

Strand Technical Data:

CTS® Rock and Soil Anchors meet the ASTM A-416 or ASTM A-488 (epoxy coated strand) specifications for 0.6", 7 wire strand.
 Ultimate stress (fpu) 270 ksi
 1861.65 N/mm²
 Weight per strand 0.74 lb./lf
 1.10 kg/m

They are in accordance to:
 "Recommendations for Prestressed Rock and Soil Anchors", Post Tensioning Institute (PTI), latest edition.
 "Ground Anchors and Anchored Systems", Geotechnical Engineering Circular No. 4, Federal Highway Administration, Washington DC, FHWA-IF-99-015, 1999

Strands	X-Section Area (APS)		Ultimate Load (fpu x APS) = GUTS		Max Jacking Load (80% of GUTS)		Max Design Load (60% of GUTS)		HDPE CORRUGATED SHEATHING		
	inch ²	mm ²	kips	kN	kips	kN	kips	kN	Nominal Diameter	Outside Diameter	
									inch	inch	mm
1	0.217	140	58.6	260.7	46.9	208.6	35.2	156.4	2"	2.4	61
2	0.434	280	117.2	521.3	93.8	417.1	70.4	312.8			
3	0.651	420	175.8	782.0	140.6	625.6	105.6	469.3			
4	0.868	560	234.4	1042.7	187.5	834.1	140.8	625.7	3"	3.6	91
5	1.085	700	293.0	1303.3	234.4	1042.7	176.0	782.1			
6	1.302	840	351.6	1564.0	281.3	1251.2	211.2	938.5			
7	1.519	980	410.2	1824.7	328.2	1459.7	246.4	1094.9	4"	4.6	119
8	1.736	1120	468.8	2085.3	375.0	1668.3	281.6	1251.4			
9	1.953	1260	527.4	2346.0	421.9	1876.8	316.8	1407.8			
10	2.17	1400	586.0	2606.7	468.8	2085.3	352.0	1564.2	5"	5.7	145
11	2.387	1540	644.6	2867.3	515.7	2293.9	387.2	1720.6			
12	2.604	1680	703.2	3128.0	562.6	2502.4	422.4	1877.0			
13	2.821	1820	761.8	3388.7	609.4	2710.9	457.6	2033.5	6"	7.1	180
14	3.038	1960	820.4	3649.3	656.3	2919.5	492.8	2189.9			
15	3.255	2100	879.0	3910.0	703.2	3128.0	528.0	2346.3			
16	3.472	2240	937.6	4170.7	750.1	3336.5	563.2	2502.7	8"	9.5	241
17	3.689	2380	996.2	4431.3	797.0	3545.1	598.4	2659.1			
18	3.906	2520	1054.8	4692.0	843.8	3753.6	633.6	2815.6			
19	4.123	2660	1113.4	4952.7	890.7	3962.1	668.8	2972.0	10"	11.6	295
20	4.34	2800	1172.0	5213.3	937.6	4170.7	703.2	3128.0			
21	4.557	2940	1230.6	5474.0	984.5	4379.2	738.4	3284.4			
22	4.774	3080	1289.2	5735.4	1031.4	4588.3	773.5	3441.2	N/A	N/A	N/A
27	5.859	3780	1582.2	7038.9	1265.8	5631.1	949.3	4223.3			
30	6.51	4200	1758.0	7821.0	1406.4	6256.8	1054.8	4692.6			
31	6.727	4340	1816.6	8081.7	1453.3	6465.4	1090.0	4849.0	N/A	N/A	N/A
37	8.029	5180	2168.2	9645.9	1734.6	7716.7	1300.9	5787.5			
47	10.199	6580	2754.2	12251.3	2203.4	9801.0	1654.4	7351.7			
60	13.02	8400	3516.0	15640.0	2812.8	12512.0	2112.0	9385.2	N/A	N/A	N/A
92	19.964	12880	5391.2	23981.3	4313.0	19185.0	3238.4	14390.6			

The drill hole size chosen should allow for a minimum grout cover over the corrugated sheath of 0.5" (12.7 mm).
 If our post-grout pressure lines are used, allow for a minimum of 1" (25.4 mm) grout cover on the side where the grout pipe is assembled.

Our centralizers are made to allow for a minimum of 0.5" (12.7 mm) grout cover or to a specified size.
 They are available as single wing parts (a minimum of 3 wings is required per location) or as multiple wing elements.
 Our strand organizers are fabricated to provide the minimum strand spacing recommended in the PTI manual.

For the most current technical information please go to our website: www.contechsystems.com

