



TECHNICAL DATA OF PIPES CONFORMING TO ASTM A135 GRADE A & B

SCOPE : ERW mild Steel Black & Galvanized Steel Pipes in NPS 3/4" (26.9mm) to NPS 8" (219.1mm) conforming to Nominal Wall Thicknesses Sch-10, Sch-30, Sch-40 etc.

TOLERANCES

OUTSIDE DIAMETER : ± 1% of the specified Outside Diameter

THICKNESS : Minimum wall thickness 12.5% max under the specified wall thickness and not specified on positive side

WEIGHT : ± 10% of specified weight for SCH-10 pipes and ±1.75% of specified weight for other than SCH-10 pipes.

LENGTH : 1.5 to 8.0 Mtr (5FT to 25FT) for black & galvanized pipes and 3.0 to 12.8 Mtr (10FT to 42FT) for black pipes NPS 3" to 8".

STRAIGHTNESS : As mutually agreed with Client

END FINISH : Plain Ends (Square Cut); Threaded with or without coupling; Roll Grooved

IN-PROCESS TESTING

IN-LINE NDT : Full body for NPS 3/4" to 4" and weld seam for NPS 3" to 8" tested by Eddy Current Test Machine

HYDROSTATIC TEST : All pipes hydrostatically tested at specified pressure for holding time 5 seconds minimum

FLATTENING TEST : Weld located either 0° or 90° from the direction of force
Flatten upto 2/3 of O.D. for weld, upto 1/3 of O.D. for body, and full flattening for lamination

GRADE	CHEMICAL COMPOSITION (%) Max.				MECHANICAL PROPERTIES (MPa) Min.		
	C	Mn	P	S	YS	UTS	%EL
A	0.250	0.950	0.035	0.035	205	330	35
B	0.300	1.200	0.035	0.035	240	415	30

WORKMANSHIP : As per ASTM A135, all pipes are finished with Black Lacquer Coating or Galvanized (as per ASTM A90)

THREADING : As per ANSI B1.20.1

MARKING : Each pipe shall be stenciled as per ASTM A135 / Client Requirement.

"TIGER STEEL INDUSTRIES LLC / ASTM A135 NPS --" SCH NO--- GRADE A/B E HEAT NO.----- LENGTH----- / MADE IN U.A.E.

Value Addition: We are limiting the diameter tolerance upto ±0.50%D and Straightness 1 mm per meter



DIMENSION TABLE - ASTM A53/A795/A135 GRADE A & B

NPS	DN	DIAMETER		THICKNESS		SCH-NO	WEIGHT (PE)			WEIGHT (TC)			LENGTH (PE)		LENGTH (TC)		TEST PRESSURE (GRADE A)		TEST PRESSURE (GRADE B)		PCS PER BUNDLE
		Inch	mm	Inch	mm		Kg/Mtr	Kg/ft	lbs/ft	Kg/Mtr	Kg/ft	lbs/ft	Mtr/Ton	Ft/Ton	Mtr/Ton	Ft/Ton	PSI	KPa	PSI	KPa	
1/2	15	0.840	21.30	0.065	1.65	5	0.80	0.244	0.540	0.80	0.244	0.540	1250.0	4101.0	1250.0	4101.0	700	4800	700	4800	169
				0.083	2.11	10	1.00	0.305	0.670	1.00	0.305	0.670	1000.0	3280.8	1000.0	3280.8	700	4800	700	4800	169
				0.095	2.41	30	1.12	0.341	0.760	1.12	0.341	0.760	892.9	2929.3	892.9	2929.3	700	4800	700	4800	120
				0.109	2.77	40	1.27	0.387	0.850	1.27	0.387	0.860	787.4	2583.3	787.4	2583.3	700	4800	700	4800	120
3/4	20	1.050	26.70	0.065	1.65	5	1.03	0.314	0.690	1.03	0.314	0.690	970.9	3185.3	970.9	3185.3	700	4800	700	4800	127
				0.083	2.11	10	1.28	0.390	0.860	1.28	0.390	0.860	781.3	2563.2	781.3	2563.2	700	4800	700	4800	127
				0.095	2.41	30	1.44	0.439	0.970	1.44	0.439	0.970	694.4	2278.4	694.4	2278.4	700	4800	700	4800	84
				0.113	2.87	40	1.69	0.515	1.130	1.69	0.515	1.140	591.7	1941.3	591.7	1941.3	700	4800	700	4800	84
1	25	1.315	33.40	0.065	1.65	5	1.29	0.393	0.870	1.29	0.393	0.870	775.2	2543.3	775.2	2543.3	700	4800	700	4800	91
				0.109	2.77	10	2.09	0.637	1.410	2.09	0.637	1.410	478.5	1569.8	478.5	1569.8	700	4800	700	4800	91
				0.114	2.90	30	2.18	0.664	1.460	2.18	0.664	1.460	458.7	1505.0	458.7	1505.0	700	4800	700	4800	60
				0.133	3.38	40	2.50	0.762	1.680	2.50	0.762	1.690	400.0	1312.3	400.0	1312.3	700	4800	700	4800	60
1-1/4	32	1.660	42.20	0.065	1.65	5	1.65	0.503	1.110	1.65	0.503	1.110	606.1	1988.4	606.1	1988.4	700	4800	700	4800	61
				0.109	2.77	10	2.69	0.820	1.810	2.69	0.820	1.810	371.7	1219.6	371.7	1219.6	700	4800	700	4800	61
				0.117	2.97	30	2.87	0.875	1.930	2.87	0.875	1.930	348.4	1143.1	348.4	1143.1	700	4800	700	4800	42
				0.140	3.56	40	3.39	1.033	2.270	3.40	1.036	2.280	295.0	967.8	294.1	965.0	1200	8300	1300	9000	42
1-1/2	40	1.900	48.30	0.065	1.65	5	1.90	0.579	1.280	1.90	0.579	1.280	526.3	1726.8	526.3	1726.8	700	4800	700	4800	61
				0.109	2.77	10	3.11	0.948	2.090	3.11	0.948	2.090	321.5	1054.9	321.5	1054.9	700	4800	700	4800	61
				0.125	3.18	30	3.53	1.076	2.370	3.53	1.076	2.370	283.3	929.4	283.3	929.4	700	4800	700	4800	36
				0.145	3.68	40	4.05	1.234	2.720	4.04	1.231	2.740	246.9	810.1	247.5	812.1	1200	8300	1300	9000	36
2	50	2.375	60.30	0.065	1.65	5	2.39	0.728	1.610	2.39	0.728	1.610	418.4	1372.7	418.4	1372.7	700	4800	700	4800	37
				0.109	2.77	10	3.93	1.198	2.640	3.93	1.198	2.640	254.5	834.8	254.5	834.8	1640	11300	1920	13300	37
				0.125	3.18	30	4.48	1.366	3.010	4.48	1.366	3.010	223.2	732.3	223.2	732.3	1880	13000	2200	15200	26
				0.154	3.91	40	5.44	1.658	3.660	5.46	1.664	3.680	183.8	603.1	183.2	600.9	2300	15900	2500	17200	26
2-1/2	65	2.874	73.00	0.083	2.11	5	3.69	1.125	2.480	3.69	1.125	2.480	271.0	889.1	271.0	889.1	1040	7170	1210	8340	29
				0.120	3.05	10	5.26	1.603	3.530	5.26	1.603	3.530	190.1	623.7	190.1	623.7	1490	10300	1750	12100	29
				0.188	4.78	30	8.04	2.451	5.400	8.04	2.451	5.400	124.4	408.1	124.4	408.1	2340	16200	2500	17200	18
				0.203	5.16	40	8.63	2.630	5.800	8.67	2.643	5.850	115.9	380.2	115.3	378.4	2500	17200	2500	17200	18
3	80	3.500	88.90	0.083	2.11	5	4.52	1.378	3.030	4.52	1.378	3.030	221.2	725.8	221.2	725.8	850	5860	1000	6890	24
				0.120	3.05	10	6.46	1.969	4.340	6.46	1.969	4.340	154.8	507.9	154.8	507.9	1230	8500	1440	9900	24
				0.188	4.78	30	9.92	3.024	6.660	9.92	3.024	6.660	100.8	330.7	100.8	330.7	1930	13330	2260	15600	14
				0.216	5.49	40	11.29	3.441	7.580	11.35	3.459	7.680	88.6	290.6	88.1	289.1	2220	15300	2500	17200	14
3-1/2	90	4.000	101.60	0.083	2.11	5	5.18	1.579	3.480	5.18	1.579	3.480	193.1	633.4	193.1	633.4	750	5170	870	6000	19
				0.120	3.05	10	7.41	2.259	4.980	7.41	2.259	4.980	135.0	442.8	135.0	442.8	1080	7400	1270	8700	19
				0.188	4.78	30	11.41	3.478	7.660	11.41	3.478	7.660	87.6	287.5	87.6	287.5	1690	11700	1970	13600	12
				0.226	5.74	40	13.57	4.136	9.120	13.71	4.179	9.270	73.7	241.8	72.9	239.3	2030	14000	2370	16300	12
4	100	4.500	114.30	0.083	2.11	5	5.84	1.780	3.920	5.84	1.780	3.920	171.2	561.8	171.2	561.8	660	4550	780	5380	19
				0.120	3.05	10	8.37	2.551	5.620	8.37	2.551	5.620	119.5	392.0	119.5	392.0	970	6600	1130	7700	19
				0.188	4.78	30	12.91	3.935	8.670	12.91	3.935	8.670	77.5	254.1	77.5	254.1	1500	10300	1750	12100	10
				0.237	6.02	40	16.07	4.898	10.800	16.23	4.947	10.920	62.2	204.2	61.6	202.1	1900	13100	2210	15200	10
5	125	5.563	141.30	0.109	2.77	5	9.46	2.883	6.360	9.46	2.883	6.360	105.7	346.8	105.7	346.8	700	4800	820	5650	10
				0.134	3.40	10	11.56	3.523	7.780	11.56	3.523	7.780	86.5	283.8	86.5	283.8	870	6000	1020	7000	10
				0.188	4.78	*30	16.09	4.904	10.800	16.39	4.996	11.070	62.2	203.9	61.0	200.2	1220	8400	1420	9800	7
				0.258	6.55	40	21.77	6.635	14.630	22.07	6.727	14.900	45.9	150.7	45.3	148.7	1670	11500	1950	13400	7
6	150	6.625	168.30	0.109	2.77	5	11.31	3.447	7.590	11.31	3.447	7.590	88.4	290.1	88.4	290.1	590	4070	690	4760	10
				0.134	3.40	10	13.83	4.215	9.300	13.83	4.215	9.300	72.3	237.2	72.3	237.2	730	5000	860	5900	10
				0.219	5.56	*30	22.31	6.800	15.000	22.63	6.898	15.350	44.8	147.1	44.2	145.0	1190	8200	1390	9600	7
				0.280	7.11	40	28.26	8.614	18.990	28.58	8.711	19.340	35.4	116.1	35.0	114.8	1520	10500	1780	12300	7
8	200	8.625	219.10	0.109	2.77	5	14.78	4.505	9.920	14.78	4.505	9.920	67.7	222.0	67.7	222.0	460	3170	560	3860	5
				0.188	4.78	*10	25.26	7.699	16.960	25.26	7.699	16.960	39.6	129.9	39.6	129.9	780	5380	920	6340	5
				0.250	6.35	20	33.31	10.153	22.380	33.31	10.153	22.380	30.0	98.5	30.0	98.5	1040	7200	1220	8400	5
				0.277	7.04	30	36.81	11.220	24.720	38.07	11.604	25.530	27.2	89.1	26.3	86.2	1160	7800	1350	9300	5
				0.322	8.18	40	42.55	12.969	28.580	43.73	13.329	29.350	23.5	77.1	22.9	75.0	1340	9200	1570	10800	5

*Not Schedule 30 and ** Not Schedule 10 but considered as per Specification UL 852 & FM Class 1630.