

ATP-100 Coiled Tubing

ATP-100 is a thermally processed grade of coiled tubing with a uniform microstructure throughout the tubing that yields improved bias weld performance with respect to low-cycle fatigue accumulation and localized corrosion. ATP-100 can be ordered as either TRUE-TAPER™ or TRUE-TAPER XR, straight wall, or as a string with an electric wireline or capillary tube installed.

Mechanical properties

Minimum yield strength psi (MPa)	Minimum tensile strength psi (MPa)	Maximum hardness
100,000 (689)	110,000 (758)	28 HRC

Technical data

Specified

	Outside diameter, D		Wall thickness, t		Calculated inside diameter, d		Plain end mass, M _{pe}		Pipe metal cross sectional area, A		Pipe body yield load, L _y		Tensile load, L _t		Internal yield pressure, P _r		Hydro test pressure, P _T		Torsional yield strength, T _r	
	in.	mm	in.	mm	in.	mm	lb/ft	kg/m	in. ²	mm ²	lb	kg	lb	kg	psi	MPa	psi	MPa	ft-lb	N-m
1¾	44.5	0.134	3.4	1.482	37.64	2.314	3.444	0.680	439	68,020	30,840	74,830	33,930	14,740	101.6	11,700	80.6	2,450	3,310	
1¾	44.5	0.145	3.7	1.460	37.08	2.487	3.701	0.731	472	73,110	33,150	80,420	36,470	16,000	110.3	12,800	88.2	2,610	3,530	
1¾	44.5	0.156	4.0	1.438	36.53	2.658	3.955	0.781	504	78,110	35,420	85,920	38,960	17,250	118.9	13,800	95.1	2,750	3,720	
1¾	44.5	0.175	4.4	1.400	35.56	2.946	4.384	0.866	559	86,580	39,260	95,240	43,190	19,420	133.8	15,000	103.4	2,980	4,030	
1¾	44.5	0.188	4.8	1.374	34.90	3.138	4.670	0.923	595	92,250	41,830	101,470	46,010	20,910	144.1	15,000	103.4	3,130	4,240	
1¾	44.5	0.203	5.2	1.344	34.14	3.356	4.995	0.987	636	98,650	44,730	108,520	49,210	22,620	155.9	15,000	103.4	3,300	4,470	
1¾	44.5	0.224	5.7	1.302	33.07	3.653	5.437	1.074	693	107,380	48,690	118,120	53,560	25,020	172.5	15,000	103.4	3,510	4,750	
2	50.8	0.134	3.4	1.732	43.99	2.672	3.977	0.786	507	78,550	35,620	86,400	39,180	12,900	88.9	10,300	71.0	3,300	4,470	
2	50.8	0.145	3.7	1.710	43.43	2.875	4.278	0.845	545	84,490	38,310	92,940	42,140	14,000	96.5	11,200	77.2	3,510	4,750	
2	50.8	0.156	4.0	1.688	42.88	3.074	4.575	0.904	583	90,360	40,970	99,400	45,070	15,100	104.1	12,000	82.7	3,720	5,040	
2	50.8	0.175	4.4	1.650	41.91	3.413	5.080	1.003	647	100,330	45,490	110,360	50,040	17,000	117.2	13,600	93.7	4,050	5,480	
2	50.8	0.188	4.8	1.624	41.25	3.641	5.418	1.070	690	107,010	48,520	117,710	53,380	18,300	126.1	14,600	100.6	4,270	5,780	
2	50.8	0.203	5.2	1.594	40.49	3.899	5.802	1.146	739	114,590	51,960	126,050	57,160	19,800	136.5	15,000	103.4	4,500	6,090	
2	50.8	0.224	5.7	1.552	39.42	4.252	6.327	1.250	806	124,970	56,670	137,470	62,340	21,900	150.9	15,000	103.4	4,810	6,510	
2	50.8	0.236	6.0	1.528	38.81	4.449	6.621	1.308	844	130,780	59,300	143,860	65,240	23,100	159.2	15,000	103.4	4,980	6,740	
2	50.8	0.25	6.4	1.500	38.10	4.676	6.958	1.374	887	137,440	62,320	151,180	68,560	24,500	168.9	15,000	103.4	5,160	6,990	
2¾	60.3	0.134	3.4	2.107	53.52	3.209	4.776	0.943	609	94,330	42,770	103,770	47,060	10,860	74.8	8,600	59.2	4,810	6,510	
2¾	60.3	0.145	3.7	2.085	52.96	3.456	5.143	1.016	655	101,580	46,060	111,730	50,670	11,780	81.2	9,400	64.8	5,130	6,950	
2¾	60.3	0.156	4.0	2.063	52.40	3.700	5.506	1.087	702	108,740	49,310	119,620	54,240	12,710	87.6	10,100	69.6	5,450	7,380	
2¾	60.3	0.175	4.4	2.025	51.44	4.115	6.123	1.209	780	120,940	54,840	133,040	60,330	14,310	98.6	11,400	78.6	5,960	8,070	
2¾	60.3	0.188	4.8	1.999	50.77	4.394	6.539	1.292	833	129,160	58,570	142,080	64,430	15,410	106.2	12,300	84.8	6,300	8,530	
2¾	60.3	0.203	5.2	1.969	50.01	4.712	7.013	1.385	894	138,510	62,810	152,360	69,090	16,670	114.9	13,300	91.7	6,670	9,030	
2¾	60.3	0.224	5.7	1.927	48.95	5.149	7.663	1.514	977	151,360	68,640	166,500	75,510	18,440	127.1	14,700	101.3	7,170	9,710	
2¾	60.3	0.236	6.0	1.903	48.34	5.395	8.029	1.586	1,023	158,580	71,910	174,440	79,110	19,450	134.1	15,000	103.4	7,430	10,060	
2¾	60.3	0.25	6.4	1.875	47.63	5.678	8.449	1.669	1,077	166,890	75,680	183,580	83,250	20,630	142.2	15,000	103.4	7,730	10,470	
2¾	60.3	0.276	7.0	1.823	46.30	6.191	9.214	1.820	1,174	181,990	82,530	200,190	90,780	22,820	157.3	15,000	103.4	8,260	11,190	
2¾	60.3	0.281	7.1	1.813	46.05	6.289	9.358	1.849	1,193	184,850	83,820	203,330	92,210	23,240	160.2	15,000	103.4	8,350	11,310	
2¾	66.7	0.156	4.0	2.313	58.75	4.116	6.126	1.210	781	120,990	54,860	133,090	60,350	11,500	79.2	9,200	63.4	6,780	9,180	
2¾	66.7	0.175	4.4	2.275	57.79	4.582	6.819	1.347	869	134,690	61,080	148,160	67,190	12,950	89.2	10,300	71.0	7,440	10,080	
2¾	66.7	0.188	4.8	2.249	57.12	4.896	7.287	1.439	929	143,920	65,260	158,320	71,800	13,940	96.1	11,100	76.5	7,880	10,670	
2¾	66.7	0.203	5.2	2.219	56.36	5.255	7.820	1.545	996	154,450	70,040	169,900	77,050	15,080	103.9	12,000	82.7	8,360	11,320	
2¾	66.7	0.224	5.7	2.177	55.30	5.748	8.554	1.690	1,090	168,950	76,610	185,850	84,280	16,680	115	13,300	91.7	9,000	12,190	
2¾	66.7	0.236	6.0	2.153	54.69	6.026	8.967	1.771	1,143	177,110	80,310	194,830	88,350	17,600	121.3	14,000	96.5	9,350	12,660	
2¾	66.7	0.250	6.4	2.125	53.98	6.346	9.443	1.865	1,203	186,520	84,580	205,170	93,040	18,660	128.6	14,900	102.7	9,740	13,190	
2¾	66.7	0.276	7.0	2.073	52.65	6.929	10.311	2.037	1,314	203,670	92,360	224,030	101,600	20,640	142.3	15,000	103.4	10,440	14,140	
2¾	66.7	0.281	7.1	2.063	52.40	7.039	10.476	2.069	1,335	206,910	93,830	227,610	103,220	21,020	144.9	15,000	103.4	10,560	14,300	
2¾	66.7	0.300	7.6	2.025	51.44	7.454	11.093	2.191	1,414	219,110	99,360	241,030	109,310	22,470	154.9	15,000	103.4	11,030	14,940	

A Minimum wall thickness is 0.005 in. (0.13 mm) less than specified wall thickness.

B Pressures calculated based on t = 0.005 in. (0.13 mm).

C Maximum hydrostatic test pressure is 15,000 psi (103 MPa).

D Additional diameters and wall thicknesses may be available upon request.

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