

Table 4-1
Flow Comparison of Metal Arch Pipe and Snap-Tite Liner

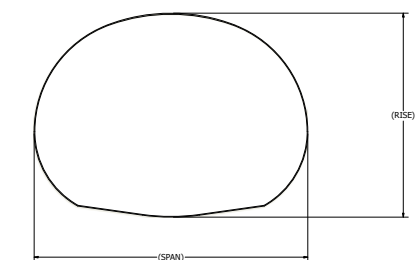
CMP			Equivalent Snap-Tite® Liner (in.)	Outside Liner Diameter (in.)		Inside Liner Diameter (in.)		Flow Q (cfs)	Snap-Tite® Flow Change %
Span (in)	Rise (in)	Q (cfs)		Major	Minor	Major	Minor		
28	20	2.8	20	23	16.5	21.7	15.1	4.7	168%
35	24	6.1	26	30.5	20.5	28.8	18.8	9.2	151%
42	29	9.9	30	36	22.5	34	20.3	12.6	127%
40	31	10.7	30	36	22.5	34	20.3	12.6	118%
49	33	15.1	36	41	30	38.7	27.7	22.9	151%
46	36	15.7	36	41	30	38.7	27.7	22.9	146%
57	38	21.5	42	48.5	34	45.9	31.3	33.7	156%
53	41	22.6	42	48.5	34	45.9	31.3	33.7	149%
64	43	29.5	48	55.6	39	52.3	35.9	48.3	164%
60	46	32.6	48	55.6	39	52.3	35.9	48.3	148%
71	47	39.0	48	55.6	39	52.3	35.9	48.3	124%
66	51	43.4	54	60.2	47	56.6	43.5	70.0	161%
77	52	50.2	54	60.2	47	56.6	43.5	70.0	139%
73	55	55.3	54	60.2	47	56.6	43.5	70.0	127%
83	57	63.1	54	60.2	47	56.6	43.5	70.0	111%
81	59	68.9	54	60.2	47	56.6	43.5	70.0	102%
87	63	85.0	63 oval	67.5	58	63.5	53.9	109.1	128%
95	67	102.5	63 round	63	63	58.89	58.89	111.5	109%
103	71	122.8	63 round	63	63	58.89	58.89	111.5	91%

* Flow is based on slope of 0.1%. HDPE n= 0.00914 / CMP n= 0.024

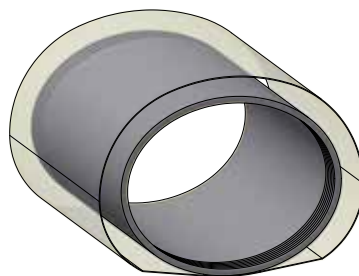
* Oval dimensions shown are the recommended pressed dimensions. Customers can pick any y-dimension between the equivalent round and the pressed dimension if full ovalization is not required. Call a Snap-Tite representative for project flow calculations as needed.

Metal Pipe Arch: 2 2/3 in. x 1/2 in. Corrugations—AASHTO M36 & M196

Metal Pipe Arch: 3 in. x 1 in. or 5 in. x 1 in. Corrugations—AASHTO M36 & M196



FRONT VIEW OF CORRUGATED METAL PIPE IN CULVERT



OVAL SNAP-TITE INSIDE CORRUGATED METAL PIPE



A culvert, rehabilitated with Snap-Tite® oval pipe.