

Flow of Water Through Schedule 40 Steel Pipe

Discharge		Pressure Drop per 100 feet and Velocity in Schedule 40 Pipe for Water at 60 F.																			
		Velocity		Press Drop		Velocity		Press Drop		Velocity		Press Drop		Velocity		Press Drop		Velocity		Press Drop	
		Gallons per Minute	Cubic Ft. per Second	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.	Feet per Second	Lbs. per Sq. In.
		1/8"		1/4"		3/8"		1/2"		3/4"		1"		1 1/4"		1 1/2"					
.2	0.000446	1.13	1.86	0.616	0.359	0.504	0.159	0.317	0.061												
.3	0.000668	1.69	4.22	0.924	0.903	0.672	0.345	0.422	0.086												
.4	0.000891	2.26	6.98	1.23	1.61	0.840	0.539	0.528	0.167												
.5	0.00111	2.82	10.5	1.54	2.39	1.01	0.751	0.633	0.240	0.301	0.033										
.6	0.00134	3.39	14.7	1.85	3.29	1.25	0.844	0.408	0.481	0.361	0.041										
.8	0.00178	4.52	25.0	2.46	5.44	1.34	1.058	0.408	0.481	0.481	0.102										
1	0.00223	5.65	37.2	3.08	8.28	1.68	1.85	1.06	0.600	0.602	0.155	0.371	0.048								
2	0.00446	11.29	134.4	6.16	30.1	3.36	6.58	2.11	2.10	1.20	0.526	0.743	0.164	0.429	0.044						
3	0.00668			9.25	64.1	5.04	13.9	3.17	4.33	1.81	1.09	1.114	0.336	0.644	0.090	0.473	0.043				
4	0.00891			12.33	111.2	6.72	23.9	4.22	7.42	2.41	1.83	1.49	0.565	0.858	0.150	0.630	0.071				
5	0.01114					8.40	36.7	5.28	11.2	3.01	2.75	1.86	0.835	1.073	0.223	0.788	0.104				
6	0.01337	0.574	0.044	2 1/2"		10.08	51.9	6.33	15.8	3.61	3.84	2.23	1.17	1.29	0.309	0.946	0.145				
8	0.01782	0.765	0.073			13.44	91.1	8.45	27.7	4.81	6.80	2.97	1.99	1.72	0.518	1.26	0.241				
10	0.02228	0.956	0.108	0.670	0.046			10.56	42.4	6.02	9.99	3.71	2.99	2.15	0.774	1.58	0.361				
15	0.03342	1.43	0.224	1.01	0.094	3"				9.03	21.6	5.57	6.36	3.22	1.63	2.37	0.755				
20	0.04456	1.91	0.375	1.34	0.158	0.868	0.056	3 1/2"		12.03	37.8	7.43	10.09	4.29	2.78	3.16	1.28				
25	0.05570	2.39	0.561	1.68	0.234	1.09	0.083	0.812	0.041					9.28	16.7	5.37	4.22	3.94	1.93		
30	0.06684	2.87	0.786	2.01	0.327	1.30	0.114	0.974	0.056					11.14	23.8	6.44	5.92	4.73	2.72		
35	0.07798	3.35	1.05	2.35	0.436	1.52	0.151	1.14	0.074	0.882	0.041	12.99	32.2	7.51	7.90	5.52	3.64				
40	0.08912	3.83	1.35	2.68	0.556	1.74	0.192	1.30	0.095	1.01	0.052	14.85	41.5	8.59	10.24	6.30	4.65				
45	0.1003	4.30	1.67	3.02	0.668	1.95	0.239	1.46	0.117	1.13	0.064			9.67	12.80	7.09	5.85				
50	0.1114	4.78	2.03	3.35	0.839	2.17	0.288	1.62	0.142	1.26	0.076	5"									
60	0.1337	5.74	2.87	4.02	1.18	2.60	0.406	1.95	0.204	1.51	0.107			12.89	22.2			7.88	7.15		
70	0.1560	6.70	3.84	4.69	1.59	3.04	0.540	2.27	0.261	1.76	0.143	1.12	0.047					11.05	13.71		
80	0.1782	7.65	4.97	5.36	2.03	3.47	0.687	2.60	0.334	2.02	0.180	1.28	0.060					12.62	17.59		
90	0.2005	8.60	6.20	6.03	2.53	3.91	0.861	2.92	0.416	2.27	0.224	1.44	0.074					14.20	22.0		
100	0.2228	9.56	7.59	6.70	3.09	4.34	1.05	3.25	0.509	2.52	0.272	1.60	0.090	1.11	0.036	15.78	26.9				
125	0.2785	11.97	11.76	8.38	4.71	5.43	1.61	4.06	0.769	3.15	0.415	2.01	0.135	1.39	0.055	19.72	41.4				
150	0.3342	14.36	16.70	10.05	6.69	6.51	2.24	4.87	1.08	3.78	0.580	2.41	0.190	1.67	0.077						
175	0.3899	16.75	22.3	11.73	8.97	7.60	3.00	5.68	1.44	4.41	0.774	2.81	0.253	1.94	0.102						
200	0.4456	19.14	28.8	13.42	11.68	8.68	3.87	6.49	1.85	5.04	0.985	3.21	0.323	2.22	0.130						
225	0.5013	.....	.....	15.09	14.63	9.77	4.83	7.30	2.32	5.67	1.23	3.61	0.401	2.50	0.162	1.44	0.043				
250	0.557	.....	.....	.....	.....	10.85	5.93	8.12	2.84	6.30	1.46	4.01	0.495	2.78	0.195	1.60	0.051				
275	0.6127	.....	.....	.....	.....	11.94	7.14	8.93	3.40	6.93	1.79	4.41	0.583	3.05	0.234	1.76	0.061				
300	0.6684	.....	.....	.....	.....	13.00	8.36	9.74	4.02	7.56	2.11	4.81	0.683	3.33	0.275	1.92	0.072				
325	0.7241	.....	.....	.....	.....	14.12	9.89	10.53	4.09	8.19	2.47	5.21	0.797	3.61	0.320	2.08	0.083				
350	0.7798	.....	.....	.....	.....	.....	.....	11.36	5.41	8.82	2.84	5.62	0.919	3.89	0.367	2.24	0.095				
375	0.8355	.....	.....	.....	.....	.....	.....	12.17	6.18	9.45	3.25	6.02	1.05	4.16	0.416	2.40	0.108				
400	0.8912	.....	.....	.....	.....	.....	.....	12.98	7.03	10.08	3.68	6.42	1.19	4.44	0.471	2.56	0.121				
425	0.9469	.....	.....	.....	.....	.....	.....	13.80	7.89	10.71	4.12	6.82	1.33	4.72	0.529	2.73	0.136				
450	1.003	.....	.....	.....	.....	.....	.....	14.61	8.80	11.34	4.60	7.22	1.48	5.00	0.590	2.89	0.151				
475	1.059	1.93	0.054	.....	.....	.....	.....	.....	.....	11.97	5.12	7.62	1.64	5.27	0.653	3.04	0.166				
500	1.114	2.03	0.059	.....	.....	.....	.....	.....	.....	12.60	5.65	8.02	1.81	5.55	0.720	3.21	0.182				
550	1.225	2.24	0.071	.....	.....	.....	.....	.....	.....	13.85	6.79	8.82	2.17	6.11	0.861	3.53	0.219				
600	1.337	2.44	0.083	.....	.....	.....	.....	.....	.....	15.12	8.04	9.63	2.55	6.66	1.02	3.85	0.258				
650	1.448	2.64	0.097	.....	.....	.....	.....	.....	.....	.....	.....	10.43	2.98	7.22	1.18	4.17	0.301				
700	1.560	2.85	0.112	2.01	0.047	.....	.....	.....	.....	.....	.....	11.23	3.43	7.78	1.35	4.49	0.343				
750	1.671	3.05	0.127	2.15	0.054	14"		.....	.....	.....	.....	12.03	3.92	8.33	1.55	4.81	0.392				
800	1.782	3.25	0.143	2.29	0.061	.....	.....	.....	.....	.....	.....	12.83	4.43	8.88	1.75	5.13	0.443				
850	1.894	3.46	0.160	2.44	0.068	2.02	0.042	.....	.....	.....	.....	13.64	5.00	9.44	1.96	5.45	0.497				
900	2.005	3.66	0.179	2.58	0.075	2.13	0.047	.....	.....	.....	.....	14.44	5.58	9.99	2.18	5.77	0.554				
950	2.117	3.86	0.198	2.72	0.083	2.25	0.052	.....	.....	.....	.....	15.24	6.21	10.55	2.42	6.09	0.613				
1000	2.228	4.07	0.218	2.87	0.091	2.37	0.057	16"		.....	.....	16.04	6.84	11.10	2.68	6.41	0.675				
1100	2.451	4.48	0.260	3.15	0.110	2.61	0.068	.....	.....	.....	.....	17.65	8.23	12.22	3.22	7.05	0.807				
1200	2.674	4.88	0.306	3.44	0.128	2.85	0.080	2.18	0.042	.....	.....	.....	.....	13.33	3.81	7.70	0.948				
1300	2.896	5.29	0.355	3.73	0.150	3.08	0.093	2.36	0.048	.....	.....	.....	.....	14.43	4.45	8.33	1.11				
1400	3.119	5.70	0.409	4.01	0.171	3.32	0.107	2.54	0.055	.....	.....	.....	.....	15.55	5.13	8.98	1.28				
1500	3.342	6.10	0.466	4.30	0.195	3.56	0.122	2.72	0.063	18"		.....	.....	16.66	5.85	9.62	1.46				
1600	3.565	6.51	0.527	4.59	0.219	3.79	0.138	2.90	0.071	.....	.....	.....	.....	17.77	6.61	10.26	1.65				
1800	4.010	7.32	0.663	5.16	0.276	4.27	0.172														