



POSITION TAPER THREADED GRIP-TWIST® SYSTEM TEST DATA CONVERSION - 15M AND 20M (GRADE 400)

Lab Report & Reference No.		Bar Type	ASTM Bar Size Designation	ASTM Bar Area (in ²)	Max Load (lb)	Max Stress (psi)	Developed Stress %fy ASTM Gr 60 (metric Gr 420)	Equivalent CSA Designation	CSA Bar Area (mm ²)	Max Load (kN)	Equivalent Max Stress CSA Gr 400 (N/mm ²)	Equivalent Developed Stress %fy CSA Gr 400
5T3512*	5A	BLACK	No. 5	0.31	29,960	96,645	161%	15M	200	133.3	666	167%
5T6612	5A	BLACK	No. 5	0.31	34,040	109,806	183%	15M	200	151.4	757	189%
	5B		No. 5	0.31	34,500	111,290	185%	15M	200	153.5	767	192%
5T10990	5A	BLACK	No. 5	0.31	34,961	112,777	188%	15M	200	155.5	778	194%
	5B		No. 5	0.31	35,057	113,088	188%	15M	200	155.9	780	195%
5T11454	5A	BLACK	No. 5	0.31	36,117	116,507	194%	15M	200	160.6	803	201%
	5B		No. 5	0.31	35,373	114,107	190%	15M	200	157.3	787	197%
5T12973	5A	BLACK	No. 5	0.31	33,290	107,387	179%	15M	200	148.1	740	185%
	5B		No. 5	0.31	34,365	110,854	185%	15M	200	152.9	764	191%
6T635	6A	BLACK	No. 6	0.44	50,901	115,683	193%	20M	300	226.4	755	189%
	6B		No. 6	0.44	51,040	116,001	193%	20M	300	227.0	757	189%
6T1718	6A	BLACK	No. 6	0.44	47,270	107,432	179%	20M	300	210.3	701	175%
	6B		No. 6	0.44	50,010	113,659	189%	20M	300	222.4	741	185%
6T2282	6A	BLACK	No. 6	0.44	53,590	121,795	203%	20M	300	238.4	795	199%
	6B		No. 6	0.44	50,780	115,409	192%	20M	300	225.9	753	188%
6T7317	6A	BLACK	No. 6	0.44	47,005	106,829	178%	20M	300	209.1	697	174%
	6B		No. 6	0.44	48,146	109,423	182%	20M	300	214.2	714	178%

NOTES

All splices meet Type 2 requirement of ACI 318 Section 18 (100% f_u) Grade 60 bar, and CSA A23.3 Clause 12.14.3.4 requirement (120% f_y) Grade 400 bar. Results shown are from routine testing of various heat lots of completed coupler assemblies, per Barsplice Products, Inc. ISO 9001 Quality System. Conducted on reinforcing bars per ASTM A615 (or *A706) Grade 60, with a specified yield, $f_y = 60,000$ psi (420 N/mm²). Tests performed in accordance with ASTM A1034, Section 10.3, Monotonic Tension Tests, using load rates per ASTM A370. See Lab reports for stress versus displacement curves (stress versus cross-head position). ASTM = American Society for Testing and Materials, CSA = Canadian Standards Association



POSITION TAPER THREADED GRIP-TWIST® SYSTEM TEST DATA CONVERSION - 25M AND 30M (GRADE 400)

Lab Report & Reference No.		Bar Type	ASTM Bar Size Designation	ASTM Bar Area (in ²)	Max Load (lb)	Max Stress (psi)	Developed Stress % <i>f_y</i> ASTM Gr 60 (metric Gr 420)	Equivalent CSA Designation	CSA Bar Area (mm ²)	Max Load (kN)	Equivalent Max Stress CSA Gr 400 (N/mm ²)	Equivalent Developed Stress % <i>f_y</i> CSA Gr 400
8T649	8A	BLACK	No. 8	0.79	85,560	108,304	181%	25M	500	380.6	761	190%
	8B		No. 8	0.79	84,600	107,089	178%	25M	500	376.3	753	188%
8T1505	8A	BLACK	No. 8	0.79	86,610	109,633	183%	25M	500	385.2	770	193%
	8B		No. 8	0.79	85,850	108,671	181%	25M	500	381.9	764	191%
8T2530	8A	BLACK	No. 8	0.79	87,650	110,949	185%	25M	500	389.9	780	195%
	8B		No. 8	0.79	87,940	111,316	186%	25M	500	391.2	782	196%
8T3731	8A	BLACK	No. 8	0.79	88,798	112,402	187%	25M	500	395.0	790	197%
	8B		No. 8	0.79	90,819	114,961	192%	25M	500	404.0	808	202%
9T342	9A	BLACK	No. 9	1.00	109,162	109,162	182%	30M	700	485.6	694	173%
	9B		No. 9	1.00	110,132	110,132	184%	30M	700	489.9	700	175%
9T1091	9A	BLACK	No. 9	1.00	107,070	107,070	178%	30M	700	476.2	680	170%
	9B		No. 9	1.00	108,450	108,450	181%	30M	700	482.4	689	172%
9T1780	9A	BLACK	No. 9	1.00	114,410	114,410	191%	30M	700	508.9	727	182%
	9B		No. 9	1.00	115,040	115,040	192%	30M	700	511.7	731	183%
9T2100	9A	BLACK	No. 9	1.00	110,445	110,445	184%	30M	700	491.3	702	175%
	9B		No. 9	1.00	111,308	111,308	186%	30M	700	495.1	707	177%

NOTES

All splices meet Type 2 requirement of ACI 318 Section 18 (100% *f_u*) Grade 60 bar, and CSA A23.3 Clause 12.14.3.4 requirement (120% *f_y*) Grade 400 bar. Results shown are from routine testing of various heat lots of completed coupler assemblies, per Barsplice Products, Inc. ISO 9001 Quality System. Conducted on reinforcing bars per ASTM A615 (or *A706) Grade 60, with a specified yield, *f_y* = 60,000 psi (420 N/mm²). Tests performed in accordance with ASTM A1034, Section 10.3, Monotonic Tension Tests, using load rates per ASTM A370. See Lab reports for stress versus displacement curves (stress versus cross-head position). ASTM = American Society for Testing and Materials, CSA = Canadian Standards Association



POSITION TAPER THREADED GRIP-TWIST® SYSTEM TEST DATA CONVERSION - 35M AND 45M (GRADE 400)

Lab Report & Reference No.		Bar Type	ASTM Bar Size Designation	ASTM Bar Area (in ²)	Max Load (lb)	Max Stress (psi)	Developed Stress % <i>f_y</i> ASTM Gr 60 (metric Gr 420)	Equivalent CSA Designation	CSA Bar Area (mm ²)	Max Load (kN)	Equivalent Max Stress CSA Gr 400 (N/mm ²)	Equivalent Developed Stress % <i>f_y</i> CSA Gr 400
11T3832*	11A	BLACK	No. 11	1.56	175,620	112,577	188%	35M	1000	781.2	781	195%
11T4062	11A	BLACK	No. 11	1.56	159,460	102,218	170%	35M	1000	709.3	709	177%
	11B		No. 11	1.56	158,100	101,346	169%	35M	1000	703.2	703	176%
11T4193	11A	BLACK	No. 11	1.56	161,563	103,566	173%	35M	1000	718.6	719	180%
	11B		No. 11	1.56	162,736	104,318	174%	35M	1000	723.9	724	181%
11T4202*	11A	BLACK	No. 11	1.56	163,621	104,885	175%	35M	1000	727.8	728	182%
11T5618	11A	BLACK	No. 11	1.56	177,464	113,759	190%	35M	1000	789.4	789	197%
	11B		No. 11	1.56	179,152	114,841	191%	35M	1000	796.9	797	199%
11T5645	11A	BLACK	No. 11	1.56	180,980	116,013	193%	35M	1000	805.0	805	201%
	11B		No. 11	1.56	180,261	115,552	193%	35M	1000	801.8	802	200%
14T366	14A	BLACK	No. 14	2.25	243,650	108,289	180%	45M	1500	1083.8	723	181%
	14B		No. 14	2.25	241,101	107,156	179%	45M	1500	1072.4	715	179%
14T574	14A	BLACK	No. 14	2.25	231,811	103,027	172%	45M	1500	1031.1	687	172%
	14B		No. 14	2.25	230,531	102,458	171%	45M	1500	1025.4	684	171%
14T1119	14A	BLACK	No. 14	2.25	237,474	105,544	176%	45M	1500	1056.3	704	176%
	14B		No. 14	2.25	237,029	105,346	176%	45M	1500	1054.3	703	176%
14T1285*	14A	BLACK	No. 14	2.25	242,053	107,579	179%	45M	1500	1076.7	718	179%
14T1622	14A	BLACK	No. 14	2.25	250,272	111,232	185%	45M	1500	1113.2	742	186%
	14B		No. 14	2.25	249,435	110,860	185%	45M	1500	1109.5	740	185%

NOTES

All splices meet Type 2 requirement of ACI 318 Section 18 (100% *f_u*) Grade 60 bar, and CSA A23.3 Clause 12.14.3.4 requirement (120% *f_y*) Grade 400 bar. Results shown are from routine testing of various heat lots of completed coupler assemblies, per Barsplice Products, Inc. ISO 9001 Quality System. Conducted on reinforcing bars per ASTM A615 (or *A706) Grade 60, with a specified yield, *f_y* = 60,000 psi (420 N/mm²). Tests performed in accordance with ASTM A1034, Section 10.3, Monotonic Tension Tests, using load rates per ASTM A370. See Lab reports for stress versus displacement curves (stress versus cross-head position). ASTM = American Society for Testing and Materials, CSA = Canadian Standards Association



POSITION TAPER THREADED GRIP-TWIST® SYSTEM TEST DATA CONVERSION - 55M (GRADE 400)

Lab Report & Reference No.		Bar Type	ASTM Bar Size Designation	ASTM Bar Area (in ²)	Max Load (lb)	Max Stress (psi)	Developed Stress % <i>f_y</i> ASTM Gr 60 (metric Gr 420)	Equivalent CSA Designation	CSA Bar Area (mm ²)	Max Load (kN)	Equivalent Max Stress CSA Gr 400 (N/mm ²)	Equivalent Developed Stress % <i>f_y</i> CSA Gr 400
18T376	18A	BLACK	No. 18	4.00	436,648	109,162	182%	55M	2500	1942.2	777	194%
	18B		No. 18	4.00	440,528	110,132	184%	55M	2500	1959.5	784	196%
18T449*	18A	BLACK	No. 18	4.00	428,280	107,070	178%	55M	2500	1905.0	762	190%
18T724*	18A	BLACK	No. 18	4.00	457,640	114,410	191%	55M	2500	2035.6	814	204%
18T753	18A	BLACK	No. 18	4.00	441,780	110,445	184%	55M	2500	1965.0	786	197%
	18B		No. 18	4.00	445,232	111,308	186%	55M	2500	1980.4	792	198%
18T1056	18A	BLACK	No. 18	4.00	451,136	112,784	188%	55M	2500	2006.7	803	201%
	18B		No. 18	4.00	454,552	113,638	189%	55M	2500	2021.8	809	202%
18T1068	18A	BLACK	No. 18	4.00	430,616	107,654	179%	55M	2500	1915.4	766	192%
	18B		No. 18	4.00	422,460	105,615	176%	55M	2500	1879.1	752	188%

NOTES

All splices meet Type 2 requirement of ACI 318 Section 18 (100% *f_u*) Grade 60 bar, and CSA A23.3 Clause 12.14.3.4 requirement (120% *f_y*) Grade 400 bar. Results shown are from routine testing of various heat lots of completed coupler assemblies, per Barsplice Products, Inc. ISO 9001 Quality System. Conducted on reinforcing bars per ASTM A615 (or *A706) Grade 60, with a specified yield, *f_y* = 60,000 psi (420 N/mm²). Tests performed in accordance with ASTM A1034, Section 10.3, Monotonic Tension Tests, using load rates per ASTM A370. See Lab reports for stress versus displacement curves (stress versus cross-head position). ASTM = American Society for Testing and Materials, CSA = Canadian Standards Association