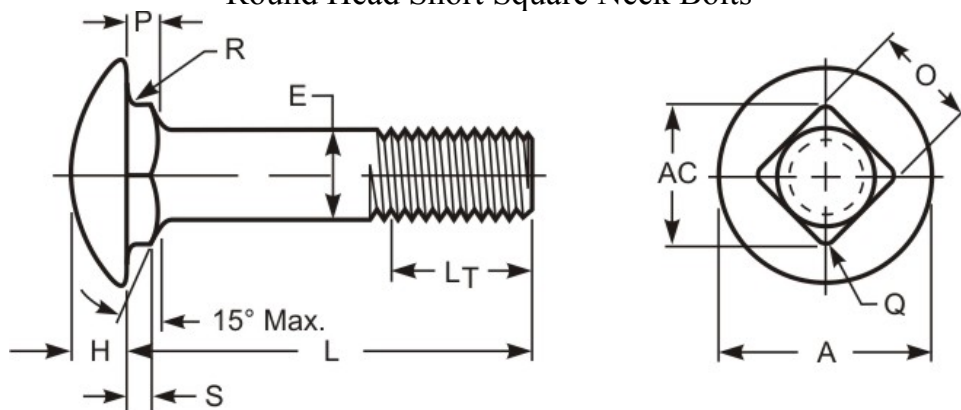


Round Head Short Square Neck Bolts



307A

GRADE MARK

THREAD DATA		
Size: 3/8	Threads per in.: 16	Series Designation: UNC
Thread Class or Type: 2A	Major Diameter: 0.3737 - 0.3643	Pitch and Functional Dia.: 0.3331 - 0.3287
Tensile Stress Area: 0.0775	Standard: ASME B1.1 - 2019	
DIMENSIONAL DATA		
Type: Round Head Short Square Neck Bolts	Standard: ASME B18.5-2017	Nominal Diameter: 0.375
E - Body Diameter : 0.388 - 0.329	A - Head Diameter: 0.844 - 0.782	R - Fillet Radius: 0.031 Max
H - Head Height: 0.208 - 0.188	L _T - Thread Length for Screw Length 6 in. or less: 1.000	Point Type: Non-pointed
O - Square Width: 0.388 - 0.368	P - Square Depth: 0.156 - 0.125	Q - Max. Corner Radius: 0.047
AC - Minimum Square Across Corners: 0.481	S - Minimum Square Corner Height: 0.068	L - Length: 2-1/2
Length Tolerance: +0.02/-0.04		
PHYSICAL REQUIREMENTS		
Nominal: 0.375	Standard: ASTM A307A-2014e1	Typical Materials: low carbon steel, 1006 through 1022
Hardness: HRB 69 - 100	Tensile Load, Min. (lbf): 4,650	Yield PSI, 2% Offset, Machined Specimen: 36,000
Elongation, min. %, Machined Specimen: 18	Tensile Strength, Min. (psi): 60,000	Calculated Shear Load-BODY (ref.)(lbf): 2,790
Calculated Shear Load-THREADS (ref.)(lbf): 2,325	Straightness Factor: 0.015	Calculated Pretension ² (lbf) : 2,093
Tightening Torque ¹ : 14 ft.lbf, 173 in.lbf, 19.5 Nm		
FINISH DATA		
Finish: Zinc & Clear, non-hexavalent/Cr(VI) free - .0001"/ 3Åµm	K factor (ref. DIN 946): 0.22	Standard: ASTM F1941/F1941M-2016, Fe/Zn 3AN

¹ These torque values are based on K factors determined using DIN 946, tightening tension of 75% of the yield strength, and the calculation formula $T=KDP$. These values are advisory only. The torque for assembling critical joints should be determined and/or verified through actual experimentation by the user. The IFI is not responsible for any losses or claims resulting from the use of these values. ² Calculated Pretension is equal to 75% of the bolt's yield strength achieved when using the indicated Tightening Torque.