

Friction Loss Characteristics

Class 125 IPS U.S. PVC Plastic Pipe

(1120,1220) C=150 SDR 32.5
 PRESSURE LOSS PER 100 FEET OF PIPE (PSI) SIZES 6" THRU 12"

Nominal Size	6"		8"		10"		12"		Nominal Size	8"		10"		12"	
Pipe ID	6.217		8.095		10.088		11.966		Pipe ID	8.095		10.088		11.966	
Pipe OD	6.625		8.625		10.750		12.750		Pipe OD	8.625		10.750		12.750	
Wall Thick	0.204		0.265		0.331		0.392		Wall Thick	0.265		0.331		0.392	
Flow GPM	Velocity FPS	PSI LOSS	Velocity FPS	PSI LOSS	Velocity FPS	PSI LOSS	Velocity FPS	PSI LOSS	Flow GPM	Velocity FPS	PSI LOSS	Velocity FPS	PSI LOSS	Velocity FPS	PSI LOSS
40	0.42	0.01							1850	11.52	1.82	7.42	0.62	5.27	0.27
45	0.48	0.01							1900	11.83	1.91	7.62	0.66	5.41	0.29
50	0.53	0.01							1950	12.14	2.01	7.82	0.69	5.56	0.30
55	0.58	0.01							2000	12.45	2.10	8.02	0.72	5.70	0.31
60	0.63	0.01							2050	12.76	2.20	8.22	0.75	5.84	0.33
65	0.69	0.01							2100	13.08	2.30	8.42	0.79	5.98	0.34
70	0.74	0.02							2150	13.39	2.41	8.62	0.82	6.13	0.36
75	0.79	0.02	0.47	0.00					2200	13.70	2.51	8.82	0.86	6.27	0.37
80	0.84	0.02	0.50	0.01					2250	14.01	2.62	9.02	0.90	6.41	0.39
85	0.90	0.02	0.53	0.01					2300	14.32	2.73	9.22	0.93	6.55	0.41
90	0.95	0.02	0.56	0.01					2350	14.63	2.84	9.42	0.97	6.70	0.42
95	1.00	0.03	0.59	0.01					2400	14.94	2.95	9.62	1.01	6.84	0.44
100	1.06	0.03	0.62	0.01					2450	15.25	3.06	9.82	1.05	6.98	0.46
110	1.16	0.04	0.68	0.01					2500	15.57	3.18	10.02	1.09	7.12	0.48
120	1.27	0.04	0.75	0.01					2550	15.88	3.30	10.22	1.13	7.27	0.49
130	1.37	0.05	0.81	0.01	0.52	0.00			2600	16.19	3.42	10.42	1.17	7.41	0.51
140	1.48	0.06	0.87	0.02	0.56	0.01			2650	16.50	3.54	10.62	1.21	7.55	0.53
150	1.58	0.06	0.93	0.02	0.60	0.01			2700	16.81	3.67	10.82	1.26	7.69	0.55
160	1.69	0.07	1.00	0.02	0.64	0.01			2750	17.12	3.80	11.03	1.30	7.84	0.57
170	1.79	0.08	1.06	0.02	0.68	0.01			2800	17.43	3.92	11.23	1.34	7.98	0.59
180	1.90	0.09	1.12	0.02	0.72	0.01			2850	17.74	4.06	11.43	1.39	8.12	0.61
190	2.01	0.10	1.18	0.03	0.76	0.01			2900	18.06	4.19	11.63	1.44	8.26	0.63
200	2.11	0.11	1.25	0.03	0.80	0.01	0.57	0.00	2950	18.37	4.32	11.83	1.48	8.41	0.65
225	2.38	0.13	1.40	0.04	0.90	0.01	0.64	0.01	3000	18.68	4.46	12.03	1.53	8.55	0.67
250	2.64	0.16	1.56	0.04	1.00	0.02	0.71	0.01	3050	18.99	4.60	12.23	1.58	8.69	0.69
275	2.90	0.19	1.71	0.05	1.10	0.02	0.78	0.01	3100	19.30	4.74	12.43	1.62	8.83	0.71
300	3.17	0.23	1.87	0.06	1.20	0.02	0.85	0.01	3150	19.61	4.88	12.63	1.67	8.98	0.73
325	3.43	0.26	2.02	0.07	1.30	0.02	0.93	0.01	3200	19.92	5.03	12.83	1.72	9.12	0.75
350	3.69	0.30	2.18	0.08	1.40	0.03	1.00	0.01	3250			13.03	1.77	9.26	0.77
375	3.96	0.34	2.33	0.09	1.50	0.03	1.07	0.01	3300			13.23	1.82	9.40	0.79
400	4.22	0.39	2.49	0.11	1.60	0.04	1.14	0.02	3350			13.43	1.87	9.55	0.82
425	4.49	0.43	2.65	0.12	1.70	0.04	1.21	0.02	3400			13.63	1.93	9.69	0.84
450	4.75	0.48	2.80	0.13	1.80	0.05	1.28	0.02	3450			13.83	1.98	9.83	0.86
475	5.01	0.53	2.96	0.15	1.90	0.05	1.35	0.02	3500			14.03	2.03	9.97	0.89
500	5.28	0.58	3.11	0.16	2.00	0.06	1.42	0.02	3550			14.23	2.09	10.12	0.91
550	5.81	0.70	3.42	0.19	2.21	0.07	1.57	0.03	3600			14.43	2.14	10.26	0.93
600	6.33	0.82	3.74	0.23	2.41	0.08	1.71	0.03	3700			14.83	2.25	10.54	0.98
650	6.86	0.95	4.05	0.26	2.61	0.09	1.85	0.04	3800			15.23	2.37	10.83	1.03
700	7.39	1.09	4.36	0.30	2.81	0.10	1.99	0.04	3900			15.64	2.48	11.11	1.08
750	7.92	1.24	4.67	0.34	3.01	0.12	2.14	0.05	4000			16.04	2.60	11.40	1.13
800	8.44	1.39	4.98	0.39	3.21	0.13	2.28	0.06	4100			16.44	2.73	11.68	1.19
850	8.97	1.56	5.29	0.43	3.41	0.15	2.42	0.06	4200			16.84	2.85	11.97	1.24
900	9.50	1.73	5.60	0.48	3.61	0.16	2.56	0.07	4300			17.24	2.98	12.25	1.30
1000	10.56	2.11	6.23	0.58	4.01	0.20	2.85	0.09	4400			17.64	3.11	12.54	1.35
1050	11.08	2.31	6.54	0.64	4.21	0.22	2.99	0.10	4500			18.04	3.24	12.82	1.41
1100	11.61	2.51	6.85	0.70	4.41	0.24	3.13	0.10	4600			18.44	3.37	13.11	1.47
1150	12.14	2.73	7.16	0.76	4.61	0.26	3.28	0.11	4700			18.84	3.51	13.39	1.53
1200	12.67	2.95	7.47	0.82	4.81	0.28	3.42	0.12	4800			19.24	3.65	13.68	1.59
1250	13.19	3.18	7.78	0.88	5.01	0.30	3.56	0.13	4900			19.64	3.79	13.96	1.65
1300	13.72	3.42	8.09	0.95	5.21	0.32	3.70	0.14	5000					14.25	1.71
1350	14.25	3.67	8.41	1.02	5.41	0.35	3.85	0.15	5100					14.53	1.78
1400	14.78	3.93	8.72	1.09	5.61	0.37	3.99	0.16	5200					14.82	1.84
1450	15.31	4.19	9.03	1.16	5.81	0.40	4.13	0.17	5300					15.10	1.91
1500	15.83	4.46	9.34	1.24	6.01	0.42	4.27	0.18	5400					15.39	1.98
1550	16.36	4.74	9.65	1.31	6.21	0.45	4.42	0.20	5600					15.96	2.12
1600	16.89	5.03	9.96	1.39	6.41	0.48	4.56	0.21	5800					16.53	2.26
1650	17.42	5.32	10.27	1.47	6.62	0.51	4.70	0.22	6000					17.10	2.40
1700	17.95	5.63	10.58	1.56	6.82	0.53	4.84	0.23	6500					18.52	2.79
1750	18.47	5.94	10.90	1.64	7.02	0.56	4.99	0.25	7000					19.95	3.20
1800	19.00	6.26	11.21	1.73	7.22	0.59	5.13	0.26							

Shaded area represents velocities over 5 fps. Use with caution where water hammer is a concern.