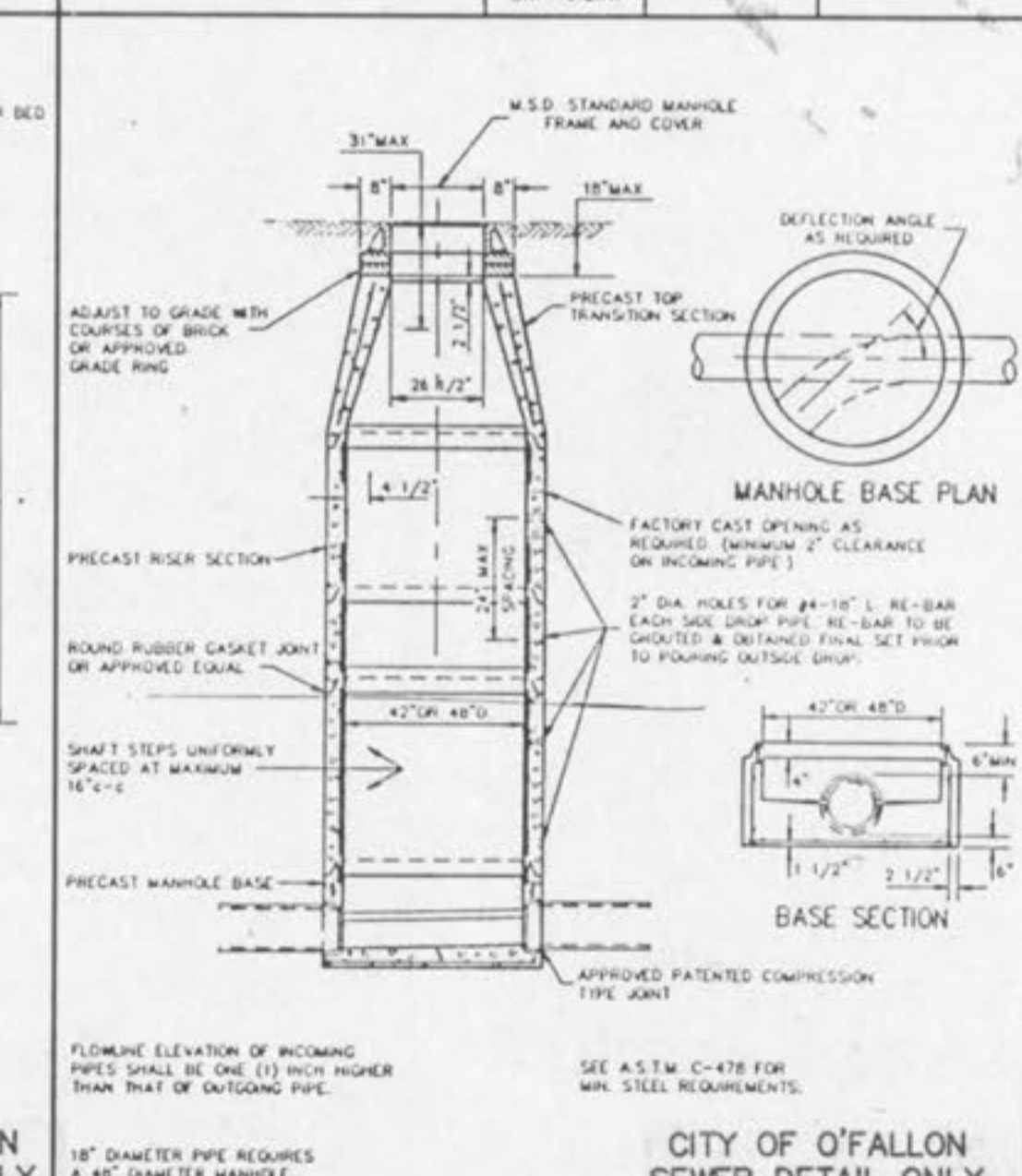
INSIDE FOULWATER DROP MANHOLE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 14
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INSIDE FOULWATER DROP MANHOLE (FOR FREE-FALL)	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 15
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TERMINAL MANHOLE	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 16
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PRE-CAST CONCRETE MANHOLE FOR SEWERS 8" THROUGH 18"	METROPOLITAN ST. LOUIS SEWER DISTRICT Standard Details of Sewer Construction	Dr. W.S.H. Ch. J.C.K.	1992	SHEET 17
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